



# SUNNICA ENERGY FARM

EN010106

Volume 8

8.8 Applicant's Response to the First Written Questions

Planning Act 2008

Infrastructure Planning (Applications: Prescribed Forms and Procedure) Regulations 2009



Planning Act 2008

**The Infrastructure Planning  
(Applications: Prescribed Forms and  
Procedure) Regulations 2009**

**Sunnica Energy Farm  
Development Consent Order 202[x]**

**8.8 Applicant's Response to the First Written Questions**

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## 1 Introduction

- 1.1.1 This report responds to the Examining Authority's (ExA) first written questions, issued on 4 October 2022 [PD-017]. It responds to each of the questions posed to the Applicant. The Applicant has not responded to questions posed to specific Interested Parties but will review those responses once available and may comment on those at Deadline 2.
- 1.1.2 Section 2 of this report is tabularised to include the ExA's questions and response to each question as follows:
- Principle and Nature of the Development (25 questions)
  - Air Quality and Human Health (65 questions)
  - Biodiversity and Nature Conservation (including Habitats Regulations Assessment) (34 questions)
  - Compulsory Acquisition, Temporary Possession and Other Land or Rights Considerations (36 questions)
  - Cultural Heritage and Historic Environment (14 questions)
  - Draft Development Consent Order (dDCO) (81 questions)
  - Environmental Statement – general matters (12 questions)
  - Landscape and Visual Effects (12 questions)
  - Noise and Vibration (2 questions)
  - Socio-Economics and Land Use (8 questions)
  - Traffic, Transport and Highway Safety (109 questions)
  - Water Resources, Flood Risk and Drainage (31 questions)

## 2 Topic 1.0 - Principle and Nature of the Development

ExQ1	Respondent	Question	Applicant's Response																			
Q1.0.1	The Applicant	<p><b>Design and Access Statement</b></p> <p>Of the opportunities and constraints listed in the Design and Access Statement [APP-264] para 2.3.1, please clarify which are regarded as opportunities and which as constraints.</p>	<p>The following table clarifies whether each of the opportunities and constraints listed in para 2.3.1 of the Design and Access Statement [APP-264] are opportunities, constraints, or both.</p> <table border="1"><thead><tr><th colspan="2">Opportunities and constraints listed in para 2.3.1 of the Design and Access Statement [APP-264]</th><th>Opportunity, Constraint or Both?</th></tr></thead><tbody><tr><td>a</td><td>The excellent topographical and landform characteristics of the Sites which meet the requirements of the Scheme to generate significant amounts of electricity and be able to store it;</td><td>Opportunity</td></tr><tr><td>b</td><td>The majority of the land being low grade, non best and most versatile (BMV) agricultural land.</td><td>Opportunity</td></tr><tr><td>c</td><td>The Sites being predominantly within Environment Agency Flood Zone 1 with only small areas of the Sites within Flood Zones 2 and 3.</td><td>Both</td></tr><tr><td>d</td><td>The Scheme location being predominantly rural and open in character but with industrial uses and the Strategic Road Network influencing the landscape character</td><td>Both</td></tr><tr><td>e</td><td>The lack of internationally and nationally designated biodiversity sites within the Order</td><td>Both</td></tr></tbody></table>		Opportunities and constraints listed in para 2.3.1 of the Design and Access Statement [APP-264]		Opportunity, Constraint or Both?	a	The excellent topographical and landform characteristics of the Sites which meet the requirements of the Scheme to generate significant amounts of electricity and be able to store it;	Opportunity	b	The majority of the land being low grade, non best and most versatile (BMV) agricultural land.	Opportunity	c	The Sites being predominantly within Environment Agency Flood Zone 1 with only small areas of the Sites within Flood Zones 2 and 3.	Both	d	The Scheme location being predominantly rural and open in character but with industrial uses and the Strategic Road Network influencing the landscape character	Both	e	The lack of internationally and nationally designated biodiversity sites within the Order	Both
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e	The lack of internationally and nationally designated biodiversity sites within the Order	Both																				

ExQ1	Respondent	Question	Applicant's Response		
				limits but the presence of such sites within close proximity.	
			f	The presence of stone curlew birds linked to the Breckland SPA and locally designated biodiversity sites within the Sites.	Constraint
			g	The presence of existing PRoW within and in close proximity to the Order limits.	Both
			h	The absence of any nationally or locally designated landscapes.	Opportunity
			i	The presence of existing vegetation within the Sites which can be retained and used to screen the Scheme.	Both
			j	The presence of heritage assets within and surrounding the Order limits and the design needing to respond to impacts on the setting of these assets and, also where possible, limit direct impacts on below ground archaeology.	Constraint
			k	The good transport access for construction, operational maintenance and decommissioning, with the Sites being adjacent to or in close proximity of A14 and A11 part of the Strategic Road Network.	Opportunity
			l	Residential receptors being within 500m of the Sites with the exception of Sunnica West Site B.	Both

ExQ1	Respondent	Question	Applicant's Response			
			m	The limited land use conflicts with respect to local development plan allocations and displacement of existing uses.	Both	
			n	The need to avoid existing infrastructure and provide appropriate easements.	Constraint	
<b>Q1.0.2</b>	The Applicant and/or East Cambridgeshire District Council and West Suffolk Council	<b>Impact on local populations</b> Please quantify how many residential properties are within 400m and 100m of the Order limits.	The Applicant has reviewed the AddressBase Core data available at <a href="https://www.emapsite.com">https://www.emapsite.com</a> and has identified 2517 residential addresses within 400m of the Order limits and 176 within 100m of the Order limits.			
<b>Q1.0.3</b>	The Applicant	<b>Good Design</b> Section 4.5 of the Overarching National Policy Statement (NPS) for Energy (EN-1) emphasises the importance placed on ensuring good design in the development of infrastructure projects. This matter is cross-cutting in relation to multiple topics identified within the Initial Assessment of Principal Issues. Although the NPS is the primary source of policy under which the application will be considered, policy within the National Planning Policy Framework (NPPF) advocates for good design as do the 'Design Principles for National Infrastructure', developed by the National Infrastructure Commission. Please outline your approach to good design in respect of the following key elements, focusing on emerging technology and how each element reflects the	<b>Introduction: Overall Approach to Good Design</b> As explained by section 6.3 of the Planning Statement [APP-261], and by the Design and Access Statement [APP-264], the design of the Scheme has been an iterative process, which commenced in 2015 at the initial feasibility stage. It has been guided by the "criteria for good design" set out in the Overarching National Policy Statement for Energy EN-1 (NPS), published landscape character assessments and fieldwork analysis. This has resulted in the design process responding to the 'setting' of the sites in order to develop a good design that takes advantage of the landscape and landform in order to reduce the impact of the Scheme on the landscape and limit the visual impact of the Scheme for sensitive receptors, thereby responding to 'place', i.e. how people experience their surroundings. The Design and Access Statement [APP-264] and section 10.7 of the ES Chapter 10, Landscape and Visual Amenity (LVIA) [APP-042] describe how the Scheme design achieves these objectives. In particular, this includes siting of the solar panels, substations and battery energy storage system (BESS) relative to existing landscape patterns, landform and vegetation, through: <ul style="list-style-type: none"> <li>careful siting of the Scheme in the landscape by the structures being offset from settlement edges, existing vegetation, including hedgerows and "pine lines", public rights of way and road networks;</li> </ul>			

ExQ1	Respondent	Question	Applicant's Response
		<p>principles of development responding to setting/place and people:</p> <ul style="list-style-type: none"> <li>a) solar panels: form and associated platforms;</li> <li>b) substations, transmission cables and grid connection;</li> <li>c) the size and location of the battery energy storage systems.</li> </ul>	<ul style="list-style-type: none"> <li>• conserving field patterns, ecology and historical features (including below ground archaeology) across the Order limits, including pine lines; and</li> <li>• creating new green infrastructure within the Order limits which integrates with networks across the study area and includes new permissive routes to provide linkages between Freckenham and Isleham and Red Lodge and Worlington.</li> </ul> <p>The Applicant has applied a hierarchical approach to the design, by first considering the location, scale and positioning of built elements within the existing landscape framework, as described above. Through this approach the design retains perception of characteristic features, e.g. Pine Lines, distant skylines, landmarks and visual connections between settlements, thereby responding to setting and place. This approach has been key to avoiding impacts on setting and place.</p> <p>Having carefully sited the Scheme in the landscape, the Applicant refined the design through various stages of the design development process, including taking account of feedback received from stakeholders at the non-statutory and statutory consultations, as described by the Design and Access Statement [APP-264]. For example, following statutory consultation, the Applicant substantially increased the stand-off to solar farm infrastructure from the south-west of Worlington by removing proposals for solar panels from the northern part of ECO1, identified by the Sunnica East Parameter Plan [APP-135]. The Applicant has prepared a Technical Note on Settlement Design Iteration, which is also submitted to the examination at this deadline. This explains in more detail how the Scheme has been refined through the design development process so as to be sympathetic to the setting and people's experience of the landscape and settlements.</p> <p>The design of individual components of the Scheme, including solar panels, substations, cables, and BESS has been considered in the hierarchical design process as part of the Scheme's approach to good design and following the careful siting of the overall Scheme that is described above. The following paragraphs address the components of the Scheme that are specifically referenced by parts a, b and c of the question.</p>

		<p><b>a) Solar panels: form and associated platforms [racks];</b></p> <p>Solar PV and battery energy storage technology is rapidly evolving. In preparing its design, the Applicant has made provision for technological innovation and improvement realised at the time of procurement and construction so that it can select products that may not have been brought to market yet. However, since future innovations cannot be predicted or guaranteed, it also needs to ensure the Scheme is deliverable using existing proven technology.</p> <p>As described by paragraph 3.5.9 of the Scheme Description [APP-0.35], the solar panels will be mounted on racks. We assume that the ExA's reference to 'platforms' intends to refer to these racks. The solar panels and associated racks have been designed to respond sensitively to setting and place, as described in the following paragraph.</p> <p>Through the design development process, the proposed heights of the solar panels have been reduced from 3.5 m above ground level to be a maximum of 2.5 m above ground level. This design decision will help the Scheme fit into the existing landscape framework and avoid or minimise visibility of panels above vegetation, including hedgerows which will be managed to a height of between 2m and 3m as part of the Scheme. The 2.5m height of the panels is lower than other solar NSIP projects. For comparison, maximum panel heights at the proposed Longfield Solar Farm are 3 m, at the consented Little Crow Solar Park are 3.5 m and at the consented Cleve Hill Solar Park are 3.9 m.</p> <p>Offsets of proposed solar PV arrays have also been increased through the design development process to reduce impacts on the setting of settlements and people's views. The edge of the solar PV array areas is also substantially offset from field boundaries, roads and PRoW to respond to the setting and minimise views of solar panels from people. Figures 8 to 13 of the Landscape and Ecology Management Plan [APP-108], provide illustrative cross sections which depict some of the offsets from roads, PRoW, properties, and hedgerows to solar panels that have been allowed for in the design of the Scheme. For example, these illustrate an offset of 118 m to solar panels from Beck Road (Figure 9) and an offset of 22 m to solar panels from PRoW U6006. In all cases, proposed or existing woodland and proposed grassland is incorporated into the design of the Scheme as part of offsets between solar panels and receptors.</p>
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ExQ1	Respondent	Question	Applicant's Response
			<p><b>b) Substations, transmission cables and grid connection;</b></p> <p>The Grid connection route has been carefully designed to avoid long term impacts to setting or on people's views by being located below ground, thereby avoiding the introduction of new pylons and visible electricity lines into the landscape. Similarly, onsite cabling would also be located either below ground or above ground in cable trays attached to other infrastructure.</p> <p>The Applicant has kept the parameter for the maximum heights of substations as low as practicable. The substations will be a maximum of 10m above ground level, responding to the generally flat or gently undulating character of the receiving landscape. This compares favourably to the proposed Longfield Solar Farm (13 m) and the consented Cleve Hill (12.8 m) (the maximum height of the proposed substation at the consented Little Crow Solar Park does not appear to be stated or constrained).</p> <p>In terms of location, the siting of the substations has been informed by the Environmental Impact Assessment, particularly the LVIA, biodiversity and heritage assessments retaining and reinforcing the existing landscape features and framework to structure the Scheme, break up scale and mass, provide visual screening and enhanced habitat connectivity. The substation at Sunnica East Site B has been sited so that it is enclosed by existing woodland vegetation to the north and in part by roadside vegetation to the south-east (Elms Road) in order to minimise its impact on its surroundings. Substations at Sunnica East Site A and Sunnica West Site B have been sited in locations that are remote from settlements, and have avoided higher ground and close proximity to public rights of way. Proposals for substantial planting to reinforce the landscape framework and enhance screening of these substations is also proposed. In addition, the substation in Sunnica West Site A has been sited adjacent to barns and mature woodland of Sounds Plantation and the substation at Sunnica East Site A is adjacent to reservoirs and Lee Farm, which will help the massing and land use be perceived in the context of existing infrastructure features and built structures in the landscape.</p> <p><b>c) The size and location of the battery energy storage systems</b></p>

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			<p>c) The BESS has been co-located with the substations, with the siting selected for the same reasons as set out in (b), above. The design decision to consolidate BESS and substation infrastructure was also made in order to help minimise the impact of these features on the landscape and people's views.</p> <p>The Applicant also made the design decision that the maximum parameters for the dimensions of each BESS container will be 17 m x 5 m footprint and a maximum of 6 m in height above ground level. The maximum height parameter represents containers being single stacked, thereby minimising their height, in order to help them fit in with their surroundings. The Applicant has also committed through the Design Principles submitted as Appendix B of the Design and Access Statement [APP-264] that the external finish of BESS containers will be in keeping with the prevailing surrounding environment, most likely with a green, light grey or white painted finish.</p>
Q1.0.4	The Applicant	<p><b>Design principles</b></p> <p>In the context of EN-1 paragraph 4.5.5, explain how the design of the proposed development meets the National Infrastructure Commission's Design Principles for National Infrastructure (February 2020) in respect of Climate, Places, People and Value, in all three phases of construction, operation and decommissioning.</p>	<p><b><u>Operational Phase</u></b></p> <p><b>Climate</b></p> <p>Regarding climate, the 'Design Principles for National Infrastructure', developed by the National Infrastructure Commission (NIC Design Principles) set out that projects should "<i>Mitigate Greenhouse gas emissions and adapt to climate change</i>".</p> <p>The Scheme will generate a substantial amount of renewable energy that would be delivered to the NETS. By doing this it would save approximately 1 million tonnes CO<sub>2</sub> over its lifetime, making a substantial contribution to the achievement of net zero targets. In this respect the Scheme directly responds to the NIC Design Principles objective that infrastructure should help meet net zero and support an environmentally sustainable society. The Scheme will contribute to the decarbonisation of the NETS, and thereby help all people or businesses that use power from the NETS to reduce their wider climate impacts, as per the NIC Design Principles objective.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>In addition, the design of the Scheme will deliver substantial new areas of vegetation that will sequester carbon and contribute to delivery of a biodiversity net gain which would increase ecosystem resilience.</p> <p><b>Places</b></p> <p>Regarding places, the NIC Design Principles set out that projects should "<i>Provide a sense of identity and improve our environment</i>".</p> <p>The design of the Scheme has been shaped by detailed studies of the character of the landscape and settlements and engagement with stakeholders including through community consultation. As a result of the design approach taken by the Applicant, the design of the Scheme incorporates offsets from solar farm structures to settlement edges, existing vegetation, including hedgerows, public rights of way and road networks. The design of the Scheme also conserves field patterns, ecology and historical features (including below ground archaeology) across the Order limits, including pine lines. This approach preserves the sense of identity of the landscape.</p> <p>The Design and Access Statement [APP-264] describes how the Applicant's approach to the development of the design of the Scheme has been sensitive to place and local character, including as described below.</p> <ul style="list-style-type: none"><li>• The Applicant identified land with optimal topography within which to locate a large scale solar development to maximise energy generation but which could be successfully integrated to reduce landscape and visual impact (paragraph 3.3.2).</li><li>• The Applicant's masterplanning process incorporated careful siting of the Scheme in the landscape by offsetting structures from existing vegetation and conserving existing landscape features across the sites (paragraphs 3.5.5 and 3.5.18).</li><li>• The Applicant has avoided infrastructure within high value archaeological mitigation areas identified through geophysical surveys and avoided any direct impacts on the Scheduled monument within the Order limits with appropriate offsets and screening from this asset (3.5.18).</li></ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"><li>• The Applicant's landscape design strategy integrates the Scheme into the landscape; responds to landscape character, amenity, cultural and natural heritage aspects; and reinforces and creates new connections through the landscape to be used by local communities (paragraph 3.5.7).</li><li>• The Applicant reduced the proposed heights of BESS and solar PV arrays through the design development process to minimise visual impacts and better integrate into its surroundings (paragraph 3.5.15).</li><li>• The Applicant has sensitively sited the larger structures (substations and BESS) that form part of the Scheme in order to maximise screening, proximity to existing built structures, and to help minimise views (paragraph 3.5.18).</li><li>• Offsets from settlements, roads and PROW have been incorporated into the design of the Scheme (paragraph 3.5.18).</li><li>• Through the design development process, proposals for solar PV arrays in E07 as shown on Figure 3-7 of the Design and Access Statement [APP-264] have been removed from the Scheme in order to avoid impacts on the open character of the landscape between Freckenham and Isleham to the west of Beck Road (paragraph 3.6.7).</li><li>• Additional infill planting of the Avenue of Chippenham, in addition to the planting proposed in the solar PV areas which are adjacent, is proposed. This will reinforce this historic linear feature (paragraph 3.6.7).</li></ul> <p>To expand on some of the points above, the Applicant has prepared a Technical Note on Settlement Design Iteration, which is also submitted to the examination at this deadline. This explains in more detail how the Scheme has been refined through the design development process so as to be sympathetic to its setting.</p> <p>As set out in the Design and Access Statement [APP-264] paragraph 3.7.1, over 30% of the area of the Sites will be used to provide green infrastructure, including new woodlands and hedgerows. In addition, the Scheme will also deliver new permissive routes and a biodiversity net gain which will contribute to enhancement of the area and improvement of the environment, as per the NIC Design Principles objective.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>ES Chapter 10, Landscape and Visual Amenity [APP-042] recognises impacts where they occur, but also demonstrates that these impacts are not consistent across the Scheme and have been reduced through good design including embedded mitigation which retains key landscape features and characteristics that contribute to sense of place. Overall, the above demonstrates that the Scheme has been designed sensitively to place and contributes to the quality of the local area as far as practicable, as per NPS EN-1 paragraphs 4.5.1 and 4.5.3 and draft NPS EN-1 paragraphs 4.6.1 and 4.6.3 and the NIC design principles.</p> <p><b>People</b></p> <p>Regarding people, the NIC Design Principles set out that projects should “<i>Reflect what society wants and share benefits widely</i>”.</p> <p>RenewableUK Topic Polling Conducted by Survation on behalf of RenewableUK published on 6 September 2022 shows that there is overwhelming public support for building new wind and solar farms to tackle the cost of the energy crisis. The national polling was conducted by Survation using a fully weighted sample of 6,114 people throughout the UK from 27th July to 4th August 2022. This showed that 81% of respondents support energy generation from solar, with only 9% opposing it. Solar was the most popular generation technology, with support for offshore wind (76%), onshore wind (74%), tidal energy (72%), wave energy (72%) also popular (but less so). Support for nuclear (49%), gas from fracking on land (34%), north sea gas (56%) and biomass (45%) was notably lower. In addition, 76% of respondents responded that they support renewable energy projects in their local area, with only 12% opposing. 77% of respondents responded that the UK Government should use wind and solar farms to reduce energy bills.</p> <p>The design of the Scheme will respond directly to what society wants by generating a large amount of renewable electricity to be shared widely by distributing that electricity via the National Electricity Transmission System (NETS). This will make a substantial contribution to helping to deliver a secure, affordable, and low carbon electricity supply, which underpins our quality of life, as explained by Paragraph 3.2.1 of NPS EN-1.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Under the 'people' topic, the NIC Design Principles go on to state that:</p> <p><i>"Infrastructure should be designed for people, not for architects or engineers. It should be human scale, easy to navigate and instinctive to use, helping to improve the quality of life of everyone who comes into contact with it. This means reliable and inclusive services. It means accessible, enjoyable and safe spaces with clean air that improve health and wellbeing."</i></p> <p>The majority of land within Order limits is currently private with no or limited public access via public rights of way or roads. As such, the principles relating to navigation and instinctive use are less applicable for the Scheme than they would be for more publicly accessible development types. However, care has been taken in the design to retain and set built elements of the Scheme back from PRoW and to enhance vegetation in order to reduce visibility and soften views of solar farm infrastructure from PRoW, as explained by ES Chapter 10, Landscape and Visual Amenity [APP-042].</p> <p>The Scheme has also been carefully designed so that no public rights of way will be closed or diverted during the operational phase. In addition, the design of the Scheme takes opportunities to enhance access by providing additional off-road permissive paths, connecting settlements and the wider countryside, providing a benefit to quality of life. The Scheme avoids land use conflicts that would result in the loss of publicly accessible open spaces, sports or recreational facilities that help to underpin people's quality of life.</p> <p>Regarding scale, the extent of the Scheme is required in order to generate a large amount of electricity in order to deliver the secure, low cost, renewable electricity generation benefits that society needs. Regarding Scheme components, care has been taken in the design of the Scheme to keep these as small-scale as is practicable whilst seeking to balance that with technical design requirements and performance outcomes. Given that they are the main component of the solar farm, particular attention has been given to the scale of PV arrays. These have been designed to be a maximum of 2.5m high. This will help avoid or minimise visibility of panels above hedgerows which will be managed to a height of between 2m and 3m as part of the Scheme. The 2.5m height of the panels is substantially lower than other comparable projects. For comparison, maximum</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>panel heights at Longfield Solar Farm are proposed are 3m, at Little Crow Solar Park are 3.5 m and at Cleve Hill Solar Park are 3.9 m. In addition, the Applicant has sought to keep the maximum heights of substations as low as practicable. These will be a maximum height of maximum of 10 m, which compares favourably to other similar projects.</p> <p>The final paragraph under the 'people' topic of the NIC Design Principles states that:</p> <p><i>"The range of views of communities affected by the infrastructure must be taken into account and reflected in the design. While it won't always be possible to please everyone, engagement should be diverse, open and sincere, addressing inevitable tensions in good faith and finding the right balance. And it should not just be designed for people today. Good design will plan for future changes in demographics and population."</i></p> <p>The Applicant has developed the design of the Scheme through various stages, taking account of feedback received from stakeholders, including having full regard to the views expressed by members of local communities, at the non-statutory and statutory consultations, as described by the Design and Access Statement [APP-264]. For example, following feedback received at statutory consultation, proposals for solar panels were removed from parcels W13, W14, and E07 that are shown on Figures 3-7 and 3-8 of the Design and Access Statement [APP-264] (Parameter Plan as presented in the PEIR Report). The purposes of these changes were, respectively, to reduce the overall massing of the Scheme and to retain the open character of the landscape between Freckenham and Isleham to the west of Beck Road. This is one example of how the Scheme has taken account of the views of communities, as per the NIC Design Principles. The Consultation Report and its appendices [APP-026 to APP-031] detail how each comment made during the statutory consultation has been taken into account by the Applicant.</p> <p><b>Value</b></p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Regarding value, the NIC Design Principles set out that projects should “<i>achieve multiple benefits and solve problems well</i>”.</p> <p>The design development of the Scheme has followed a landscape-led approach, embedding green infrastructure principles to deliver a multi-functional landscape framework, responding to place and delivering benefits to people and nature beyond. Through this approach, and in accordance with this NIC Design Principle, the Scheme has been designed to deliver benefits beyond the main purpose of the Scheme, which is to generate a large amount of renewable electricity that is urgently needed to provide a secure, affordable and low carbon energy system.</p> <p>Section 4.7 of the Planning Statement [APP-261] summarises the additional benefits of the Scheme that add further value to the Scheme for people and the environment. Through the creation and enhancement of habitats, the Scheme is expected to deliver a biodiversity net gain of approximately 83% for habitat units, 16% for hedgerow units, and 1% for river units. The Landscape and Ecology Management Plan [APP-108] sets out the design measures through which biodiversity net gain will be achieved.</p> <p>The Scheme incorporates ten areas of high value significant archaeological activity (totalling approximately 97 ha). The design of the Scheme has safeguarded these from development in order to preserve any archaeology present in these areas in situ. These areas are retained within the Order limits and the design of the Scheme proposes that they are managed as native grassland. This will remove them from agricultural use for the duration of the Scheme, which will protect assets from harm as a result of ploughing.</p> <p>The design of the Scheme also incorporates three permissive routes. These permissive routes will enable increased public access across the landscape of the local area.</p> <p><b><u>Construction and Decommissioning Phases</u></b></p> <p><b>Climate</b></p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Paragraphs 6.7.1, 6.7.2, 6.7.5 and 6.7.6 of Chapter 6, Climate Change, of the ES [APP-038] set out measures that have been embedded into the design of the construction and decommissioning of the Scheme in order to reduce the greenhouse gas impact of the Scheme. These include:</p> <ul style="list-style-type: none"><li>• minimising the creation of waste and maximising the use of alternative materials with lower embodied carbon, such as locally sourced products and materials with a higher recycled content where feasible;</li><li>• segregation and recycling of construction and decommissioning waste where reasonably practicable;</li><li>• encouraging the use of lower carbon modes of transport and car sharing;</li><li>• switching vehicles and plant off when not in use and conducting regular planned maintenance</li></ul> <p>The above are secured by the Framework Construction Environmental Management Plan [APP-123] and the Framework Decommissioning Environmental Management Plan [APP-125], which are referenced by Requirements 14 and 22 of Schedule 2 of the draft DCO [APP-019].</p> <p><b>People and Places</b></p> <p>Measures that will control and minimise the construction and decommissioning impacts on people and places have been an important part of the design and are set out and secured through the Framework Construction Environmental Management Plan (CEMP) [APP-123] and the Framework Decommissioning Environmental Management Plan (DEMP) [APP-125].</p> <p><b>Value</b></p> <p>The construction and decommissioning phases of the Scheme will create significant employment opportunities. The Applicant is also committing to implementing a Skills, Supply Chain and Employment Plan for the construction of the Scheme which will include provision of employment opportunities for local people. This is proposed to be a requirement of the DCO. An Outline Skills, Supply Chain and Employment Plan [APP-268] accompanies the Application.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.0.5	The Applicant, and relevant Local Authorities and Statutory Parties	<p><b>Design principles</b></p> <p>The National Infrastructure Strategy (November 2020) states that:</p> <p><i>"All infrastructure projects to have a board level Design Champion in place by the end of 2021 at either the project, programme or organisational level, supported ... by design panels".</i></p> <p>i) Comment on the desirability of implementing the following measures to ensure that good quality sustainable design and integration of the proposed development, particularly the solar panels, BESS and substations, into the landscape is achieved in the detailed design, construction and operation of the projects.</p> <ul style="list-style-type: none"> <li>• A Design Champion to advise on the quality of sustainable design and the spatial integration of energy infrastructure structures, buildings, compounds, security fences, landscape, heritage, woodland, new landscape features, public rights of way and visual amenity.</li> <li>• A 'design review panel' to provide informed 'critical-friend' comment on the developing sustainable design proposals;</li> <li>• An approved 'design code' or 'design approach document' (as approved in the Hinkley Point C Connector Project) to set out the approach to delivering the detailed design specifications to achieve good quality sustainable design;</li> </ul>	<p><b>Introduction: How the Scheme delivers good design</b></p> <p>As explained by section 6.3 of the Planning Statement [APP-261], and by the Design and Access Statement [APP-264], the design of the Scheme has been an iterative process, which commenced in 2015 at the initial feasibility stage. The design process has been guided by professionals who have influenced the design from the earliest stage, including a team of landscape architects working closely with engineers and other disciplines to ensure a fully integrated approach to the design and evolution of the Scheme. The Scheme design presented in the DCO application was completed in 2021, which is before the date by which the National Infrastructure Commission suggested a Design Champion or Design Panel should be in place.</p> <p>The design development of the Scheme has followed a hierarchical approach by first considering the location, scale and positioning of built elements within the existing landscape framework, having regard to landform and landscape features. This approach secures the spatial integration of the energy infrastructure and associated structure and landscaping from the outset of the design process. Having carefully sited the Scheme in the landscape, the Applicant has refined the design through various stages, including taking account of feedback received from stakeholders at the non-statutory and statutory consultations. This includes refinements to reduce the proposed maximum height parameters of infrastructure including solar panels, and amendments to the Scheme in order to increase offsets of solar farm infrastructure from settlement edges, existing vegetation, public rights of way and road networks. The Applicant has prepared a Technical Note on Settlement Design Iteration, which is also submitted to the examination at this deadline to provide more detail on how the design of the Scheme has developed. The landscape-led approach to the design of the Scheme has also enabled green infrastructure principles to be embedded into the Scheme, delivering a multi-functional landscape framework.</p> <p>The design approach of the Applicant that is described above has delivered good quality sustainable design through the strategic design decisions that have been made since an early stage in the project, enabling the Scheme to respond to landform, local character and features.</p> <p><b>How the Design is secured</b></p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• An outline, including timeline, of the proposed design process, including consultation with stakeholders and a list of proposed consultees.</li> </ul> <p>ii) What qualifications and experience should the Design Champion have?</p> <p>iii) How might the above measures be secured? and:</p> <p>iv) Are any further measures needed? and In the opinion of the local authorities and other statutory parties, would the implementation of any or all of the above measures assist in determining post-consent approvals (including the discharge of requirements) in relation to achieving good design?</p>	<p>The design of the Scheme will be secured by the Development Consent Order, should consent be granted. The location and extent of the different elements of the Scheme are defined and secured by Article 3(2) which requires each of the numbered works defined by Schedule 1 of the Draft DCO [APP-019] to be located within the corresponding numbered area shown on the Works Plans [APP-007]. Parameters that define the maximum dimensions, the nature, materials, and appearance of components of the Scheme are set out as Design Principles which are submitted as Appendix B of the Design and Access Statement [APP-264]. For example, the design principles control the maximum area of solar PV infrastructure on each of the Sites, the colour or appearance of infrastructure, and the maximum heights and footprint of elements of the Scheme. Requirement 6 of Schedule 2 of the Draft DCO [APP-019] (detailed design approval) requires that the details of the Scheme submitted for approval must accord with the Design Principles, thereby securing the delivery of the Scheme within the parameters they set out.</p> <p>The green infrastructure design of the Scheme as set out by the Outline Landscape and Ecology Management Plan (OLEMP) [APP-108] (including the Landscape Masterplan) is secured by Requirement 8 of Schedule 2 of the Draft DCO [APP-019]. This Requirement requires a written landscape and ecology management plan that accords substantially with the OLEMP to be prepared and approved prior to commencement of the authorised development, and that the approved management plan must then be implemented, thereby securing the green infrastructure design benefits that the OLEMP describes.</p> <p><b>Detailed design approval</b></p> <p>Requirement 6 of Schedule 2 of the Draft DCO [APP-019] requires the details of the design of the Scheme within the parameters and locations already defined by Development Consent Order to be approved by the applicable host Local Planning Authority. This relates to the following:</p> <ul style="list-style-type: none"> <li>a) the detail of the layout within numbered works areas;</li> <li>b) the scale of the components of the Scheme;</li> <li>c) proposed finished ground levels;</li> <li>d) external appearance;</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>e) hard surfacing materials;</p> <p>f) vehicular and pedestrian access, parking and circulation areas;</p> <p>g) refuse or other storage units, signs and lighting;</p> <p>h) drainage, water, power and communications cables and pipelines; and</p> <p>i) programme for landscaping works.</p> <p>The details to be submitted and approved must be in accordance with the design principles (and the flood risk assessment in particular with respect to the detail of the site relating to drainage and water). The detailed design submitted for approval must also comply with restrictions imposed via the Works Plans (via Article 3(2) as noted above).</p> <p>There is limited scope for design in terms of the infrastructure itself (for example PV panels, transformers and inverters, the BESS and battery stations, substations and control buildings) and other details listed above, as the design or appearance of those elements is dictated largely by functionality and technological or engineering requirements. What remains in terms of aesthetics is secured via the Design Principles (e.g. maximum heights, colours). As is explained below, the success of the Scheme in terms of good design is more reliant upon the overall design of the Scheme and how it has been sited and designed to be sensitive to the landscape and to integrate elements such as landscaping, screening and green infrastructure. The Applicant therefore considers that the detailed design requirement in place, and the design principles it secures, is appropriate and proportionate to the limited level of design input required at the point of detailed design approval.</p> <p><b>i) Comment on the desirability of implementing a Design Champion, Design Panel, Design Code/Approach, and/or Design Timetable</b></p> <p>In light of the above and noting that a landscape architect would retain a role in the detailed design, the Applicant considers that there would be limited value in the inclusion of a Design Champion or Design Panel. This is because given the nature of the Scheme, good design is achieved at a higher level than the design details that remain to be developed. Good design for the Scheme primarily comprises matters such as the siting of key elements based on landform and landscape features, distance from receptors, and integration of landscaping.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>These have already been subject to an iterative design process guided by professionals who have influenced the design from the earliest stage, including a team of landscape architects working closely with engineers and other disciplines. Having carefully developed the strategic elements of the Scheme design that are critical to the achievement of good design, only limited elements of the design remain to be finalised. These are already controlled by parameters defined by the Design Principles and OLEMP. There therefore remains limited potential for these elements to affect the delivery of good design.</p> <p>A process and timetable for approval by the relevant host Local Planning Authority of the remaining design elements and of a written landscape and ecology management plan is already in place under the DCO Requirements. The Applicant therefore considers that this, along with the Design Principles, effectively provides a Design Code, Design Approach, and Design Timeline, and that additional documents with these titles would be of limited or no benefit to the delivery of good design.</p> <p><b>ii) What qualifications and experience should the Design Champion have?</b></p> <p>The Applicant does not consider that a Design Champion would be desirable or beneficial to the delivery phase of the project, since good design has been achieved at a higher level and landscape architect is expected to retain a role in detailed design. However, if a Design Champion was to be implemented, it should be someone with experience of delivery of large-scale solar farms. In addition, if a Design Champion was implemented, their remit should be tightly defined within the elements of the design that remain to be developed and the parameters that are already set out for those elements.</p> <p><b>iii) How might the above measures be secured?</b></p> <p>The Applicant considers that design matters are adequately addressed through the DCO Requirements as set out above.</p> <p><b>iv) Are any further measures needed?</b></p> <p>The Applicant considers that no further measures are needed.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.0.6	The Applicant	<p><b>Good Design: substations and connection to the national grid</b></p> <p>EN-1 section 4.5 criteria for 'good design' for energy infrastructure states that applying good design to energy projects should produce infrastructure that is sustainable, sensitive to place, efficient in the use of natural resources and energy used in their construction and operation and be matched by an appearance that demonstrates good aesthetics as far as possible.</p> <p>Paragraph 4.5.3 of EN-1 requires applicants to take into account both functionality and aesthetics (including its contribution to the quality of the area in which it would be located) and encourages an applicant to take opportunities to demonstrate good design in terms of siting relative to existing landscape character, landform and vegetation.</p> <p>Explain how the criteria set out in EN-1 have been met in the location, layout, design and proposed mitigation in respect of the Sunnica and National Grid substations and proposed alternative grid connection locations at Burwell.</p>	<p>Following acceptance of the Changes Application, onsite (Sunnica) substations are proposed at Sunnica West Site A, Sunnica East Site A and Sunnica East Site B. Substations would be constructed in those locations regardless of whether Option 2 or Option 3 is pursued. In addition, a National Grid Substation extension would be constructed adjacent to the existing Burwell National Grid Substation only if Option 2 is pursued.</p> <p>Through the Applicant's application of good design, the substations will be sensitive to place and have been sited carefully relative to existing landscape character, landform and vegetation.</p> <p>The siting of the onsite (Sunnica) substations has been informed by the Environmental Impact Assessment, particularly the LVIA, biodiversity and heritage assessments retaining and reinforcing the existing landscape features and framework to structure the Scheme, break up scale and mass, provide visual screening and enhanced habitat connectivity. The substation at Sunnica East Site B has been sited so that it is enclosed by existing woodland vegetation to the north and in part by roadside vegetation to the south-east (Elms Road) in order to minimise its impact on its surroundings. Substations at Sunnica East Site A and Sunnica West Site B have been sited in locations that are remote from settlements, and have avoided higher ground and close proximity to public rights of way. Proposals for substantial planting to reinforce the landscape framework and enhance screening of these substations is also proposed, as set out by the Landscape and Ecology Management Plan [APP-108]. In addition, the substation in Sunnica West Site A has been sited adjacent to barns and mature woodland of Sounds Plantation and the substation at Sunnica East Site A is adjacent to reservoirs and Lee Farm, which will help the massing and land use be perceived in the context of existing infrastructure features and built structures in the landscape. The onsite substations have also been sited so as to be located within flood zone 1.</p> <p>The National Grid substation extension, should it be required, has been designed to be located adjacent to the existing Burwell National Grid, so that its nature and massing would be perceived in the context of the existing substation.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>In terms of the aesthetics of the substations, the appearance and nature of substation infrastructure is a direct result of its technical requirements and function. There is therefore no realistic potential to significantly affect the aesthetic appearance of substation infrastructure itself through design. However, the design of the Scheme has sought to locate substation infrastructure carefully in the landscape to preserve the quality of the area, as described by the paragraphs above. In addition, the Applicant has kept the maximum height parameters of substations as low as practicable. The onsite substations will be a maximum of 10m above ground level, and the National Grid Substation Extension (if needed) would be a maximum height of 12m above ground level, responding to the generally flat or gently undulating character of the receiving landscape, and maximum dimensions in this respect are secured via the Design Principles.</p> <p>In terms of efficient use of natural resources and sustainability, the materials required for the construction of substations are a direct result of their technical requirements and function. Framework Construction Environmental Management Plan (CEMP) [APP-123] sets out measures that will be employed to ensure the efficient and sustainable use of natural resources in the construction of the Scheme at Table 3-1 and at Table 3-11 commits to the preparation of a Construction Resource Management Plan (CRMP), which will set out targets for fuel, waste and energy consumption. The Decommissioning Environmental Management Plan [APP-125] sets out that at the end of the Scheme's operational life each of the onsite (Sunnica) substations will be decommissioned, removed from the Sites and recycled or disposed of in accordance with good practice at the time.</p>
<b>Q1.0.7</b>	The Applicant	<p><b>Connection to the national grid</b></p> <p>Item 4 in Table 1 of the Consents and Agreements Position Statement [APP-021] says that you accepted a grid connection offer in December 2018.</p> <p>Please update this item to reflect the present position, with particular reference to the acceptability (or otherwise) of your proposed Option 3.</p>	<p>The Applicant provided a statement on the grid connection contractual arrangements in its Grid Connection Statement <b>[APP-265]</b>. This document provided an up-to-date position at the date of the Application being made.</p> <p>Since National Grid submitted its relevant representation, the Applicant has been in discussions with regard to the acceptability of Option 3. In summary:</p> <p>11<sup>th</sup> July 2022 Sunnica submitted an updated DRC form and single-line diagram (SLD) to NGESO and NGET to assess Option 3. The DRC form is a tool that provides "a list of essential data fields to be submitted by parties seeking connection to the GB transmission network at the application stage, in order to</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>ensure technical competency of the application". The SLD is an electrical diagram that sets out the electrical components of the proposed generating station and associated grid connection and is normally submitted alongside the DRC form at application stage.</p> <p>September 27<sup>th</sup> 2022 NGET responded via email to confirm that they are comfortable with the submission for option 3 from a technical perspective and that nothing needs changing within the existing Bilateral Connection Agreement (BCA) as modified by the Agreement to Vary (ATV) completed on 23<sup>rd</sup> August 2021.</p> <p>September 28<sup>th</sup> 2022 NGET wrote a letter of support to Sunnica confirming the existence of a TOCA (Transmission Owner Connection Agreement) with NGESO with reference to a layout diagram (Ref: PDD-100393-LAY-003) that identifies the details of the point of connection at Burwell Main.</p> <p>October 13<sup>th</sup> 2022 NGESO submitted an email to Sunnica confirming that Option 3 does not need any further changes to the existing BCA as modified by the Agreement to Vary (ATV) completed on 23<sup>rd</sup> August 2021.</p> <p>The Applicant is considering its contractual arrangements before a decision on withdrawing Option 2 from the Application.</p>
<b>Q1.0.8</b>	The Applicant	<p><b>Connection to the national grid</b></p> <p>In paragraph 4.1.3 of the Grid Connection Statement [APP-265] you say that a modification application was made to NGESO resulting in an Agreement to Vary offer being made on 26 April 2021 which you accepted.</p> <ul style="list-style-type: none"> <li>• Who made the modification application and why?</li> <li>• When did you accept the Agreement to Vary offer?</li> <li>• Is this now part of the Bilateral Connection Agreement?</li> </ul> <p>Have there been any further changes since the application was submitted?</p>	<p>Sunnica made the modification application because it was not going to be able to meet the programme dates for the progress milestones as set out in the original accepted BCA.</p> <p>The ATV was completed on 23<sup>rd</sup> August 2021.</p> <p>The ATV completed on 23<sup>rd</sup> August 2021 and now forms part of the Bilateral Connection Agreement.</p> <p>There have been no further changes.</p>

ExQ1	Respondent	Question	Applicant's Response
<b>Q1.0.9</b>	The Applicant	<b>Connection to the national grid</b>  In paragraph 4.1.4 of the Grid Connection Statement [APP-265] you say that the connection to the national grid will be an import and export connection.  Why does the BESS require charging from external sources?	Please refer to Appendix B
<b>Q1.0.10</b>	The Applicant	<b>Transfer of energy to the national grid</b>  Our understanding is that a battery energy storage system (BESS) is needed to control the transfer of energy to the national grid because of the fluctuating quantities of energy generated by the solar panels: the BESS is thus necessary development associated with the NSIP which is the solar energy generating panels.  Paragraph 3.4.23 of the Scheme Description [APP-035] says that " <i>The BESS is designed to provide peak generation and grid balancing services to the electricity grid by allowing excess electricity generated either from the solar PV panels, or imported from the electricity grid, to be stored in batteries and dispatched when required.</i> "  Please explain:  i) Under what circumstances and why it would be necessary to allow electricity imported from the national grid to be stored in the Sunnica BESS; and  How and why this is necessary to the operation of the NSIP, ie the solar panels generating the electricity, and thus fulfils the requirements of associated development.	Please refer to Appendix B

ExQ1	Respondent	Question	Applicant's Response																																																								
Q1.0.11	The Applicant	<p><b>Energy production from the solar panels</b></p> <p>In paragraph 4.1.5 of the Grid Connection Statement [APP-265] you say that the output from the solar panels and the BESS will be exported to the national grid, but no figures are provided.</p> <p>Bearing in mind the pace of technological change, including solar panel types, materials and configurations; and conversion efficiency from the DC panels to inverters and inverters to AC output to the national grid</p> <ul style="list-style-type: none"> <li>ii) How much energy do you expect the solar cells to produce daily?</li> <li>iii) At what times of day?</li> <li>iv) Do you have hourly projections of likely energy production by time of day and time of year?</li> <li>v) How do these figures compare with other alternative sites you have investigated?</li> <li>vi) What is the maximum storage demand that will be made on the BESS by the energy generated by the solar panels?</li> <li>vii) Is the BESS able to deal with this demand? and</li> </ul> <p>What is the export limit both as DC from the solar panels and as AC into the national grid?</p>	<p>ii.) The candidate solar PV design forecasts the solar cells to produce approximately 643,361 MWh [REF the climate change chapter of the Environmental Statement [APP-038]] over the first year, giving an average of 1,763 MWh per day. This total was calculated using PVsyst software which is the industry standard and the candidate design at the time of the DCO submission. The problem with saying how many kWh/ day a solar cell would produce is that every day is different owing to daily and seasonal weather patterns (a cloudy day versus a sunny day and a winter, spring, summer, autumn day). The table below highlights the average output per day in MWh by month. This also demonstrates how many MWh of a 500MW BESS could be charged on average per day by month.</p> <table border="1" data-bbox="1078 682 1931 1238"> <thead> <tr> <th>Month</th> <th>Average monthly electricity production (MWh/ month)</th> <th>Average daily electricity production (MWh/ day)</th> <th>Average daily solar PV energy production available to charge a 500MW power rated BESS (500MWh)</th> </tr> </thead> <tbody> <tr> <td>January</td> <td>15577</td> <td>502</td> <td>1.0</td> </tr> <tr> <td>February</td> <td>25756</td> <td>920</td> <td>1.8</td> </tr> <tr> <td>March</td> <td>53849</td> <td>1737</td> <td>3.5</td> </tr> <tr> <td>April</td> <td>78569</td> <td>2619</td> <td>5.2</td> </tr> <tr> <td>May</td> <td>85874</td> <td>2770</td> <td>5.5</td> </tr> <tr> <td>June</td> <td>87408</td> <td>2914</td> <td>5.8</td> </tr> <tr> <td>July</td> <td>88032</td> <td>2840</td> <td>5.7</td> </tr> <tr> <td>August</td> <td>75741</td> <td>2443</td> <td>4.9</td> </tr> <tr> <td>September</td> <td>62448</td> <td>2082</td> <td>4.2</td> </tr> <tr> <td>October</td> <td>37863</td> <td>1221</td> <td>2.4</td> </tr> <tr> <td>November</td> <td>19323</td> <td>644</td> <td>1.3</td> </tr> <tr> <td>December</td> <td>12921</td> <td>404</td> <td>0.8</td> </tr> <tr> <td><b>Yearly total</b></td> <td><b>643361</b></td> <td><b>1763</b></td> <td><b>4</b></td> </tr> </tbody> </table> <p>iii) The solar PV cells produce power when there is sufficient irradiance during daylight hours. In the UK this is between the hours of 5:00 and 19:00 during summer and 9:00 and 15:00 during winter.</p>	Month	Average monthly electricity production (MWh/ month)	Average daily electricity production (MWh/ day)	Average daily solar PV energy production available to charge a 500MW power rated BESS (500MWh)	January	15577	502	1.0	February	25756	920	1.8	March	53849	1737	3.5	April	78569	2619	5.2	May	85874	2770	5.5	June	87408	2914	5.8	July	88032	2840	5.7	August	75741	2443	4.9	September	62448	2082	4.2	October	37863	1221	2.4	November	19323	644	1.3	December	12921	404	0.8	<b>Yearly total</b>	<b>643361</b>	<b>1763</b>	<b>4</b>
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			<p>The energy production follows what is known as a bell curve producing more electricity as the sun rises until it is directly overhead and then reducing as the sun moves towards the end of the day when the sun sets.</p> <p>iv) The table below sets out the number of daylight hours assumed per month by the PVsyst software simulation for the Sunnica solar PV generation. Note that for the inverters to have sufficient voltage to switch on they need to be receiving sufficient voltage resulting from the solar irradiance.</p> <table border="1"> <thead> <tr> <th>Month</th><th>From</th><th>To</th><th>Average N° of hours by month</th></tr> </thead> <tbody> <tr> <td>January</td><td>9:00</td><td>14:00</td><td>220</td></tr> <tr> <td>February</td><td>8:00</td><td>16:00</td><td>246</td></tr> <tr> <td>March</td><td>7:00</td><td>16:00</td><td>337</td></tr> <tr> <td>April</td><td>6:00</td><td>17:00</td><td>391</td></tr> <tr> <td>May</td><td>5:00</td><td>17:00</td><td>457</td></tr> <tr> <td>June</td><td>5:00</td><td>18:00</td><td>472</td></tr> <tr> <td>July</td><td>5:00</td><td>19:00</td><td>476</td></tr> <tr> <td>August</td><td>5:00</td><td>18:00</td><td>426</td></tr> <tr> <td>September</td><td>6:00</td><td>17:00</td><td>351</td></tr> <tr> <td>October</td><td>7:00</td><td>16:00</td><td>301</td></tr> <tr> <td>November</td><td>7:00</td><td>15:00</td><td>238</td></tr> <tr> <td>December</td><td>9:00</td><td>15:00</td><td>197</td></tr> <tr> <td>TOTAL</td><td></td><td></td><td>4112</td></tr> </tbody> </table> <p>The Applicant has made an estimation of the likely hourly energy production by time of day and year based on PVsyst software (industry standard).</p> <p>v) The alternative sites investigated as part of the alternatives sites assessment within a 15km radius of the Point of Connection (POC) will all have almost</p>	Month	From	To	Average N° of hours by month	January	9:00	14:00	220	February	8:00	16:00	246	March	7:00	16:00	337	April	6:00	17:00	391	May	5:00	17:00	457	June	5:00	18:00	472	July	5:00	19:00	476	August	5:00	18:00	426	September	6:00	17:00	351	October	7:00	16:00	301	November	7:00	15:00	238	December	9:00	15:00	197	TOTAL			4112
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TOTAL			4112																																																								

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			<p>identical irradiance to those assessed for Sunnica. Any differences would be insignificant.</p> <p>vi) The maximum storage demand that will be made on the BESS by the energy generated by the solar panels is 500MW of power.</p> <p>vii) Yes, the BESS has sufficient capacity to deal with 500MW of demand (power import) and energy placed on it by the energy generated from the solar PV panels. This capacity can be defined in terms of both power and energy.</p> <p>In terms of power the BESS can be configured to have the capacity to import 500MW of power which is the same level of power that can be generated by the solar PV.</p> <p>In terms of energy the table set out for question part (ii) above demonstrates how the BESS can be configured to have sufficient energy storage capacity to deal with most of the energy generated from the solar PV panels. Note that there will be some days where the BESS may not be able to absorb 100% of the energy generated from the solar PV assuming it is configured for a four-hour duration.</p> <p>To explain the data shown in the table in question part (ii) above further, the first column shows the average monthly electricity production from the solar PV panels measured in MWh/month. The second column shows the resulting average daily electricity production in MWh/day. The third column shows the ratio of the average daily electricity production from the solar PV panels to the energy capacity of a 500MW / 500 MWh BESS. The third column therefore demonstrates that during six months of the year (between April and September) the solar PV panels would generate enough energy to charge the BESS for more than four hours equivalent energy capacity for the BESS. During two months of the year (March and October) the solar PV panels would generate enough electricity to charge the BESS for between two to three hours equivalent energy capacity for the BESS. During the remaining four months of the year the average daily electricity production from the solar PV panels would generate average less than two hours equivalent energy capacity for the BESS. It also shows that overall average daily production equates to a four-hour duration charge for a 500 MW power rated BESS system.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.0.12	The Applicant	<p><b>Energy production efficiency</b></p> <p>Do you expect the efficiency of conversion from DC to AC and the efficiency of conversion from sunlight to electrical energy to improve by the time the proposed development is operational?</p> <p>If so, what does this mean in terms of the number, size, type and appearance of panels, the land required and the environmental and landscape impacts?</p>	<p>The efficiency of conversion from DC to AC is determined by the inverters. Technology learning curves indicate that it is likely/ possible that the conversion efficiencies improve. If these improvements occur then less equipment associated with the inverters will be required resulting in lower environmental impacts such as those related to visual impact, materials, noise, and construction.</p> <p>The efficiency of conversion from sunlight to electrical energy is determined by module efficiency. Technology learning curves indicate it is likely/ possible that there will be incremental improvements in efficiency by the time the proposed development is operational.</p> <p>The relationship between the DC capacity (the quantity and wattage of solar panels) installed and the inverter's AC power rating is called the DC:AC ratio. The implications of a higher DC:AC ratio are that the system results in greater electricity production owing to having more DC power installed and being able to export closer to its maximum grid connection export power potential more of the time. The system can never export more than the maximum capacity of the grid connection.</p> <p>Therefore, if there are improvements in the efficiency of the modules and the inverters there will be more times that the Proposed Development will be able to output at or close to the maximum 500MW capacity threshold thereby producing more low-carbon electricity. In summary greater panel efficiency will enable the project to produce more electricity within the same land-take so that the project can deliver more benefits.</p> <p>There is no change to the number, size, type and appearance of panels and the land required and all the associated environmental and landscape impacts. They will remain within the parameters assessed by the Environmental Impact Assessment and submitted within the DCO submission.</p>
Q1.0.13	The Applicant	<p><b>Public sector equality duty (PSED)</b></p> <p>Please submit an equality impact assessment to inform the ExA how your proposal would accord with the requirements of the Public Sector Equality Duty.</p>	<p>The Applicant notes that the Public Sector Duty (pursuant to section 149 of the Equality Act 2010) is a duty on public authorities to have "due regard" to the requirements of the Equality Act 2010. Sunnica, as the Applicant, is not a public body subject to the Public Sector Equality Duty and is therefore not required to undertake an equality impact assessment. In any event, the Applicant proposes to prepare an Equality Impact Assessment which will be submitted at a future examination deadline. The purpose of the EqIA would be to inform the</p>

ExQ1	Respondent	Question	Applicant's Response
			consideration of the application by the Secretary of State and its fulfilment of the Public Sector Equality Duty.
<b>Q1.0.14</b>	The Applicant	<p><b>Sensitive information in planning applications</b></p> <p>Has the Applicant complied with National Cyber Security Centre and Centre for the Protection of National Infrastructure guidance and requirements in respect of sensitive information in planning applications for critical national infrastructure?</p>	The Applicant notes Section 4.15 of Draft Overarching National Policy Statement for Energy (EN-1, September 2021) (Draft NPS EN-1). In accordance with paragraph 4.15.3 of Draft NPS EN-1 no national security implications of the Scheme have been identified. No sensitive information for critical national infrastructure is contained within the DCO Application.
<b>Q1.0.15</b>	The Applicant	<p><b>Cumulative Effects Assessment, overarching approach</b></p> <p>Table 1-1 of ES Appendix 5A [APP-055] lists all the developments screened into consideration for the Cumulative Effects Assessment (CEA). This provides the outcome of Stages 1 and 2 of the methodology and lists approximately 92 developments carried forward for further assessment at Stage 3. However, the only Zone of Influence referred to in Table 1-1 is for ecology.</p> <p>Please explain the reasons why the ecological zone of influence is the only consideration in Table 1-1 in Appendix 5A and how other environmental aspect zones of influence have been used to define the scope of the CEA.</p>	<p>The 10km ecological study area that is referred to in Table 1-1 of ES Appendix 5A [APP-055] is the greatest potential study area that was identified for any environmental or social impact presented in the ES. It is therefore considered to be a suitable distance threshold for the identification of cumulative schemes and was applied to all other environmental topics.</p> <p>Only impacts on bats was considered beyond 10km from the Site, following a request from PINS in the Scoping Opinion [APP-052] to consider international statutory site designations up to 30km away where bats are noted as the, or one of the, qualifying features. As noted in Paragraph 4.1.1 of Appendix 8J Report on Surveys for Bats [APP-087]. "There are no international statutory site designations for bats within 30km of the Order limits". It was therefore not necessary to consider impacts beyond 10km in any technical chapters.</p> <p>For clarity, the potential Zone of Influences for all environmental or social impacts were considered when identifying cumulative schemes, but none exceeded 10km.</p> <p>Other schemes outside of 10km were not considered in the cumulative impact assessment, as explained in Paragraph 5.8.8 of Chapter 5: EIA Methodology [APP-037].</p>
<b>Q1.0.16</b>	The Applicant	<p><b>Cumulative Effects Assessment, overarching approach</b></p> <p>Paragraph 5.8.17 of the EIA methodology [APP-037] states that the outcome of Stage</p>	The results of the Stage 4 Cumulative Effects Assessment is presented in the technical chapters (Chapters 6-16 of the ES). These chapters provide the assessment of cumulative effects mentioned in Paragraph 5.8.17 of the EIA methodology [APP-037] within subsection 11, which is titled 'Cumulative Effects'.

ExQ1	Respondent	Question	Applicant's Response
		<p>4 of the CEA is documented in a matrix including proposed mitigation, but this does not appear to have been provided.</p> <p>Please provide the matrix described in paragraph 5.8.17 presenting the outcome of Stage 4 of the cumulative effects assessment, or signpost to where this is included within the application material.</p>	<p>It was suggested in Chapter 5 that this would be tabulated in matrix style, but some technical chapters have provided the information in written paragraphs. This is not considered to represent any sort of omission, rather it represents a minor deviation from the methodology.</p>
<b>Q1.0.17</b>	The Applicant	<p><b>Cumulative Effects Assessment, overarching approach</b></p> <p>The cumulative effects assessment presented in Chapter 10: Landscape and Visual Amenity [APP-042] also references the use of GLVIA guidance as the methodology used for the aspect cumulative assessment.</p> <p>The CEA within this chapter identifies that when considered with other development, there is potential for significant cumulative landscape and visual effects during construction and operational phases of the Proposed Development. There is no assessment to confirm whether there are significant cumulative effects during decommissioning.</p> <p>However, this approach is not in line with the methodology presented in Chapter 5 of the ES. Where significant cumulative effects have been identified in the Landscape and Visual Amenity assessment, no mitigation is proposed or secured, for example.</p> <p>Please comment on the reasons for diverging from the stated methodology for</p>	<p>Chapter 10: Landscape and Visual Amenity [APP-042] considers embedded mitigation within cumulative schemes as part of the cumulative impact assessment. Paragraph 5.8.17 of Chapter 5: EIA Methodology [APP-037] states that the cumulative assessment will include proposed mitigation applicable to the Scheme.</p> <p>Guidelines for Landscape and Visual Impact Assessment, 3rd Edition (GLVIA3), acknowledges the challenges with mitigating cumulative effects. It advocates a proportionate approach with a key focus on the likely significant effects and in particular those likely to influence decision making. Paragraph 7.39 of GLVIA3 states that <i>"in accordance with the Regulations mitigation of significant adverse cumulative landscape and visual effects needs to be considered. However, the possible actions that might be taken to mitigate such effects are somewhat different from mitigation measures to address effects identified through the standard process of LVIA. As these effects arise from a number of different developments they cannot necessarily be addressed by measures related only to the main project being considered."</i> Paragraph 7.40 of GLVIA3 adds <i>"there may be some scope for reducing cumulative effects through changes to the main project being considered, for example by considering appropriate siting, by changing the scheme layout or by more conventional use of planting or screening in order to avoid or reduce its contribution to the cumulative effects. However, depending on the type of project, such traditional approaches may only work for cumulative visual effects in certain circumstances and for certain visual receptors."</i></p> <p>Additional mitigation has not been proposed to reduce cumulative impacts because:</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Stages 3 and 4 of the cumulative effects assessment.</p> <p>What mitigation and, where relevant, monitoring, do you propose to address the identified significant cumulative landscape and visual effects? How will this mitigation be secured?</p> <p>The cumulative effects methodology indicates that local councils were consulted during the refinement of developments at Stage 3. Can you confirm whether the outcome of the assessment has been discussed with other relevant consultation bodies?</p>	<ul style="list-style-type: none"> <li>• The significant cumulative effect with ID85 is noted as being due to the other scheme and being temporary during construction only. This is noted in Paragraph 10.11.10 of Chapter 10: Landscape and Visual Amenity [APP-042].</li> <li>• The significant cumulative effect with ID95 occurs if construction happens both sides of the road simultaneously. This is considered temporary, during construction only and would only occur if the timings coincide.</li> <li>• The significant cumulative effect with ID98, ID154, ID296, ID351 and ID757 occurs during construction and is therefore temporary.</li> <li>• Cumulative landscape and visual impacts and effects are assessed at the construction phase and year 1 of opening, so as to reflect a worst case scenario, given the details of many of the cumulative schemes are not confirmed. The Scheme, in combination with the cumulative scheme assessed, only gives rise to significant cumulative effects relating to the Lowland Village Chalklands Landscape Character Type and recreational users on Burwell Lode (VP54) and Hightown Drove (VP55) associated with ID296 and ID757.</li> </ul> <p>It is not considered that additional mitigation such as planting or changes to the Scheme design would mitigate the aforementioned significant cumulative effects without seriously reducing the scale of renewable energy being proposed as part of the Scheme or affecting the proposed build schedule. This would involve removing large areas of solar PV and replacing it with woodland, reducing the renewable generating potential of the Scheme. Furthermore, these effects relate to year 1 of operation, again representing a worst-case scenario. It is likely that the cumulative effects at year 15 would be less following the establishment of mitigation planting on these other schemes. The receptors referred to above are predicted to experience effects which are either neutral or negligible adverse and therefore not significant by year 15 as a result of the Scheme. Any cumulative effect would therefore be due to the impacts associated with these other schemes in the area, rather than combined with the Scheme.</p> <p>Cumulative effects have not been considered during decommissioning because many of the cumulative effects were associated with construction works coinciding on projects, the planting associated with the Scheme would have matured, reducing the potential for cumulative effects from what was stated in the</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>chapter for construction, and the absence of known decommissioning dates for many of the cumulative schemes.</p> <p>No additional mitigation is proposed which would further reduce the landscape and visual cumulative effects for the reasons explained above.</p> <p>The councils were consulted during the refinement of developments at Stage 3. The matter was not specifically discussed with other relevant consultation bodies, although cumulative impact assessments were presented at statutory consultation within the PEI Report for review and comment by statutory and non-statutory consultees.</p>
<b>Q1.0.18</b>	Suffolk Wildlife Trust	Question not for Applicant.	
<b>Q1.0.19</b>	The Applicant	<p><b>Flexibility sought within DCO and Works Plan</b></p> <p>Table 3.1 of the Scheme Description [APP-035] gives an indication of the flexibility you seek and your assessment approach, but contains very little detail.</p> <p>Please explain in more detail what flexibility is sought and where, whether this is in terms of different uses or the use of the latest technology for a particular use, and how the Rochdale Envelope principles have been adopted to ensure that you have assessed the worst case.</p>	<p>The locations where flexibility is included for the different uses and technologies described in the first row of Table 3-1 of the Scheme Description [APP-035] are defined on the Works Plans [APP-007] and by Schedule 1 of the Draft DCO [APP-019] (see 'Work No's.' referred to by this answer). These are the locations where BESS/onsite substations are proposed in Sunnica East Site A (area E33 shown on Figure 3-1 Sunnica East Parameter Plan [APP-135]), Sunnica East Site B (area E18 shown on Figure 3-1 Sunnica East Parameter Plan [APP-135]) and Sunnica West Site A (area W17 shown on Figure 3-2 Sunnica West Parameter Plan [APP-136]). In these areas, the Works Plans [APP-007] show that the BESS (Work No. 2) will be co-located with the onsite substations (Work. No. 3) and that the precise location and extent of the BESS and substations within the areas defined remains flexible. In addition, the Works Plans [APP-007] show that these areas may also be used for Solar PV arrays (Work No. 1) instead of or in combination with BESS and substations if the full area is not needed for those BESS and substation uses. In Sunnica East Site A, a warehouse building and permanent compounds (Work No. 8) is also included within part of the BESS/substation area (area E33 shown on Figure 3-1 Sunnica East Parameter Plan [APP-135]). Again, the Works Plans [APP-007] show that this could also be used for BESS/onsite substation/solar PV works should the whole area not be needed for the warehouse or compound.</p> <p>Flexibility is also incorporated in terms of the detailed layout of solar PV arrays, access tracks etc. within the parameters defined by the Works Plans [APP-007]</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>and the Design Principles (Appendix B of the Design and Access Statement [APP-264]).</p> <p>The second and third rows of Table 3-1 of the Scheme Description [APP-035] address how land that is to be used temporarily for construction purposes during the construction phase and then for operational elements of the Scheme during the operational phase have been assessed. These areas are also defined on the Works Plans [APP-007]. It is very common for development of a wide variety of types to site temporary construction compounds in land that will form part of the permanent or long-term development. The different construction and operational uses proposed for this land recognises the temporal nature of the development. In terms of the assessment, as explained in Table 3-1 the temporary construction use of this land has been assessed as part of the construction phase, and the operational use has then been assessed as part of the operational phase, so all uses have been assessed in the Environmental Statement.</p> <p>The final row of Table 3-1 of the Scheme Description [APP-035] explains that construction and operational phase elements of the Scheme will take place in areas where there are also below ground cables. This is illustrated on the Works Plans [APP-007]. Again, this is very common for development of a wide variety of types. In terms of the environmental assessment, this has assumed underground cabling works where permitted by the Works Plans, in addition to the other construction or operational activities proposed to take place above ground.</p> <p>Flexibility to use the latest technology is incorporated in the Scheme since specific products (i.e. the precise solar panel, or battery) are not defined. Instead maximum and minimum parameters are defined by the Design Principles (Appendix B of the Design and Access Statement [APP-264]). The Design Principles set out parameters within which all elements of the Scheme will be constructed. Flexibility is therefore retained to use the latest technology that falls within the parameters set out by the Design Principles. Retaining this flexibility will ensure the delivery of a scheme that is as efficient in generation as possible, and a scheme which is able to adapt to future market conditions.</p> <p>Table 3-2 of the Scheme Description [APP-035] sets out in the ES the parameters that are defined by the Design Principles (Appendix B of the Design</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>and Access Statement [APP-264]). As explained by paragraph 3.3.4 of the Scheme Description [APP-035], it is these maximum design parameters that have been assessed by the EIA. It also explains that each technical chapter of the ES sets out the relevant design parameters that are likely to result in the likely worst-case effects for that topic, and assesses those parameters. This approach ensures that the worst-case has been assessed by the EIA.</p> <p>As explained by the first row of Table 3-1 of the Scheme Description [APP-035], where the Works Plans [APP-007] identify that an area of land could be used for either solar PV, BESS or an on-site substation (or a combination of these), the ES assumes that it would be used for BESS and one substation as this represents the greatest massing and traffic generation, and is expected to represent the worst case for all disciplines.</p>
<b>Q1.0.20</b>	The Applicant	<p><b>Rochdale envelope principles</b></p> <p>Paragraph 3.2.3 of the Scheme Description [APP-035] says that “<i>the Environmental Impact Assessment (EIA) has been undertaken adopting the principles of the ‘Rochdale Envelope’ where appropriate ...</i>”.</p> <p>Does this mean that there are parts of the assessment of the proposed development where the principles of the Rochdale Envelope have not been adopted?</p>	The Scheme has been assessed by the EIA on the basis of the worst-case parameters in all cases, as described by paragraph 3.3.4 of the Scheme Description [APP-035].
<b>Q1.0.21</b>	The Applicant	<p><b>Site selection - drafting</b></p> <p>In lines 3 and 4 of paragraph 5.4.7 of the Statement of Reasons [APP-022], do you mean to say that “None of the alternatives would provide the compelling benefits that the Scheme would provide, and all would involve additional impacts or disadvantages”?</p>	Yes, that is correct. None of the alternatives would provide the compelling benefits that the Scheme would provide, and all would involve additional impacts or disadvantages.
<b>Q1.0.22</b>	The Applicant	<p><b>Policy support</b></p> <p>Chapter 7 of the Statement of Reasons [APP-022] deals with policy support for the</p>	Chapter 7 of the Statement of Reasons [APP-022] refers to the Planning Statement [APP-261 to APP-263]. This refers to the policy documents that are listed below, all of which are extant and retain the status they had at the time the

ExQ1	Respondent	Question	Applicant's Response
		Application. Please confirm that all policies referred to are extant and up to date.	<p>Planning Statement [APP-261 to APP-263] and Statement of Reasons [APP-022] were drafted, submitted and accepted for examination.</p> <ul style="list-style-type: none"><li>a. Overarching National Policy Statement for Energy (EN-1), July 2011 (NPS EN-1)</li><li>b. National Policy Statement for Renewable Energy (EN-3), July 2011 (NPS EN-3)</li><li>c. National Policy Statement for Electricity Networks (EN-5), July 2011 (NPS EN-5)</li><li>d. Draft Overarching National Policy Statement for Energy (EN-1) (Draft NPS EN-1)</li><li>e. Draft National Policy Statement for Renewable Energy (EN-3), September 2021 (Draft NPS EN-3)</li><li>f. National Policy Statement for Electricity Networks (EN-5), September 2021 (NPS EN-5)</li><li>g. National Planning Policy Framework, updated July 2021</li><li>h. Forest Heath District Council Core Strategy, Adopted 2010</li><li>i. Forest Heath and St Edmundsbury Local Plan: Joint Development Management Policies Document (JDMPD), updated February 2015</li><li>j. Forest Heath Local Plan Policies Map, Adopted February 2015</li><li>k. Newmarket Neighbourhood Plan, made February 2020</li><li>l. Suffolk Minerals and Waste Local Plan, Adopted July 2020</li><li>m. East Cambridgeshire District Council Local Plan, Adopted April 2015</li><li>n. Fordham Neighbourhood Plan, made December 2018</li><li>o. Cambridgeshire and Peterborough Minerals and Waste Local Plan, Adopted July 2021</li><li>p. East Cambridgeshire District Council Supplementary Planning Document (SPD) Renewable Energy Development (Commercial Scale), Adopted October 2014</li></ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>q. East Cambridgeshire District Council Contaminated Land SPD, Adopted 2015</li> <li>r. East Cambridgeshire District Council Wildlife Sites SPD, Adopted 2010</li> <li>s. East Cambridgeshire District Council Natural Environment SPD, Adopted 2020</li> <li>t. East Cambridgeshire District Council Climate Change SPD, Adopted 2020</li> <li>u. East Cambridgeshire District Council Flood and Water SPD, Adopted 2016</li> </ul>
<b>Q1.0.23</b>	The Applicant	<p><b>Change application - drafting</b></p> <p>It would assist our understanding of section 3.6 of the scheme description [AS-249] if the following minor changes were made in order to clarify Options 2 and 3:</p> <ul style="list-style-type: none"> <li>• amend the header above paragraph 3.6.1 to read "<i>Option 3 - onsite substations</i>";</li> <li>• amend the header above paragraph 3.6.5 to read "<i>Option 2 - Burwell National Grid Substation Extension</i>", and</li> <li>• add new paragraph 3.6.7 "<i>Option 3 does not require any extension works to the Burwell National Grid Substation</i>"</li> </ul>	<p>The Applicant makes the following observations about this request:</p> <ul style="list-style-type: none"> <li>• It would not be correct to amend the heading to paragraph 3.6.1 as suggested. This is because this section refers to onsite substations that would be required for both Option 2 (at 132 kV) or for Option 3 (at 400kV). The Applicant does not propose to make this amendment to the text.</li> <li>• The Applicant has amended the heading as suggested by the second bullet point and submits an updated Scheme Description as part of this response to written questions.</li> <li>• The Applicant has added the text to a new paragraph 3.6.7 as suggested by the third bullet point and submits an updated Scheme Description as part of this response to written questions.</li> </ul>
<b>Q1.0.24</b>	The Applicant	<p><b>Change application</b></p> <p>In paragraph 3.7.8 of the Scheme Description [AS-249], the total construction period, previously 30 weeks, is now 50 weeks for Sunnica West Site A, Sunnica East Site A, Sunnica East Site B.</p> <p>Please explain</p>	<p>Paragraph 3.7.8 of the Scheme Description [AS-249] relates to the construction periods for the three onsite substations (and the Burwell National Grid Substation Extension) only. Please find responses to the three questions, below.</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"><li>• the reasons for this 20 week increase in the total construction period;</li><li>• why no reference appears to be made to Sunnica West Site B;</li><li>• why it appears to be the same for both Option 2 and Option 3; and</li><li>• how this increase has been taken into account in the environmental assessment, with particular reference to air quality, noise and vibration, and other human health issues including mental health.</li></ul>	<ul style="list-style-type: none"><li>• The changes do not represent an increase in the total construction period for Sunnica East Site A, Sunnica East Site B, nor Sunnica West Site A overall. These remain as 24 months, as set out by Paragraphs 3.7.1 to 3.7.7 of the Scheme Description [AS-249]. As explained by paragraph 5.1.1 of Proposed Changes to the Application [AS-243], the increase in the construction period for the substations at Sunnica East Site A, Sunnica East Site B, and Sunnica West Site A is a result of the additional technical complexity of the 400kV configuration; however, this is still within the 24 month worst case construction programme assessed within the ES.</li><li>• No reference is made to Sunnica West Site B because no substation is proposed there.</li><li>• The amendment to part (d) of paragraph 3.7.8 of the Scheme Description [AS-249] was made in error and should continue to read 24 weeks. This has been corrected in an updated version of the Scheme Description that is submitted at this deadline.</li></ul> <p>Table 5-1 of the Proposed Changes to the Application [AS-243] summarises the outcomes of assessments of the change to the proposed onsite substations (NMC-03) in order to identify any likely significant effects that would be new or materially different from those presented in the Scheme ES [APP-036 and APP-038 to APP-048]. Consideration of the increase in the construction period for the substations up to 50 weeks is included in these assessments. Table 5-1 of the Proposed Changes to the Application [AS-243] shows that these assessments have concluded that no material changes would result from NMC-03 (including the change in construction period for the substations). In particular, the following conclusions are set out:</p>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>• Air quality (ES Chapter 14): “As described in the Transport and Access section above, the construction programme is expected to be carried out over longer periods (up to 50 weeks rather than 30 weeks) than assumed in the ES. Therefore, the forecast daily construction HGVs and staff presented in the ES represent a worst-case scenario as it compresses the construction phase and therefore yields a higher number of daily and peak hour trip movements offsite and a greater number of plant onsite at any one time consequently, the construction road traffic emissions assessment in the ES are a worst case and will not change.”</li> <li>• Noise and vibration: (ES Chapter 11): “The construction programme for the substations associated with NMC-03 has been reviewed as part of the engineering design and is expected to be carried out over longer periods (up to 50 weeks) than assumed in the ES, to account for the additional complexity of the 400kV electrical configuration. As outlined below in the Transport and Access section, the number of HGV and staff vehicle movements are not anticipated to change, and similarly the construction methods are not changing from those assessed within the ES. Although, the noise and vibration effects would be extended in duration they would be expected to be lower in magnitude form construction traffic as it would involve less traffic movements over a longer period. Therefore the conclusions of the construction traffic impact assessment would therefore remain valid and represent the worst-case situation, while the noise and vibration from onsite activities would remain as assessed in the ES.”</li> <li>• Human Health (ES Chapter 15): “The proposed change in transformer type will not influence any potential outcomes of the Scheme experienced by Human Health receptors such that the findings of Chapter 15: Human Health [APP-047] of the ES would not change.”</li> </ul> <p>As noted above, the change does not result in an increase in the construction period for the Scheme overall nor for Sunnica East Site A, Sunnica East Site B nor Sunnica West Site A.</p>
<b>Q1.0.25</b>	The Applicant	<b>Change application</b> In paragraph 3.7.8 of the Scheme Description [AS-249], the total construction	The amendment to part (d) of paragraph 3.7.8 of the Scheme Description [AS-249] was made in error and should continue to read 24 weeks. This has been

ExQ1	Respondent	Question	Applicant's Response
		<p>period, previously 24 weeks, is now 50 weeks for the Burwell National Grid Substation Extension.</p> <p>Please explain:</p> <ul style="list-style-type: none"><li>• the reasons for this 26 week increase in the total construction period;</li><li>• why it appears to be the same for both Option 2 and Option 3; and</li></ul> <p>how this increase has been taken into account in the environmental assessment, with particular reference to air quality, noise and vibration, and other human health issues including mental health.</p>	<p>corrected in an updated version of the Scheme Description that is submitted at this deadline.</p>



### 3 Topic 1.1 Air Quality and Human Health

ExQ1	Respondent	Question	Applicant's Response
Q1.1.1	The Applicant, relevant local authority	Question duplicated, please refer to Q1.8.1.	
Q1.1.2	The Applicant	<p><b>Health and safety related consents:</b>            Item 7 of the Consents and Agreements Position Statement [APP-021] refers to health and safety related consents.</p> <ul style="list-style-type: none"> <li>• Do such consents apply in respect of both the workforce and members of the public?</li> <li>• How long before construction commences are such consents to be applied for?</li> <li>• Rather than "as appropriate" do you mean that such consents are to be made as required to comply with relevant legislation?</li> </ul>	<p>The Health and Safety at Work etc. Act 1974 impose general duties on employers, employees and other persons concerned with the workplace, to establish safe systems of working. A wide range of more specific regulations apply to particular operations, industries and categories of employees. The reference to "as appropriate" identified in the question was intended to convey that the Applicant and its contractor(S) will comply with all applicable regulatory requirements under Health and Safety at Work etc. Act 1974 legislation and associated regulations. To the extent that such regulations require consents, record keeping or other activities before particular operations are undertaken, such actions will be taken as required to comply with the applicable legislation.</p>
Q1.1.3	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Table 3-2 (foot of page 8) and paragraph 3.4.2 g. of the Scheme Description [APP-035] state that there is a BESS in Works No 2A, 2B and 2C, but not 2D.            Why is this?</p>	<p>The Sunnica design utilises an AC-coupled BESS technology solution which is centralized (aggregated) and located close to the on-site substations (33/400kV transformer compounds) so that medium voltage (MV) losses are minimized. This is owing to the shorter distance that the cables need to travel. The longer the cable distance the greater the losses.</p> <p>There are 3 on-site substations within the areas shown on the Works Plan for works 3A, 3B and 3C and, because there is no on-site substation located at Sunnica West B neither is there BESS located on that site. There is no need for an on-site substation associated with the solar PV in Sunnica West B because it is more economic to connect the solar PV in this work area to the on-site substation located at work area 3C. While there will be elevated losses associated with the distance between the on-site substation and work area 2D the additional</p>

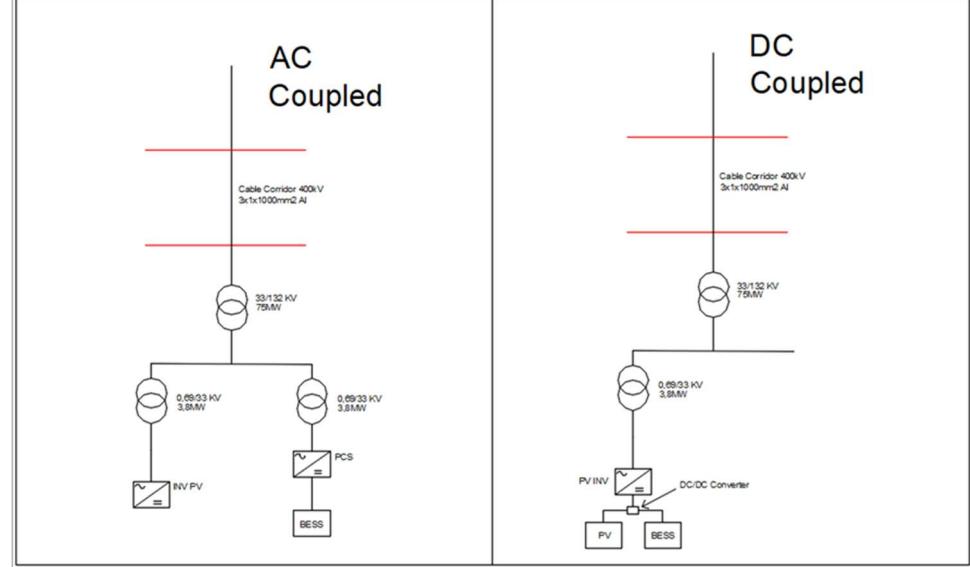
ExQ1	Respondent	Question	Applicant's Response
			cost of an on-site substation would be far greater than the value of the losses and not justify the additional cost impacts.
Q1.1.4	The Applicant	<p><b>Battery energy storage system (BESS):</b> By way of background</p> <ul style="list-style-type: none"> <li>• Paragraphs 3.4.23 to 3.4.32 of the Scheme Description [APP-035] give a brief description of the Battery Energy Storage System (BESS) but do not mention fire risk.</li> <li>• Fire is mentioned briefly in general terms in section 16.5 of ES Chapter 16: Other Environmental Topics [APP-048] (Major Accidents and Disasters) with brief references to ES Appendix 16D entitled “Unplanned Atmospheric Emissions from Battery Energy Storage Systems (BESS)” [APP-124].</li> <li>• Concerns about the fire risk of the batteries being installed are mentioned briefly in the penultimate entry in ES Table 16.8 [APP-048] which covers Section 47 response (statutory consultation): the response states that <i>“an Outline Fire Safety Management Plan has been prepared as part of the DCO submission [EN010106/APP/7.9].”</i></li> <li>• ES Appendix 16D entitled “Unplanned Atmospheric Emissions from Battery Energy Storage Systems (BESS)” [APP-124] and</li> </ul>	<p>The EIA process has included the consideration of fire risk to environment; ES Appendix 16D entitled “Unplanned Atmospheric Emissions from Battery Energy Storage Systems (BESS)” [APP-124] presents an assessment of an unplanned/emergency fire scenario on atmospheric emissions and human inhalation. The fire risk is not anticipated to generate a “likely significant effect”. This risk is discussed in the Outline Battery Fire Safety Management Plan [APP-267], which is not part of the ES.</p> <p>Table 16-8 of Chapter 16 of the ES [APP-048] states that emergency response is covered in the Framework CEMP (Appendix 16C of this Environmental Statement [EN010106/APP/6.2]), and notes that an Outline Fire Safety Management Plan has been prepared [EN010106/APP/7.9], and a BESS Air Quality Fire Risk Assessment has been prepared and is provided in Appendix 16D of the ES [EN010106/APP/6.2]. Paragraphs 16.5.15 and 16.5.23-16.5.39 of Chapter 16 of the ES provide a summary and assessment of these documents and appendices as part of the ES. The mention in Chapter 16: Other Environmental Topics [APP-048] to “an Outline Fire Safety Management Plan has been prepared as part of the DCO submission [EN010106/APP/7.9]” is an error. This should have read “an Outline Battery Fire Safety Management Plan [EN010106/APP/7.6]”. Chapter 16 has been amended and submitted as one of the Applicant’s Deadline 2 submissions.</p> <p>With regards to the documents made available to the councils, the PEI Report did not include an Outline Battery Fire Safety Management Plan. A draft Outline Fire Safety Management Plan was shared with Suffolk County Council outside of statutory consultation ahead of submission, with SCC taking a lead on safety matters on behalf of the host councils. A copy was shared with West Suffolk Council, who also asked to be involved. It is the Applicant’s understanding that CCC and East Cambs passed over responsibility to Suffolk County Council and their respective Fire Departments to provide comments on the draft Outline Battery Fire Safety Management Plan ahead of submission. The report was also copied to HSE but this did not constitute consultation.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>mentions fire along with out-gassing and emissions generally.</p> <p>Paragraph 2.3.4 of the outline Battery Fire Safety Management Plan [APP-267] states that <i>"The councils have expressed a concern that the risks associated with battery storage fires have not been fully explored and a request has been made to develop an Outline Battery Fire Safety Management Plan for the BESS and to be included as part of the DCO application for the Scheme. This document addresses this request."</i></p> <ul style="list-style-type: none"> <li>• What documents had been made available to the Councils to form the basis for this statement?</li> <li>• Where is the Outline Fire Safety Management Plan in the DCO submission [EN010106/APP/7.9]?</li> </ul>	
Q1.1.5	Cambridgeshire County Council, Suffolk County Council, East Cambridgeshire District Council, West Suffolk Council	Question not for Applicant.	
Q1.1.6	The Applicant	<p><b>Battery energy storage system (BESS):</b> Paragraphs 3.4.23 to 3.4.32 of the Scheme Description [APP-035] give a brief description of the Battery Energy Storage</p>	<p><b>Bullets 1 and 3:-</b></p> <p>All Lithium-ion battery chemistries were considered for the Sunnica BESS project.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>System (BESS) but do not describe the BESS chemistry or explain why the particular battery cell chemistry outlined in Table 2 of the outline Battery Fire Safety Management Plan [APP-267] has been selected.</p> <p>Please</p> <ul style="list-style-type: none"> <li>• describe all the battery storage technologies which have been considered;</li> <li>• explain how they each perform in respect of battery fire hazard, risk and severity of outcome;</li> <li>• explain the reasons for selecting Nickel Manganese Cobalt (NMC) and Lithium Iron Phosphate (LiFePO<sub>4</sub>) cells with particular reference to battery fire hazard, risk and severity of outcome; and</li> <li>• explain what other component parts of the BESS other than the battery cells may present a fire risk.</li> </ul>	<p>As is set out in more detail below, from a fire risk perspective, there is relatively little to distinguish between lithium-ion battery chemistries, as they share common hazard parameters during thermal runaway reactions and chemistry is in fact a very small part (c. 10%) of fire risk.</p> <p>The chemistries selected were Nickel Manganese Cobalt (NMC) and Lithium Iron Phosphate (LFP) because they provide the required grid scale performance specifications and are the two dominant battery chemistries for BESS systems. At the time when the Sunnica BESS battery specifications were selected, approximately 80% of BESS system designs being tested and certified were either LFP or NMC cells. As such the BESS system selected by Sunnica was entirely consistent with the prevailing market.</p> <p><b>Bullet 2:-</b></p> <p>This is a complex area. This answer is an attempt to keep matters as simple as possible, but more information can be provided if that would be of help.</p> <p>By way of important background information, the various references to Lithium-ion battery chemistry types (NMC or LFP) refers to the cathode materials. This will typically be aluminium foil coated with a metal oxide or phosphate such as Nickel Manganese Cobalt (NMC) or Lithium Iron Phosphate (LFP). It is this cathode material which determines the capacity and voltage of the cell. Within the battery cell itself there is an organic electrolyte composition (typically a mixture of lithium salts dissolved in organic carbonates). This is similar across all lithium-ion chemistries, but each battery manufacturer will have their own mixture. It is this composition which would be the potential fire fuel source.</p> <p>At a single cell level, the severity of any fire reaction is not simply driven by battery chemistry. It will be driven by three main factors: the cell design, the chemistry, and the state of charge (SOC). Cell design can influence the potential for a single cell fire to spread to other cells. The state of charge can influence the amount of venting taking place (higher charged cells will typically vent more forcefully). The cell chemistry (alongside cell construction features) can determine the burning and venting gas mixtures. However, as this is a function of the electrolyte composition it can vary within the same battery chemistry (i.e. in this</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>specific regard the risk profiles of two different manufacturer's NMC or LFP cells may be different).</p> <p>For that reason picking between cell chemistries only represents about 10% of fire risk.</p> <p>That said, there are some <i>generalised</i> differences between the two chemistries. NMC cells generally have a lower temperature trigger point compared to LFP cells, but burn more freely producing lower levels of toxic gas (i.e. more carbon dioxide, less hydrogen and carbon monoxide). They have a higher voltage than LFP cells, of 3.6-3.7V per cell, generally meaning less complex circuitry is required and most cell designs will contain less energy. By contrast, LFP cells typically have a higher thermal trigger point before commencing thermal runaway, this can lead to a higher possibility of a venting reaction producing higher levels of hydrogen and carbon monoxide which need to be safely ventilated to reduce the risk of delayed ignition. They typically have a nominal voltage of 3.2V per cell which can pose more challenges for electronic controls.</p> <p>As set out above these are generalisations relating to a small component of overall fire risk and there can be significant variations within a particular cell type. The specific risk profile (chemistry, cell design, gas production) of the battery cell chosen will be considered as part of the eventual Battery Fire Safety Management Plan.</p> <p><b>Bullet 4:-</b></p> <p>(It is understood that the reference to "BESS" here is to the battery container itself. That does not include other Energy Storage System equipment such as PCS and transformers which are housed externally in the indicative designs. If the basis of the question has been misunderstood, further detail can be provided in the next round of written questions).</p> <p>Detailed investigations into BESS fire and safety incidents have found the primary initiation causes were: insufficient battery protection systems, the inadequate management of BESS enclosure operating environment, careless installation</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>procedures and BESS integrated control failures (poor system protection designs).</p> <p>Specific BESS components that have led to fire and explosion incidents were: cell manufacturing defects, grounding faults leading to battery control failures or breakdown of BESS system insulation, HVAC malfunctions (moisture ingress, dangerous BESS operating temperatures or smoke / fire source), inadequate overcurrent / voltage fuse protection, BMS malfunctions, and Fire Suppression System false discharge. A further component which may present a fire risk is an electrical fire commencing in a control panel. The identification of the above issues has informed the outline Battery Fire Safety Management Plan, an updated version of which has been submitted at Deadline 2.</p>
Q1.1.7	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Paragraph 3.4.24 of the Scheme Description [APP-035] says that “<i>The Scheme is an AC-coupled system, so the BESS will be located together in three centralised areas ...</i>”.</p> <p>Please</p> <ul style="list-style-type: none"> <li>• explain briefly your choice of AC over DC; and</li> <li>• explain why and how the choice of AC coupling decides the location of the BESS.</li> </ul>	<p>The AC-coupled BESS configuration locates the BESS containers centrally alongside the substations) which results in reduced electricity losses.</p> <p>A DC-coupled BESS configuration would require that the BESS containers are distributed across the site alongside the solar stations.</p> <p>The differences are highlighted in the following Single Line Diagram (SLD):</p>

ExQ1	Respondent	Question	Applicant's Response
			 <p>The diagram illustrates two power system configurations: AC Coupled and DC Coupled.</p> <p><b>AC Coupled:</b> This configuration shows a 33/132 kV 75MW step-down transformer connected to a 0.69/0.33 kV 3.8MW distribution transformer. The distribution transformer feeds into an Inverter (INV) and a Power Conditioning System (PCS). The PCS is connected to a Battery Energy Storage System (BESS).</p> <p><b>DC Coupled:</b> This configuration shows a 33/132 kV 75MW step-down transformer connected to a 0.69/0.33 kV 3.8MW distribution transformer. The distribution transformer feeds into a PV Inverter (PV INV) and a DC/DC Converter. The PV INV is connected to a PV array, and the DC/DC Converter is connected to a BESS.</p> <p>This DC-coupled approach was dismissed ahead of the Preliminary Environmental Impact Report (PEIR) phase for environmental impact reasons. The AC-coupled configuration has a reduced impact in landscape terms because the height of the containers would be greater than the height of the panels and therefore visible from a distance whereas located in a single centralized location it is possible to screen the containers from view with landscape mitigation. There are also advantages from a fire risk safety point of view (ability to contain a fire in a specific area).</p>
Q1.1.8	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Paragraph 3.4.26 of the Scheme Description [APP-035] states that “<i>The batteries will be housed within containers, each with maximum dimensions of 17m by 5m in plan and up to a maximum 6m of height.</i>”</p>	<p>Paragraph 3.4.26 of the Scheme Description [APP-035] aligns with Table 3-2 (Design Parameters used for the ES assessment) in the same chapter, which says “Maximum dimensions of each container: 17m by 5m footprint and up to 6m in height” and also Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264] which says “The maximum dimensions of each BESS container within a BESS compound is 17m by 5m footprint and up to 6m in height.” This is secured by requirement 6(2) in</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the component parts of the BESS. The BESS enclosure for each of Work Nos 2A, 2B and 2C is shown as the fourth item.</p> <p>Please confirm that the maximum footprint of each BESS enclosure will be 17m (L) x 5m (W) with a maximum height from ground level of 6m and that this is what has been assessed in the EIA.</p>	<p>Schedule 2 of the dDCO which requires the detailed design to be in accordance with the design principles.</p> <p>Table 2 of the outline Battery Fire Safety Management Plan [APP-267] confirms the aforementioned dimensions and states “The maximum anticipated footprint will be 17 m (L) x 5 m (W) with a maximum height from ground level of 6 m.</p> <p>The Applicant confirms the maximum footprint of each BESS enclosure will be 17m (L) x 5m (W) with a maximum height from ground level of 6m and that this is what has been assessed in the EIA.</p>
Q1.1.9	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Paragraph 3.4.27 of the Scheme Description [APP-035] says that “<i>The precise number of individual battery storage containers will depend upon the level of power capacity and duration of energy storage that the Scheme will require.</i>”</p> <p>Paragraph 2.2.2 of the outline Battery Fire Safety Management Plan [APP-267] states that “<i>details of the design for the BESS elements, including their power and energy ratings, and their final enclosure dimensions and appearance, are currently in development and will be finalised following receipt of any Development Consent Order.</i>”</p> <p>Please explain</p> <ul style="list-style-type: none"> <li>• why the power and energy ratings cannot be specified in the Order; and</li> <li>• what has been assessed in the EIA.</li> </ul>	<p>The Applicant does not understand what the justification would be for any limit on the power and energy rating of the BESS. The amount of power the BESS can store, and for how long, has no direct relationship to its environmental and social impacts. The only technical topic this affects is safety; although because any fire is likely to be associated with a single battery enclosure, safety is affected by the power energy rating of an individual battery enclosure rather than the BESS compound as a whole. The Applicant could limit the power and energy rating but this would unnecessarily reduce its flexibility at detailed design stage and be a missed opportunity to support the UK in achieving a balanced and net zero electricity supply.</p> <p>The Applicant is aware that the Little Crow Development Consent Order 2022 imposes a 90MW limit on the capacity of the BESS. However, it is not clear to the Applicant from the Examining Authority's recommendation or from the Secretary of State's decision letter what the reason and the justification for that imposition was. There is no reasoning or justification in either document.</p> <p>It therefore remains the position of the Applicant that it does not consider an upper limit on capacity is the appropriate way to control the impacts of the BESS. The impacts of the BESS are not directly related to its capacity. It is for that reason that the Applicant's approach is to focus on directly controlling and</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>managing the potential impacts of the BESS, rather than arbitrarily limiting its capacity.</p> <p><u>Environmental and Social Impacts</u></p> <p>The amount of energy a BESS can store and for how long has no direct effect on environmental or social impacts presented in the ES. These impacts are limited by the design principles which limit the size and location, noise, and chemistry. The EIA process and resultant ES has considered the maximum parameters of the BESS, as a worst case approach to the EIA. These parameters are set out in the design principles and comprise the assumption that the entire Works Nos 2A, 2B and 2C (as shown on the Works Plans [APP-007] will be covered with BESS containers 6m in height, with no spacing between containers. Should the BESS be built smaller, it is logical that the impacts would be the same or lower than what is presented in the ES.</p> <p>The EIA has therefore assessed the maximum and worst-case parameters for the BESS. Limiting the energy and power rating of the BESS would not change the assessment of the environmental and social impacts assessed within the ES.</p> <p><u>Impacts on Safety</u></p> <p>The design of the BESS and its impacts are controlled in several ways. Prior to commencement of construction of the BESS, a Battery Fire Safety Management Plan (in accordance with the Outline Battery Fire Safety Management Plan (BSMP) [APP-267] submitted with the Application) is required to be submitted to the relevant local planning authority and approved, in consultation with the Cambridgeshire Fire and Rescue Service and the Suffolk Fire and Rescue Service. The Applicant must operate the BESS in accordance with the approved plan.</p> <p>Further, pursuant to the detailed design requirement of the draft DCO [APP-019], the detailed design of the BESS must be in accordance with the Design Principles [Appendix B of APP-264]. The Design Principles [APP-264] contain controls over the BESS which restrict the area, height, external finish and some design features of the BESS. The controls in the Design Principles also include: (i) that the chemistry of the BESS will be lithium ion, and (ii) that an assessment will be undertaken, based on the detailed design for the BESS to demonstrate that the environmental and social impacts from such a fire will be no worse than as</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>assessed in ES Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems [APP-124]. In terms of noise, this is controlled via the operational noise requirement in the draft DCO, which will require the BESS to comply with the noise rating levels as set out in the Environmental Statement. The Applicant is content to also include in the detailed design requirement (currently requirement 6) reference to Work Number 2 being designed in accordance with the Design Principles, the Outline Battery Fire Safety Management Plan and Appendix 16D, so that everyone has clarity over the design controls of the BESS. This update will be made in the next draft of the DCO.</p> <p>In this way the draft DCO [APP-019] controls and limits the BESS in a way that reflects its potential impacts.</p> <p>Furthermore, if the ExA is inclined to impose a capacity restriction on the BESS despite the Applicant's position, the Applicant is not clear how this would work in practice without constraining the Applicant's flexibility. Is it not as simple as limiting the generation capacity of the solar PV to the storage capacity of the BESS, because they are measured in different ways. The MW generation capacity of the solar PV is a figure of how much electricity is produced at a specific time – measured in MW. The BESS is designed in MW-hrs, which is a measure of the power over a given time.</p> <p>For the Scheme it is intended that the BESS will be designed to store a 24 hour period of energy generated by the Solar PV, and no more – so the BESS isn't oversized for the solar PV.</p> <p>The ExA should note that the export capacity is limited to 500MW for the solar farm and BESS; the BESS will therefore never exceed 500MW peak export.</p>
Q1.1.10	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Paragraph 3.4.28 of the Scheme Description [APP-035] says that battery stations may be housed outside or in a container.</p> <p>Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the</p>	<p>With regards to preference, the Applicant has not yet secured a contract to procure this equipment and therefore does not currently have a preference to an outdoor or indoor solution. The design of both options is evolving rapidly as new technology is created and new models are released continually; the preference will be determined by the EPC Contractor during detailed design, based on durability, ease of maintenance, cost effectiveness, and availability.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>component parts of the BESS. The indoor or outdoor battery station for each of Work Nos 2A, 2B and 2C is shown as the seventh item, headed “Indoor or Outdoor Battery Station”.</p> <ul style="list-style-type: none"> <li>• Please explain which option you prefer.</li> <li>• What is the footprint of the indoor and outdoor options?</li> <li>• Which option is better in terms of minimising the risk of fire and ensuring that any incident can be dealt with safely and effectively? and</li> <li>• Has the worst case has been assessed in the EIA?</li> </ul>	<p>The battery stations comprising the transformers, switchgear, power conversion system (PCS) or inverter, and other ancillary equipment will be up to 6m height, as stated in the outline Battery Fire Safety Management Plan [APP-267] and the Design Principles (Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264]). The battery stations do not contain any battery cells. The fire risk of this equipment and the ability to react to a fire is therefore not affected by whether it is an indoor or outdoor solution; they are the same. All the battery station equipment is in some form of enclosure; the reference to indoor solution is where the equipment is enclosed together in a single enclosure, and the outdoor solution is where the enclosures are separate. The fire risk is low associated with battery stations and would not be affected by whether the equipment is enclosed together or separately, nor would the ability to respond to and react to a fire.</p> <p>The EIA has not needed to assess a number or footprint of the battery stations. As mentioned in the Applicant's response for Q1.1.9, the EIA has considered the maximum footprint, massing and height of the BESS, as a worst case approach to the EIA. This comprises the assumption that the entire Works Nos 2A, 2B and 2C (as shown on the Works Plans [APP-007]) will be covered with BESS containers 6m in height, with no spacing between containers. Should the BESS be built smaller, it is logical that the impacts would be the same or lower than what is presented in the ES. The battery stations have the same maximum height as other components in the BESS compound. A worse case has therefore been assessed in the EIA. The footprint is unaffected by whether it will be indoor or outdoor because a worst-case / maximum has been applied to the EIA which can accommodate either design. The specific appearance of the battery stations (outdoor Vs indoor solution) was not considered in the EIA; it does not affect the conclusions of the LVIA and heritage assessments and would look very similar in both situations (with the difference being that an outdoor solution has each enclosure separated by a small gap rather than everything within a single enclosure).</p> <p>The Applicant prefers not to limit the footprint of the battery stations to maximise flexibility in the final design. The absence of this information does not affect the EIA or ES findings.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.1.11	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Paragraph 3.4.29 of the Scheme Description [APP-035] says that each BESS will require an air or liquid cooling system.</p> <ul style="list-style-type: none"> <li>• What are the advantages and disadvantages of air and liquid cooling systems?</li> <li>• Which do you prefer and why?</li> <li>• How do air and liquid systems differ in terms of footprint and visual impact?</li> </ul>	<p>Lithium-ion battery safety and performance parameters are significantly impacted by operating temperature range and variations. Optimum operating temperatures are typically between 20–40°C.</p> <p>Liquid Cooling Systems (LCS) systems will allow for safer and more efficient BESS performance and will be integrated into the BESS design selected for Sunnica. This is referenced in Table 3 of the outline Battery Fire Safety Management Plan [APP-267].</p> <p>The latest LCS designs allow for smaller variations in cell operating temperatures, lower energy consumption, earlier detection for potential thermal runaway, active cooling to manage thermal runaway incidents and high ingress protection module designs allowing for safer operating conditions. High energy density battery systems used in BESS place significant stresses on air cooled system designs.</p> <p>Air cooled systems (ACS) have been involved in many of the BESS incidents since 2016. HVAC design and maintenance is critical to performance and safety for ACS, thermal runaway can be caused by ingress of moisture, dust / particle contamination, inefficient air circulation leading to significant cell temperature differences across the battery system and fire suppression false discharge triggered by HVAC malfunctions.</p> <p>ACS or LCS BESS enclosure designs do not vary significantly, therefore no appreciable footprint or visual impact difference.</p>
Q1.1.12	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Table 1 (Technical Terms and Definitions) of the outline Battery Fire Safety Management Plan [APP-267] says that the authority having jurisdiction (AHJ) “<i>will be confirmed in the final Battery Fire Safety Management Plan</i>”; paragraph 4.1.1 refers to the need to update the Battery Fire Safety Management Plan during the operational phase of the Scheme, or if there is a change to the Scheme; and paragraph 4.3.1 says that it “<i>will be submitted for</i></p>	<p>Under the relevant Requirement in the draft DCO, the Applicant must submit, and have approved by both relevant planning authorities, a Battery Fire Safety Management Plan (BFSMP) prior to commencement of Work No.2. The BFSMP must be implemented as approved.</p> <p>Before determining whether to approve the BFSMP, the relevant planning authorities must consult with the Cambridgeshire Fire and Rescue Service and the Suffolk Fire and Rescue Service. In addition, the Applicant has included the Health and Safety Executive as a consultee in the revised draft of the DCO.</p> <p>In addition, under the Requirement, the BFSMP must be substantially in accordance with the Outline Battery Fire Safety Management Plan. A revised version of the Outline Battery Fire Safety Management Plan [EN010106/APP/7.6] has been submitted for Deadline 2. The reference to an “AHJ” has been deleted</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>approval ... and will be updated during the project lifecycle".</i></p> <ul style="list-style-type: none"> <li>• Which statutory body do you expect to be the AHJ?</li> <li>• Given that the Battery Fire Safety Management Plan will be a live document updated throughout the life of the Scheme, what do you mean by "final"? and</li> <li>• Do you mean that the AHJ will be confirmed prior to approval of the Battery Fire Safety Management Plan in accordance with Schedule 2 to the DCO (Requirement 7)?</li> </ul>	<p>from the revised document, as have references to the "final" BFSMP. When the BFSMP is submitted for approval under the requirement, references to "outline" in the BFMSP would be removed as the BFSMP being submitted would be the version that is then complied with.</p> <p>To the extent that any changes to the BFSMP may be required after commencement of Work No.2 (e.g. due to changes in industry guidance or legislation), the BFSMP provides this review in paragraph 2.7.1.</p>
Q1.1.13	The Applicant	<p><b>Battery energy storage system (BESS):</b> Paragraph 2.2.1 of the outline Battery Fire Safety Management Plan [APP-267] lists the components of the authorised development.</p> <p>Please confirm that the outline Battery Fire Safety Management Plan [APP-267] applies just to item d.</p>	This is correct. It only applies to the Battery Energy Storage Systems (BESS's) on Sunnica East Sites A and B and Sunnica West Site A.
Q1.1.14	The Applicant	<p><b>Battery energy storage system (BESS):</b> Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the component parts of the BESS. The BESS compound for each of Work Nos 2A, 2B and 2C is shown as the fifth item.</p> <ul style="list-style-type: none"> <li>• Please confirm that the figure for Sunnica East Site A is 66,000m<sup>2</sup>;</li> </ul>	<p>The maximum footprint for Sunnica East Site A is 66,000 m<sup>2</sup>. This is clarified in the Design Principles (Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264]).</p> <p>The figures do represent the maximum area for each compound. Again, this is clarified in the Design Principles (Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264]).</p> <p>As mentioned in Q1.1.9, the EIA has considered the maximum footprint, massing and height of the BESS, as a worst case approach to the EIA. This comprises the assumption that the entire Works Nos 2A, 2B and 2C (as shown on the Works Plans [APP-007]) will be covered with BESS containers 6m in height, with no</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• Please confirm that the figures given refer to the maximum area of each compound; and</li> <li>• Please explain how the length and width of each area will be arrived at             <ul style="list-style-type: none"> <li>◦ to minimise the risk of fire;</li> <li>◦ to ensure that any incident can be dealt with safely and effectively, and</li> </ul> </li> <li>• to ensure that the worst case has been assessed in the EIA.</li> </ul>	<p>spacing between containers. Should the BESS be built smaller, it is logical that the impacts would be the same or lower than what is presented in the ES. The battery stations have the same maximum height as other components in the BESS compound. The outline Battery Safety Management Plan [APP-267] has set out a minimum separation distance between battery enclosures and thermal barrier requirements should this not be achievable; the approach taken in the EIA aligns with this. A worse case has therefore been assessed in the EIA.</p> <p>The length and width of each individual infrastructure within the BESS compounds will not exceed the maximum parameters in the application. The fire / explosion risk is directly related to MWh energy contained in each BESS enclosure and the volume of free air, not necessarily its physical dimensions. The dimensions are influenced by the MWh energy stored in the BESS enclosure i.e. number of battery modules &amp; racks, and therefore will be determined at detailed design state, ensuring minimum spacing widths and sufficient space for the fire services to access the compounds are achieved in line with the outline Battery Fire Safety Management Plan [APP-267]. The Applicant will have tested the design to the latest UL 9540A unit or installation level testing and / or NFPA 855 specified 3rd party fire &amp; explosion testing.</p>
Q1.1.15	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the component parts of the BESS. The operational office/warehouse building for each of Work Nos 8A and 8B is shown as the sixth item.</p> <p>Please confirm that the maximum size of each operational office/warehouse building will be 31m (L) x 13m (W) x 5m (H) for Sunnica East Site A and 35.5m (L) x 25m (W) x 8m (H) for Sunnica East Site B and that this is what has been assessed in the EIA.</p>	<p>The outline Battery Fire Safety Management Plan [APP-267] says: the maximum anticipated size of the Operational Office and Warehouse Building for the different sites are as follows:</p> <p>Sunnica East Site A: 31 m(L) x 13 m(W) x 5 m(H)</p> <p>Sunnica East Site B: 35.5 m(L) x 25 m(W) x 8 m(H)</p> <p>Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3 _Design and Access Statement [APP-264] is consistent with this, saying: The maximum parameters for the office and warehouse building in Sunnica East Site A is 13 x 31m and 5m height</p> <p>The maximum parameters for the office and warehouse building in Sunnica East Site B is 25 x 35.5m and 8m height</p> <p>This also aligns with Chapter 3: Scheme Description [APP-035] of the ES. Paragraph 3.4.48, Chapter 3 [APP-035] says:</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>The Sunnica East Site A office/warehouse will be up to 13m by 31m and 5m height and the Sunnica East Site B office/warehouse will be up to 25m by 35.5m and 8m height (see Figures 3-12a and 3-12b).</p> <p>This also matches Table 3-2 of Chapter 3 which says Maximum parameters: Sunnica East Site A: 13 x 31m and 5m height. Maximum parameters: Sunnica East Site B: 25 x 35.5m and 8m height.</p> <p>Therefore a consistent approach has been taken across the application documentation and the ES has assessed the parameters set out above.</p>
Q1.1.16	The Applicant	<p><b>Battery energy storage system (BESS):</b> Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the component parts of the BESS. The substation adjacent to the BESS for each of Work Nos 3A, 3B and 3C is shown as the eighth item.</p> <p>Please confirm that</p> <ul style="list-style-type: none"> <li>• the maximum size of each substation control building or container will be 25m (L) x 8m (W) x 6m (H);</li> <li>• this is included within the overall dimensions given above; and</li> <li>• this is what has been assessed in the EIA.</li> </ul>	<p>Table 2 of the outline Battery Fire Safety Management Plan [APP-267] says that: The maximum anticipated size of the substation control building or container will be 25 m (L) x 8 m (W) x 6 m (H).</p> <p>Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264] says the maximum parameters for the substation control building are 25m by 8m footprint and 7m in height. This is consistent with the ES, with Chapter 3: Scheme Description [APP-035] saying: Maximum parameters: 25m by 8m footprint and 7m in height.</p> <p>The maximum parameters of each substation control building or container assessed in the EIA is 25m by 8m footprint and 7m in height.</p> <p>The typographical error in the outline Battery Fire Safety Management Plan [APP-267] has been corrected in a revised version of the outline Battery Safety Management Plan also submitted at Deadline 2, which now refers to a maximum 7m height.</p>
Q1.1.17	The Applicant	<p><b>Battery energy storage system (BESS):</b> Table 2 of the outline Battery Fire Safety Management Plan [APP-267] outlines the component parts of the BESS. The fire</p>	<p>NFPA 855 (2023) confirms water as the preferred agent for suppressing lithium-ion battery fires. Water has superior cooling capacity, is easily accessible in many locations and is easy to transport to the seat of the fire. In training and real-world BESS fire incidents water spray has been demonstrated to be safe as an agent for use on high-voltage systems by firefighters (from appropriate distances). In</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>water storage tanks (Work Nos 2A, 2B and 2C) are shown as the ninth (final) item.</p> <ul style="list-style-type: none"> <li>• Given that the BESS is essentially electrical, please explain the use of water to put out a fire;</li> <li>• What do you mean by “resiliency” in line 3? and</li> <li>• Will resilience be optimised by immediate refilling and availability of each tank after use?</li> </ul>	<p>many recent BESS incidents firefighters have just used water to externally cool adjacent BESS enclosures to minimise any risk of fire spread.</p> <p>Reference to “resiliency” means that two water tanks are located within each BESS area meaning that if one failed that there would additional capability for firefighting.</p> <p>Once the battery system is selected for Sunnica an Emergency Response Plan (ERP) will be drafted with firefighters to decide on water tank refilling protocols / requirements based upon a risk assessment from UL 9540A unit or installation level test data and / or 3rd party fire &amp; explosion test data for the BESS system. There is an expectation that water tanks will be refilled as soon as it is practical and safe to do so.</p>
Q1.1.18	The Applicant	<p><b>Battery energy storage system (BESS):</b> Paragraph 2.3.5 of the outline Battery Fire Safety Management Plan [APP-267] says that the Battery Fire Safety Management Plan will be secured through Schedule 2 of the DCO which will require approval by the relevant planning authorities.</p> <p>As the Battery Fire Safety Management Plan is concerned mainly with fire safety,</p> <ul style="list-style-type: none"> <li>• should the fire and emergency services be consulted, if not required to approve the plan? and</li> <li>• should the emergency services be listed in paragraph 2.4.1?</li> </ul>	<p>Paragraph 2.4.1 of the Outline Battery Fire Safety Management Plan [APP-267] lists the consultees that Sunnica has identified as being relevant stakeholders for preparation of the plan, including the relevant emergency services for a fire safety plan, being the Cambridge Fire and Rescue Service (CFRS) and the Suffolk Fire and Rescue Service (SFRS). It is noted at paragraph 3.1.2 that the Outline Battery Fire Safety Management Plan has been developed in collaboration with SFRS and that CFRS deferred consultation on the plan to SFRS.</p> <p>Paragraph 2.4.1 does not include the East of England Ambulance Service Trust, as this is not appropriate given the scope of the Plan is about managing fire safety rather than a plan for how the emergency services should respond in a major event. In any event, EEAST has submitted a Relevant Representation following submission of the DCO application and has not requested that it is consulted as part of developing or approving the plan.</p> <p>Requirement 7 (fire safety management) of the draft DCO states that Work No. 2 must not commence until a battery fire safety management plan has been submitted to and approved by both relevant planning authorities. The battery fire safety management plan approved under Requirement 7 must be substantially in accordance with the Outline Battery Fire Safety Management Plan [APP-267] that is submitted as part of the DCO application, which was prepared in collaboration with SFRS, or any revision of this document submitted during the examination.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Whilst the responsibility is on the relevant planning authorities to approve the plan, Requirement 7 requires both relevant planning authorities to consult with the CFRS and the SFRS before determining an application for approval of the battery fire safety management plan. Requirement 7 has been updated in the draft DCO submitted at Deadline 2 to include the Health and Safety Executive as one of the bodies that the relevant planning authorities must consent before determining an application for approval. This secures the need for the relevant local planning authorities to get input from the fire services and the Health and Safety Executive as part of approving the final plan prior to commencement of Work No. 2.</p>
Q1.1.19	The Applicant	<p><b>Battery energy storage system (BESS):</b> Paragraph 3.1.1 of the outline Battery Fire Safety Management Plan [APP-267] refers to “<i>the life safety and property protection fire safety requirements</i>”.</p> <ul style="list-style-type: none"> <li>• Please explain what you mean by “life safety and property protection”;</li> <li>• What are these requirements? and</li> <li>• do they include human health, safety and welfare? (Either say so here or signpost)</li> </ul>	<p>“Life safety” refers to minimising risks to Sunnica site personnel and first / second responders who would be required to deal with a BESS safety incident in close proximity to the BESS area. Local residents are situated outside the life safety critical zones but their specific health and safety protocols and incident communication requirements will also be factored into Emergency Response Planning (ERP). “Property protection” covers site equipment and site biodiversity protection (air, water or land pollution control). Site design ensures that a BESS fire incident would have a minimal impact on neighbouring property to Sunnica.</p> <p>“Welfare” has been added to the revised version of the Outline Battery Fire Safety Management Plan [APP-267] at Deadline 2. This clarifies that human health, safety and welfare are requirements.</p> <p>Hazard risk assessments covering these areas are shown in Tables 8-12 in the Outline Battery Fire Safety Management Plan [APP-267].</p>
Q1.1.20	The Applicant	<p><b>Battery energy storage system (BESS):</b> In paragraph 3.1.2 of the outline Battery Fire Safety Management Plan [APP-267]</p> <ul style="list-style-type: none"> <li>• Please explain what you mean by “significant”; and</li> <li>• In line 3, rather than “an appropriate Outline Battery Fire Safety Plan” do you mean “the approved Battery Fire Safety Management Plan”?</li> </ul>	<p>Paragraph 3.1.2 of the outline Battery Fire Safety Management Plan [APP-267] says: “The purpose of the Outline Battery Fire Safety Management Plan is to demonstrate that the location of BESS within the Scheme does not give rise to a significant increase in fire risk and ....”. The word “significant” is given its everyday meaning and refers to more than slight or imperceptible. It is not meant in terms of the EIA Regulations; this report does not form part of the ES.</p> <p>Regarding line 3, the sentence should say “the approved Battery Fire Safety Management Plan”. A revised version of the outline Battery Fire Safety Management Plan has been produced as part of Deadline 2.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.1.21	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>In paragraph 3.1.3 of the outline Battery Fire Safety Management Plan [APP-267]</p> <ul style="list-style-type: none"> <li>• What concerns have been raised by local communities?</li> <li>• What do you mean by “historical” BESS projects?</li> <li>• What is “the experience gained from these projects”?</li> <li>• How do your proposals differ from these “historical” projects in terms of fire safety and human health, safety and welfare?</li> <li>• What do you mean by “where reasonably practicable”?</li> <li>• Surely solutions should be implemented as required to reduce any and all foreseeable risks to as low as reasonably practicable?</li> </ul>	<p>With reference to paragraph 3.1.3 of the outline Battery Fire Safety Management Plan [APP-267]:</p> <ul style="list-style-type: none"> <li>• The concerns raised by local communities are included in Table 3 of the report [APP-267]. Table 3 also includes concerns raised by other stakeholders such as the councils and Fire Service. Further detail of these concerns is also summarised in the Consultation Report [APP-26] in Table 6-19. All issues raised referencing the BESS are listed in Appendix J1-J5 [APP-30], please refer to the ‘Human Health’ topic area in appendices J-1 to J-5.</li> <li>• “Historical” BESS projects is a reference to other, independent BESS projects not associated with this application or the Applicant, and in some cases not based in the UK, which are operational in the world and have experienced some form of accident or unplanned event. These are taken into account in current legislation and guidelines,</li> <li>• Manufacturers and fire experts have learnt from these historical projects and have developed research papers to share these lessons. This has led to the measures presented in Section 6 of the Outline Battery Fire Safety Management Plan [APP-267]. Many of these measures have been a result of lessons learnt from worldwide real life projects and controlled fire explosion tests carried out following unplanned events on the historical BESS projects.</li> <li>• As noted above, Section 5 of the Outline Battery Fire Safety Management Plan presents a comprehensive list of mitigation and control measures, some of which were not included in the design of the “historical” BESS projects around the world that communities referred to.</li> <li>• The Applicant agrees to delete the reference to ‘reasonably practical’ which is shown in the revised document submitted at Deadline 2.</li> </ul> <p>The Applicant agrees that solutions should be implemented to reduce any and all foreseeable risks to as low as reasonably practicable. The Applicant considers that this is achieved by the Outline Battery Fire Safety Management Plan [APP-267], which has been written in liaison with the councils and fire services.</p>
Q1.1.22	The Applicant	<b>Battery energy storage system (BESS):</b>	An emergency response plan is not included in the Outline Battery Fire Safety Management Plan [APP-267] and is better produced following detailed design

ExQ1	Respondent	Question	Applicant's Response
		<p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 2 states that "<i>The Battery Fire Safety Management Plan will include an emergency response plan during the detailed design stage of the Scheme</i>".</p> <ul style="list-style-type: none"> <li>• Surely the Battery Fire Safety Management Plan will include an emergency response plan throughout the life of the Scheme?</li> <li>• Is an outline emergency response plan included in the outline Battery Fire Safety Management Plan with the detail to be added during the detailed design stage?</li> </ul> <p>If not, please explain how the inclusion of an emergency response plan in the Battery Fire Safety Management Plan will be secured in the DCO.</p>	<p>when the specific risks are better understood. A requirement for one to be in the Battery Fire Safety Management Plan is noted in Table 3 of The Outline Battery Safety Management Plan [APP-267]. The Emergency Response Plan (ERP) will be prepared during the detailed design stage and will be in place throughout the lifetime of the Scheme.</p> <p>Requirement 7 of the draft DCO [APP-019] requires Work No. 2 must not commence until a battery fire safety management plan ("BFSMP") has been submitted to and approved by both relevant planning authorities. It says that The BFSMP must be substantially in accordance with the outline battery fire safety management plan. The Outline BFSMP [APP-267] commits in Table 3 to the preparation of an emergency response plan as part of the updated, BFSMP that will be agreed with relevant planning authorities in consultation with the Fire Services.</p>
Q1.1.23	Various	Question not for Applicant.	
Q1.1.24	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 4 states that "<i>the emergency response plan should include details ...</i>"</p> <p>Please confirm as your response to this requirement that "the emergency response plan will include details ..."</p>	<p>The text referred to in item 4 is a summary of the response received from statutory consultees. The Applicant commits in its response to item 5 to maintain an emergency response plan .</p> <p>Furthermore, the ERP will be modelled on recommendations and templates contained in NFPA 855 (2023), UK Fire Chiefs Council guidelines and EPRI international ERP template (2023).</p>
Q1.1.25	The Applicant	<b>Battery energy storage system (BESS):</b>	Table 3 of the outline Battery Fire Safety Management Plan [APP-267] presents stakeholders' comments. Stakeholders raised a concern that persons might be

ExQ1	Respondent	Question	Applicant's Response
		<p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 17 refers to persons being burnt.</p> <p>Does this item also include persons inhaling toxic gases?</p>	<p>burnt and a potential for death, asking that this scenario be included in the risk assessment. The risk of persons inhaling toxic gases was also included.</p> <p>As noted in Table 3, this was added to the risk assessment matrix (Tables 7, - 11 of the Outline Battery Fire Safety Management Plan [APP-267]). These tables do not explicitly include persons inhaling toxic gases. However, as noted in item 3 of Table 3, stakeholders did also raise concern about toxic fumes being inhaled, which the Applicant notes has been considered, particularly as part of Appendix 16D: Unplanned Atmospheric Emissions from Battery Energy Storage Systems (BESS) of the Environmental Statement [APP-124].</p>
Q1.1.26	Various	Question not for Applicant.	
Q1.1.27	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 19 refers to details of the BESS technology.</p> <p>The requirement states that these need "<i>to be presented as part of the consultation and not developed post consent</i>". Your response states that details have been provided in Table 1, that the maximum parameters of the BESS have been provided and that more detailed information will be provided "<i>within the detailed Battery Fire Safety Management Plan as the project develops during detailed design</i>".</p> <ul style="list-style-type: none"> <li>• Table 1 appears to cover technical terms and conditions: where are the details provided?</li> </ul> <p>If sufficient detail is not provided with the application, how do you know that you have assessed the worst case in the EIA and what the effects of those impacts will be?</p>	<p>This should have referred to Table 3 of the Outline Battery Fire Safety Management Plan [APP-267] rather than Table 1. This has been amended in a revised version of the Outline Battery Fire Safety Management Plan which has been submitted at Deadline 2.</p> <p>The application has assessed a parameters based approach to the BESS based on maximum parameters, which limit the environmental effects. These are secured via the Design Principles set out in the Design and Access Statement (APP-264) and the OBFSMP. The Applicant has not stipulated detailed specifications of the BESS as it is seeking to maintain flexibility until detail design is undertaken. This approach is in line with PINS advice note (Advice Note Nine) on the Rochdale Envelope.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.1.28	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 21 refers to the need “<i>to observe the minimum of 6m separation between containers rather than the provision of 1-hour fire separation ... due to the potential for thermal runaway</i>”.</p> <ul style="list-style-type: none"> <li>• Is 1-hour fire separation sufficient to prevent thermal runaway?</li> <li>• What impact would a minimum 6m separation between containers have on the layout, footprint and consequent impact of the BESS?</li> <li>• Has this been assessed in the EIA?</li> </ul>	<p>As mentioned in Table 12 of the outline Battery Fire Safety Management Plan [APP-267], which provides a proposed list of risk mitigation methods:</p> <p><i>“If the separation distances can't be maintained, thermal barriers shall be provided in accordance with FM Global Datasheet 1-21 for Fire Resistance of Building Assemblies. This will allow containers to be located directly next to each other. Cable and pipe penetrations into each BESS enclosure will be sealed and provided with rating equal to that required for the BESS enclosure.”</i></p> <p>The thermal barriers would provide a minimum 1-2 hour thermal insulation as per NFPA 855 (2023) recommendation, and as noted in the illustration in Method RMM01 of Table 12 of the outline Battery Fire Safety Management Plan [APP-267]. This is to provide protection against propagation to or from other BESS containers. It does not prevent thermal runaway on a battery container that is already on fire. The separation between containers has no bearing on thermal runaway.</p> <p>BESS containers located closer together and with thermal barriers will lead to the volume of free air quickly diminishing, therefore any fire reducing.</p> <p>A minimum 6m separation between containers increases the footprint of the BESS compounds, compared with a facility with less (or no) separation between containers (assuming there is no change in capacity). The DCO application has allowed for adequate separation; should 6m be later agreed with the Fire and Rescue Services and host councils, it would not affect the application or EIA. The EIA has assessed the maximum parameters set out in Table B-1 (Work No1 Design Principles) of Appendix B Design Principles in 7.3_Design and Access Statement [APP-264] and Chapter 3: Scheme Description [APP-035].</p>
Q1.1.29	Various	Question not for Applicant.	
Q1.1.30	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 29 refers to isolation of battery racks and modules, and says “<i>Battery discharge is not possible once isolated</i>”.</p>	<p>With current BESS designs (2022), automatic or manual emergency stop capabilities will not allow for battery discharge without a full safety assessment and health check of the affected parts of the battery system. Discharge of battery modules increases cell surface temperatures and could trigger thermal runaway in some scenarios. Research and testing programs are currently being conducted by the US Department of Energy and a variety of Battery OEMs to evaluate</p>

ExQ1	Respondent	Question	Applicant's Response
		Please explain why this is, and how the safety of responding personnel is ensured.	<p>emergency discharge capabilities for a variety of lithium-ion battery module designs to see if this will be safe to integrate for BESS.</p> <p>NFPA 855 (2023) stipulates that site operatives and first responders will have access to the real time BESS monitoring systems, analysis of the data allows them to decide if the battery system can be restarted safely for operational use or decommissioning.</p> <p>Sunnica BESS system minimum online monitoring must include:</p> <ul style="list-style-type: none"><li>a. Charging / discharging voltage &amp; current</li><li>b. Temperature</li><li>c. Internal ohmic (resistance)</li><li>d. Capacity</li><li>e. State of Charge (SOC)</li><li>f. State of Health (SOH)</li><li>g. Alarm or fault log</li></ul> <p>The Sunnica BESS Emergency Response Plan (ERP) will include procedures for safe shutdown, de-energising or isolation of equipment / systems under emergency conditions to reduce the risk of fire, electric shock, personal injuries, and for safe start-up following cessation of emergency conditions. The procedures will be dependent on the BESS battery system and will be provided by battery OEM and BESS integrator. Any additional safety requests from the local and national Fire &amp; Rescue Service will be accommodated.</p> <p>The safety of responding personnel is secured as the online monitoring information allows first responders to make informed decisions on processes to follow if the system is automatically isolated but is not obviously on fire. All the monitoring variables have defined safe operating parameters so if all are within tolerance then the system can be restarted. If they aren't then the ERP will define the procedure to make the system as safe as possible.</p> <p>If the BESS is on fire then the monitoring will give first responders accurate data on how the thermal runaway propagation is developing within the BESS. Decisions on firefighting tactics can be made based on this data. The battery</p>

ExQ1	Respondent	Question	Applicant's Response
			OEM and integrator will have defined appropriate tactics together with first responders and will be included in the ERP.
Q1.1.31	Various	Question not for Applicant.	
Q1.1.32	The Applicant	<p><b>Battery energy storage system (BESS):</b>  Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 30 refers to safe dissipation of residual charge and says "<i>it's currently unknown whether a residual charge can be safely dissipated to a remote location. This will be confirmed during the detailed design stage ...</i>".</p> <ul style="list-style-type: none"> <li>• Do you mean that it will be confirmed during the detailed design stage that it is unknown whether a residual charge can be safely dissipated to a remote location?</li> <li>• What do you mean by "a remote location" and do you have a particular location in mind?</li> </ul>	<p>The Applicant considers that there may be a misunderstanding as to what item 30 of the outline Battery Fire Safety Management plan [APP-267] was saying. It has been redrafted in an updated plan submitted at Deadline 2 to make this clearer. Fundamentally, the reference to dissipation to a remote location was not referring to the discharge of the batteries to a remote location, rather the ability for the BESS to be controlled from a remote location.</p> <p>Many current BESS Supervisory Control and Data Acquisition (SCADA) systems are capable of discharging battery systems from remote locations. The precise SCADA capabilities and base for the remote facility will be selected by the BESS integrator chosen for the Sunnica project.</p> <p>However, to ensure the highest level of safety in accordance with NFPA 855 (2023) the ability to monitor data from a battery container will be possible from (a) a remote (24/7 facility) and (b) a local control room on the Sunnica site. In addition, there will be remote and local emergency electrical disconnect facilities integrated into the BESS system itself.</p>
Q1.1.33	The Applicant	<p><b>Battery energy storage system (BESS):</b>  Table 3 of the outline Battery Fire Safety Management Plan [APP-267] at item 30 refers to safe dissipation of residual charge and says "<i>it's currently unknown whether a residual charge can be safely dissipated to a remote location. This will be confirmed during the detailed design stage ...</i>".</p>	<p>Please see our response to Q1.1.32 which explains that this text has been updated in the revised outline Battery Fire Safety Management Plan submitted at Deadline 2.</p> <p>Once the BESS battery system is selected for the Scheme, NFPA 855 (2023) guidelines will be followed to ensure that the BESS ERP includes procedures for safe shutdown, de-energising or isolation of equipment / systems under</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>Please explain why this is, and how the safety of responding personnel is ensured.</li> <li>What if it proves impossible to dissipate a residual charge safely to a remote location?</li> </ul>	<p>emergency conditions to reduce the risk of fire, electric shock, personal injuries, and for safe start-up following cessation of emergency conditions.</p> <p>Battery system (real time) online monitoring data will be available to site personnel, Subject Matter Experts and first responders to assist incident response decision making.</p>
Q1.1.34	Various	Question not for Applicant.	
Q1.1.35	The Applicant	<p><b>Battery energy storage system (BESS):</b> Section 4.2 of the outline Battery Fire Safety Management Plan [APP-267] is headed "Building Regulations".</p> <ul style="list-style-type: none"> <li>Why is BS9999 (Fire safety in the design, management and use of buildings) cited here and not under section 4.3 Safety Standards?</li> <li>Should building regulation documents be cited here? (eg "Fire safety: Approved Document B (Building regulation in England covering fire safety matters within and around buildings - DLUHC/MHCLG, last updated 26 November 2020)</li> <li>BS9999 is dated 2017 and currently under review: do you expect any material changes which might affect the Scheme?</li> </ul>	<p>The Applicant agrees that reference to BS9999 would be better located within section 4.3 of the Outline Battery Fire Safety Management Plan [APP-267]. This amendment has been made in an update to this document also submitted at Deadline 2. Please see table 4.</p> <p>The BS9999 risk assessment approach was used alongside other safety standards to put together the outline Battery Fire Safety Management Plan [APP-267]. These safety standards will be confirmed in the final Battery Fire Safety Management Plan, which will be submitted for approval to the relevant planning authorities, and will be updated during the project lifecycle.</p> <p>There are no current UK laws or regulations specifically covering BESS enclosure fire safety; the outline Battery Fire Safety Management Plan [APP-267] Safety Standards table references the key safety standards that will be followed.</p> <p>Building regulations approval is not required for certain exempt projects, including most repairs, replacements and maintenance work (except heating systems, oil tanks, fuse boxes and glazing units). The BESS falls within the category of an exempt project, being considered 'Class 2 Buildings not frequented by people'. This type of Class 2 building is exempt from parts A-K, M, N, Q and P of the Building Regulations. Government guidance suggests that Part L may apply in some circumstances, which is the application of energy efficient requirements. Within Regulation 21 of the Building Regulations 2010, which sets out when Part L applies, the Applicant notes that Part L would apply if the structure were considered to be a roofed construction having walls and uses energy to condition the indoor climate. An indoor, enclosed BESS would be roofed and have walls,</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>but any energy used to condition the climate is internal to the BESS modules themselves, not the container and is a functional aspect of their design. For these reasons the Building Regulations is not expected to apply to the BESS.</p> <p>Nevertheless, if during the post consent stage when the BESS compound is undergoing detailed design the council suggests otherwise, the Applicant confirms it will meet the requirements of Part L of the Building Regulations.</p> <p>The above clarification has been made within a revised version of the outline Battery Fire Safety Management Plan [APP-267] at Deadline 2.</p>
Q1.1.36	The Applicant	<p><b>Battery energy storage system (BESS): drafting</b></p> <p>Paragraph 5.1.5 of the outline Battery Fire Safety Management Plan [APP-267] refers to hazards (orange shapes) and “seven main categories (blue shapes), as shown in Figure 1”. The blue shapes in Figure 1 show five categories; mechanical, chemical, electrical, thermodynamic and environmental.</p> <ul style="list-style-type: none"> <li>• Do you mean to say “five main categories” in paragraph 5.1.5?</li> <li>• Should outside temperature be included as an environmental hazard?</li> </ul>	<p>Correct. This should say “five main categories …”. This has been corrected in a revised version of the Outline Battery Fire Safety Management Plan [APP-267] at Deadline 2.</p> <p>The UK does not experience air temperatures that would likely cause an environmental hazard to BESS; it will be designed to function within the climatic and weather extremes known to occur and forecast for the UK. Battery modules will integrate Liquid Cooling Systems (LCS) which regulate temperature very efficiently, and module casing will have high ingress protection. The BESS enclosure will also have a well regulated and protected operating environment (temperature regulation, moisture ingress protection, humidity controls, etc.).</p>
Q1.1.37	The Applicant	<p><b>Battery energy storage system (BESS): drafting</b></p> <p>Paragraph 5.2.3 i of the outline Battery Fire Safety Management Plan [APP-267] refers to risk mitigation methods.</p> <ul style="list-style-type: none"> <li>• Do you mean to say “eliminate, reduce or control …”?</li> <li>• Following “eliminate” and “reduce”, is there also an action in the</li> </ul>	<p>This is a typographical error. It should read “eliminate, reduce or control …”. This has been corrected in a revised version of the Outline Battery Fire Safety Management Plan [APP-267] at Deadline 2 (now paragraph 4.2.3(i)).</p> <p>The risk mitigation methods inform the mitigation and control measures, as suggested by the ExA. Paragraph 6.1.1 of the Outline Battery Fire Safety Management Plan [APP-267] introduces this, with Table 12 listing the proposed risk mitigation methods.</p>

ExQ1	Respondent	Question	Applicant's Response
		hierarchy to inform, and how is this done?	
Q1.1.38	The Applicant	<p><b>Battery energy storage system (BESS):</b></p> <p>With reference to Tables 7 to 11 inclusive of the outline Battery Fire Safety Management Plan [APP-267], please explain why undesirable events including loss of life are only accorded a severity assessment of 3 and not 5.</p>	<p>With regards to these tables, 3 represents Major severity, 4 is Critical, and 5 is Catastrophic.</p> <p>The undesirable event mentioned is “Burns / loss of life”, which is a category of physical harm that ranges from minor burn through to the loss of life. It does not suggest loss of life may happen. A risk assessment is designed to consider every eventuality. In this case, the scenarios presented in tables 7 to 11 for the category “Burns / loss of life”, are expected to lead to a severity of 3 (Major) due to the presence of some Scheme operational staff onsite, who should they be in proximity to a fire event have the potential to be exposed to ‘Major’ severity. Burns / loss of life is not expected for members of the public given the Scheme’s distance from Public Rights of Way and areas where the public may reside or congregate, or for First Responders from the Fire Service who are appropriately trained and equipped to deal with any fire event and would therefore not be expected to incur burns / loss of life.</p> <p>The probability of a Major severity impact reduces following the implementation of the measures presented in the outline Battery Fire Safety Management Plan [APP-267].</p>
Q1.1.39	The Applicant	<p><b>Battery energy storage system (BESS): drafting</b></p> <ul style="list-style-type: none"> <li>• In line 2 of Risk Mitigation Method RMM04 in Table 12 of the outline Battery Fire Safety Management Plan [APP-267] do you mean to say “thermal runaway”?</li> <li>• Is RMM16 not used?</li> </ul>	<p>Correct. It should read:</p> <p>“Find out, according to the empty space existing in the battery container, the air leak and nature of gas generated, the acceptability of the substances released in case of thermal runaway, venting or leaking cell. Calculate the maximum number of cells below which the concentration of flammable substances is not hazardous.”</p> <p>RMM16 is not used.</p> <p>An amended version of the Outline Battery Safety Management Plan has been submitted at Deadline 2.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.1.40	The Applicant	<p><b>Battery energy storage system (BESS):</b>            Paragraph 7.1.2 of the outline Battery Fire Safety Management Plan [APP-267] refers to further stakeholder consultations.</p> <ul style="list-style-type: none"> <li>• Who are the stakeholders?</li> <li>• Have the further consultations been carried out?</li> <li>• If not, when is it proposed that the further consultations be carried out?</li> </ul>	<p>The key stakeholders during the preparation of the outline Battery Fire Safety Management Plan was the fire services (Cambridge Fire and Rescue Service and Suffolk Fire and Rescue Service) and the relevant planning authorities. The Health and Safety Executive (HSE) was also consulted. It is anticipated that these same stakeholders will be consulted during the preparation of the Battery Fire Safety Management Plan (BFSMP).</p> <p>Of course, requirement 7 of the DCO provides that no work on the BESS may commence until the BFSMP has been approved by the relevant planning authorities and such approval cannot take place until consultation has been undertaken with the fire services. The HSE would be contacted if any deviation from industry guidance is proposed during the Scheme, as noted in Table of the Outline Battery Fire Safety Management Plan [APP-267].</p> <p>These further consultations have not been carried out and are not necessary for this stage; it is intended these would happen during detailed design.</p>
Q1.1.41	Various	Question not for Applicant.	
Q1.1.42	Various	Question not for Applicant.	
Q1.1.43	The Applicant	<p><b>Major accidents and disasters</b>            Paragraph 16.5.10 of the ES [APP-048] mentions receptors which could be vulnerable to major accidents or disasters.</p> <p>Does the list just refer to the infrastructure and sites, or are humans included?</p>	<p>It is the humans using the receptors identified in 6.5.10 that are the receptors that could be vulnerable to a major accident or disaster and not the buildings/infrastructure itself. Site operatives or first responders would be at the greater risk of exposure to toxic gases but are subject to H&amp;S at work regulations, which require consideration of Personal Protective Equipment, and allow for greater exposure to toxic gases in the workplace.</p>
Q1.1.44	The Applicant	<p><b>Major accidents and disasters</b>            Paragraph 16.5.15 of the ES [APP-048] deals briefly with fire risk but does not mention the operational phase.</p>	<p>Paragraph 16.5.15 [APP-048] is describing potential impacts during the construction and decommissioning phase only, as indicated by the headings above Paragraph 16.5.12.</p> <p>Thank you for identifying a typographical error: there should be a subheading introducing the Operational Phase before Paragraph 16.5.17 of the ES [APP-</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Paragraph 16.5.17 of the ES [APP-048] is under the heading "Rail Accidents" but appears to introduce the operational phase.</p> <ul style="list-style-type: none"> <li>• Should there be a heading between paragraphs 16.5.16 and 16.5.17?</li> <li>• What adverse impacts might the Scheme have on people, property and the environment during the operational phase, and how would the effects be minimised?</li> </ul>	<p>048]. A revised version of this chapter has been submitted at Deadline 2 which corrects this error.</p> <p>The impacts during the operational phase are discussed in Paragraphs 16.5.17-16.5.40.</p>
Q1.1.45	The Applicant	<p><b>Major accidents and disasters</b></p> <p>Under the general heading of fire, paragraphs 16.5.23 to 16.5.39 of the ES [APP-048] briefly cover battery fire, and refer to the outline Battery Fire Safety Management Plan [APP-267].</p> <p>Paragraph 2.3.4 of the outline Battery Fire Safety Management Plan [APP-267] states that "<i>The councils have expressed a concern that the risks associated with battery storage fires have not been fully explored and a request has been made to develop an Outline Battery Fire Safety Management Plan for the BESS and to be included as part of the DCO application for the Scheme. This document addresses this request.</i>"</p> <ul style="list-style-type: none"> <li>• Did paragraphs 16.5.23 to 16.5.39 of the ES [APP-048] form part of the section 47 consultation?</li> </ul> <p>If so, were they modified prior to submission of the application to include reference to the</p>	<p>The text set out at paragraphs 16.5.23 to 16.5.39 of the ES [APP-048] was not consulted upon during the statutory consultation pursuant to section 47 of the Planning Act 2008. The Preliminary Environmental Information Report did include text on fire risk but it was not the same as that identified by the Ex A in the ES. The outline Battery Fire Safety Management Plan [APP-267] was not available at Statutory Consultation, which allowed this section to be drafted in greater detail than was possible for the Preliminary Environmental Information Report.</p> <ul style="list-style-type: none"> <li>•</li> </ul> <p>The information on fire risk was modified prior to submission of the application to include reference to the Outline Battery Fire Safety Management Plan [APP-267].</p>

ExQ1	Respondent	Question	Applicant's Response
		outline Battery Fire Safety Management Plan [APP-267]?	
Q1.1.46	The Applicant	<p><b>Major accidents and disasters</b></p> <p>Paragraph 16.5.33 of the ES [APP-048] and paragraph 2.1.2 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124]) both say that "<i>If the battery cells become damaged ... then the combustible materials consumed in the fire could give rise to a range of organic and inorganic air pollutants.</i>".</p> <p>How will the adverse effects of these air pollutants be dealt with?</p>	<p>The ES Appendix 16D: Unplanned Atmospheric Emissions from BESS [APP-124] considers the potential magnitude of the impacts that are possible in the event of unplanned emissions to air from the use of battery technology within the Proposed Development. The assessment sets out that the only pollutant of concern is hydrogen fluoride (HF) and concludes that concentrations of HF will be below the AEGL-1 value before reaching any sensitive receptors. As such there are not expected to be any adverse effects from HF. The expectation is that exposure will be avoided rather than mitigated.</p> <p>A fire is considered unlikely to occur due to the designed-in fire suppression systems. Should a fire occur, the distribution of emissions would be part dependant on the weather conditions at that time, primarily the wind speed and wind direction. The wind direction will determine the direction that the plume travels, and the wind speed determines the distance the plume travels. The modelling was undertaken with 5 years of meteorological data, and results from the worst case year presented. As such, meteorological conditions are likely to be more favourable (higher wind speed) and lead to lower impacts than has been demonstrated.</p> <p>The Battery Fire Safety Management Plan will be agreed with the host authorities and fire services, who would be the first responders (Fire Brigade, Police etc), who in turn will be fully aware of the range of risks. It would be the responsibility of the first responders to decide if measures such as evacuation or advising people to stay indoors and keep windows closed were appropriate.</p>
Q1.1.47	The Applicant	<p><b>Major accidents and disasters</b></p> <p>Paragraph 16.5.37 of the ES [APP-048] refers to "<i>the use of batteries that are sealed by design so do not vent when in normal use</i>".</p> <ul style="list-style-type: none"> <li>• Does this mean that there is a risk of explosion?</li> <li>• If yes, what would the consequences be in terms of</li> </ul>	<p>Lead-acid batteries vent hydrogen during normal operations. The lithium-ion batteries proposed for use by the project do not vent explosive gases during normal operations, as outlined in paragraph 4.1.6 of Appendix 16D: Unplanned Atmospheric Emissions from BESS [APP-124]. The use of batteries that are sealed by design do not pose an explosive risk.</p> <p>Lithium-ion batteries can vent explosive gases during a thermal runaway event. The selected battery system and BESS enclosure design for Sunnica will have completed UL 9540A unit / installation testing and 3rd Party Fire and Explosion testing. These tests will quantify thermal runaway gas emissions and ensure that</p>

ExQ1	Respondent	Question	Applicant's Response
		physical damage, plant and equipment loss, noise, and emissions to air and water?	deflagration potential from a thermal runaway event will not compromise BESS structural integrity. Safe distances to adjacent BESS equipment will be established through this testing.
Q1.1.48	The Applicant	<p><b>Major accidents and disasters (or with Q1.0.2 upfront?)</b></p> <p>Paragraph 16.5.37 of the ES [APP-048] and paragraph 4.1.6 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refer to “<i>another thermal barrier or an air gap</i>”. This is not mentioned in paragraph 1.2.2 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124].</p> <ul style="list-style-type: none"> <li>• Is the air gap intended to act as a thermal barrier?</li> </ul> <p>If so, does it?</p>	<p>Paragraph 16.5.37 of the ES [APP-048] states “...with the [battery] modules themselves also separated from one another by another thermal barrier or an air gap”. Paragraph 1.2.2(d) of ES Appendix 16D directly refers to this additional thermal barrier or air gap, noting that in addition to containing cells separated by a thermal barrier, the modules themselves “will be stacked vertically in racks and separated by thermal barriers from each other”.</p> <p>As described in the Outline Battery Fire Safety Management Plan [APP-267], the cells will have a thermal barrier separating adjacent cells, the racks will be separated with thermal barriers, but the modules will be separated by an adequate separation distance (agreed with the host authorities and fire services) or where this cannot be achieved thermal barriers will be applied between modules. This is described in item RMM01 of Table 12 of the Outline Battery Fire Safety Management Plan.</p> <p>The air gap is a risk mitigation measure in the same way as a thermal barrier, both acting to reduce the chance of any fire or overheating spreading from one module to another. An air gap, more commonly referred to as "cell spacing" can assist in the slowdown of cell propagation during a thermal runaway event</p>
Q1.1.49	The Applicant	<p><b>Major accidents and disasters (or with Q1.0.2 upfront?)</b></p> <p>Paragraph 16.5.39 of the ES [APP-048] and paragraph 4.1.8 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] say that emissions will be checked at detailed design stage.</p> <ul style="list-style-type: none"> <li>• If at that stage the impacts associated with an unplanned fire were found to give rise to adverse</li> </ul>	<p>The design process focuses on minimising the risk of any fire occurring and spreading and through those protections also minimises the consequences of a fire. Design features such as fire suppression systems, insulating layers, and separation distance between racks and enclosures act to not only reduce the chance of fire but, should a fire occur, they restrict the burn time (for example by automatically dousing the fire) and spread of the fire (for example by ensuring the separation distance stops the fire jumping small gaps).</p> <p>It would not be appropriate to set a maximum value for emissions from an unplanned event such as a fire, due to the generally unforeseeable nature of such an event. Consequence modelling will be undertaken when the detailed design is known in order to inform the detailed Battery Fire Safety Management Plan. The</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>health effects, how would this be dealt with prior to construction?</p> <ul style="list-style-type: none"> <li>• Should any maximum values be included in the Requirements?</li> </ul>	<p>results will be compared to the AEGL-1 levels as with the dilution modelling, which is an appropriate level for the protection of health. The dilution modelling undertaken thus far assumes that no mitigation measures are in place – i.e. no fire suppression system of any kind – to represent a worst case scenario. This will not be the case with the final design, which will have mitigation measures in place, and therefore, it is very unlikely that any impacts associated with an unplanned fire would exceed the effects outlined and assessed in the ES. The detailed design will ensure that the emissions values estimated in the dilution modelling are met.</p>
Q1.1.50	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 1.1.1 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refers to unplanned emissions to air from the BESS.</p> <ul style="list-style-type: none"> <li>• Have unplanned emissions to land and water from the BESS been considered?</li> <li>• If so, what are your conclusions?</li> </ul>	<p>Deposition of unplanned emissions from land and water have not been considered as part of the EIA. The harmful emissions from a battery fire are gaseous, not particulate and so would not result in unplanned emissions to land or water.</p> <p>Appendix 16D Unplanned Atmospheric Emissions from Battery Energy Storage Systems (BESS) of the ES [APP-124], which is summarised in Chapter 16 of the ES [APP-048], considers the impact from airborne HF emissions from an unplanned fire. This is a gas and would therefore not deposit on land or water, nor would any noticeable quantities be absorbed by the ground or waterbody. Any particulates associated with a fire would be similar in nature and no worse in severity than if there were a residential or commercial fire within the community.</p> <p>Water from the fire suppression system and water from firefighting has been considered but as it would be channelled to bunded areas so that it can be tankered offsite or tested prior to discharge it is not considered an unplanned emission. No water will be released to the land or waterbodies until after it has been tested to confirm it is safe to do so. The capacity of the storage basin (400m<sup>2</sup>) will be greater than the volume of stored water (228m<sup>2</sup>) for fire-fighting activities, and if necessary, the basin can be lined to prevent the infiltration of any chemical pollutants if it is used. These measures are secured in Table 3-4 of the Outline Operation Environmental Management Plan [APP-126].</p>
Q1.1.51	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 2.1.2 of ES Appendix D: Unplanned Atmospheric Emissions from</p>	<ul style="list-style-type: none"> <li>• The methodology is set out in ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] section 4. The modelled emission factor is 1 µg/m<sup>3</sup>/s. The resulting dilution factors have been applied to a range of indicative emission rates (Table 4). These have been derived from the</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<p>BESS [APP-124] notes that emission factors have been collated by the Environment Agency for various types of incident fire, but that “<i>A standardised set of emission factors for BESS is not currently available ...</i>”.</p> <p>Paragraph 3.1.2 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] acknowledges that “<i>a definitive emission rate will not be known until later in the detailed design stage ...</i>”</p> <ul style="list-style-type: none"> <li>• Please summarise your methodology for arriving at a robust set of emission factors</li> <li>• How have you used these to determine worst-case impacts and the severity of the resulting effects on humans? and</li> <li>• How do you know that you have assessed the worst case in the EIA?</li> </ul>	<p>LeClanche SA study, which is applicable to Sunnica as the size of the fire would likely be the same due to how fast a fire is able to spread. Upper and lower estimates have also been assessed, representing the fact that the state of charge of the cells affects the quality of HF available for release.</p> <ul style="list-style-type: none"> <li>• The results of the modelling have been assessed against Emergency Response Planning Guideline (ERPG) level 1 criteria (the lowest concentration) and Acute exposure guideline level 1 criteria (the lowest level). As such the assessment has been protective of human health as the most stringent criteria have been used to compare the results to, which means that all other criteria will also be met. Concentrations have been estimated at nodes on a polar grid around the site, and dilution factors are sufficient to reduce estimated concentrations to below the AGL-1 value before the nearest receptor in all cases.</li> <li>• The emissions scenario is a situation that should never occur, as the system will be designed to the latest standards incorporating fire suppression systems. However, if a series of unlikely events occurred in combination (for example the failure of fire suppression system along with a failure of the integrity of a cell) then a fire could occur. It is considered to represent a reasonable worst-case scenario, without being purely hypothetical. The battery system eventually selected will have undergone UL 9540A testing, and therefore the gas production emissions during thermal runaway will have been quantified at both cell and module levels. As such accurate information can be input into a consequence model in the future.</li> </ul>
Q1.1.52	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 2.1.4 b of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] states that in a BESS fire the concentration of carbon monoxide (CO) “<i>decreased to near zero during the main period of self-sustaining combustion ...this</i></p>	<p>The description of a fire becoming self sustaining is used to mean that while there is enough heat, oxygen and fuel present, the fire will continue to burn.</p> <p>In an outdoor environment, there is a continuous flow of fresh air into the fire, which enables the fuel to be oxidised to carbon dioxide instead of carbon monoxide due to the readily available oxygen. High concentrations of carbon monoxide are more likely to occur for fires within an enclosed environment, where there is less oxygen available so the fuel oxidises into carbon monoxide more readily than carbon dioxide.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>is not unexpected for a fire occurring outdoors.</i>"</p> <p>Please explain what you mean by self-sustaining combustion and why near zero CO levels are not unexpected for a fire occurring outdoors</p>	
Q1.1.53	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 2.1.3 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] says that the US Fire Protection Research Foundation (FPRF) has tested "BESS up to 100kWh size" but that "<i>the total BESS size at Sunnica may be greater than 100kWh ...</i>"</p> <ul style="list-style-type: none"> <li>• Does the 100kWh figure refer to BESS storage capacity?</li> <li>• What is the maximum BESS capacity at Sunnica?</li> <li>• Does the FPRF study make any mention of applicability to larger scale BESS installations such as Sunnica? And</li> <li>• To what extent do the FPRF results apply to BESS at Sunnica?</li> </ul>	<p>Yes, 100kWh refers to the amount of energy stored within the BESS. In this example it can mean capacity to store or export 100kW over 1 hour or a lower amount of kW over a greater period of time (such as 50kW over 2 hours). As mentioned, the BESS at Sunnica is expected to have greater capacity than this.</p> <p>The BESS at Sunnica will be designed to store energy generated during peak solar exposure, and then export energy at peak times of demand. The Applicant does not wish to commit to a capacity as technological advancements may allow more storage capacity on the same footprint, nor does it affect the EIA, which is not dependent on this information. This is because the environmental impacts of the BESS are not directly related to its capacity. It is for that reason that the Applicant's approach is to focus on directly controlling and managing the potential impacts of the BESS, rather than arbitrarily limiting its capacity. As a guide however, a BESS with capacity to store a few hours of peak solar PV capacity is likely to be approximately ten times larger than the 100kWh example.</p> <p>The FPRF study was an independent study unconnected with the Sunnica application. It does not refer to larger scale BESS. Nonetheless, the FPRF results are relevant to BESS at Sunnica because they represent a fire initiated through a single Lithium Ion cell and illustrate the rate at which the fire propagates and the temporal profile of emissions.</p>
Q1.1.54	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 2.1.6 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] acknowledges that the Anderson et al study also used small battery packs and says that the study "<i>had access to monitoring equipment that was capable of</i></p>	<p>The previous study (FPRF study) was unable to report the upper bounds of pollutant concentrations over the entire burn period of the study, meaning that the total concentrations were above detection, and therefore could not be factored up to larger cases. However this data was captured in the Anderson study using more precise measurement equipment.</p> <p>Using these two studies together – the larger scale of the FPRF study and the better measurements of the Anderson study – provides the data required in order</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>more precise measurements over a larger concentration range.”.</i></p> <p>How do more precise measurements over a larger concentration range help to make the case for applying the test results to larger installations such as Sunnica?</p>	to scale potential emissions to a large installation such as Sunnica. The key information from the Anderson study that has been applied to Sunnica is that the state of charge impacts the amount of hydrogen fluoride produced during a fire. This information has allowed a calculation of upper and lower indicative emissions based on the total emissions used in the LeClanche study.
Q1.1.55	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>With reference to paragraph 2.1.7 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124], please explain why the approach taken by manufacturer Leclanche SA is conservative.</p>	The main assumption in the LeClanche SA study is that no fire suppressant system is in place, when in practice a system will be in place for Sunnica. Therefore, the scenario of 5 racks with a self-sustaining fire at one time assumed by the LeClanche study is unlikely to occur for Sunnica, as with fire suppressant in place any fire should not be able to progress part of one rack across to 5 racks.
Q1.1.56	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS: drafting</b></p> <p>Paragraph 2.2.2 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] discusses the Public Health England (PHE) emergency response guideline values. To assist the reader and avoid confusion, please confirm that</p> <ul style="list-style-type: none"> <li>• “, that” should be deleted from line 1; and</li> <li>• the correct acronym is ERPG throughout, and also in paragraph 2.2.4 and Table 1, and not EPRG</li> </ul>	Confirmed.
Q1.1.57	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 3.2.1 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] says that “the exact</p>	As set out previously in the report, the exact emissions cannot be established as the precise battery units have not been determined. This is because the available BESS technology is developing quickly, and to commit to a specific model at this stage would restrict the Applicant or prevent it installing the best available technology at the time of construction (thereby reducing the efficiency of the scheme). Emission data comparison for BESS systems under consideration will

ExQ1	Respondent	Question	Applicant's Response
		<p>emissions ... cannot be meaningfully estimated at present ..."</p> <ul style="list-style-type: none"> <li>• Why is this?</li> <li>• How have you selected the nominal emission rate?</li> </ul>	<p>be one of the key selection criteria for the Applicant when selecting the BESS system for Sunnica. UL 9540A test data will be used to undertake consequence modelling once the detailed design is known for the selected BESS system, and detailed design will ensure that the outcomes predicted in Appendix 16D are not exceeded.</p> <p>A nominal emission rate of 1 microgram/m<sup>3</sup>/s has been selected in order to make the reporting of dilution factors more straightforward - see ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] section 3.1.2. This allows the concentrations at receptors to be compared to a source rate of 1, allowing the rate of attenuation over distance to be easily understood. Total possible emissions have been used from the LeClanche SA study based on a maximum fire size of 5 racks. This leads to a nominal total emission of between 6 and 36 mg/m<sup>3</sup> (see Table 4).</p>
Q1.1.58	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 3.4.3 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] says that "The meteorological site is located between 45 and 50 km north-north-east of the Scheme."</p> <ul style="list-style-type: none"> <li>• Do you mean that the Scheme is located between 45 and 50 km north-north east of the meteorological site?</li> <li>• Given that you have used data for 2014-2017 and 2019, surely it would have been more useful to have used 2018 data, ie five consecutive years?</li> <li>• By representative do you mean similar?</li> <li>• When you say "at the site", do you mean at the Scheme?</li> </ul>	<ol style="list-style-type: none"> <li>1. Yes, this was a typographical mistake, the scheme is located north-north-east of Stanstead Airport.</li> <li>2. 2018 data was not suitable for air quality modelling, as there were too many hours of missing data.</li> <li>3. Yes, the meteorological conditions are expected to be similar.</li> <li>4. Yes, "at the site" has been used in place of Scheme.</li> <li>5. Meteorological data suitable for air quality dispersion modelling is only available at limited sites across the country, and it is good practice to use high quality data from World Meteorological Organisation (WMO) registered observations stations so long as the data can reasonably be considered to be representative of conditions within the study area. In this instance the meteorological data at Stansted Airport (WMO station number 3683) is representative of conditions in the Essex / Cambridgeshire / Suffolk area, with rural rolling countryside with small elevation changes, away from the influence of coastal winds.</li> <li>6. The Scheme does not currently propose to collect meteorological data and compare them with data from the Stansted Airport meteorological site. This is not required to validate the EIA/DCO application reports or to assist the design. In this instance the lowest rates of dilution for all</li> </ol>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>Given that the meteorological site (at Stansted airport) is around 30 miles away, please explain why you consider that meteorological conditions there are similar to those experienced at the Scheme.</li> <li>Do you propose to collect relevant meteorological data for the Scheme and compare them with data from the Stansted Airport meteorological site in order to help you establish that meteorological conditions there are indeed similar at the two locations?</li> </ul>	<p>directions that are achievable under real world conditions have already been captured within the Stansted meteorological dataset. These are for very low wind speeds and represent the worst-case scenario in terms of dispersion and dilution. The collection of new data from the Scheme location may demonstrate if the Stansted data is overly conservative, but Scheme location specific data would not make a material difference to the conclusions of the assessment, as it is already based on the worst-case scenario.</p>
Q1.1.59	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 4.1.2 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refers to the Cleve Hill DCO.</p> <ul style="list-style-type: none"> <li>Please explain why the estimate for the Cleve Hill DCO is relevant to this application, and why you have adopted the various values of hydrogen fluoride content.</li> <li>What is SOC?</li> </ul>	<p>Several key arguments were presented and accepted for the Cleve Hill DCO. While we present the arguments afresh in this assessment, it is reasonable to flag that these arguments were tested and accepted through the Cleve Hill DCO process, therefore a similar approach can and should be taken for Sunnica..</p> <p>The Leclanche SA assessment, which was relied upon in the Cleve Hill examination, set out that in the case of a fire with no fire suppression system, it is likely that only 5 racks would be burning at any one time. This means that the whole size of the development is not relevant, as the time taken for the fire to spread means that only 5 racks will be alight at any one time. This principle is directly transferable to Sunnica or any other BESS site.</p> <p>To be clear, ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] does not use assumptions from Cleve Hill; it applies assumptions from the Leclanche SA assessment which is mentioned in the Cleve Hill DCO. The Leclanche SA assessment is mentioned as Ref. 4 in the Unplanned Atmospheric Emissions from BESS [APP-124].</p> <p>SoC is an abbreviation of State of Charge of the cells, which affects the concentration of pollutants available for release.</p>
Q1.1.60	The Applicant	<b>Unplanned Atmospheric Emissions from BESS:</b>	A reasonable peak emission has been calculated and assumed to be continuous; this provides for a worse scenario (ie greater emission) than lowering the peak

ExQ1	Respondent	Question	Applicant's Response
		<p>Paragraph 4.1.3 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refers to the release of hydrogen fluoride.</p> <p>Please explain why a steady rate has been assumed, rather than a fluctuating rate which may have higher peak values.</p>	<p>emission rate at certain times to create a fluctuating emission rate. Introducing a real-life fluctuating rate would lower the overall emission rate and subsequent environmental impact. The approach taken is therefore a worst-case assessment to ensure all potential effects are considered and assessed.</p>
Q1.1.61	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Please explain the assumptions made in paragraph 4.1.4 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] and what you mean by "in most instances".</p>	<p>As set out earlier in Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems (BESS) of the Environmental Statement [APP-124], a 5-rack fire has been assumed as a worst-case scenario, following the assumptions made by LeClanche SA and used in the Cleve Hill DCO. When the indicative emission rates in Table 4 in Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems (BESS) of the Environmental Statement [APP-124] are applied to the predicted dilution rates shown in figures A1 and A2 in Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems (BESS) of the Environmental Statement [APP-124], the resulting concentrations are below the AEGL-1 value before reaching the nearest receptor.</p> <p>In "most instances" the AEGL-1 value is met within the Order limits – meaning that the majority of the predicted concentrations meet the AEGL-1 value within the Order limits. Dilution rates of 0.005-0.01 are met in all cases by 200m from the source in all directions. In the case of Site A, the BESS is close to the Order limit, and as such there is an area to the south-west where dilution rates are 0.005-0.01 outside of the Order Limits. In all other directions dilution rates are 0.001-0.005 and below. A dilution rate of 0.01 and the maximum HF content of 3Kg results in concentrations of 0/36 mg/m<sup>3</sup> within the order limit – well below the AEGL-1 value. The use of "most instances" is precautionary, and in fact according to the modelling results there are no predicted exceedances of the AEGL-1 value outside of the Order Limits. There are no permanent human receptors or PRoWs or permissive paths within the Order limits where the AEGL-1 value is predicted to be exceeded.</p>
Q1.1.62	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p>	<p>The reference in paragraph 4.1.5 is to requirement 6 (detailed design approval), which states that no phase of the authorised development may commence until</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Paragraph 4.1.5 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refers to a requirement in the DCO.</p> <p>Is this reference to Requirement 7 and the requirement for a Battery Fire Safety Management Plan?</p>	<p>the detailed design relating to that phase has been submitted to and approved in writing by the relevant planning authority.</p> <p>The detailed design must accord with the design principles that are set out in Appendix B to the Design and Access Statement (AS-250). These design principles include: 'The detailed design will ensure that the parameters assessed in the study presented in Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems (BESS) of the Environmental Statement [APP-124] are met (i.e. 1 kg to 3 kg of hydrogen fluoride from a 5 rack fire)' and 'The expected hydrogen fluoride emissions will be checked against the assumptions in Appendix 16D: Unplanned Atmospheric Emissions from Battery Storage Systems (BESS) of the Environmental Statement [APP-124] at detailed design stage (post consent) once the make, model and layout of the BESS is known.'</p>
Q1.1.63	The Applicant	<p><b>Unplanned Atmospheric Emissions from BESS:</b></p> <p>Paragraph 4.1.6 of ES Appendix D: Unplanned Atmospheric Emissions from BESS [APP-124] refers to a requirement in the DCO and to a Safety Management Plan.</p> <ul style="list-style-type: none"> <li>• With reference to ExQ1 2.0.2 above, where is the Safety Management Plan in the DCO submission? and</li> <li>• Is this reference to Requirement 7 and the requirement for a Battery Fire Safety Management Plan?</li> </ul>	<p>Requirement 7 (fire safety management) of the draft DCO states that Work No. 2 must not commence until a battery fire safety management plan has been submitted to and approved by both relevant planning authorities, which must be substantially in accordance with the Outline Battery Fire Safety Management Plan that is submitted as part of the DCO application, or any revision of this document submitted during the examination.</p>
Q1.1.64	The Applicant	<p><b>Indicative timescales for construction and operation</b></p> <p>Paragraph 3.2.4a of the Scheme Description [APP-035] says that a single phase of 24 months would give rise to the worst case due to higher peak traffic volumes and a greater number of construction activities being undertaken concurrently.</p>	<p>Please note that the Scheme Description has been updated and the correct reference is now paragraph 3.3.4a [AS-299]. The Applicant has investigated how the impact of the construction of the Scheme would be affected if the construction period was increased, with the implications set out within this response. The number of HGV movements and staff Full Time Equivalents (FTE) days needed to deliver the project would stay the same, and therefore the daily and peak hour trips would be reduced, but would occur over a longer period of time. Over a 24-month construction period, the Scheme would require a maximum of 155 daily HGVs at its peak, with an average of 119 daily HGVs. This is set out in Paragraph</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Is this always the case for all those who will be affected by the construction of the proposed development?</p> <p>Could a more prolonged timescale mean more uncertainty and inconvenience, for example to landowners and farmers, with traffic disruption over longer periods in some areas, and thereby adversely affect the livelihood, general wellbeing and mental health of those affected to a greater extent than a shorter timescale?</p>	<p>5.4.22 and 5.4.23 in the Transport Assessment [APP-117]. These HGVs would be spread across all of the site HGV access points. We have considered how an increase in duration, but decrease in magnitude, of impact, would affect EIA findings. Traffic is not an impact in itself, it is the effect of traffic which results in environmental impact, in terms of severance, driver delay, fear and intimidation, and pedestrian and cycle amenity.</p> <p>In terms of air quality, the air quality objectives of concern are the annual mean objectives for nitrogen dioxide and particulate matter. A longer construction period would reduce the daily trips, leading to a lower Annual Average Daily Traffic (AADT) value. The air quality assessment has shown that there is no significant impact from assuming a 24 month programme, so a longer construction period with lower AADT would have lower changes in air quality, and no significant impact.</p> <p>In terms of severance, by reducing the number of daily staff/HGVs that will be travelling to/from the sites, the ability for individuals to cross roads will improve due to the greater number of gaps in traffic and therefore reduce the impact of severance.</p> <p>A reduction in the volume of additional daily staff/HGV traffic in the local area caused by the construction of the Scheme would reduce the impact on driver delay. With fewer vehicles on the road, there would be lower levels of congestion on the local highway network which will result in less queuing and delay for general traffic.</p> <p>Reducing the daily number of HGVs travelling to/from the sites will help Non-Motorised Users (NMUs) travelling in the local area feel safer with a lower presence of large vehicles. Also, by reducing the amount of additional Annual Average Weekday Traffic (AAWT), the impact that the construction of the Scheme will have on fear and intimidation in the local area will decrease.</p> <p>In respect of general wellbeing and mental health, Chapter 12 of the ES considered the effects of the scheme on several relevant determinants including Accessibility, Social Cohesion and Access to Healthcare Services and Other Social Infrastructure. In terms of Accessibility and Social Cohesion, a more prolonged timescale would improve the ability for individuals to cross roads, therefore making NMUs travelling in the local area feel safer whilst further limiting the potential for any physical barriers and severance caused by this. This would</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>reduce any resulting potential to hinder social interaction which could otherwise adversely affect wellbeing and mental health. In regard to Access to Healthcare Services and Other Social Infrastructure, the potential for any such health impact arising from residents accessing healthcare services either on foot or by vehicle would also be lessened by any reduction in traffic travelling to/from the sites. This would also apply to local residents accessing any other items of social infrastructure, such as schools and community facilities that are critical to wellbeing and maintaining good mental health.</p> <p>In conclusion, the level of impact of construction activities would be lower in magnitude than that assessed in the ES, but of a more prolonged duration. The scale of environmental impact reported is sufficiently low that an extension to the duration of that impact would not result in a worsening of environmental impact, particularly because the extension of duration would be coupled by a proportionate reduction in magnitude of impact.</p> <p>Thus a longer construction period would not represent the worst case. This is the case for all those affected by the construction and in respect of all aspects of construction and at all locations where sensitive receptors have been assessed in Chapter 13 of the ES [APP-045].</p>
Q1.1.65	The Applicant	<p><b>Vehicle emissions</b></p> <p>In paragraph 7.2.11 of ES Appendix 13C [APP-118] you say that <i>"All HGVs routeing to the development sites (with the exception of vehicles used for the transportation of Abnormal Indivisible Loads including cranes) will be required to be compliant with the latest emission standards at the time of construction".</i></p> <p>Why the exception?</p> <p>Please confirm that all construction and maintenance vehicles including NRMM will be required to be compliant with the latest emission standards at the time of use.</p>	<p>In the European Union, emissions of nitrogen oxides (NOx), total hydrocarbon (THC), non-methane hydrocarbons (NMHC), carbon monoxide (CO) and particulate matter (PM) are regulated for most vehicle types, including cars, trucks (lorries), locomotives, tractors and similar machinery. For each vehicle type, different standards apply. Compliance is determined by running the engine at a standardised test cycle. The legal framework consists in a series of EU directives, each amendments to the 1970 Directive 70/220/EEC, adopted into UK legislation by the Road Vehicle Emission Performance Standards (Cars and Vans) (Amendment) (EU Exit) Regulations 2019. Road vehicles and non-road mobile machinery need to adhere with the emissions standards at the time of their construction, not the latest, most stringent emission limits for their category at the time they are utilised. For example, an HGV built in 2000 does not have to meet the same emissions standards as an HGV built in 2022.</p> <p>There is not the same abundance of vehicles used for the transportation of AILs including cranes as there is for other types of vehicles such as HGVs, and therefore the Applicant cannot commit to these being aligned with the latest</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>emissions standards at the time of construction. Imposing the latest emission limits for AILs on the Scheme would require the Applicant to source only the newest vehicles, reducing the choice and availability of Contractors. In turn, this would delay or could compromise the ability to construct the Scheme.</p> <p>For clarity, all vehicles and non-road machinery associated with the Scheme will meet the relevant emission standards set by UK regulations. The approach taken by the Applicant aligns with UK regulations (Road Vehicle Emission Performance Standards (Cars and Vans) (Amendment) (EU Exit) Regulations 2019) and UK good industry practice. For example, the London NRMM Register scheme operates an exemption policy to allow for unusual or rare plant and vehicles to operate on construction sites even if they do not comply with the NRMM low emission zone (see <a href="https://www.london.gov.uk/sites/default/files/nrmm_lez_exemption_and_retrofit_policy_-_covid-19_update_final_0.pdf">https://www.london.gov.uk/sites/default/files/nrmm_lez_exemption_and_retrofit_policy_-_covid-19_update_final_0.pdf</a>).</p>

## 4 Topic 1.2 Biodiversity and Nature Conservation (including Habitats Regulations Assessment)

ExQ1	Respondent	Question	Applicant's Response																
1.2.1	The Applicant	<p><b>Ecological assessment methodology</b></p> <p>The Ecology Chapter [APP-040] references Chartered Institute of Ecology and Environmental Assessment guidelines (Table 8-2) to generate an equivalence from the generic EIA significance criteria and apply specific thresholds.</p> <p>Please give further justification for how the Environmental Assessment methodology uses a combination of the magnitude of impact and the sensitivity or value of the receptor to establish the significance of effects.</p> <p>Please give further justification for the conclusions of the likely scale of potential effects (for example hedgerow removal is listed as being of relatively limited extent however the size and extent of the proposed development means it has the potential to be far greater).</p> <p>Please provide further detail in relation to the proposed design controls to prevent loss of habitat as far as possible, considering the requested flexibility in works plans which may result in additional habitat loss.</p>	<p>In order to provide consistency in the terminology used across the Environmental Statement chapters for describing the conclusions of the assessment, the effects on important ecological features of the Scheme are translated to a significance level on a scale of neutral, minor, moderate and major. This classification is comparable to that used in other Environmental Statement chapters as outlined in Table 8-2. These conclusions are provided in each case in brackets following the equivalent CIEEM assessment conclusion.</p> <table border="1"> <thead> <tr> <th colspan="2">Effect classification terminology used in other EIA chapters</th> <th rowspan="2">Equivalent CIEEM assessment</th> </tr> <tr> <th>Other EIA chapters</th> <th>Ecology chapter</th> </tr> </thead> <tbody> <tr> <td><b>Significant (beneficial)</b></td> <td>Major beneficial</td> <td>Beneficial effect on structure / function or conservation status at regional, national or international level.</td> </tr> <tr> <td><b>Significant (beneficial)</b></td> <td>Moderate beneficial</td> <td>Beneficial effect on structure/ function or conservation status at County level.</td> </tr> <tr> <td><b>Non-significant</b></td> <td>Minor beneficial</td> <td>Beneficial effect on structure/function or conservation status at Site or Local level.</td> </tr> </tbody> </table>	Effect classification terminology used in other EIA chapters		Equivalent CIEEM assessment	Other EIA chapters	Ecology chapter	<b>Significant (beneficial)</b>	Major beneficial	Beneficial effect on structure / function or conservation status at regional, national or international level.	<b>Significant (beneficial)</b>	Moderate beneficial	Beneficial effect on structure/ function or conservation status at County level.	<b>Non-significant</b>	Minor beneficial	Beneficial effect on structure/function or conservation status at Site or Local level.		
Effect classification terminology used in other EIA chapters		Equivalent CIEEM assessment																	
Other EIA chapters	Ecology chapter																		
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<b>Non-significant</b>	Minor beneficial	Beneficial effect on structure/function or conservation status at Site or Local level.																	

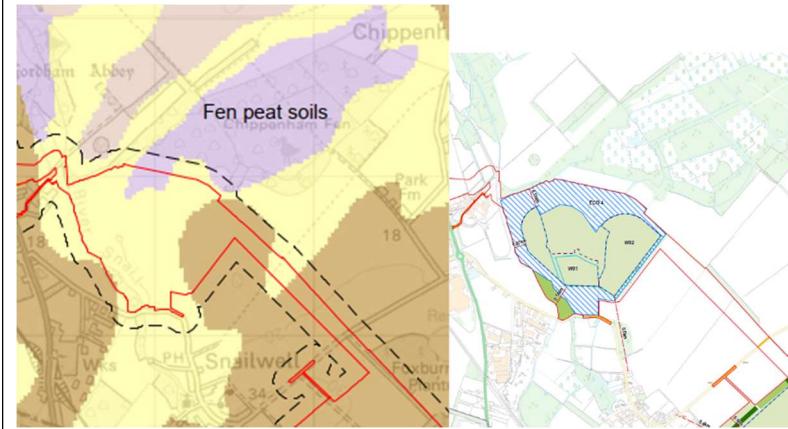
ExQ1	Respondent	Question	Applicant's Response		
			<b>Non-significant</b>	Neutral / Negligible	No effect on structure / function or conservation status
			<b>Non-significant</b>	Minor adverse	Adverse effect on structure / function or conservation status at Local level.
			<b>Significant (adverse)</b>	Moderate adverse	Adverse effect on structure/function or conservation status at county level.
			<b>Significant (adverse)</b>	Major adverse	Adverse effect on structure/function or conservation status at regional, national or international level.
			<p>The assessment approach follows the good practice guidelines for ecological impact assessment (EcIA) described in CIEEM (2018). Potential impacts on relevant ecological features are assessed and a judgement reached on whether or not the resultant effect on conservation status or structure and function is likely to be significant. This process takes into consideration the characteristics of the impact including the quantification of the extent of the habitat to be lost and, or damaged, a quantification of the loss relative to the habitat across the Site, as well as the sensitivity of the ecological feature concerned, and the geographic scale at which the feature is considered important.</p> <p>In the example of hedgerow removal, this is quantified as 264 m of hedgerow which will be lost. The total length of hedgerow on the Site is 22,986 m, enabling an objective assessment of the likely scale of potential effects as opposed to a relative effect, i.e. the effect is quantified.</p> <p>Whilst the DCO seeks flexibility in aspects of the design, the EcIA has considered the maximum designs parameters being sought, i.e. the worst case scenario. For</p>		

ExQ1	Respondent	Question	Applicant's Response
			<p>example, the assessment has considered the maximum parameters for solar panels and the battery energy storage areas, such as height and footprint.</p> <p>Design controls to avoid and minimise impacts on biodiversity are set out in Section 8.8 of Chapter 8: Ecology and Nature Conservation of the ES [APP-040] and will be secured through the Works Plans [APP-007], i.e. undeveloped buffers, or through the Framework CEMP [APP-123], Framework OEMP [APP-126] and Framework DEMP [APP-125]. Similarly, enhancements will be secured as set out in the Outline LEMP [APP-108]. Examples of these design controls include:</p> <ul style="list-style-type: none"> <li>• Security fencing will be established at an early stage to protect retained habitats from incursion during construction and prevent construction activity in proximity to retained vegetation, in particular designated sites within and adjacent to the Order limits;</li> <li>• Protection measures for trees will be implemented, including solid hoarding fencing and construction exclusion zones;</li> <li>• Access points set up to limit the loss of vegetation at access points and the number of field boundary crossings;</li> <li>• Dust control measures;</li> <li>• Pollution prevention;</li> <li>• Monitoring programme;</li> <li>• Restoring post-construction any habitat removed from within the Grid Connection cable corridors;</li> <li>• Siting construction routes; and</li> <li>• Ensuring that existing woodland, treelines and the majority of hedgerows are retained and protected during construction of the Scheme.</li> </ul>
1.2.2	Natural England	Question not for Applicant.	
1.2.3	The Applicant	<b>Stone Curlew</b> Please explain the steps you are taking to provide the additional information required	The Applicant is continuing to engage with Natural England through the examination. There have been meetings and there is a programme of online meetings scheduled. The Applicant and Natural England will continue to work

ExQ1	Respondent	Question	Applicant's Response
		by Natural England in order for them to make a comprehensive assessment of the impact of the proposed development on Stone Curlew.	towards finalising a Statement of Common Ground (SoCG). The Applicant is in dialogue with Natural England to clarify whether information provided in response to Relevant Representations is satisfactory to allow them to come to a view on the impact of the proposed development on Stone Curlew. If further additional information or clarification is required, then the Applicant will set out a programme for delivery of this.
1.2.4	The Applicant	<p><b>Stone Curlew</b></p> <p>Please explain why the protection measures outlined in [APP-108] apply to the proposed offsetting areas, but apparently not to the areas where stone curlew have been recorded, even breeding, some of which will be within the solar arrays? What provision will be made for stone curlew that attempt to breed within the operational areas?</p>	<p>Offsetting habitats have been embedded into the Scheme, as it has been assumed that, in a worst case scenario, Stone Curlew will not nest within the operational site where solar arrays are located. The Framework OEMP [<b>APP-126</b>, ES - Appendix 16F] includes the requirement for all operational staff working within 500m of the offsetting areas created for breeding Stone Curlew to be given a toolbox talk regarding the sensitivity of the species and controlling works which can be undertaken. Where possible, any operational maintenance within 500m of the offsetting areas will be scheduled between November and February.</p> <p>Monitoring of Stone Curlew during operation of the Scheme will establish whether the species is nesting within the solar arrays. Should this be found to be the case then the same requirements, with regard to briefing operational staff and controlling works, will be applied to any locations within the operational areas, that are already included in the Framework OEMP [<b>APP-126</b>, ES - Appendix 16F] for the offsetting areas. Given, the low likelihood that Stone Curlew will nest in the operational areas, seasonal restrictions with regards operational maintenance are not required throughout the Scheme. These measures will be included within the updated Framework OEMP to be submitted at Deadline 2.</p>
1.2.5	The Applicant, Natural England and Suffolk Wildlife Trust	<p><b>Stone Curlew</b></p> <p>Do you consider the proposed offsetting measures to be appropriate, adequate and realistic, given that (presumably) stone curlew cannot be excluded from operational areas? How confident are you that stone curlew numbers can be retained, including of successfully breeding pairs?</p>	<p>The intention is not to exclude Stone Curlew from operational areas, but to provide sufficient breeding habitat to offset the loss of arable farmland which has been found to be used by the species in the breeding season. The measures are based on the species' distribution in the local area, informed by detailed surveys between 2019 and 2021 and supplemented by historic breeding information from the RSPB.</p> <p>The distribution of Stone Curlew within the farming landscape of the Order limits and surrounding area is fluid and the species is reliant on the cropping regime in any given year to provide suitable areas of fallow and spring-sown crops to be able to nest. The Offsetting Habitat Provision for Stone-Curlew Specification</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>[APP-258], sets out how the Scheme has embedded sufficient areas within the Scheme design to offset any potential reduction in arable farmland, that may, in any given year, be used by Stone Curlew and avoid a net reduction in breeding and foraging opportunities for the species. The areas embedded within the Scheme design for offsetting impacts on Stone Curlew utilise the species' current and historical distribution across the Order limits. Therefore, since this replicates the conditions the birds are already utilising, it is considered a suitably robust approach informed by empirical information on the nesting behaviour of the specific Stone Curlew pairs in question in this landscape. Furthermore, the habitat, including nesting plots, has been designed and will be delivered following what has been successful with the other similar habitat and nesting plots around the Breckland area.</p> <p>With reference to the Offsetting Habitat Provision for Stone-Curlew Specification [APP-258] and the Landscape and Ecology Management Plan [APP-108], over 100ha of predominantly arable farmland have been embedded within the Scheme for reversion to grassland, specifically managed to create a close-cropped sward, suitable for Stone Curlew. Small areas of existing acid grassland have also been retained within the Scheme design in Sunnica East Site B and these will form the basis of reverting adjacent areas in Sunnica East Site B to semi-natural grassland, characteristic of the Breckland heaths. This equates to greater than the 16 ha per pair and acknowledges the requirement for not only suitable nesting sites, but also the requirement for foraging habitat. Additionally, the provision of a maximum of ten (minimum of five) 2ha plots maximises the potential for take up with two plots allocated per pair. Plots unoccupied for nesting will contribute an important resource for foraging pairs.</p> <p>The Applicant considers that the land embedded within the Scheme for Stone Curlew allows the flexibility for any adaptive management prescriptions to ensure the success of the offsetting areas, the detail of which will be brought forward pursuant to Requirement 10 of the DCO (as amended at Deadline 2 to allow for post consent development).</p>
1.2.6	Natural England & Suffolk Wildlife Trust	Question not for Applicant.	

ExQ1	Respondent	Question	Applicant's Response
1.2.7	The Applicant	<b>Stone Curlew</b> Para 1.8.16b of [APP-108] mentions the danger posed to stone curlew nests and chicks from tractor wheels during spraying. Given that the point of the spraying is to create bare areas to encourage stone curlew nesting, please explain what measures can be put in place to ensure that the very activity of spraying does not destroy stone curlew nests and chicks.	This point is noted. Operational monitoring of Stone Curlew plots, secured through the OEMP, will help to establish the location of nesting locations prior to spraying commencing. This will inform the process for the application of any herbicides to Stone Curlew plots. The management of Stone Curlew plots will be within the remit of the Ecology Advisory Group, who will ensure that management techniques are compatible with protection of the species' nests and chicks.
1.2.8	The Applicant	<b>Biodiversity net gain</b> Please confirm whether the balance in the biodiversity net gain figures includes mitigation and compensation as well as overall biodiversity net gain? If so, what is the figure for net gain alone?	As no European Protected Species Mitigation Licences are needed as a result of the Scheme, there was no need to account for any associated habitat creation or mitigation in the calculations. Likewise, the Scheme is not providing any compensatory habitats for any habitats or species. As such, all areas of habitat creation were included in the biodiversity net gain calculations using metric 3.0. The biodiversity net gain is being recalculated using metric 3.1 and will be submitted at a later Deadline. This will consider where areas may be classed as mitigation as laid out in the latest guidance, in order to avoid any double counting. It will also take into account updates to habitat changes from recent updating surveys.
1.2.9	The Applicant & Natural England	<b>Ecological mitigation</b> How confident are you that new wetland indicated in Figure 10-14E of the Environmental Statement, Landscape Masterplan [APP-213] can successfully be created, in ecological and operational terms?	The area referred to in Figure 10-14E of the ES, Landscape Masterplan [APP-213], is currently predominantly dry semi-improved grassland, with isolated pockets of marshy grassland (please refer to APP-079 – 6.2 Environmental Statement – Appendix 8C for further details). As indicated in Figure 10-14E of the ES, Landscape Masterplan [APP-213], this will be retained as an undeveloped buffer from Chippenham and the River Snail and the Applicant is currently working with stakeholders to agree an appropriate management regime for this area, with the target of increasing the areas of wet and marshy grassland, creating a linkage between Chippenham Fen and Snailwell Fen to the south-west. The Applicant is confident that new areas of wet grass as indicated in Figure 10-14E of the Environmental Statement, Landscape Masterplan [APP-213] can successfully be created. Approximately one third of the area is on “Fen peat soils”, a continuation of this small area of this soil type, most of which is within Chippenham Fen. The whole area is influenced by the River Snail which flows along the western side of Sunnica West Site B. This area will benefit from the

ExQ1	Respondent	Question	Applicant's Response
			<p>hydrological connectivity with Chippenham Fen, and will enhance the buffer zone around the Fen. The priority for this area is to create a contiguous area of higher quality habitat, buffering, but also extending the core nature sites. Whilst much of this area will be grassland, wetland mosaics are targeted in the existing wetter areas or where there are remnant peat soils.</p> <p>Allowing the drainage of the new wetland area to return to a more natural condition; and thus creating an area wetland mosaic, as the Scheme proposes, will utilise the existing soil conditions and topography. Where suitable, this will involve preparing the surface, i.e. raking the surface to create a fine tilth and ensuring that the new wet grassland is level with the surrounding area; and fill it up slowly with water from Chippenham and the River Snail. It may take a year or two before the wetland area finds its balance but, once it has been established and looked after properly, it will be a low maintenance area. A sustainable grazing regime will also be sought, building on experience gained from the management of Chippenham Fen, to maximise the quality of these new grassland areas.</p> 
1.2.10	The Applicant	<p><b>Grassland re-establishment</b></p> <p>Please clarify which areas referred to as "native grassland" in figures 1 – 5 of the LEMP [APP-108] are intended for acid and for chalk grassland establishment and explain how these relate to the underlying</p>	<p>The Applicant is preparing a figure showing the areas referred to as "native grassland" in Figures 1 – 5 of the LEMP [APP-108] in relation the underlying soils, e.g. showing the areas that are intended for acid grassland and for chalk/other neutral grassland establishment overlying the soils map. The figure will reaffirm the confidence the Applicant has in establishing these grassland areas.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>geology and how the variation in grassland types will be achieved.</p>	<p>The variation in grassland types will be achieved:</p> <p>through natural regeneration such that immediately after the seeds have been sown, the ground should be left undisturbed (watering the seeds will not be necessary), and where practicable, allowing livestock to move between the areas, re-establishing traditional management grazing or hay-cutting practices which will help to restore grassland areas;</p> <p>from seed collection from the grasslands identified within the Order limits and locally to the Scheme for the purpose of maintaining continuity with local species; using ground disturbance for encouraging naturally occurring species in the soil's seed bank including rare arable flora; and</p> <p>through a suitable long-term habitat management regime with grassland being managed by either low intensity grazing or infrequent hay cutting to allow plant species to flower and seed.</p> <p>Species composition will take into consideration:</p> <ul style="list-style-type: none"> <li>• microclimatic conditions taking into account such factors as prevailing wind and exposure, and local hydrology;</li> <li>• soil types based on the soil map for the Scheme which in preparation such that e.g. acid grassland parcels will be created on freely draining slightly acid sandy soils with low nutrients;</li> <li>• local and national biodiversity targets, e.g. Nature Recovery Network, B-lines and local biodiversity action plans (BAPs); and</li> <li>• promoting annual seed-bearing plant species to benefit declining farmland birds such as Turtle Dove (<i>Streptopelia turtur</i>).</li> </ul> <p>Habitat creation will include areas of bare ground, with grassland to be managed by either low intensity grazing or infrequent hay cutting to allow plant species to flower and seed.</p>
1.2.11	The Applicant	<p><b>Grassland re-establishment</b></p> <p>ref [APP-101] Please explain how you propose to secure locally harvested seed and whether appropriate and available sources have been identified.</p>	<p>Based on experience on other similar sites and using the extensive knowledge of Breckland and the surrounding landscape, going back to the mid-1900s, e.g. "An Ecological Flora of Breckland", there is significant scope to secure locally harvested seed to assist in establishing acid grassland and chalk grassland. This has been established using the soil map for the Scheme, field observations and</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>identification of sites with the appropriate species composition, e.g. those that have benefited from focussed agri-environment schemes.</p> <p>The next stage is to enter into agreements with landowners and, at the appropriate time, to use good practice methods for harvesting seeds from donor sites.</p>
1.2.12	Natural England & Suffolk Wildlife Trust	Question not for Applicant.	
1.2.13	The Applicant	<p><b>Glint &amp; Glare Assessment</b></p> <p>Please explain whether you have considered the potential impact of glint and glare from the solar panels on birds (especially water birds) and invertebrates, and how you propose to mitigate any potential impacts.</p>	<p>The Applicant can confirm that the potential impact of solar panels on birds, particularly waterbirds was considered, but it was deemed that no impact pathway existed. This was based on the following:</p> <ul style="list-style-type: none"> <li>• The Scheme will not create habitat that will attract significant numbers of waterbirds.</li> <li>• The wintering bird surveys (6.2 Environmental Statement - Appendix 8H [<b>APP-084</b>]) did not record significant numbers of waterbirds as being present within the Survey Area.</li> <li>• The Scheme is not on a migratory route for birds or on a path connecting areas supporting significant numbers of birds, e.g. waterbodies supporting waterbirds.</li> </ul> <p>The potential impact of attraction of aquatic invertebrates, especially those associated with Chippenham Fen, to the panels, is discussed in 6.2 Environmental Statement - Appendix 8M [<b>APP-092</b>], with the conclusion of no significant effects. A technical note, providing further information as to this potential effect, requested by consultees, is appended to this response.</p> <p>There is no evidence to suggest that there are any further impacts from glint and glare to biodiversity.</p>
1.2.14	The Applicant	<p><b>Biosecurity</b></p> <p>With reference to Table 3-3 page 16C-20 of ES Appendix 16C (Framework Construction Environmental Management Plan) [<b>APP-</b></p>	<p>The Applicant will work with the landowners and farmers to plan in advance of construction to minimise effects on crops, livestock and horses. The construction programme will be developed in liaison with the landowners and farmers (building on the good relationship that has already been built during property negotiations),</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>123] what measures will be in place to safeguard against damage to crops, livestock or horses caused by movement of personnel and machinery between landholdings?</p>	<p>who will be able to plan for harvest before construction or will be compensated for unexpected or planned loss of crops. For example, the Applicant has previously compensated the farmers for crop damage that was incurred by the extensive archaeological trial trenching which has been undertaken.</p> <p>Impacts to livestock or horses caused by movement of personnel and machinery between landholdings is not expected. Landowners and farmers will be aware of where and when construction works will take place sufficiently far in advance of any works that livestock or horses can be moved to safety.</p> <p>The design of the Scheme is such that movement of personnel and machinery between landholdings will be minimised. Where and when it does occur, the following precautionary working methods will be employed to minimise damage to crops, livestock or horses caused by movement of personnel and machinery between landholdings including the spread of disease:</p> <ul style="list-style-type: none"> <li>• Project planning will ensure that instances of movement of personnel and machinery between landholdings are kept to a minimum.</li> <li>• Measures to prevent damage to crops will include the use of existing tracks and roads for movement of personnel and machinery.</li> <li>• Where feasible, such movements of personnel and machinery will be undertaken in the least disruptive phase of crop cultivation cycle.</li> <li>• Measures to prevent and minimise disturbance to livestock or horses will include, where necessary, erection of fencing to direct and contain movements in fields adjacent to those with crops, livestock and horses including a buffer if needed.</li> <li>• The status of plant pathogens and livestock diseases will be kept under review during construction and any measures regarding local, regional or national biosecurity will be implemented immediately.</li> </ul> <p>All works will need to abide by the Construction Environmental Management Plan. This will include any new biosecurity measures requested by the landowners / farmers should there be any national or local outbreaks at the time.</p> <p>Table 3-3 of ES Appendix 16C (Framework Construction Environmental Management Plan) [APP-123] refers to protection and management of biodiversity during construction, with biosecurity addressed on page 16C-20 in</p>

ExQ1	Respondent	Question	Applicant's Response
			relation to the potential impacts on the site's biodiversity of the spread of invasive non-native species during construction.
1.2.15	Natural England	Question not for Applicant.	
1.2.16	Natural England	Question not for Applicant.	
1.2.17	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>The dimensions of the BESS compound given in paragraph 1.2.9 of the HRA report [APP-092] are 66m x 699m and 12m in height. The figures provided in Table 3-2 within Chapter 3 of the ES [APP-035] are 43m x 76m footprint, 12m in height, with an associated laydown area of 43m by 30m. Please explain the discrepancy between the HRA Report and the ES for the dimensions of the BESS compound.</p>	<p>Paragraph 1.2.9 of the HRA report [APP-092] is referring to the dimensions of the Burwell National Grid Substation Extension and not the Battery Energy Storage System (BESS). The Applicant can confirm that the dimensions presented in Table 3-2 within Chapter 3 of the ES [APP-035] (and crucially also in the Design Principles secured by the DCO) are correct and that the Burwell Substation Extension dimensions are, 43m by 76m footprint, 12m in height, with an associated laydown area of 43m by 30m. However, given these dimensions are within the parameters included within the HRA report [APP-092], there is no change to the conclusions presented within the HRA report [APP-092].</p> <p>This will be updated in the HRA report, which will be re-submitted to the ExA at Deadline 3 during the examination, alongside the updated matrices referenced in questions 1.2.22 and 1.2.23.</p>

ExQ1	Respondent	Question	Applicant's Response
1.2.18	The Applicant	<b>Habitats Regulations Assessment</b> <p>The scheme description within ES Table 3-1 [APP-035] indicates that flexibility is sought to lay cabling within proposed areas to be safeguarded as replacement habitat for Stone curlew. The parameters, timing and working methods for this cabling are not however provided. Please confirm the parameters the Applicant is seeking flexibility for and how this affects the outcome of the assessment of potential impacts on land identified for Stone curlew mitigation.</p>	<p>It is noted that Requirement 10 of the DCO does not include Work No. 4 which covers the installation of the grid connection. A section of the grid connection passes through the Stone Curlew offsetting area and therefore, will be subject to temporary ground disturbance whilst the cables are laid. As a necessity (and as all other works on the main sites are caught by Requirement 10), this will need to take place before the compensation area is created, as Requirement 10 would not be able to be discharged with cable works taking place. As such there would be no impacts to the Stone Curlew mitigation area arising from the cabling works.</p> <p>Whilst the Applicant is seeking flexibility for cable laying, any such works undertaken within areas supporting Stone Curlew, or within 500 m of areas supporting Stone Curlew, will be concordant with the measures committed to within the CEMP, and thus secured under the DCO. As set out in Table 3-3 of the Framework CEMP [APP-123], construction will be phased so that areas within 500 m of the new habitat provisions are developed outside the Stone Curlew breeding season of March to October.</p>
1.2.19	The Applicant	<b>Habitats Regulations Assessment</b> <p>Please resubmit tables 4-1 and 4-2 [APP-092] with the correct qualifying features and criteria provided</p>	<p>The qualifying features and criteria for the relevant designated sites are set out in Table 3-1 of the HRA report [APP-092] and these have been taken forward for screening for the potential for likely significant effects in Table 4-1 and 4-2. It has been noted that Spined Loach and Great Crested Newt, qualifying features of the Fenland SAC, has been excluded from Table 4-2, which considers operational effects. Given the source-receptor pathways scoped in for screening in section 4.3.1 of the HRA report [APP-092], these two qualifying features were excluded from Table 4-2, as no pathway exists for operational impacts. However, for completeness and in response to this question, these species have been included and screened for LSE in Table 4-2 of the updated HRA report, which will be submitted to the ExA at Deadline 3.</p>
1.2.20	The Applicant	<b>Habitats Regulations Assessment</b> <p>Table 4-1 of the assessment [APP-092] does not appear to consider the potential for piling up to a depth of 12m at the BESS and the three onsite substations at Sunnica East sites A and B and Sunnica West Site A. Please provide an update to the</p>	<p>This comment is noted. Piling associated with the BESS (located within Sunnica East Site B and Sunnica West Site A) and the three onsite substations at Sunnica East sites A and B and Sunnica West Site A are, at the closest approximately 0.35 km from Fenland SAC/Chippenham Fen Ramsar site and therefore, impact pathways for habitat contamination and groundwater disturbance were not considered to exist. The assessment has considered the intrusive elements of the Scheme nearest to the designated sites, i.e., the mounts for the solar panels, and</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>assessment that confirms, and where relevant, assesses, the potential for significant effects on sites and qualifying features for the following impact pathways:</p> <ul style="list-style-type: none"> <li>• Habitat contamination; and</li> <li>• Groundwater disturbance.</li> </ul>	<p>concluded no likely significant effects through habitat contamination and groundwater disturbance. The updated HRA report, to be submitted at Deadline 3, will address this issue, as requested.</p>
1.2.21	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please update the matrices provided in Annex C2 to the HRA Report [APP-092] to reflect the outcome of the assessment for each qualifying feature.</p>	<p>The matrices provided in Annex C2 to the HRA Report [APP-092] will be updated, where necessary in line with the additional details required in the ExQ1, and resubmitted at Deadline 3. It should be noted, that where an impact pathway was not identified in Annex B (and for a number of qualifying species this was the case), these features were not presented again in Annex C, as impacts to those features had already been screened out.</p>
1.2.22	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please update Matrix 2 (Chippenham Fen Ramsar) provided in Annex C2 to the HRA Report [APP-092] to provide footnotes for points b and c and to include all the effects identified in Table 4-1 [APP-092].</p>	<p>Matrix 2 provided in Annex C2 to the HRA report [APP-092] will be updated with footnotes b and c and re-submitted at Deadline 3.</p>
1.2.23	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please update Matrix 3 (Breckland SPA) in Annex C3 to the HRA Report [APP-092] to include the effects identified in Table 4-1 and 4-2 of the HRA Report [APP-092] and a commentary on the reasons for concluding no AEol.</p>	<p>Matrix 3 provided in Annex C3 to the HRA report [APP-092] will be updated and re-submitted during examination.</p>
1.2.24	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please clarify how depths of excavation will be controlled and secured.</p>	<p>Should consent be granted, the Applicant will build within the controlled parameters set out in the DCO. The Scheme description has been submitted as part of the Applicant's DCO application. This is available in Chapter 3: Scheme description of the Environmental Statement [APP-035], which sets maximum parameters for excavations, which is secured by its inclusion in the Design Principles [APP-264], compliance with which is a DCO Requirement - see</p>

ExQ1	Respondent	Question	Applicant's Response
			Requirement 6(2) of the draft DCO [ <b>APP-019</b> ] which requires the details of the authorised development to accord with the design principles.
<b>1.2.25</b>	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>How have the proposed final mitigation and monitoring plans been discussed and agreed with the relevant SNCB? What were their views?</p>	The Applicant is continuing to engage with Natural England through the examination, with a programme of online meetings scheduled. The Applicant and Natural England will continue to work towards finalising a Statement of Common Ground (SoCG). At present Natural England is not yet satisfied that the proposed offsetting land is sufficient to rule out impacts to stone curlew. The Applicant considers that its proposals are sufficient but is discussing this matter with Natural England. Natural England also considers that annual monitoring should be put in place which the Applicant is considering.
<b>1.2.26</b>	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Section 5 of the HRA Report [<b>APP-092</b>] provides a general discussion of how adverse effects will be avoided, but does not assess each site and qualifying feature screened into the assessment in Tables 4-1 and 4-2. For example, the assessment for Breckland SPA describes disturbance in general terms making it difficult to understand the different effects in construction and operation identified previously in the tables.</p> <p>Please provide an assessment of the effects on each site, qualifying feature and stage of the proposed development (construction, operation and decommissioning) considered in Stage 2 of the assessment.</p>	This comment is noted. Section 5 of the HRA Report [ <b>APP-092</b> ] presents Stage 2 or the 'Appropriate Assessment' part of the HRA. The Statements to Inform Appropriate Assessment provided in Section 5 present the assessment, including any mitigation proposed by the Scheme for those impact pathways that have been identified and for which the potential for Likely Significant Effects could not be ruled out at Stage 1 'Screening for Likely Significant Effects'. Only those impact pathways for which Likely Significant Effects could not be screened out at Stage 1 are taken forward for Stage 2 'Appropriate Assessment'. As a result, not all sites identified in Tables 4-1 and 4-2 are taken forward into Stage 2. With reference to the Breckland SPA for example, construction disturbance of nesting Stone Curlew is assessed in Sections 5.3.16-5.3.20 and operational disturbance of nesting Stone Curlew in Sections 5.3.21-5.3.24. Where appropriate, the HRA will be updated to reflect this comment and resubmitted at Deadline 3.
<b>1.2.27</b>	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please provide an update to Section 5.3 of the HRA Report [<b>APP-092</b>] to confirm what</p>	This comment is noted and will be addressed, where necessary, in the updated HRA report to be resubmitted at Deadline 3. Stone Curlew has a fluid distribution within the farming landscape of the Order limits and surrounding area and is reliant on the cropping regime in any given year to provide suitable areas of fallow

ExQ1	Respondent	Question	Applicant's Response
		alternative mitigation measures for the Stone Curlew qualifying feature of Breckland SPA were considered, and the reasons for the choice of the measures presented in the HRA Report.	and spring-sown crops to be able to nest. As such the nesting locations can vary annually depending on this availability. The Scheme has taken this fluid nesting distribution into consideration and sought to avoid blocks of land where regular nesting attempts have been observed e.g., those in ECO3. This principle of avoidance has guided the locations of the offsetting areas which have taken into account not only the species existing distribution, but also the design and construction elements of the Scheme (e.g., to minimise construction disturbance), the location of residential areas and the ability to be able to secure large continuous blocks of land to maximise delivery of habitat creation and nesting plot opportunities and allow for efficient management. The Scheme has embedded sufficient areas within the Scheme design to offset any potential reduction in arable farmland, that may, in any given year, be used by Stone Curlew and avoid a net reduction in breeding and foraging opportunities for the species. Alternative mitigation measures, including the creation of Stone Curlew nesting plots in arable fields outside the Order limits were considered, but the ability of the Scheme to incorporate the creation of permanent grasslands with managed nesting plots within the Order limits and thus not requiring third party land, was considered the optimal solution for not only providing, but securing, long term, high quality nesting and foraging habitat for the Stone Curlew population occurring within and surrounding the Order limits. The use of nesting plots is a proven method for providing suitable nesting habitat for Stone Curlew in Breckland and is supported by the RSPB information note 'Managing nest plots for stone-curlews'.
1.2.28	The Applicant	<b>Habitats Regulations Assessment</b>  Please provide information about the current conservation status and condition of the National Site Network sites carried forward to Stage 2 of the assessment.	This comment is noted and will be addressed, where necessary, in the updated HRA report and resubmitted at Deadline 3. In summary, the current condition of Fenland SAC (Chippenham Fen component site) and Chippenham Fen Ramsar, is 90.3% in a favourable condition and consequently 9.7% is in unfavourable and recovering condition. For Breckland SPA this is 100% in favourable condition.
1.2.29	Natural England	Question not for Applicant.	
1.2.30	The Applicant	<b>Habitats Regulations Assessment</b>	Section 5.3 provides an assessment of the impact pathway for the Breckland SPA, which could not be dismissed at Stage 1. As the Scheme has only identified

ExQ1	Respondent	Question	Applicant's Response
		<p>Please amend and submit an updated matrix C2 to the HRA Report [APP-092] following updates to the relevant section of the assessment in Section 5.3 of the HRA Report in relation to assessment specifically on each qualifying feature.</p> <p>Please include footnotes b and c omitted from matrix C2.</p>	functional linkage to the SPA via Stone Curlew, other qualifying features, namely Woodlark and Nightjar, are not considered further at Stage 2. The footnotes for Matrix C2 will be updated along with Section 5.2 (Chippenham Fen Ramsar) to clearly separate out each qualifying feature taken forward from Stage 1. The updated HRA report will be resubmitted at Deadline 3.
1.2.31	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please amend and submit an updated matrix C3 to the HRA Report [APP-092] to include the non-physical disturbance impacts identified in section 4.2.1 of the HRA Report during construction, decommissioning and operation.</p>	This comment is noted and Matrix C3 will be updated to reflect the assessment presented in Section 5.3. The updated HRA report will be resubmitted at Deadline 3.
1.2.32	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please provide updated matrices to take account of the additional information on air quality, lighting and noise requested by Natural England.</p>	This comment is noted and will be addressed, where necessary, in the updated HRA report and resubmitted during the examination. Whilst, Natural England has requested further information, the Applicant does not believe this is necessary as this will not alter the conclusions of the assessment presented in the matrices given the level of information already available and used in the assessment. Should any additional evidence and commentary be required, this will be identified and included within the updated matrices and relevant footnotes.
1.2.33	The Applicant	<p><b>Habitats Regulations Assessment</b></p> <p>Please provide an amended HRA that includes consideration of the spined loach and great crested newt features of the Fenland SAC, and criteria 2 and 3 of Chippenham Fen Ramsar. Please also</p>	This comment is noted. Spined Loach and Great Crested Newt are considered in Table 4-1, with the potential for Likely Significant Effects screened out, due to the species absence from Chippenham Fen and absence of pathways and connectivity to other component sites of the Fenland SAC. Criteria 2 and 3 of Chippenham Fen Ramsar are considered in Tables 4-1 and 4-2 and updates to

ExQ1	Respondent	Question	Applicant's Response
		check that qualifying features are described consistently through the document. Changes should also apply to information supplied in the Annexes.	section 5.2 will be made to clearly separate out the qualifying features. The updated HRA report will be resubmitted at Deadline 3.
<b>1.2.34</b>	Natural England	Question not for Applicant.	



## 5 Topic 1.3 - Compulsory Acquisition, Temporary Possession and Other Land or Rights Considerations

ExQ1	Respondent	Question	Applicant's Response
Q1.3.1	The Applicant	<b>Compulsory Acquisition (CA) and Temporary Possession (TP): general:</b>  Please confirm that all references to and citing of legislation and guidance in all documents submitted with this application are accurate and up to date.	This is confirmed.
Q1.3.2	The Applicant	<b>Objections Schedule:</b>  Notwithstanding information contained in the Schedule of Negotiations and Powers Sought [AS-297], and with regard to the outcomes from continuing due diligence,  viii) please complete the Objections Schedule attached at Annex A below, and ensure that it is updated (tracked changes and clean versions) at each successive deadline so as to include up to date information about the status of all negotiations and current objections to the CA and/ or TP proposals, both making new entries and deleting any entries that you consider no longer apply, taking account of the positions expressed in RRs and written representations (WRs) and giving reasons for any additions or deletions; and  please ensure that all updates to the Schedule of Negotiations and Powers Sought (APP-025) are issued as both clean and tracked change documents.	Appendix D Objections Schedule submitted at Deadline 2.

ExQ1	Respondent	Question	Applicant's Response
Q1.3.3	The Applicant	<p><b>Unknown interests</b></p> <p>In the Schedule of Negotiations and Powers Sought [AS-297] you list unknown interests in respect of plots 5-04, 5-06 and 7-02.</p> <p>Please provide an update regarding continuing due diligence in respect of these plots.</p>	<p>Regarding continuing due diligence in respect of these plots, the Applicant has and is currently undertaking the following methods to identify any interests:</p> <p>Erected notices for preliminary hearings with the Applicants contact details</p> <p>Erected notices for issue specific hearings under sections 91 and 94 of the Planning Act 2008</p> <p>Erected Unknowns section 56 with the Applicants contact details (Reg 8 and Reg 9 notices)</p> <p>Land registry refresh every 6 months and regular monitoring of land registry for title changes</p>
Q1.3.4	The Applicant	<p><b>Negotiations and powers sought</b></p> <p>In the Schedule of Negotiations and Powers Sought [AS-297] under the entry for Joanna Reeks,</p> <p>ix) why is there reference to the Tilbrook family?</p> <p>Please update in respect of the current position in respect of Joanna Reeks.</p>	<p>The Applicant draws reference to the Tilbrook family in the Schedule of Negotiations and Powers Sought for this entry because Joanna Reeks is the sister of Richard Martin Tilbrook. Richard and Joanna share the same agent and solicitor and as such the updates displayed in this document are reflective of the current position.</p>
Q1.3.5	The Applicant	<p><b>Negotiations and powers sought</b></p> <p>In the Schedule of Negotiations and Powers Sought [AS-297] under the entry for NGET, you state that NGET issued Heads of Terms on 18 May 2021 and that (at the time that the application was submitted) you were negotiating for lease and easement at Burwell substation.</p> <p>Please give an update of the latest position.</p>	<p>Negotiations for a lease of land with NGET ceased on 10 March 2022 when the Applicant was informed that Option 1 was no longer available to it.</p>
Q1.3.6	The Applicant	<b>Crown land and consent:</b>	<p>The Applicant has been engaging with the Secretary of State for Transport (the "SoS") since March 2019. On 15 October 2020 the SoS confirmed that they do</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>With regard to the outcomes from continuing due diligence, please explain briefly the position in respect of any Crown interests subject to PA2008 s135 with reference to the latest available Book of Reference (BoR) and Land Plan, to identify whether consent is required with respect to s135(1)(b) and/or s135(2) and what progress has been made to obtain such consent(s).</p> <p>Written evidence of consent(s) obtained is required as soon as possible and in any event by the close of the Examination.</p>	<p>not hold any interests within the Order limits. Further correspondence contrary to this was received on 26 October 2022, confirming that the SoS holds an interest in plot 4-03 and that rights will be required to cross their property as part of Grid Connection Route A.</p> <p>After receiving this notification, the Applicant asked if the SoS would be willing to discuss the acquisitions of the rights required for the Scheme and to give section 135 consent and the matter was directed to their estates team. A meeting was held on 21 March 2022 and an external agent appointed on 15 June 2022.</p> <p>The Applicant is presently awaiting further contact from the SoS's appointed agent. Further information on the current status of negotiations can be found in the Schedule of Negotiations and Powers Sought [AS-297].</p>
Q1.3.7	The Applicant	<p><b>Special category land and land subject to special Parliamentary procedure:</b></p> <p>Please confirm that no special category land is to be the subject of any CA or TP proposals (PA2008 s130-132 refer).</p>	<p>It is confirmed no special category land is subject to CA or TP or is within the order limits at all.</p>
Q1.3.8	The Applicant	<p><b>Statutory undertakers: land or rights (PA2008 s127):</b></p> <p>Notwithstanding information contained in the Schedule of Negotiations and Powers Sought [AS-297], please review RRs and WRs made as the examination progresses alongside your land and rights information systems and prepare and at each successive deadline update as required (tracked changes and clean versions) a table identifying and responding to any representations made by statutory undertakers with land or rights to which PA2008 s127 applies.</p>	<p>Appendix E Statutory Undertaker Representations Schedule (PA2008 S127) submitted.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Where there are such representations, please identify:</p> <ul style="list-style-type: none"><li>• the name of the statutory undertaker;</li><li>• the nature of the undertaking;</li><li>• the land and/ or rights affected, identified with reference to the most recent version of the Book of Reference (BoR) and Land Plan available at that time;</li><li>• in relation to land, whether and if so how the tests in PA2008 s127(3)(a) or (b) can be met;</li><li>• in relation to rights, whether and if so how the tests in s127(6)(a) or (b) can be met; and</li><li>• in relation to these matters, whether any protective provisions and /or commercial agreements are anticipated, and if so<ul style="list-style-type: none"><li>◦ whether these are already available to the ExA in draft or final form;</li><li>◦ whether a new document describing them is attached to the response to this question: or</li><li>◦ whether further work is required before they can be documented; and</li></ul></li><li>• in relation to a statutory undertaker named in an earlier version of the table but in respect of which a settlement has been reached:</li></ul>	

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>○ whether the settlement has resulted in that statutory undertaker's representation(s) being withdrawn in whole or part; and</li> <li>● identifying any documents providing evidence of agreement and withdrawal.</li> </ul>	
Q1.3.9	The Applicant	<p><b>Statutory undertakers: extinguishment of rights and removal of apparatus etc. (PA2008 s 138):</b></p> <p>Notwithstanding information contained in the Schedule of Negotiations and Powers Sought [AS-297], please review your proposals relating to CA or TP of land and/or rights and prepare and at each successive deadline update as required (tracked changes and clean versions) a table identifying whether and if so how these proposals affect the relevant rights or relevant apparatus of any statutory undertakers to which PA2008 s138 applies.</p> <p>In respect of such rights or apparatus, please identify:</p> <ul style="list-style-type: none"> <li>● the name of the statutory undertaker;</li> <li>● the nature of the undertaking;</li> <li>● the relevant rights to be extinguished and/ or the relevant apparatus to be removed;</li> <li>● how the test in s138(4) can be met;</li> </ul>	<p>Appendix F Statutory Undertaker Representations Schedule (PA2008 S138) submitted</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• in relation to these matters, whether any protective provisions and/ or commercial agreement are anticipated, and if so:           <ul style="list-style-type: none"> <li>◦ whether these are already available to the ExA in draft or final form;</li> <li>◦ whether a new document describing them is attached to the response to this question; or</li> <li>◦ whether further work is required before they can be documented; and</li> </ul> </li> <li>• in relation to a statutory undertaker named in an earlier version of the table but in respect of which a settlement has been reached:           <ul style="list-style-type: none"> <li>◦ whether the settlement has resulted in that statutory undertaker's representation(s) being withdrawn in whole or part; and</li> </ul> </li> <li>• identifying any documents providing evidence of agreement and withdrawal.</li> </ul>	
Q1.3.10	The Applicant	<p><b>Land Plan:</b></p> <p>With particular reference to sheet 20 of the Land Plan [AS-281] and plot 20-11 please</p> <ul style="list-style-type: none"> <li>• give an update on progress on deciding the outstanding choice of connection point to the existing Burwell substation;</li> </ul>	<p>The point of connection into the substation has been confirmed with NGET. We are awaiting written confirmation from NGET that no further documentation is required for Option 3 to be taken forward.</p> <p>If Option 3 is confirmed the CA of land in Option 2 will no longer be required, however CA of rights over the land for laying of cables will be required and the Land Plans will be updated accordingly.</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>update the Land Plan accordingly; and</li> <li>confirm that if Option 3 is chosen the land and rights relating to Option 2 will fall away.</li> </ul>	
Q1.3.11	The Applicant	<p><b>Private rights:</b></p> <p>With reference to Art 21, our understanding is that overriding is neither extinction nor full suspension against everyone: rather, it leaves the right in place but allows the undertaker a defence against breach or interference for the purposes of constructing and using the development authorised by the DCO.</p> <ul style="list-style-type: none"> <li>Does this mean that private rights are to be overridden, suspended or extinguished?</li> <li>To whom does notice need to be provided under Art 21(6)(a)?</li> </ul>	<p>Article 21 of the draft DCO sets out what is to happen to existing private rights over land that are affected by the two main compulsory acquisition powers contained in article 18 (compulsory acquisition of land) and article 20 (compulsory acquisition of rights) and during periods of temporary possession under articles 27 (temporary use of land for constructing the authorised development) and 28 (temporary use of land for maintaining the authorised development).</p> <p>In relation to each:</p> <ul style="list-style-type: none"> <li><b>Acquisition of land subject to article 18 (compulsory acquisition of land)</b> – article 21(1) provides that, subject to the provisions of this article (in relation to which see below), all private rights and restrictive covenants are extinguished on the date of acquisition of the land (if acquired by agreement) or on the date of entry (if the power to compulsorily acquire the land is exercised). This means that where the land subject to this article is acquired by agreement or compulsorily, all existing private rights are extinguished and will cease to exist.</li> <li><b>Acquisition of rights over land or the imposition of restrictive covenants in accordance with article 20 (compulsory acquisition of rights)</b> – article 21(2) provides that, subject to the provisions of this article (in relation to which see below), all private rights that are inconsistent with the rights or restrictive covenants acquired by the undertaker under article 20 (in this answer these are referred to as 'Order rights') are to cease to have effect as from the earliest of the date of acquisition of the Order rights (whether by compulsion, by agreement or through the grant of a lease), the date of entry (where the compulsory power is exercised) or on the commencement of any activity authorised by the Order which interferes with or breaches those rights. In contrast to article 21(1) which extinguishes all private rights over land acquired, this article only causes existing rights to cease to have effect where the exercise of those existing rights is inconsistent with the exercise by the undertaker of the Order</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>rights. This takes a proportionate approach by allowing existing rights and Order rights to co-exist.</p> <ul style="list-style-type: none"> <li>• <b>Temporary possession of land for constructing or maintaining the authorised development (articles 27 and 28)</b> – article 21(3) provides that during periods of temporary possession existing rights are suspended and are unenforceable in so far as their continued exercise is inconsistent with the purposes for which temporary possession is taken. In such circumstances, the existing rights will continue to exist and on the cessation of the period of temporary possession would again become exercisable and enforceable.</li> </ul> <p>Paragraphs (6) and (7) of article 21 qualify the exercise of paragraphs (1) to (3). Paragraph (6) allows the undertaker to serve notice to effectively modify the application of paragraphs (1) to (3). For example, the undertaker may come to the view in light of the detailed design of the project that certain existing rights on land (for example, those owned by utility companies) that is subject to compulsory acquisition under article 18 may not be incompatible with the Project and as such it may choose to exclude those particular rights from becoming extinguished in accordance with article 21(1). This may also be done to give effect to an agreement, as is referred to in sub-paragraph (6)(b) and which may extend to successors in title in accordance with paragraph (7).</p> <p>The notice under article 21(6), if the circumstances are such that one is appropriate, would be served upon the persons with the benefit of the private rights in question.</p>
Q1.3.12	The Applicant	<p><b>Private rights:</b></p> <p>Provision is made in the dDCO for compensation to be determined under Part 1 of the 1961 Act. It is acknowledged that a provision in this form is commonplace in DCOs and other Orders. However, Part 1 of the 1961 Act only relates to compensation for compulsory acquisition.</p>	<p>Arts 27(6) and 28 (6) refer to temporary possession of land and the compensation payable in that instance. It also states in Art 27 (7) and 28 (7) that Part 1 of the <u>1961 Act</u> will apply where there is any dispute regarding entitlement to compensation or the amount of compensation. The Applicant therefore does not consider that any modification of Arts 27 (6) and 28 (6) is required as that provision ensures that the 1961 Act process applies.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>In order for there to be certainty that this would apply in other situations (e.g. the temporary use of land under Arts 27 and 28)</p> <ul style="list-style-type: none"> <li>• should Arts 27(6) and 28(6) be modified, and a modification be included as with the other compensation provisions in Schedule 9? and if not, please explain why not.</li> </ul>	<p>No amendment needs to be made to Schedule 9, as that relates to different processes that are not considered relevant to temporary possession powers, that are very different from powers of compulsory acquisition of land or rights</p>
Q1.3.13	The Applicant	<p><b>Statutory undertakers: Art 2:</b></p> <p>Bearing in mind the different definitions of statutory undertaker in s127 and s138 of PA 2008, should the definition of "statutory undertaker" in Art 2(1) be amended?</p>	<p>The Applicant is content that the definition in article 2(1) for the term "statutory undertaker" is correct and requires no further amendment, notwithstanding that sections 127 and 138 of the Planning Act 2008 adopt definitions that are drawn in different terms.</p> <p>The Applicant notes that the Infrastructure Planning (Model Provisions) (England and Wales) Order 2009 adopted the formulation that refers to the definition of statutory undertaker contained in section 127 of the Planning Act 2008, a precedent that has been followed in the vast majority of development consent orders made to date including, for example the East Anglia ONE North Offshore Wind Farm Order 2022. and the Riverside Energy Park Order 2020.</p> <ul style="list-style-type: none"> <li>•</li> </ul>
Q1.3.14	The Applicant	<p><b>Temporary possession: Art 6:</b></p> <p>In respect of TP, are all the provisions cited in Art 6 capable of being disapplied?</p>	<p>The Applicant understands the question relates to the disapplication of the provisions of the Neighbourhood Planning Act 2017, referred to in paragraph (1)(g) of article 6 of the draft DCO as that is the only disapplication that is of relevance to the powers in the draft DCO that relate to the temporary possession of land.</p> <p>Section 120(5) of the Planning Act 2008 permits, among other matters, a development consent order to "apply, modify or exclude a statutory provision which relates to any matter for which provision may be made in the order;". Subsection (3) confirms that a DCO may "make provision relating to, or to matters ancillary to, the development for which consent is granted. Subsection (5) confirms that the term "statutory provision" means a provision of an Act or of an instrument made under an Act. As such the provisions of the Neighbourhood</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Planning Act 2017 are capable of being disappled by a development consent order.</p> <p>The vast majority of development consent orders granted (across all sectors) since the Neighbourhood Planning Act 2017 was enacted have included a provision that disapples the temporary possession provisions contained within it. For example and to name only a small sample of the available precedents, the Silvertown Tunnel Order 2018, the Cleve Hill Solar Park Order 2020 and the East Anglia ONE North Offshore Wind Farm Order 2022.</p>
Q1.3.15	The Applicant	<p><b>CA of rights: Art 20:</b></p> <p>Should Art 20(1) be redrafted to make it clear that, for any plot of land, the undertaker may only acquire compulsorily those rights or impose those restrictive covenants</p> <ul style="list-style-type: none"> <li>• which are identified in the BoR as applying to that plot, and not simply for the purposes in Art 18; and</li> <li>• only over such of the Order land as may be required?</li> </ul>	<p>The Applicant considers that the drafting in article 20 is sufficiently clear and is very well precedented in a wide range of made development consent orders. For example and to name only a few, a similar approach is taken in the Cleve Hill Solar Park Order 2020, the Hornsea Three Offshore Wind Farm Order 2022 and the A47 North Tuddenham to Easton Development Consent Order 2022.</p> <p>The approach in article 20 is reflective of the overall structure of the two key compulsory acquisition provisions in articles 18 and 20 and the temporary possession provisions in articles 27 and 28. Looked at together they reflect a hierarchy where:</p> <ul style="list-style-type: none"> <li>• in relation to the land subject to article 18 (compulsory acquisition of land) and which is shown in pink on the Land and Crown Land Plans (APP-006) the undertaker may instead of acquiring the land, acquire rights or impose restrictive over it and take temporary possession;</li> <li>• In relation to the land subject to article 20(2) (compulsory acquisition of rights) and which is shown in blue on the Land and Crown Land Plans (APP-006), the undertaker may acquire the rights or impose the restrictive covenants referred to in Schedule 8 of the DCO and may temporarily possess that land, but is not authorised to compulsorily acquire the land.</li> <li>• In relation to the single temporary possession plot (plot 21-04) accepted for examination following the Applicant's Proposed Changes Application, the Applicant is prohibited from acquiring the land or acquiring rights or imposing restrictive covenants over it.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>The rationale behind the hierarchy is to enable the Applicant during the detailed design process to 'refine down' the powers it requires to deliver the Scheme in the light of the detailed design.</p>
Q1.3.16	The Applicant	<p><b>CA of rights: Art 20:</b></p> <p>In paragraph 5.5.6 of the Explanatory Memorandum (EM) [AS-294], referring to Art 20 (Compulsory acquisition of rights) you say that "<i>Providing the undertaker with powers to acquire rights only and impose restrictive covenants only over the Order Land set out in Schedule 8 allows the undertaker to reduce the area of land that is required to be compulsorily acquired for the purposes of the authorised development ...</i>"</p> <p>a) Does this mean that if the land as shown on the Land Plan is more than is needed then rights in only that land which is needed will be taken?</p> <p>b) Does this also mean that only those rights which are necessary will be acquired? and</p> <p>c) Is this flexibility also necessary as a fall-back position in case negotiations with owners of Order land are unsuccessful?</p>	<p>Article 20 (<i>Compulsory acquisition of rights</i>) enables the undertaker to acquire rights or impose restrictive covenants over the Order Land as may be required for any purpose for which the land may be acquired under Article 18 (Compulsory acquisition of land). The Article provides that, in respect of the Order Land set out in Schedule 8, the undertaker's powers of acquisition of new rights and imposition of restrictive covenants are limited to the purposes set out in that Schedule.</p> <p>Taking each of these in turn:</p> <ul style="list-style-type: none"> <li>a) The Applicant confirms the land as shown on the Land and Crown Land Plans (APP-006) is the land it considers to be necessary to construct, maintain and decommission the Scheme at this stage. However, if the Applicant is able to refine this area down at a later stage following the detailed design of the Scheme, then rights will only be taken over the land that is needed;</li> <li>b) The Applicant will only acquire what is needed to deliver the Scheme. As noted in response to question 1.3.15, the rationale behind the hierarchy of the compulsory acquisition powers is to enable the Applicant during the detailed design process to 'refine down' the powers it requires to deliver the Scheme in light of the detailed design; and</li> <li>c) The Applicant is making great efforts to acquire the land it requires for the Scheme by agreement, but it is also seeking compulsory acquisition powers as a fall-back position in case negotiations are unsuccessful. This position is very well precedented in a wide range of made development consent orders. The flexibility between the powers is to ensure that if the Applicant is left with no choice but to exercise compulsory acquisition powers, it can do so in a way that is proportionate.</li> </ul>
Q1.3.17	The Applicant	<b>Acquisition of subsoil only: Art 20:</b>	<p>The Applicant confirms that the reference to Article 20 in the second line of Article 23 is required for instances when the Applicant needs to take rights in the sub-soil only. This is well precedented in a number of recently made development consent</p>

ExQ1	Respondent	Question	Applicant's Response
		Is the reference to Art 20 in the second line of Art 23 required?	orders, including Cleve Hill Solar Park Order 2020, Hornsea Project Three Offshore Windfarm Order 2020 and Riverside Energy Park Order 2020.
Q1.3.18	The Applicant	<p><b>Temporary possession:</b></p> <p>Art 27 provides for temporary use of land (TP). The authorised development may be constructed in phases, with or without a time gap in between. This may have implications for landowners in terms of the duration of any TP. The drafting of Art 27(4) does not appear to address the potential for the construction of authorised development in phases with a gap in construction works.</p> <ul style="list-style-type: none"> <li>• When would a decision on the approach to construction be made?</li> <li>• How would this be communicated to landowners and others with an interest?</li> <li>• Is it envisaged that the undertaker would remain in possession of land used under Art 27 during any gap in construction?</li> <li>• How does this article as drafted limit the impacts on landowners and others with an interest in the event of any delay?</li> <li>• Insofar as this flexibility has impacts on the use and enjoyment of land, how would those impacts be minimised and/or mitigated?</li> </ul>	<ul style="list-style-type: none"> <li>• ES Chapter 3 states that the decision on construction will be taken post consent and post the final investment decision. The construction programme and whether it is built in phases or not will depend on the final scheme design and the potential environmental constraints on the timing of construction activities</li> <li>• The framework CEMP at ES 6.2 Appendix 16C provides for a Community Liaison Group to be set up prior to the start of construction and a Community Liaison Officer will keep the local community informed with progress updates and items such as crane deliveries or new phases of work via use of a social media page</li> <li>• The Applicant's intention is to build without any gap in construction but this can't be confirmed until the main contractor is appointed. The power is subject to a right of compensation and so the applicant would be incentivised to keep the periods of possession to the minimum period necessary. Art 27 (11) allows for the taking of temporary possession on more than one occasion therefore the Applicant could give back the land to the owner during any gap in construction, however for each period of returning the land to the owner would result in the Applicant paying compensation under Art 27(6). This would be a disincentive for the Applicant to have gaps in construction leading to higher compensation payments</li> <li>• Once temporary possession of land is taken then the applicant is liable for any losses incurred by the landowner and will have to reinstate land if it is given back on a temporary basis only to be taken again later. This would increase the overall construction costs for the Applicant which they would wish to avoid wherever possible and look to keep compensation in these circumstances to a minimum</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>Disruption to users of Public Rights of Way will be mitigated by having appropriate and clearly signed existing alternative routes and where possible will be planned and programmed to minimise disruption to users.</li> <li>Whilst the Applicant had already anticipated continuing its activities to engage with landowners, the framework CEMP has been updated to include a commitment to specifically engage with landowners in respect of construction programming and the use of their land, so that they can plan the use of the rest of their land around the Scheme's construction,</li> </ul>
Q1.3.19	The Applicant	<p><b>Temporary possession:</b></p> <p>Art 27(1) refers to taking TP by</p> <ul style="list-style-type: none"> <li>serving notice of entry under the 1965 Act;</li> <li>making a declaration under s4 of the 1981 Act and;</li> <li>otherwise acquiring the land or rights over land.</li> </ul> <p>Please explain the circumstances in which each of these will be used on the project.</p>	<p>In general terms, once a power of compulsory acquisition has been authorised whether through a development consent order, compulsory purchase order or through other legislative means, the person with the benefit of that authorisation must take some further action to actually implement that authorisation. There are two ways in which such an authorisation can be implemented, either through the service of notice to treat and notice of entry under sections 5 and 11 of the Compulsory Purchase Act 1965, or by making a general vesting declaration in accordance with the provisions of the Compulsory Purchase (Vesting Declarations) Act 1981.</p> <p>The references to the 1965 Act and the 1981 Act in article 27(1) are to confirm that the undertaker may not take temporary possession under article 27 after it has served notice of entry or made a general vesting declaration. This reflects the assumption that, once those steps have been taken to implement the compulsory acquisition, the undertaker would no longer need to enter on and take temporary possession of the land. It would be able to do so in accordance with either the notice of entry or once the land had vested following the making of a general vesting declaration.</p> <p>Similarly, in relation to paragraph (5) the undertaker should not be required to restore the land at the end of a period of temporary possession when it has implemented compulsory acquisition of that land through the making of vesting declaration or the service of notice of entry.</p>
Q1.3.20	The Applicant	<b>Temporary possession:</b>	The Applicant does not believe a schedule of land presenting which temporary possession may be taken is required as there is only one plot within the Order required for powers of temporary possession only.

ExQ1	Respondent	Question	Applicant's Response
		<p>Art 27(1) refers to taking TP of "any of the Order land".</p> <p>Should this statement be qualified by reference to a schedule of land of which temporary possession may be taken? If not, please explain why there is no need for a Schedule of land of which temporary possession may be taken to be included within the Order.</p>	<p>As is standard for DCOs, temporary possession powers are sought for all land within the Order limits.</p>
Q1.3.21	The Applicant	<p><b>Temporary possession:</b></p> <p>Art 27(1)(e) refers to "mitigation works". Mitigation is not defined in Art 2 or Schedule 2, so</p> <ul style="list-style-type: none"> <li>• what is meant by mitigation?</li> <li>• what is being mitigated? and</li> <li>• are there circumstances where mitigation may or will extend beyond Schedule 2?</li> </ul>	<p>Article 27(1)(f) refers to the "mitigation works required under the requirements in Scheduled 2 (requirements) on that land". Schedule 2 sets out the requirements that apply to the construction, operation, maintenance and decommissioning of the authorised development under the Order. The requirements closely relate to the mitigation set out in the Environmental Statement that is required to avoid, reduce and offset any likely significant adverse effects. A number of the requirements specifically refer to the Environmental Statement and other application documents (in particular, 'outline' or 'framework' strategies or plans) in order to ensure that the mitigation or other measures outlined in those documents are secured.</p> <p>The Applicant considers that the drafting in article 27(1)(e) is sufficiently clear in that it enables the Applicant to deliver any of the mitigation works pursuant to the requirements in Schedule 2 only. This includes mitigation works required pursuant to the control plans and strategies referred to in the requirements, such as the implementation and maintenance of landscaping works required in the landscape and ecology management plan, as secured by Requirement 9 in Schedule 2. This is well precedented in a range of made development consent orders, including the Cleve Hill Solar Park Order 2020, Hornsea Three Offshore Wind Farm Order 2020 and North Wales Wind Farm Connection Order 2016.</p>
Q1.3.22	The Applicant	<p><b>Funding: Guarantees in respect of compensation:</b></p> <p>Art 43 refers to either a guarantee under Art 43(1)(a) or an alternative form of security</p>	<p>The Applicant has not made a decision as to whether it would use a guarantee, or an alternative form of security should it need to exercise its powers of compulsory acquisition referred to in paragraph 2 of this article. This will depend on a number of factors such as the cost of obtaining a guarantee at the time and the ability for</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>under Art 43(1)(b), to be in place for no more than 15 years under Art 43(4).</p> <ul style="list-style-type: none"> <li>• Which of these do you propose to put in place, and why?</li> <li>• Explain why you consider 15 years to be sufficient.</li> </ul>	<p>any parent company to provide a parent company guarantee. The interests of recipients of any compensation payable are protected by the fact that the Secretary of State is required to approve any alternative form of security which could be elected by the Applicant under paragraph 1(b) of this Article.</p> <p>As referred to in paragraph 5.6.18 of the Explanatory Memorandum (AP-20) the form of wording is commonly used in made DCO's including the Wrexham Gas Fired Generating Station Order 2017 and the Drax Power (Generating Stations) Order 2019.</p> <p>It is appropriate for the security to be time limited as there is a cost to the Applicant in putting that security in place. The security only needs to be in place until the compensation has been paid to the recipient. This will be settled once powers have been exercised and well in advance of the 15 year limit referred to in the article. There is no justification for this period to be extended as compensation liabilities will have been settled long before the end of the 15 year period.</p>
Q1.3.23	The Applicant	<p><b>Book of Reference (BoR):</b></p> <p>Please ensure that the BoR follows the latest version of Government Guidance "Planning Act 2008: guidance related to procedures for the compulsory acquisition of land", including Annex D which deals specifically with guidance on the BoR: for example, please ensure that in the BoR:</p> <ul style="list-style-type: none"> <li>• you cross refer to relevant DCO Articles;</li> <li>• each person listed in Part 3 is also in Part 1; and</li> <li>• diligent inquiry continues throughout the Examination to ensure that the BoR is always up to date.</li> </ul>	<p>The Book of Reference was submitted at Deadline 1 and updates the front end of the document to reference the relevant DCO articles for all powers sought.</p> <p>The Applicant confirms that each person listed in Part 3 is also listed in Part 1.</p> <p>The Applicant will continue to undertake diligent inquiry throughout the Examination.</p>
Q1.3.24	The Applicant	<b>Book of Reference:</b>	

ExQ1	Respondent	Question	Applicant's Response
		<p>As part of the cross reference to the relevant DCO Articles, please add a column entitled "Extent of acquisition or use" to Part 1 of the BoR immediately to the right of the left-hand column entitled "Number on Plan". In this new column, please specify the extent of acquisition or use of each plot, by reference to a new table of new rights sought, which specifies the various categories of new rights sought, and which is inserted immediately before Part 1.</p>	<p>The Applicant has amended the Book of Reference as per the ExA's request and this was submitted at Deadline 1 reference ENO10106/APP/4.4</p>
Q1.3.25	The Applicant	<p><b>Book of Reference:</b></p> <p>As part of continuing due diligence, please ensure that there are no blank columns in the BoR for any plot in respect of interests, and that the words "none identified" are inserted to confirm that this is the case.</p>	<p>The Applicant has applied the words 'none identified' where applicable and can confirm this is the case. There are no blank columns in the Book of Reference submitted at Deadline 1.</p>
Q1.3.26	The Applicant	<p><b>Book of Reference (TP):</b></p> <p>With reference to paragraph 1.1.8 of the Book of Reference (BoR) [AS-296]</p> <p>Please explain why you do not seek the power to take TP of plots 6-05 and 6-06.</p>	<p>The Applicant confirms plots 6-05 and 6-06 have been removed from the order limits and the updated versions of the Land Plans will be provided at Deadline 2. The Book of Reference was submitted at Deadline 1.</p>
Q1.3.27	The Applicant	<p><b>Book of Reference (category 3 persons):</b></p> <p>Paragraph 1.3.2 of the Book of Reference (BoR) [AS-296] asserts that "<i>the Applicant does not consider that any person would be entitled to make a claim under part 1 of the Land Compensation Act 1973 or under section 152(1) of the PA 2008</i>" in relation to</p>	<p>All relevant interests with the potential to make a claim under Section 10 (s10) of the Compulsory Purchase Act 1965 because they are in benefit of a restrictive right or covenant over land within the Order limits, have been included within the Book of Reference as Category 2 and Category 3 persons.</p> <p>All relevant interests with the potential to make a claim under Section 152(3) of the PA 2008 because they are in benefit of a restrictive right or covenant over</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>noise, vibration, fumes, smoke or light emissions.</p> <p>Have you considered possible claims under s10 of the Compulsory Purchase Act 1965 in respect of injurious affection?</p>	<p>land within the Order limits, have been included within the Book of Reference as Category 2 and Category 3 persons.</p>
Q1.3.28	The Applicant	<p><b>Change application</b></p> <p>Paragraph 2.1.9 of the change application [AS-243] mentions the need for compulsory acquisition for Option 2. What do you mean by "this new information"?</p>	<p>The 'new information' referred to in paragraph 2.1.9 refers to National Grid Electricity Transmission's representations which referred to Option 1 being considered 'not technically feasible', as is discussed in paragraphs 2.1.5 and 2.1.6 of the Proposed Changes to the Application report [AS-243], which prompted the reconsideration of the options for the Project's electrical connection.</p>
Q1.3.29	The Applicant	<p><b>Change application</b></p> <p>Figure 2-2 of the change application [AS-243] still shows Option 1 land.</p> <ul style="list-style-type: none"> <li>• It is acknowledged that the removal of this option would mean that only rights over the land would be required, but why are rights over the entire Option 1 land area still required? and</li> <li>• Should the caption for East Site B also mention the shunt reactor?</li> </ul>	<p>The reasons for this is explained in paragraph 3.1.2 of the Proposed Changes to the Application report [AS-243] which states "<i>Works will still be required to connect the Scheme to the National Electricity grid at Burwell and therefore access will be required for those works and for maintenance during operations. Cable Route Access A would be relocated to the existing Burwell National Grid existing main access to facilitate the required works to connect the Scheme to the national electricity grid.</i>"</p> <p>Whether the Applicant proceeds by way of Option 3 (its preferred option) or Option 2, it will still be necessary for works to be carried out in the vicinity of the existing National Grid Burwell Substation, and for the Applicant to acquire the necessary rights to carry out, access and maintain those works. The detailed design of those final connection works would be prepared collaboratively with National Grid Electricity Transmission Limited and so a proportionate degree of flexibility to support the detailed design of those works is required by the Applicant.</p> <p>Figure 2-2 presented the proposed changes in overview. While it could have noted the addition of the shunt reactor to East Site B, taking the whole package of documents comprised in the Proposed Changes to the Application Report</p>

ExQ1	Respondent	Question	Applicant's Response
			together, the Applicant considers that its proposed changes were clearly described and reflected in the amended documents.
Q1.3.30	The Applicant	<b>Change application</b> With reference to paragraph 2.5.10 and tables 3-2, 4-2 and 5-2 of the change application [AS-243] what do you mean by the term "affected parties"?	The Applicant confirms that the intended wording in paragraph 2.5.10 and tables 3-2, 4-2 and 5-2 of the Change Application should have read "Affected Persons" (as defined by the Planning Act 2008 and the Infrastructure Planning (Examination Procedure) Rules 2010).
Q1.3.31	The Applicant	<b>Change application</b> Table 2-3 of the change application [AS-243] covers several pages and would benefit from repeat headers and numbering of issues to aid the reader. Halfway down page 23 reference is made to a consultation: does this refer to the main consultation or the subsequent limited one related to oversailing of AIL?	The Applicant has submitted an Errata Report for the Change Application [AS-243] to clarify the headings and to provide numbering to the issues outlined. This report forms Appendix G of the Applicant's Response to the First Written Questions. The Errata Report includes a revised Table 2-3 in Appendix A. The reference to consultation made on page 23 of AS-243 is a reference to the 'main' consultation on the Applicant's changes and not to the subsequent limited consultation relating to oversailing. The responses received to the oversailing consultation are summarised in a separate table labelled Table 2-4. For consistency, clarifications to Table 2-4 are also included in the Errata Report with a revised Table 2-4 included in Appendix B.
Q1.3.32	The Applicant	<b>Change application</b> In paragraph 2.5.14 of the change application [AS-243] you say in respect of the additional targeted consultation " <i>In order to ensure any additional affected parties were notified of the consultation period a site notice was erected at the entrance to the property on 26 July 2022 and a formal consultation letter issued to the landowner by letter and email on 25 July 2022. Receipt of the latter was confirmed by way of email on 28 July 2022 and discussions are</i>	The Applicant acknowledges the duplication in 2.5.15. The Applicant confirms that the intended wording in paragraph 2.5.14 of the Change Application should have read "Affected Persons" (as defined by the Planning Act 2008 and the Infrastructure Planning (Examination Procedure) Rules 2010). The Applicant also confirms that agreement of all APs has not yet been obtained, however for the reasons states in paragraphs 2.6.2 to 2.6.10 of the Changes Application, such consent is not required.

ExQ1	Respondent	Question	Applicant's Response
		<p><i>ongoing</i>" and in paragraph 2.5.15 you say that "<i>a further response is awaited</i>".</p> <ul style="list-style-type: none"> <li>• The last sentence of paragraph 2.5.15 appears to have been repeated - please delete as necessary;</li> <li>• By "affected parties" do you mean affected persons (APs)? please explain; and</li> <li>• Does this mean that agreement of all APs has not yet been obtained?</li> </ul>	
Q1.3.33	The Applicant	<p><b>Change application</b></p> <p>On page 31 in Table 2-4 of the change application [AS-243] under "Other" issues, you say that "<i>No terms have been proposed as to a license agreement</i>" (sic) for the land that will be oversailed (new plot 21-04).</p> <p>Please explain the current position in respect of the land that will be oversailed, what works will be required and what happens if the charity does not want to enter into a licence agreement.</p>	<p>The Applicant seeks only the power to temporarily possess plot 21-04 during construction for the purpose of facilitating the passage of abnormal indivisible loads. Temporary possession of airspace and land will be required for oversailing and to ensure any maintenance of the verge and/or fence can be conducted.</p> <p>The Applicant is presently awaiting a response from the Charity with regards to their professional fees for the negotiation of a license agreement. If negotiations do not proceed to agreement the Applicant would propose to serve Article 29 notices.</p>
Q1.3.34	The Applicant	<p><b>Change application</b></p> <p>Paragraph 2.6.3 of the change application [AS-243] refers to Change 3 and a small increase in the Order land (new plot 21-04) "<i>as a consequence of the need to transport the larger 400kV transformers to the onsite substations ...</i>". We note that the only</p>	<p>The Applicant will continue to seek to secure the necessary agreements with the landowners concerned to secure adequate rights to oversail plot 21-04, in preference to relying upon possession powers.</p> <p>If, despite the Applicant's efforts it is unable to secure the required agreements it could rely on article 28 of the draft DCO take temporary possession of the plot 21-04 land during the maintenance period.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>powers sought are those of temporary possession during construction and that you do <i>"not seek any greater power to compulsory acquire (sic), or compulsorily acquire rights over, that land"</i>.</p> <p>Please explain what would happen if it were to become necessary to replace a 400kV transformer in service, and what will happen at the decommissioning stage.</p>	<p>In relation to decommissioning, it would be possible to remove the transformer in more than one piece thereby enabling it to be transported in smaller vehicles that would not require to oversail the land.</p>
Q1.3.35	The Applicant	<p><b>Change application - drafting</b></p> <p>It appears that page 24 of the Statement of Reasons [AS-295] is largely blank: please rectify to aid the reader.</p>	<p>The Applicant acknowledges this and will update the Statement of Reasons as a Rev 2 and submit alongside the responses to the First Written Questions at Deadline 2</p>
Q1.3.36	The Applicant	<p><b>Change application</b></p> <p>Paragraph 5.3.5 of the Statement of Reasons [AS-295] says that <i>"The requirement for the Work No. 5B land would be avoided if Option 3 is taken forward, although the compulsory acquisition of rights for the final electrical connection works into the existing Burwell National Grid Substation (Work No. 5C) would still be required"</i>.</p> <p>Would the compulsory acquisition of rights be over the same area of land as the original compulsory acquisition of land?</p>	<p>Yes, the compulsory acquisition of rights is over the same area of land. This is because, given the space (as noted by the requirement to remove Option 2 due to other extensions being proposed) and environmental constraints of the location (as identified in the assessments of Option 1 within the Environmental Statement), flexibility is needed as to where the cable corridor in this area is able to be located.</p>

ExQ1	Respondent	Question	Applicant's Response
		If so, please explain why, given that only the cabling is required and not the Option 2 substation.	



## 6 Topic 1.4 - Cultural Heritage and Historic Environment

ExQ1	Respondent	Question	Applicant's Response
Q1.4.1	The Applicant	<p><b>Settings of heritage assets</b></p> <ul style="list-style-type: none"> <li>Please explain your methodology for identifying the settings of heritage assets and the extent of likely impact on these by the proposed development; and</li> </ul> <p>Please explain your reasoning in [APP-039] paras 7.5.13 and 7.5.20 in that churches were not considered further as their settings were considered to relate to their settlements and not extend into the scheme area.</p>	<p>The methodology for the assessment of setting of heritage assets followed that outlined in Historic England guidance, namely Good Practice Advice Note 3 – The Setting of Heritage Assets (2017). In accordance with this, a staged approach was taken to the identification and assessment of setting. The study area was defined to ensure that those assets whose setting had the potential to be impacted were identified, taking into consideration the likelihood for the setting of highly designated assets to be influenced over a larger area due to the function and survival of the asset (paragraph 7.3.1 of Chapter 7 Cultural Heritage <b>[APP-039]</b>). Each asset was then assessed through documentary research and a site visit where appropriate to establish the extent of setting and how much it contributed to significance. The potential for the proposals to affect this setting were then assessed, taking into consideration visual, aural and functional relationships.</p> <p>The churches within the study area were assessed within the Archaeological Desk Based Assessment <b>[APP-059, 060 &amp; 061]</b>. The historic, and present, function of the churches is a focus for the local community, therefore, their association with the settlement is a key feature of their significance. In some areas of the country, this function is enhanced by the incorporation of tall towers and spires which enable a large visual influence over the wider landscape. The churches identified in paragraph 7.5.20 <b>[APP-039]</b> were noted as not having extensive influence beyond their settlements due to their limited visibility and intervisibility within the wider landscape.</p> <p>The churches of St Mary in Barton Mills, St Margaret in Chippenham, Church of All Saints Worlington, were considered further due to their proximity to the scheme (paragraph 7.5.9).</p>
Q1.4.2	The Applicant	<p><b>Heritage assets</b></p> <p>Environmental Statement Volume 6; 6.2 Appendix 10I: Landscape &amp; Ecology Management Plan [APP-108] states “<i>There are no Registered Parks and Gardens within Sunnica West Site A. Chippenham</i></p>	<p>Chippenham Park RPG includes the Avenue, extending across the A14 trunk road as far as the A1304. The central section of the Chippenham Park Avenue therefore falls within the Order Limits of Sunnica West Site A. It is acknowledged that the statement in the Outline Landscape and Ecology Management Plan (OLEMP) <b>[APP-108]</b> is therefore incorrect. Chapter 7: Cultural Heritage of the</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>Park RPG is to the north of this part of the Order Limits..." Please clarify whether this statement is correct.</i></p>	<p>Environmental Statement [APP-039] correctly identifies the RPG as falling within Sunnica West Site A.</p> <p>This part of the Order Limits is required for the construction of Grid Connection Route B and to provide access between parcels W04, W05 and W06. These impacts will be localised to the northern part of this central section of the Avenue. The remaining part of this section of the Avenue is shown as a heritage offset on the Sunnica West Site A Plan in Figure 4 of the OLEMP [APP-108] and will be reinforced through additional woodland planting. The OLEMP will be updated accordingly at a later Deadline.</p>
Q1.4.3	The Applicant	<p><b>Heritage assets</b></p> <p>Please provide details of any heritage assets or locations where access was denied/not possible for survey purposes.</p>	<p>A programme of pre-submission evaluation trenching based on the results of the geophysical survey and in some areas where geophysical survey was not possible, has been undertaken and the results submitted in Appendix 7I- [Sunnica West Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement [APP-076] and Appendix 7H: [Sunnica East Sites A and B Sunnica East Sites A and B Archaeological Trial Trenching report].</p> <p>Outstanding results, from evaluation trenching that were delayed due to land access and cropping schedule constraints, notably ECO1 and ECO2 of Sunnica East Site A and E15, E18, E24, E25 and E27 of Sunnica East Site B, have been submitted [Appendix 7H- [Sunnica East Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement [PDA-002]].</p> <p>Of the 935 trenches excavated in Sunnica East, the following fifteen trenches were not opened due to their proximity to contingency status, livestock, an in-use trackway and services. The trench locations are illustrated in Figure 1 of the Sunnica East evaluation report [Appendix 7H- [Sunnica East Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement [PDA-002]].</p> <ul style="list-style-type: none"> <li>• E33: Trenches 1019-1021 – due to flooding.</li> <li>• E27: Trench 1459 – gas main.</li> <li>• E26: Trenches 1448, 1449 – gas main.</li> <li>• E26: Trench 1442 – gas main.</li> <li>• E25: Trenches 1430, 1431, 1434 – crop.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>• E23: Trenches 1245, 1246 – field descoped from Scheme.</li> <li>• E12: Trench 1244 – area descoped from Scheme.</li> <li>• ECO1: Trenches 1623, 1630 – contingency trenches not required in agreement with CCC.</li> </ul> <p>Of the 530 Trenches proposed in Sunnica West the following eighteen trenches were not excavated in agreement with CCC due to flooded ground conditions. The trench locations are illustrated on Figure 1 of Appendix 7I- [Sunnica West Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement <b>[APP-076]</b>.</p> <ul style="list-style-type: none"> <li>• W01: Trenches 13, 15-19, 24-26, 29.</li> <li>• W03: Trenches 90, 95, 102, 103, 107-109.</li> <li>• W04: Trench 124.</li> </ul>
Q1.4.4	The Applicant	<p><b>Chippenham Park RPG</b></p> <ul style="list-style-type: none"> <li>• Has any survey work or research been undertaken to establish the historic extent and design of Chippenham Park?</li> <li>• Has any survey work or research been undertaken to establish the extent and condition of remaining historic landscape features?</li> <li>• Please provide details of the proposed planting along the Grand Avenue, to include precise measurements and details of species mix and densities.</li> </ul> <p>Please detail future management measures for the proposed mitigation planting, and how this will be managed and secured</p>	<p>Available historic mapping and documentary research was examined to establish the historic extent of Chippenham Park and its design. This information was used to inform the baseline studies presented in], Appendix 7D - [(Sunnica West Site Archaeological Desk Based Assessment <b>[APP-060]</b>).</p> <p>A site visit was also undertaken to inform the assessment work undertaken to establish the extent and condition of surviving historic landscape features within the parkland. The results of this have been used to inform the statement of significance presented in the Archaeological Desk Based Assessments.</p> <p>The precise measurement, species mix and densities of planting to reinforce the Avenue are matters that the Applicant would expect to be resolved at the detailed design stage, post-DCO consent as part of the approval of the detailed LEMPs, in accordance with the OLEMP. However, the OLEMP has been updated to incorporate further work the Applicant has done on planting and vegetation management, including indicative species mixes for different types of planting, including along the Grand Avenue. This will be submitted at Deadline 3.</p> <p>The management measures for the proposed mitigating planting are set out in the Outline Landscape and Ecology Management Plan (OLEMP) in Appendix 10I <b>[APP-108]</b>, which is a certified document in the draft DCO.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.4.5	The Applicant and the local authorities	<p><b>Historic Environment Management Plan (HEMP)</b></p> <p>It is noted within chapter 7 of the ES [APP-039] that the Applicant does not intend to submit a HEMP. This was originally requested within the Scoping Opinion and has been requested within the Cambridgeshire County Council Relevant Representation.</p> <p>Please comment on the requirement to submit a HEMP to the Examination, and for it to be secured within the DCO.</p>	<p>A standalone HEMP document is not proposed as the requirements of such a plan will be incorporated within the Construction Environment Management Plan (CEMP) or Landscape Environment Management Plan (LEMP) to be approved by the relevant county authority for the works.</p> <p>Archaeological works moving forward will be required to be in accordance with a detailed archaeological mitigation strategy, as secured by Requirement 13 of the DCO. The Applicant has been working with CCC and SCC to produce this strategy, which will be submitted at a future examination deadline.</p>
Q1.4.6	The Applicant	<p><b>Archaeological surveys</b></p> <p>ES Chapter 7 [APP- 039] paragraphs 7.2.6 and 7.3.6 identify data gaps in the extent of geophysical surveys due to access.</p> <ul style="list-style-type: none"> <li>Please clarify to what extent these gaps have now been filled, and how the results of baseline information gained from additional trial trenching work affects the Environmental Statement and in particular the Cultural Heritage chapter [APP-039]; and</li> </ul> <p>Please provide a list of these areas and confirm whether and when there will be further submissions of baseline information to the Examination.</p>	<p>The Scheme has been subject to appropriate archaeological assessment, including higher levels of evaluation trenching in areas not accessible for the geophysical survey. The lack of geophysical survey coverage in certain areas was discussed with CCC and Suffolk County Council Archaeological Services (SCCAS) and enhanced samples of trial trenching were employed to compensate for any data gaps in these areas. The results are contained within the trial trench reports [Appendix 7H- [Sunnica East Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement <b>[PDA-002]</b> and Appendix 7I- [Sunnica West Sites A and B Archaeological Trial Trenching Report] of the Environmental Statement <b>[APP-076]</b>. The principal areas of enhanced trenching were in Fields E01 and E03 of Sunnica East. No further baseline information is therefore required to be submitted.</p> <p>The conclusions presented in ES Chapter 7 <b>[APP-039]</b> have not changed as a result of full and final reporting on the evaluation trenching. The assessment of archaeological potential has been suitably assessed based on the available data and professional judgement to characterise the archaeological baseline.</p> <p>Details of additional evaluation (including geophysical and trenching), if required, will be included within the forthcoming Detailed Archaeological Mitigation Strategy (DAMS) which will be submitted at a future examination deadline.</p>
Q1.4.7	The Applicant	<b>Archaeological surveys</b>	As noted in ES chapter 7 <b>[APP-039]</b> paragraph 7.2.5, it was intended that the assessment also included the transaction and analysis of oblique and vertical

ExQ1	Respondent	Question	Applicant's Response
		Air photos were not submitted as part of the EIA. Is work ongoing to obtain these?	aerial photographs from the Historic England Archive (as part of a LiDAR and aerial photograph transcription study); however, the archive closure due to Covid-19 lockdown restrictions (and subsequent delays in access) has prevented this aspect of the survey being completed. Following consultation with Cambridge County Council (CCC) and Suffolk County Council Archaeological Services (SCCAS), it was agreed that the aerial photograph aspect of the interpretation works would not need to be submitted as part of this assessment.
Q1.4.8	The Applicant	<b>Archaeological surveys</b>  Certain areas were not physically surveyed due to ground conditions and the presence of livestock. What are your plans to complete or compensate for this?	The approach to areas that were not evaluated by geophysical survey and/or trial trenching due to access restrictions is to be defined in the Detailed Archaeological Mitigation Strategy, which is to be prepared in accordance with a joint LPA brief prepared by the Cambridge County Council (CCC) and Suffolk County Council Archaeological Services (SCCAS).
Q1.4.9	The Applicant	<b>Archaeological surveys</b>  ES chapter 7 [APP-039] paragraph 7.6.5 notes that flexibility is requested within the scheme if additional heritage assets are encountered during trial trenching or construction works.  Please confirm how the scheme design would be adapted should trial trenching or archaeological work during construction indicate that further areas require protection or exclusion from development.	The methodology for Archaeological Mitigation will be provided in a detailed Archaeological Mitigation Strategy (DAMS) in accordance with a brief prepared by the Historic Environment teams of the joint Local Planning Authorities for Cambridge County Council (CCC) and Suffolk County Council Archaeological Services (SCCAS). The DAMS will include details on contingencies for unforeseen findings during fieldwork and will be submitted to the Examination in due course.
Q1.4.10	The Applicant	<b>Areas of archaeological potential</b>  The scheme description [APP-035] indicates that power cables may need to be installed within areas identified for Stone Curlew mitigation that have also been	Work No. 4 (the installation of cables) is not covered by Requirement 10 of the Draft DCO [APP-019], which imposes the restriction of other aspects of development not being able to take place until the Stone Curlew offsetting area is in place. This is because, as a necessity, the cable works will need to take place before the compensation area is created, to avoid disturbing it once it is created.

ExQ1	Respondent	Question	Applicant's Response
		<p>excluded from development due to their high archaeological potential.</p> <p>Please confirm whether excavation is required in these areas and how both aims (protecting sites of high archaeological potential and providing stone curlew mitigation habitat) are compatible with the installation of power cables.</p>	<p>Any activities associated with Works No. 4 will be subject to the restrictions set out in the OCEMP, avoiding disturbance to nearby breeding Stone Curlew.</p> <p>As such, any archaeological works that need to be undertaken prior to the cable works taking place will take place before the Stone Curlew works are undertaken; and will take place in accordance with the Detailed Archaeological Mitigation Strategy.</p> <p>The Stone Curlew habitat creation will not impact on archaeology because there will be no below ground impact on potential archaeological horizons in the ecological protection areas.</p>
Q1.4.11	The Applicant	<p><b>Archaeological potential of cable corridors</b></p> <p>No reference is made within the ES chapter 7 [APP-039] or appendices to archaeological assessments being completed for the cable route corridor.</p> <p>Please explain how a mitigation strategy for this area will be developed and submitted to the examination.</p>	<p>The cable route corridor has been subject to desk based assessment (Appendix 7E Burwell Substation Extension and Cable Route Archaeological <b>[APP-061]</b>) and Geophysical Survey (Appendix 7G Cable Route Geophysical Survey Report <b>[APP-073]</b>). A Detailed Archaeological Mitigation Strategy (DAMS), in accordance with a brief currently being prepared by the joint local Authority Historic Environment teams for Cambridge County Council (CCC) and Suffolk County Council Archaeological Services (SCCAS), will include a methodology for mitigation of archaeological impact within the cable route corridor. It is accepted that selected areas of the cable route where access has not been possible and the geophysical survey has indicated potential archaeological remains may require limited trial trench evaluation to confirm a mitigation strategy. The evaluation and mitigation fieldwork will be subject to Council agreement of Site Specific Written Schemes of Investigation (SSWSI) which will be in accordance with the DAMS as required.</p>
Q1.4.12	The Applicant	<p><b>Archaeological mitigation</b></p> <p>In Relevant Representations [RR-1178, RR-1340], CCC and SCC note that the Applicant's mitigation strategy is not developed and will require further consultation with the Councils.</p> <p>In relation to the Detailed Archaeological Mitigation Strategy:</p>	<p>Further consultation with the Councils has been undertaken and a Detailed Archaeological Mitigation Strategy (DAMS) will be submitted as soon as possible, subject to timely receipt of a brief currently being prepared by the joint Local Authority Historic Environment teams for Cambridge County Council (CCC) and Suffolk County Council Archaeological Services (SCCAS). The DAMS will set out the principles of archaeological mitigation for the Scheme, including Post-excavation Assessment, Updated Project Design and Publication requirements. Additional Site-Specific Written Schemes of Investigation (SSWSI), e.g., for any further Trial Trench evaluation, may be submitted at subsequent deadlines and appended to the DAMS. The DAMS and all subsequent SSWSI will be</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"><li>Please confirm whether this will be submitted to the examination</li></ul> <p>Please confirm who will be responsible for implementing the strategy.</p>	implemented by the Applicant in accordance with a detailed programme agreed by the Councils and the Applicant.
Q1.4.13	Isleham Parish Council	Question not for Applicant.	
Q1.4.14	Suffolk County Council	Question not for Applicant.	

## 7 Topic 1.5 - Draft Development Consent Order (dDCO)

ExQ1	Respondent	Question	Applicant's Response
Q1.5.1	The Applicant	<b>General</b>  Please confirm that the submitted DCO: <ul style="list-style-type: none"><li>• has been drafted using the Statutory Instrument (SI) template and validated against it;</li><li>• follows guidance and best practice for SI drafting (for example avoiding “shall/should”) in accordance with the latest version of guidance from the Office of the Parliamentary Counsel; and</li><li>• follows best practice drafting guidance from the Planning Inspectorate and the Departments in Advice Note 15 – Drafting development consent orders.</li></ul>	<p>The Applicant confirms that the draft DCO submitted as part of the application has been drafted using the SI template and validated against it and follows guidance and best practice for SI drafting, including Advice Note 15. The Applicant does not intend to validate the updated DCO at each deadline prior to the final submission of the draft DCO, currently timetabled for Deadline 8. The SI Validation process is a requirement that ensures that statutory instruments are prepared in a form that is compatible with publication on the legislation.gov.uk. website and carrying out validation for the last submitted version of the DCO ensures that, should it be made by the Secretary of State, is suitable for online publication.</p> <p>There are limited instances where the use of “should” remains in the draft DCO and the Applicant considers these are appropriate in the context in which they are used.</p>
Q1.5.2	The Applicant	<b>General:</b>  Please confirm that, prior to submission of any amended version of the DCO during the Examination, you will have checked and updated all internal references and legislative footnotes as necessary.	This is confirmed.
Q1.5.3	The Applicant	<b>General:</b>  Table 1-1 of the Consents and Agreements Position Statement [APP-021] shows a summary of those consents and licences likely to be required in addition to the dDCO. Please ensure that it is kept up to date as the Examination progresses (showing tracked changes) and that a tracked	This is noted.

ExQ1	Respondent	Question	Applicant's Response
		changes and clean version is provided at the close of the Examination.	
Q1.5.4	The Applicant	<b>Art 2: Interpretation - drafting:</b> <ul style="list-style-type: none"> <li>• Should “electronic transmission” and “drainage strategy” be transposed so as to be in alphabetical order?</li> <li>• Should the words “the at” immediately before “Schedule 10” under “environmental statement” be deleted?</li> </ul>	This question is noted and these changes has been made in the updated version of the draft DCO submitted at Deadline 2.
Q1.5.5	The Applicant	<b>Art 2: Interpretation:</b> Should “commence” be “begin to carry out a material operation as defined in section 155 of the 2008 Act”?	Section 155 of the Planning Act 2008 does ultimately lead back to section 56(4) of the Town and Country Planning Act 1990, via the definition of “development”, which is why the definition has been drafted as it has. However, the Applicant is content to amend the definition of “commence” in the draft DCO to refer to section 155 of the PA 2008, in line with recently made energy DCOs.
Q1.5.6	The Applicant	<b>Art 2: Interpretation:</b> Should “framework construction travel plan” and “important hedgerows and tree preservation order plan” also be defined?	These terms do not need defining as they are not referred to in this DCO. With respect to the reference to a framework construction travel plan, the Applicant has responded to a related point at written question 1.5.77. With respect to hedgerows and TPO trees, please also see the response to written questions 1.5.45 and 1.5.46.
Q1.5.7	The Applicant	<b>Art 2: Interpretation:</b> Are the “framework” plans outline plans? eg outline access management plan, outline code of construction practice, outline construction traffic management plan, outline substation design principles statement (Burwell extension), outline pre-commencement archaeological investigation plan, outline PRoW strategy, outline travel plan, outline written scheme of investigation.	The Applicant confirms that the ‘framework’ plans are akin to outline plans. They are called framework plans as they set the framework for the development of the detailed plans if consent is granted.

ExQ1	Respondent	Question	Applicant's Response
Q1.5.8	The Applicant/the relevant planning authority	<p><b>Art 2: Interpretation:</b></p> <p>The definition of "maintain" includes "reconstruct" with no upper limit save that it does not include reconstruction of the whole of the authorised development.</p> <p>Are you satisfied that this definition of "maintain" is not too extensive and widely drawn?</p>	<p>A definition of "maintain" has been added to make clear what activities are authorised under Article 5 (power to maintain the authorised development) during the operation of the authorised development.</p> <p>The Applicant is satisfied that this definition of maintain is not too extensive and widely drawn. The definition has been drafted to directly reflect the nature and context of the authorised development, which will need to be properly maintained, managed and protected throughout its operational lifetime. The drafting, therefore, reflects this operational period and likely framework of maintenance that will be required while enabling technological and practice advancement and improvements within identified environmental performance standards.</p> <p>Paragraph 5.2.2(f)(ii) of the Explanatory Memorandum (APP-020) sets out examples of the activities anticipated to be covered, including works to 'reconstruct', where if, for example, part of the authorised development has to be dismantled in order to be repaired or refurbished, then this part will need to be reconstructed.</p> <p>Accordingly, the Applicant's view is that it would not be appropriate to set an upper limit on any works needed to reconstruct the authorised development, save for it doesn't include reconstruction of the whole authorised development, so that the Applicant can properly maintain the Scheme and it can continue to meet the identified need throughout its operational lifetime. In addition, Article 5 of the draft DCO only authorises maintenance to be carried out where there are no materially new or materially different environmental effects that have not been assessed in the environmental statement. Therefore, the definition of "maintain" already contains limits.</p> <p>The Applicant would note that the definition of "maintain" in the recently made Sizewell C (Nuclear Generating Station) Order 2022 goes wider than the proposed definition in the draft DCO – first it includes "clear" as one of the maintenance activities and secondly it does not include the restriction regarding the whole of the authorised development.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.9	The Applicant/the relevant planning authority	<p><b>Art 2: Interpretation:</b></p> <p>The definition of “permitted preliminary works” is extensive. Are you satisfied that</p> <ul style="list-style-type: none"> <li>• The resulting impacts are not included in the environmental impact assessment; and</li> <li>• This definition is not too widely drawn?</li> </ul>	<p>The Applicant has given careful consideration to the works comprised in the definition of “permitted preliminary works” and where in the draft DCO they would be able to be undertaken without restriction. With some exceptions (discussed below) the works identified as “permitted preliminary works” have been identified as such as the Applicant considered their environmental impact does not require the mitigation secured by the Requirements in Schedule 2 to be in place before those works can be undertaken.</p> <p>In the draft DCO (revision 1), the Applicant has expressly identified those permitted preliminary works where it considers it would be appropriate to restrict by including them in the term “commence” for the purposes of the relevant requirement. This can be seen with Requirement 11 (<i>Fencing and other means of enclosure</i>) and Requirement 18 (<i>Ground conditions</i>). That is because some aspects of the permitted preliminary works (for example, assessing ground conditions and means of enclosure) may be required to be subject to the detail or measures approved pursuant to these requirements.</p> <p>Further to the Hearing on the draft DCO, the Applicant has made the following changes:</p> <ol style="list-style-type: none"> <li>1. Requirement 8 (<i>Landscape and ecology management plan</i>) – site clearance relating to vegetation removal of permitted preliminary works has been included in the remit of the Requirement;</li> <li>2. Requirement 13 (<i>Archaeology</i>) – intrusive archaeological surveys of permitted preliminary works has been included in the remit of the Requirement;</li> <li>3. Requirement 14 (<i>Construction environmental management plan</i>) – above ground site preparation for temporary facilities and site clearance of permitted preliminary works have been included in the remit of the Requirement;</li> <li>4. An additional traffic management plan for permitted preliminary works has been included as a Requirement.</li> </ol> <p>Requirement 8 (<i>Landscape and ecology management plan</i>) excludes permitted preliminary works from the commencement requirement. This is because such</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>works would not result in likely significant environmental effects requiring management or mitigation (of the type secured in the management plan) to be in place before they are carried out.</p> <p>With the above changes, the Applicant considers that it has resolved the concerns of the local authorities.</p>
Q1.5.10	The Applicant	<p><b>Art 2: Interpretation:</b></p> <p>Are you satisfied that the definition of "statutory undertaker" includes all statutory undertakers defined in s138 PA2008?</p>	<p>As noted in the response to question 1.3.13, the Applicant is content that the definition in Article 2(1) for the term "statutory undertaker" is correct and requires no further amendment, notwithstanding that sections 127 and 138 of the Planning Act 2008 adopt definitions that are drawn in different terms.</p> <p>The Applicant notes that the Infrastructure Planning (Model Provisions) (England and Wales) Order 2009 adopted the formulation that refers to the definition of statutory undertaker contained in section 127 of the Planning Act 2008, a precedent that has been followed in the vast majority of development consent orders made to date including, for example, the East Anglia ONE North Offshore Wind Farm Order 2022 and the Riverside Energy Park Order 2020.</p>
Q1.5.11	The Applicant	<p><b>Art 2: Interpretation:</b></p> <p>Please explain the definition of "Work No 5A land" and "Work No 5B land" with reference to sheet 20 of the Land and Crown land plan [AS-003].</p>	<p>Work No 5 in Schedule 1 of the draft DCO submitted on 18 November 2022 (APP-019) set out the works in connection with an extension to the Existing Substation for the connection into the grid. This included two options for extending the Existing Substation, being "Work No. 5A" on the 'Work No. 5A land' and "Work No. 5B" on the "Work No. 5B land".</p> <p>"Work No. 5A land" was shown as plots 20-10, 20-12 and 20-20 in the land and Crown land plans (APP-006) and the Book of Reference (APP-024) submitted as part of the DCO application on 18 November 2022. The Change Request application on 30 August 2022 included an updated draft DCO (AS-293) which removed "Work No. 5A" and the "Work No. 5A land" from the DCO as this option is no longer being progressed.</p> <p>The draft DCO submitted with the application (APP-019) incorrectly defined the "Work No. 5B land" as being shown on the land and Crown land plans and described in the Book of Reference as plot 20-03. This was corrected in the draft DCO submitted as part of the Change Request on 30 August 2022 (AS-293) as plots 20-11 and 20-12 shown on the land and Crown land plans and described in</p>

ExQ1	Respondent	Question	Applicant's Response
			the Book of Reference. This change has also been retained in the latest version of the DCO submitted at Deadline 2.
Q1.5.12	The Applicant	<p><b>Art 3: Development consent etc. granted by this Order:</b></p> <p>Should the words “detailed in Schedule 2” be added following the word “requirements” in line 1 to make it clear that all requirements are detailed in Schedule 2 and that this article gives effect to Schedule 2: Requirements?</p>	The Applicant has made this change in the latest version of the draft DCO submitted at Deadline 2.
Q1.5.13	The Applicant	<p><b>Art 3: Development consent etc. granted by this Order:</b></p> <p>Paragraph 5.2.7 of the EM [AS-294] refers to Article 3(2) re <i>“reducing the risk that the authorised development as approved cannot later be implemented for reasons which, at the time the Application was made and the development consent was granted, could not reasonably have been foreseen”</i>.</p> <p>Article 3(2) simply requires that <i>“Each numbered work must be situated within the corresponding numbered area shown on the works plans and within the limits of deviation.”</i></p> <ul style="list-style-type: none"> <li>• Please explain <ul style="list-style-type: none"> <li>◦ why Article 3(2) is necessary and proportionate, and</li> <li>◦ how it ensures that the worst case has been assessed in the EIA</li> </ul> </li> </ul>	<p>The purpose of Article 3(2) is to provide a necessary, but proportionate, degree of flexibility for the detailed design and construction of the Scheme, within set limits.</p> <p>The limits of deviation and parameters referred to in Article 3(2) are appropriate as they serve to precisely define the extent of development authorised by reference to the Works Plans, while preserving a reasonable level of flexibility in the implementation of the authorised development. Such flexibility is necessary to allow for potential variances in ground conditions and/or choice of appropriate equipment and technology at the time of construction. It is noted that in addition to Article 3(2), the authorised development and its impacts are also controlled via the Design Principles and various management plans and mitigation measures secured via the requirements in Schedule 2 to the draft DCO.</p> <p>The Environmental Statement accompanying the application for development consent has assessed the authorised development within the full envelope provided by the limits of deviation. In other words, the maximum size and scale possible for all scheme components have been assessed, providing for a worst-case scenario in terms of potential effects that exceed the worst-case scenario in the Environmental Statement.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.14	The Applicant	<p><b>Art 6: Disapplication of legislation - EM drafting:</b></p> <p>In the EM [AS-294]:</p> <ul style="list-style-type: none"> <li>• Paragraph 5.2.12 a refers to section 23 of the Land Drainage Act 1991: in line 2 should "with" read "without"? and</li> <li>• In line 9 of paragraph 5.2.12 f should "Articles 27 and 89" read "Articles 27 and 28" as in line 2?</li> </ul>	<p>The Applicant confirms that these changes have been made in the latest version of the Explanatory Memorandum.</p>
Q1.5.15	The Applicant	<p><b>Art 6: Disapplication of legislation:</b></p> <p>Art 6 would disapply provisions of the Neighbourhood Planning Act 2017 (the NPA) relating to the TP of land. There are elements of the NPA regime that are fixed by the statute itself, for example a notice period before possession is taken and a requirement for notices to identify the period of TP. We note from paragraph 5.2.12 f of the EM [APP-020] that "at present the reforms to the temporary possession regime contained in the Neighbourhood Planning Act 2017 have not yet .... commenced". Please</p> <ul style="list-style-type: none"> <li>• explain why such elements are not relevant to this application; and</li> <li>• give an update on the current position in respect of the relevant regulations.</li> </ul>	<p>The Applicant's rationale for disapplying the relevant provisions of the NPA 2017 is that the regulations required to provide more detail on the operation of the regime have not yet been consulted upon, let alone made. This creates uncertainty for the Applicant, and indeed affected persons, as to the legal regime that would apply should the development consent order be granted. For example, whilst the notice period is set out in section 20(3) of the Neighbourhood Planning Act 2017, it is not yet known whether this particular provision will apply to DCOs or whether there will be any transitional arrangements.</p> <p>As such, it is considered appropriate to apply the 'tried and tested' temporary possession regime which has been included in numerous DCOs and Orders made under the Transport and Works Act 1992 to date and to ensure that this endures throughout construction of the Scheme. The Applicant's approach here is not novel and is consistent with other DCOs made since the NPA 2017 came into force.</p> <p>A similar provision was included, for the reasons outlined above, in the Cleve Hill Solar Park Order 2020 (see Article 6), Silvertown Tunnel Order 2018 (see Article 3(1)(p)), the Eggborough Gas Fired Generating Station Order 2018 (see Article 26(12)), the A19/A184 Testo's Junction Alteration Development Consent Order 2018 (see Article 2(7)), the Port of Tilbury (Expansion) Order 2019 (Article 3(g)), the Millbrook Gas Fired Generating Station Order 2019 (see Article 27(13) and Article 28(12)).</p> <p><b>Notice period</b></p>

ExQ1	Respondent	Question	Applicant's Response
			<p>The 14-day minimum notice period is sufficient and appropriate to the Scheme and would ensure that the construction programme would not be threatened, which might occur if the Applicant is required to give the three months' notice envisaged by Chapter 1 of Part 2 of the NPA 2017. Article 6(1)(g) of the draft DCO protects the Scheme from this disruption.</p> <p>If the Applicant is required to give three months' notice it would reduce the Applicant's flexibility in how to exercise the temporary possession power. An unintended consequence of this is that it may need to make decisions on when it requires land on a precautionary basis to avoid programme disruption, leading to land being possessed temporarily earlier than would otherwise be the case which would be to the detriment of affected persons through the unnecessary disruption and to the Applicant through being required to compensate the affected persons for the loss or damage occasioned by the additional disruption.</p> <p><b>Duration of period of temporary possession</b></p> <p>The Applicant considers that the duration of the period of temporary possession is reasonable, necessary and proportionate.</p> <p>The justification for the temporary possession power is that the land is needed for the construction of the Scheme and, without its use, the Scheme and the public benefits it offers, would not be able to be delivered. It is also justified in respect of other land where a need for a greater interference such as outright acquisition or the acquisition of rights, has been justified, as temporary possession would be a lesser interference and the power would allow a more proportionate exercise of those greater powers. In either case, the underlying driver is that the land is required to construct the Scheme.</p> <p>The drafting in article 27 is carefully crafted to align the need for the temporary use of the land, with the duration of the temporary possession. So long as the land is needed for the construction of the Scheme, the Applicant is justified in taking temporary possession of the land. Once that need has been satisfied the Applicant is afforded a reasonable period to restore the land and return it, in accordance with article 27(4) and (5). When it no longer needs the land, the Applicant would not be justified to possess it. This is also reflected in the drafting</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>of article 28 in relation to temporary possession for the purposes of maintaining the authorised development.</p> <p>The Applicant is of the firm view that it would be unreasonable to impose a finite maximum duration of the period of temporary possession. A duration limit, by its nature, would give rise to a risk of land still being required for the construction of the Scheme beyond the duration limit, because of circumstances beyond the Applicant's control. This would risk the delivery of the Scheme and its wider public benefits. To avoid this risk the duration would likely be set very conservatively, which calls into question whether the imposition of the limit would achieve its objective of providing certainty to the affected person.</p> <p>The Applicant considers that its approach, of aligning the need for the land with the duration of temporary possession, is reasonable, proportionate, and necessary to secure the delivery of the public benefits of the Scheme.</p> <p><b>Counter Notice</b></p> <p>The Applicant considers that the provision of some form of counter-notice procedure in a similar vein as that set out in the provisions of the NPA 2017 (which are not in force) would be of no practical benefit to any party and it is not clear that such a provision would be within the vires of what a development consent order may authorise.</p> <p>There are two main circumstances in which the temporary possession power may be exercised: (i) in relation to the land which is required only temporarily (shown in green on the updated land and Crown land plans (AS-281)); or (ii) in relation to other land (shown in pink) prior to its acquisition, or the land shown in blue, in relation to the acquisition of rights on the land and Crown land plans).</p> <p>In relation to the first category (temporary possession only) the Applicant is clear that it cannot meet the tests for compulsory acquisition set out in section 122 of the Planning Act 2008 because its requirement is only to use the land temporarily during construction. As such, it is not clear that a provision in a DCO that would authorise compulsory acquisition of such land, through a counter-notice provision, would meet the tests in section 122(2) and (3) of the PA 2008.</p> <p>In relation to the second category of land (where temporary possession is required in advance of the acquisition of the land or rights required for the</p>

ExQ1	Respondent	Question	Applicant's Response
			Scheme), a counter notice provision would serve no purpose. The Applicant is seeking to obtain the land and rights required for the Scheme through negotiations with landowners with the exercise of compulsory powers being the last resort. If a landowner wished to transfer the land, or rights required, to the Applicant at an earlier stage, the Applicant would have no reason not to do so; early purchase would avoid the Applicant having to pay compensation both for the period of temporary possession and then for the acquisition of the land or rights over land.
Q1.5.16	Various	Question not for Applicant.	
Q1.5.17	The relevant planning authority	Question not for Applicant.	
Q1.5.18	The Applicant	<p><b>Art 10: Construction and maintenance of altered streets:</b>            Paragraph 5.3.3 of the EM [AS-294] refers to an “appropriate standard”.            Does this mean to the reasonable satisfaction of the highway authority?</p>	<p>The Applicant confirms that, in relation to permanent alterations to streets specified in Part 1 of Schedule 5 of the draft DCO, an “appropriate standard” means to the reasonable satisfaction of the highway authority, as set out in paragraph (1) of Article 10.</p> <p>Paragraph 5.5.3 of the EM [AS-294] uses “appropriate standard” as a general term rather than referring to a specific standard, as Article 10 relates to both permanent and temporary alterations to streets and applies a different standard to each based on the relevant authority. Paragraph (2) of Article 10, which relates to temporary alterations to streets specified in Part 2 of Schedule 5, provides that such works must be completed “to the reasonable satisfaction of the street authority”.</p>
Q1.5.19	The relevant highway authority	Question not for Applicant.	
Q1.5.20	The Applicant	<p><b>Art 11: Temporary stopping up of public rights of way:</b></p> <ul style="list-style-type: none"> <li>• Please confirm that there are no public rights of way which are to be stopped up permanently.</li> </ul>	Article 11 ( <i>Temporary stopping up of public rights of way</i> ) provides for the temporary stopping up of public rights of way for the purpose of constructing or maintaining the authorised development. The Applicant confirms that there are no public rights of way that are to be stopped up permanently under Article 11, or any other provision in the Order.

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>Article 11(5) refers to private rights of way. Please detail all those private rights affected by your proposals.</li> </ul>	<p>Article 11(5) provides that compensation is payable in respect of the loss from the suspension of any private rights of way as a result of the exercise of the power conferred by article 11. The Applicant is not aware of any particular private rights of access over a public right of way that would be suspended as a result of the exercise of the powers conferred by this article. Paragraph (6) is included as a contingency to make provision for compensation should such a circumstance arise.</p> <p>While it is unusual for a property to enjoy a private right of access over a public right of way, it can occasionally arise in rural areas. The inclusion of this paragraph (5) ensures that such persons are appropriately compensated if that were to occur.</p>
Q1.5.21	The relevant street authority	Question not for Applicant.	
Q1.5.22	The relevant highway authority	Question not for Applicant.	
Q1.5.23	The Applicant	<p><b>Art 12: Access to works:</b> There does not appear to be a subclause covering deemed consent if the LPA does not respond within 28 days. Are you content?</p>	<p>Article 12 is captured by Schedule 13 of the draft DCO, in accordance with Article 42(2):</p> <ul style="list-style-type: none"> <li>Article 42(2) of the draft DCO provides that Schedule 13 has effect in relation to all consents, agreements or approvals granted, refused or withheld in relation to any provision of the draft DCO, except in relation to any consents, agreements or approvals contemplated by Schedule 12 (protective provisions) or any dispute under Article 16(6) (protective work to buildings).</li> <li>Schedule 13, paragraph 2(1) provides that, where an application is made to a "relevant authority" for any consent, agreement or approval contemplated by any of the provisions of the draft DCO, the relevant authority must give notice of their decision within 28 days (except in respect of the requirements in Schedule 2, where the period is eight weeks). Note that in the draft DCO submitted at Deadline 2, this period of</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>28 days has been extended to 56 days which aligns with the recently made Sizewell C (Nuclear Generating Station) Order 2022.</p> <ul style="list-style-type: none"> <li>Under Schedule 13, paragraph 2(3) (subject to paragraph 2(4)), if the relevant authority does not determine the application within the prescribed period, they are deemed to have granted the application.</li> </ul> <p>The “relevant planning authority” referred to in Article 12(3) of the draft DCO falls within the definition of “relevant authority” for the purposes of Schedule 13. This means that, in accordance with paragraph 2(3) of Schedule 13, if the relevant planning authority does not provide its approval for the means of access or improvement to existing means of access within 28 days, they are deemed to have provided that approval.</p>
Q1.5.24	The relevant highway authority	Question not for Applicant.	
Q1.5.25	The Applicant	<p><b>Art 14: Discharge of water:</b>            There appears to be no deemed consent if a person who receives an application for consent or approval under this article fails to notify the undertaker within 28 days.            Are you content with this position?</p>	<p>The Applicant's position is the same as that relating to Article 12 of the draft DCO, which is set out in the response to Q1.5.23 above. For further clarity, the Applicant has amended the definition of “relevant authority” in Schedule 13 to read: “means any <u>person, authority or body named in any of the provisions of this Order and whose consent, agreement or approval is sought</u>”.</p>
Q1.5.26	The Swaffham Internal Drainage Board	Question not for Applicant.	
Q1.5.27	The Applicant	<p><b>Art 17: Authority to survey and investigate the land:</b>            Are you satisfied that the current drafting           <ul style="list-style-type: none"> <li>of Art 17(1)(c) does not include trial trenching? (suggest drafting per EAs?)</li> </ul> </p>	<p>Article 17 is a model provision that enables the undertaker to enter onto any land within the Order Limits or which may be affected by the authorised development for the purpose of carrying out monitoring or surveys, including bringing equipment onto the land and making trial holes. The power is subject to a number of conditions, and is essential to implementation of the authorised development, for example in verifying ground conditions or the presence of statutory undertakers' apparatus. The model provision has been modified so that no trial</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• of Art 17(1)(d) does not include any welfare facilities which may be necessary?</li> <li>• of Art 17(4) does not include for such consent not to be unreasonably withheld?</li> </ul>	<p>holes are to be made: in land located within the highway boundary without the consent of the highway authority; or in a private street without the consent of the street authority.</p> <p>Taking each of these points in turn:</p> <ul style="list-style-type: none"> <li>• The Applicant considers that the current drafting of Article 17(1)(c) is sufficiently broad to allow for trial trenching, but out of an abundance of caution agrees to adopt the following drafting: "<i>without prejudice to the generality of sub-paragraph (a), carry out ecological or archaeological investigations on such land including making trial holes and trial trenches in such positions on the land as the undertaker thinks fit to carry out archaeological and site investigations</i>"</li> <li>• Welfare facilities may be required when carrying out surveys in accordance with Article 17. The Applicant considers that the current drafting of Article 17(1)(d) is sufficiently broad to provide for welfare facilities, but out of an abundance of caution agrees to adopt similar drafting to that used in Article 17(1)(e) of the East Anglia TWO Offshore Wind Farm Order 2022, as follows: "<i>place on, leave on and remove from the land apparatus and welfare facilities for use in connection with the survey and investigation of land, environmental monitoring and making of trial holes and trial trenches.</i>"</li> <li>• The Applicant is satisfied that Article 17(4) provides for the consent of the highway authority or street authority to not be unreasonably withheld. Where such consent is required, the provisions of Article 42 apply, which provides that consent is not to be unreasonably withheld or delayed. Article 42 also applies Schedule 13 to the provision of consent under Article 17(4), which provides for a period of, as amended at this Deadline, 56 days for the relevant authority to make a decision and, if no decision is made, consent is deemed to have been given.</li> </ul>
Q1.5.28	The Applicant	<p>Art 18: Compulsory acquisition of land:</p> <ul style="list-style-type: none"> <li>• Please explain the need for 18(1)(b) and in particular the need for "Or for any other purposes"; and</li> </ul>	<p>The Applicant has amended Article 18 in the draft DCO to remove Article 18(1)(b). The amended drafting is consistent with model provisions and section 122 of the Planning Act 2008, which is the enabling power for this article.</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>Please explain what is meant by "ancillary".</li> </ul>	
Q1.5.29	Statutory undertakers	Question not for Applicant.	
Q1.5.30	The Applicant	<p><b>Art 21: Private rights:</b>            Subsection (2) makes reference to Article 20 (compulsory acquisition of rights).</p> <ul style="list-style-type: none"> <li>Should subsection (1) make reference to Article 18 (compulsory acquisition of land) in a similar manner?</li> <li>Under what circumstances would subsection 2(c) be invoked? Please explain why it is needed.</li> </ul>	<p>The Applicant does not consider it necessary to amend article 21(1) to make reference to article 18 (compulsory acquisition of land). If a reference to article 18 (compulsory acquisition of land) was to be included in article 21(1) it would introduce an ambiguity where currently there is none. The ambiguity would arise because of the way the compulsory acquisition and temporary possession powers in the DCO are structured. Article 18 starts from the position that the undertaker may acquire all of the Order land, but, in the case of the land shown in blue on the land and Crown land plans [AS-253] article 20(2) then limits that power to the acquisition of the rights over the land described in Schedule 2. Similarly, the power to acquire land in article 18 is then ousted in relation to the land shown in green on the land and Crown land plans to a power of temporary possession by virtue of article 27(6).</p> <p>If a reference to article 18 was introduced to paragraph (1) of article 21, there is a risk that article 21(1) could be construed as applying to all of the Order land (by disregarding the constraint in article 20(2)) rather than just the land to be acquired. This risks the unintended consequence of extinguishing all rights in such land, rather than only rights that are inconsistent with the exercise of the rights acquired through article 20.</p> <p>On the basis that the drafting in article 21(1) is clear and unambiguous, doesn't give rise to this potential unintended consequence, and that any alternative drafting solutions are likely to introduce further unnecessary complexity; the Applicant is content with the drafting of article 21(1) as it stands.</p> <p>In relation to article 21(2)(c) the Applicant has deleted this provision in the version of the DCO submitted at Deadline 2.</p>
Q1.5.31	Statutory undertakers	Question not for Applicant.	

ExQ1	Respondent	Question	Applicant's Response
Q1.5.32	The Applicant	<b>Art 22: Application of the 1981 Act: drafting:</b> In line 3 of Art 22(6), should the word "section" be added immediately before "5A"?	The Applicant confirms the word "section" should be added immediately before "5A" in line 3 of article 22(6) of the draft DCO.
Q1.5.33	The Applicant	<b>Art 23: Acquisition of subsoil only:</b> Paragraph 5.5.13 of the EM (APP-020) says that Article 23 is sufficient for cables and pipes and is intended to enable you to minimise the extent of interest to be acquired. With reference to Article 2, paragraph 5.2.3 of the EM refers to both subsoil and airspace rights. Should this article also apply to airspace? If not please explain why.	Article 2(2) relates to interpretation of the Order where "rights over land" are referred to and is relevant for example to Articles 20 and 21 with respect to the general powers to acquire rights "over land". Article 23 is specifically relevant to acquisition of the subsoil, where subsoil only may be acquired rather than the full freehold interest, thereby minimising the extent of interests required. Article 23 does not need to include reference to the airspace as there are no instances where only rights in the airspace would be required without also obtaining surface rights or land. Given the specific circumstances in which Article 23 would apply, and that it does not refer generally to "rights over land", Article 2(2) is not directly relevant in terms of how that term is interpreted.
Q1.5.34	The Applicant	<b>Art 24: Power to override easements and other rights:</b> In paragraph 5.5.16 of the EM [AS-294] you say that this article " <i>is considered necessary and expedient to give full effect to development consent under Article 3</i> ". Please explain why.	Paragraph 5.5.16 uses the phrase " <i>is considered necessary and expedient to give full effect to the development consent under Article 3</i> " as shorthand to refer to all of the activities authorised by the draft DCO and which are required to construct, operate and decommission the authorised development. Article 24 plays a key role in facilitating the powers under the Order that authorise the entry onto land but which stop short of acquisition or of dispossessing the owner of that land (such as where temporary possession is taken under article 27), such as the power to carry out surveys and carry out protective works to buildings under articles 16 and 17 respectively. Article 24 ensure that any existing rights on such land are overridden in respect of the authorised activity, and that compensation is payable accordingly.
Q1.5.35	The Applicant	<b>Art 25: Modification of Part 1 of the Compulsory Purchase Act 1965</b> (see Article 22 question above) Art 25(2) seeks to modify section 4A(1) (extension of time limit during challenge) in respect of section 23 of the Acquisition of	Section 4 of the Compulsory Purchase Act 1965 does not need to be disapplied by the Order, as it is already disapplied by virtue of section 125(3) of the Planning Act 2008. Section 125(3) provides that Part 1 of the Compulsory Purchase Act 1965 applies to the compulsory acquisition of land under a development consent order, with the omission of sections 4 and 10.

ExQ1	Respondent	Question	Applicant's Response
		<p>Land Act 1981 and Art 25(4) seeks to modify section 22(2). However, there appears to be no proposal to modify section 4 (time limit for giving notice to treat) which appears to be inconsistent with the time limit in Article 19.</p> <p>Should section 4 be disapplied?</p>	
Q1.5.36	The Applicant	<p><b>Art 26: Rights under or over streets:</b> Please explain what is meant by "ancillary" in Art 26(1).</p>	<p>Article 26 (<i>Rights under or over streets</i>) is a model provision that has been included in the majority of made DCOs to date which enables the undertaker to enter on and appropriate interests within streets where required for the purpose of the authorised development, or any other purpose ancillary to it, without being required to acquire that land. Section 120(3) of the Planning Act 2008 permits the inclusion within a development consent order of a "provision relating to, or to matters ancillary to, the development for which development consent is granted" (i.e. the authorised development).</p> <p>The term "ancillary" should be given its ordinary meaning, which in this context means the powers are available to the undertaker for purposes that support the authorised development. This drafting is considered necessary to ensure some flexibility in the use of the power, to in turn ensure the authorised development can be delivered.</p>
Q1.5.37	The Applicant	<p><b>Art 27: Temporary use of land for constructing the authorised development</b></p> <ul style="list-style-type: none"> <li>Notwithstanding the definition of Order land, should there be a schedule listing land of which temporary possession may be taken, with reference made under subsection (1) to the land specified in column (X) of that Schedule for the purpose specified in relation to that land in column (Y) of that Schedule? (cf Schedule 9 in the EAs)</li> </ul>	<p>Article 27 (Temporary use of land for constructing the authorised development) enables the undertaker to enter onto and take temporary possession of any of the Order Land, where no notice of entry has been served or general vesting declaration has been made. The model provision has been adapted to reflect the requirements of this Scheme, but it has precedent in a number of made DCOs, including the Millbrook Gas Fired Generating Station Order 2019 and Cleve Hill Solar Park Order 2020.</p> <p>The Applicant understands the reference in the question to "(cf Schedule 9 in the EAs)" to be a reference to Schedule 9 of the East Anglia ONE North Offshore Wind Farm Order 2022.</p> <p>Taking each of these points in turn:</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• If so, would that Schedule be cited in subsections (1) and (4)?</li> <li>• In 27(1)(b) does the term “temporary works” include temporary means of access? (cf EAs)</li> <li>• Subsection 27(4) – notice or declaration? In what circumstances would each be used?</li> <li>• Subsection 27(5) - should the undertaker be required to remove all works and restore the land in any event? Why the exclusions?</li> </ul>	<ul style="list-style-type: none"> <li>• All of the information that would be contained in such a Schedule is already contained in article 27(1)(a)(i). The East Anglia ONE North Offshore Wind Farm Order 2022 authorises temporary possession over a significant number of plots such that it is appropriate to list those in Schedule. A Schedule listing land of which temporary possession may be taken is not needed as part of this DCO as the Applicant is seeking powers of temporary possession <i>only</i> over just one plot of land within the Order limits. This plot has been listed in Article 27 of the DCO submitted as part of the Change Request (AS-293) and shown coloured green on sheet 21 of the land and Crown land plans (AS-281) and labelled plot 21-04 and described in the book of reference (AS-296).</li> <li>• As noted above, a separate Schedule is not required as powers of temporary possession only are being sought over just one plot of land.</li> <li>• The Applicant confirms that constructing temporary works has its ordinary natural meaning which could include temporary accesses. It should be noted that the power to form accesses is limited by the extent of the power conferred by Article 12 (Access to works) to form new or to improve existing means of accesses for the purposes of the authorised development, as set out in Schedule 7 to the Order.</li> <li>• Whether a notice of entry will be served or a general vesting declaration made will depend on which legislative route Sunnica uses to actually implement its compulsory acquisition powers and the circumstances that prevailed at the time, should it be necessary to exercise powers of compulsory acquisition. There are two ways in which such an authorisation can be implemented, either through the service of notice to treat and notice of entry under sections 5 and 11 of the Compulsory Purchase Act 1965, or by making a general vesting declaration in accordance with the provisions of the Compulsory Purchase (Vesting Declarations) Act 1981. Please see the response to question 1.3.19 for further information.</li> <li>• Article 27(5) sets out specific operations that are not required to be removed that are specific to the authorised development and are necessary for the Scheme. This is because the specific operations set out in Article 27(5) relate to the site clearance, temporary working sites and</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			accesses and mitigation works specifically listed in Article 27(1)(a) to (e) that the Applicant would be allowed to deliver following taking possession of the Order land. It would therefore defeat the purpose of being able to take temporary possession of the Order land under Article 27(1) if the Applicant was then required to remove those works at the end of the temporary possession period. To the extent that the removal of such temporary works is required, its removal is secured through other means. For example, in relation to the removal of accesses required for construction only, the Framework Construction Traffic Management Plan and Travel Plan (AS-278) compliance with which is secured by requirement 16, provides for their removal (see for example paragraph 5.3.4 of that document).
Q1.5.38	The Applicant	<b>Art 29: Statutory undertakers</b> <ul style="list-style-type: none"> <li>• Should subsection (a) also refer to the book of reference?</li> <li>• Should the words “and described in the book of reference” be added immediately after “within the Order land”?</li> </ul>	The Applicant confirms that this change has been made in the updated DCO submitted at Deadline 2.
Q1.5.39	Statutory undertakers	Question not for Applicant.	
Q1.5.40	The Applicant	<b>Art 31: Recovery of costs of new connections - drafting:</b> In subsection 2(b) should “sewerage” read “sewage”?	The Applicant confirms that “sewerage” in the last line of article 3, paragraph (2) of the draft DCO should read “sewage”.
Q1.5.41	National Grid	Question not for Applicant.	
Q1.5.42	The Applicant	<b>Art 33: Consent to transfer the benefit of the Order:</b> <ul style="list-style-type: none"> <li>• Please explain why the SoS should be satisfied with the exception in subsection (3)(b).</li> </ul>	The Applicant's response to each of the points set out in the question is as follows: <ul style="list-style-type: none"> <li>• The Applicant agrees to remove the reference to a subsidiary or holding company from Article 33.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• Is the five working days' notice in subsection (6) adequate? Would 14 days be more helpful? and</li> <li>• Should the relevant planning authority also be notified in the same way if the transfer or grant relates to the exercise of powers in its area?</li> <li>• To effect these modifications, should the words "and, if such transfer or grant relates to the exercise of powers in its area, to the relevant planning authority at least 14 days" be inserted in subparagraph (4) immediately after the words "Secretary of State in writing"?</li> <li>• If so, can subsection 6 be deleted?</li> </ul>	<ul style="list-style-type: none"> <li>• The Applicant is comfortable amending the period in Article 33(6) to 14 days, in line with recently made energy DCOs.</li> <li>• The Applicant is comfortable with the addition of a requirement to notify the relevant planning authority in the same way as the SoS, if the transfer or grant relates to the exercise of powers in its area.</li> <li>• The Applicant agrees that Article 33 should be amended to reflect the above changes, but considers that the following amendments are appropriate, consistent with other recently granted energy DCOs:             <p><b>Consent to transfer the benefit of the Order</b></p> <p><b>33. [...]</b></p> <p><i>(4) Where the consent of the Secretary of State is not required, the undertaker must notify the Secretary of State and, if such transfer or grant relates to the exercise of powers in its area, to the relevant planning authority, in writing before transferring or granting a benefit referred to in paragraph (1).</i></p> <p>[...]</p> <p><i>(6) The date specified under paragraph 5(b) must not be earlier than the expiry of five fourteen working days from the date of the receipt of the notification.</i></p> </li> <li>• Per the above, the Applicant considers Article 33(6) should be retained as a separate paragraph. This approach is consistent with other recently granted energy DCOs, for example the Little Crow Solar Park Order 2022.</li> </ul>
Q1.5.43	The Applicant	<b>Art 36: Felling or lopping of trees and removal of hedgerows:</b> <ul style="list-style-type: none"> <li>• Is this article to be subject to Article 37?</li> <li>• If so, should the words "Subject to article 37 (trees subject to tree preservation orders)," be inserted at the start of subsection 36(1)?</li> </ul>	<p>The Applicant confirms that the suggested change has been made in the updated DCO submitted at Deadline 2 so that the words 'subject to Article 37 (trees subject to tree preservation orders)' are inserted at the start of Article 36.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.44	The Applicant	<p><b>Art 36: Felling or lopping of trees and removal of hedgerows:</b></p> <p>Subsection 36(1) states that "The undertaker may fell or lop any tree or shrub near any part of the authorised development, or cut back its roots"</p> <ul style="list-style-type: none"> <li>• Please explain what you mean by "near";</li> <li>• Given that you have a 100m wide strip of Order land within which to locate the cable route, please explain why such provision is necessary and whether it would extend outside the Order limits.</li> </ul>	<p>Article 36 is a model provision included in numerous made DCOs which provides that the undertaker may fell or lop or cut back the roots of any tree or shrub near any part of the authorised development in specific circumstances.</p> <p>Article 36(1) sets out the specific circumstances in which the Applicant is authorised to fell or lop any tree or shrub near any part of the authorised development, which is only to prevent it obstructing or interfering with the construction, maintenance or operation of the authorised development; constituting a danger for persons using the authorised development; or obstructing or interfering with the passage of construction vehicles.</p> <p>It is not possible at this stage to precisely define what 'near' means in the context of this Article, as flexibility is required in order to allow the detailed design to be completed within the limits of deviation for the Scheme. Near could mean outside of the Order limits, but any trees or shrub must be within the scope of this Article and the specific circumstances in sub-paragraph (1) in which this power can be exercised, meaning it can only be exercised where the Applicant reasonably believes it is necessary to prevent trees from interfering with the construction, maintenance or operation of the authorised development. The working width of the cable corridor is not 100m wide across the whole cable route. As noted in the Statement of Reasons (APP-022), the working width required for material laydown and construction equipment is expected to be 30m across the majority of the cable corridor; however, the working width increases to 50m and 100m along limited sections of the cable corridor where particular environmental and engineering constraints exist. This is required at specific pinch points to ensure that, if necessary, a complex engineering solution can be deployed. As confirmed above, the powers in Article 36 could extend beyond the Order limits, subject to the requirements of sub-paragraphs (1) and (2). The provision is necessary to ensure the delivery / construction, maintenance and operation of the cable route which may require lopping, felling or cutting back of roots outside the Order limits. Were the Article not to allow such actions "near to" the authorised development, an applicant would be required to artificially and potentially unnecessarily extend the Order limits to ensure, for example, access to the site was not obstructed by a tree or shrub.</p>
Q1.5.45	The Applicant	<p><b>Art 36: Felling or lopping of trees and removal of hedgerows:</b></p>	<p>The Applicant confirms that there no important hedgerows, as defined by the ecological criteria of the Hedgerow Regulations 1997, that would be affected by</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>Are there any important hedgerows affected by the authorised development?</li> <li>If so, how and where in the dDCO are they identified?</li> </ul>	<p>the Scheme. A single 'important' hedgerow is identified in the Terrestrial Habitats and Flora Report at Appendix 8C of the Environmental Statement (APP-079) as being present on the northern boundary of Sunnica West Site A, but this will not be impacted by the Scheme.</p> <p>There are also no historically or archaeologically important hedgerows identified in the Archaeological Desk Based Assessments Appendix 7C of the Environmental Statement (APP-059), Appendix 7D of the Environmental Statement APP-060) and Appendix 7E of the Environmental Statement (APP-061), as defined by the Hedgerow Regulations 1997 Schedule 1 part 2 Criteria for identifying Historic or Archaeologically Important Hedgerows.</p>
Q1.5.46	The Applicant	<b>Art 37: Trees subject to tree preservation orders:</b> <ul style="list-style-type: none"> <li>Are there any trees subject to tree preservation orders affected by the authorised development? If so, how and where in the dDCO are they identified?</li> </ul>	<p>The Applicant confirms that it will submit an arboricultural impact assessment at a future Deadline, which will build on the assessment set out in the Environmental Statement and explain the position as to whether trees subject to Tree Protection Orders are impacted by the authorised development. Subject to the output of this assessment, the Applicant will also consider if any additional measures are required to be added to the OLEMP and framework CEMP.</p> <p>Additionally, a plan (and accompanying DCO schedule) will be produced that will be referred to in article 37.</p>
Q1.5.47	The Applicant	<b>Art 37: Trees subject to tree preservation orders:</b> Subsection (3) refers to deemed consent. What written notice period do you propose to give?	Article 37(3) provides that the consent under paragraph 1 should be treated as deemed consent under the relevant Tree Preservation Order. It is not necessary to specify a written notice period as part of this Article in the DCO, as how the removal of trees subject to Tree Preservation Orders will be managed will be included in both the Construction Environmental Management Plan secured by Requirement 14 for the construction period, and the Landscape Environmental Management Plan secured by Requirement 8 following the removal of the vegetation. The Applicant has updated both Requirement 8 and Requirement 14 in the DCO submitted at Deadline 2 so that vegetation removal undertaken as part of permitted preliminary works is included within the scope of each requirement.
Q1.5.48	The Applicant	<b>Art 39: Arbitration:</b> <ul style="list-style-type: none"> <li>Please explain whether (and if so how) you have considered other</li> </ul>	<p>Taking each of these points in turn:</p> <ul style="list-style-type: none"> <li>Article 39 is an arbitration provision and is a departure from the model provisions. This drafting, and that in the associated Schedule 11, has</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<p>forms of alternative dispute resolution (ADR), such as statutory adjudication, and why there is no provision in the Order as it currently stands for other forms of ADR.</p> <ul style="list-style-type: none"> <li>• What happens if there is a difference with the SoS in the event that the parties cannot agree on a single arbitrator?</li> <li>• What happens if the SoS fails to make an appointment within 14 days of referral?</li> </ul>	<p>precedent in other recently granted energy DCOs, including the Millbrook Gas Fired Generating Station Order 2019 and the Cleve Hill Solar Park Order 2020. It is considered that this approach will provide greater certainty to all parties involved in the process and is to be preferred over the approach adopted in the model provisions. In the context of the pressing need for new power generation, particularly by renewable means, as identified in the relevant National Policy Statements, it is considered desirable that any disputes are resolved promptly to enable delivery of the authorised development in as timely a manner as possible.</p> <ul style="list-style-type: none"> <li>• The Applicant considers this situation is unlikely to arise under the draft DCO provisions. For this situation to occur, the SoS would have to refuse to appoint the arbitrator that one of the parties has applied to have appointed. Given past examples of SoS appointment decisions, this seems highly unlikely to occur. There is no evidence from previous DCOs to suggest that the SoS will not determine or appoint someone when required.</li> <li>• The only circumstances in which the SoS makes an appointment is where the parties have failed to agree on an arbitrator within the 14 day period. This means that the 14 day period applies to the parties' appointment of an arbitrator, rather than being the time within which the SoS is required to make an appointment. Where the SoS is required to make an appointment (ie where the parties cannot agree on an arbitrator), the Applicant considers it is unlikely that the SoS would fail to make an appointment within a reasonable timeframe, and the Applicant is not aware of a situation under any previously made DCOs that suggests that the SoS will not determine or appoint someone when required.</li> </ul>
Q1.5.49	The Applicant	<p><b>Art 41: Service of notices - drafting:</b> In subsection (1)(a) do you mean first class post?</p>	<p>The Applicant considers the drafting is appropriate as currently written in the draft DCO. This is consistent with the approach taken in other recently granted energy DCOs, including The Little Crow Solar Park Order 2022 (art 15, paragraph (1)(a)). It is also consistent with section 229(1)(c) of the Planning Act 2008, which states that notice can be served, given or supplied under the Act by sending it by post (without further defining that term or specifying what type of post).</p> <p>Service by post would be subject to section 7 (references to service by post) of the Interpretation Act 1978, which provides that where service by post is required,</p>

ExQ1	Respondent	Question	Applicant's Response						
			<p>the service is deemed to be effected by properly addressing, pre-paying and posting a letter. Again, there is no specific requirement in relation to first class post.</p>						
Q1.5.50	The Applicant	<p><b>Art 42: Procedure in relation to certain approvals etc:</b></p> <ul style="list-style-type: none"> <li>• Is the appeals procedure the same as in sections 78 and 79 of the Town and Country Planning Act 1990?</li> <li>• If not, how and why is it different?</li> </ul>	<p>Article 42(2) of the draft DCO provides that Schedule 13 has effect in relation to all consents, agreements or approvals granted, refused or withheld in relation to any provision of the draft DCO, except in relation to any consents, agreements or approvals contemplated by Schedule 12 or any dispute under Article 16(6).</p> <p>Schedule 13, paragraph 4 of the draft DCO sets out a bespoke appeal process to be followed in the event that the relevant authority refuses (including a deemed refusal pursuant to paragraph 2(4)) an application for any consent, agreement or approval, requests further information that the undertaker considers is not necessary.</p> <p>This process is similar to that provided for under sections 78 and 79 of the Town and Country Planning Act 1990, but with the following differences:</p> <table border="1" data-bbox="1073 790 2084 1406"> <thead> <tr> <th>Draft DCO, Sch 13, para 4(2)</th><th>Town and Country Planning Act 1990</th></tr> </thead> <tbody> <tr> <td>(a) appeal must be made within 42 days of the date of the notice of the decision or determination giving rise to the appeal.</td><td>s78(2) appeal must be made within such period prescribed by the development order or within such extended period as may at any time be agreed in writing between the applicant and the planning authority.  s78(3)(a) must give notice of appeal to SoS within eight weeks from the date of receipt of the decision, or such longer period as the SoS may, at any time, allow.</td></tr> <tr> <td>(b) appeal documentation must be submitted to SoS and provide copies to the relevant authority and any required consultee on the same day</td><td>s78(3)(a) must give notice of appeal to SoS by serving completed appeal form on SoS.</td></tr> </tbody> </table>	Draft DCO, Sch 13, para 4(2)	Town and Country Planning Act 1990	(a) appeal must be made within 42 days of the date of the notice of the decision or determination giving rise to the appeal.	s78(2) appeal must be made within such period prescribed by the development order or within such extended period as may at any time be agreed in writing between the applicant and the planning authority.  s78(3)(a) must give notice of appeal to SoS within eight weeks from the date of receipt of the decision, or such longer period as the SoS may, at any time, allow.	(b) appeal documentation must be submitted to SoS and provide copies to the relevant authority and any required consultee on the same day	s78(3)(a) must give notice of appeal to SoS by serving completed appeal form on SoS.
Draft DCO, Sch 13, para 4(2)	Town and Country Planning Act 1990								
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(b) appeal documentation must be submitted to SoS and provide copies to the relevant authority and any required consultee on the same day	s78(3)(a) must give notice of appeal to SoS by serving completed appeal form on SoS.								

ExQ1	Respondent	Question	Applicant's Response
			s78(3)(b) must serve completed appeal form on the local planning authority as soon as reasonably practicable.
		(c) as soon as practicable after receiving the appeal documentation, SoS must appoint a person to determine the appeal and notify the parties of that person's identity and the address for all correspondence.	s79(2) before determining an appeal under s78, SoS shall, if the appellant of local planning authority so wish, give an opportunity of appearing before and being heard by a person appointed by the SoS.
		(d) to (e) set out the procedure for provision of written representations by the relevant authority and consultee (to be made within 10 business days of the appeal start date), and of counter-submissions by the undertaker (to be made within 10 business days of receipt of written representations). This has been updated in the DCO submitted at Deadline 2 to 20 business days.	There is no prescribed time frame within which the SoS or appointed person must determine the appeal.
		(f) appointed person must make their decision and notify it to the parties, with reasons, as soon as reasonably practicable and in any event within 30 business days of the deadline for receipt of counter-submissions.	
			Schedules with bespoke procedures similar to Schedule 13 have been used in various made orders and can be seen in similar form in DCOs such as Riverside Energy Park Order 2020, with the drafting in Schedule 13 having regard to Advice Note 15 (July 2018). The bespoke process is required in order to ensure that applications under the Order are dealt with efficiently so that the authorised

ExQ1	Respondent	Question	Applicant's Response
			development is not held up, and to provide greater certainty with regard to the time periods involved.
Q1.5.51	The Applicant	<b>Art 43: Guarantees in respect of compensation:</b> Should the provisions referred to in subsection (2) also include article 23 (acquisition of subsoil)?	The Applicant confirms that reference to Article 23 ( <i>acquisition of subsoil only</i> ) has been added into Article 43(2) in the updated DCO submitted at Deadline 2.
Q1.5.52	The Applicant	<b>Art 44: Traffic regulation measures - drafting:</b> In order for section 6(b) to make sense, please confirm that the words "published the undertaker's intention to make the provision in one or more newspapers circulating in the area in which any road to which the provision relates is situated." should immediately follow the words "not less than 7 days before the provision is to take effect,".	The Applicant confirms that this is correct and the change has been made in the updated DCO submitted at Deadline 2.
Q1.5.53	The Applicant	<b>Art 44: Traffic regulation measures:</b> Are any new offences created by this article?	The Applicant confirms that no new offences are created by this Article as section 120(8) of the Planning Act 2008 provides that, with the exception of the narrow circumstances in paragraph 32B of Schedule 5 which do not apply here, a DCO may not include provision for creating offences. Paragraph 8(b) of this article treats any provisions under paragraphs (1) to (3) as though a Traffic Regulation Order has been made under the Road Traffic Regulation Act 1984, applying that Act to it. Section 120(5)(a) of the Planning Act 2008 is clear that a development consent order may apply a statutory provision. Non-compliance with a Traffic Regulation Order, or a traffic regulation measure made under the DCO, may be an offence under existing legislation but the DCO did not create that offence and so article 44 does not offend section 120(8) of the Planning Act 2008. The principle of applying the Road Traffic Regulation Act 1984 to traffic regulation measures contained in DCOs is widely precedented. For example, similar provision is contained within the Network Rail (Norton Bridge Area Improvements)

ExQ1	Respondent	Question	Applicant's Response
			<p>Order 2014, National Grid (Hinkley Point C Connection Project) Order 2016 and more recently in the Great Yarmouth Third River Crossing Development Consent Order 2020.</p>
Q1.5.54	The Applicant	<p><b>Art 44: Traffic regulation measures:</b>            Paragraph 5.6.19 of the EM (APP-020) says that these powers would be used during construction, maintenance and decommissioning.</p> <ul style="list-style-type: none"> <li>• How and in what circumstances do you see these powers being used, particularly during the maintenance period: for what purposes, and over what time periods?</li> <li>• Please explain why you consider that these powers are proportionate.</li> </ul>	<p>Article 44 (Traffic regulation measures) provides the undertaker with powers to regulate traffic on the roads for the purposes of the construction, maintenance and decommissioning of the authorised development.</p> <p>These powers are proportionate as they are necessary in the interests of public safety so that the construction, maintenance and decommissioning of the authorised development can be carried out safely. Without this power it would be necessary to request the traffic authority for the relevant street to make a traffic regulation Order under the Road Traffic Regulation Act 1984 each time it is required, imposing a cost and administrative burden on them, impeding the proper management of traffic during construction and ultimately delaying the delivery of the Scheme, a nationally significant infrastructure project. However, the Applicant proposes below to limit the power in Articles 44(1) and 44(2) to the construction phase only, with maintenance and decommissioning relying on Article 44(3) only (which requires the consent process).</p> <p>This Article is common in DCOs where it is necessary for the undertaker to put in place temporary restrictions on road usage. For example, similar provision is contained within the Network Rail (Norton Bridge Area Improvements) Order 2014, National Grid (Hinkley Point C Connection Project) Order 2016 and more recently in the Great Yarmouth Third River Crossing Development Consent Order 2020.</p> <p>The Applicant envisages the powers conferred by article 44 being used to appropriately manage traffic in relation to each phase of the authorised development.</p> <p><b>Construction</b></p> <p>The specific traffic regulation measure powers for construction of the authorised development are set out in paragraphs (1) and (2). Paragraph (1) provides the specific powers that relate to the extents of the roads specified in Schedule 14 of the DCO. Part 1 of that Schedule specifies the extent of roads that would be subject to temporary speed limits, Part 2 specifies a no right turn prohibition in relation to one temporary access to the authorised development and Part 3</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>specifies the roads that are to be temporarily closed to traffic. Paragraph (2) enables the undertaker to place temporary traffic signals in the locations specified in Part 4 of Schedule 14.</p> <p>Paragraph (3) also includes a general power that would authorise other traffic regulation measures, subject to the consent of the traffic authority for the road concerned and following consultation with the chief officer of police. The inclusion of this power is justified as it allows a degree of flexibility to respond to changing conditions on the road network over the lifetime of the authorised development and is subject to appropriate regulation as it may only be exercised with the consent of the relevant traffic authority. It should also be seen in the context of requirement 16 which requires the approval by the relevant county authority of a construction traffic management plan. Should it be necessary to adjust the Applicant's proposed traffic management measures (and described in Schedule 14 and shown on the Traffic Regulations Measures Plans (AS-284 and AS-285)) to provide a construction traffic management plan that is acceptable to the relevant county authorities, paragraph (3) provides the flexibility to do so without also imposing an administrative burden on the traffic authority to make a temporary traffic regulation order.</p> <p><b>Operation and maintenance</b></p> <p>The Applicant does not anticipate any traffic regulation measures being required during the normal operation of the authorised development, as in operation the authorised development will generate an insignificant volume of traffic. To this end, the Applicant has deleted reference to "maintenance in Article 44(1) and Article 44(2).</p> <p>It is conceivable that circumstances could arise, for example if there was a failure of the cable necessitating repair, that it might be necessary to regulate traffic so as to enable such repairs to take place. However, any such measures would be appropriately regulated as the Applicant would need to apply for consent under Article 44(3) from the traffic authority and consult the chief officer of police concerned and would need to follow the procedures set out in paragraph (6).</p> <p><b>Decommissioning</b></p>

ExQ1	Respondent	Question	Applicant's Response
			<p>As is noted in paragraph 3.8.4 of Chapter 3 of the Environmental Statement (AS-299), the effects of decommissioning are similar to, or often of a lesser magnitude than construction effects. However, there can be a high degree of uncertainty regarding decommissioning as engineering approaches and technologies are likely to change over the operational life of the Scheme. Section 2.6 of the Framework Decommissioning Environmental Management Plan (APP-125) requires a decommissioning traffic management plan (including a decommissioning worker travel plan) to be produced in consultation with the appropriate local planning authorities and which will use as its starting point, the measures set out in the Framework Construction Traffic Management Plan and Travel Plan. Requirement 22 of the draft DCO requires the submission for the approval of the relevant planning authority, of a decommissioning environmental management plan that must be substantially in accordance with the Framework Decommissioning Environmental Management Plan and subsequent compliance with the approved plan.</p> <p>Consequently, at this point in time, the Applicant envisages that when decommissioning the authorised development it would exercise its powers under Article 44(3) and as such as deleted reference to "decommissioning" in Articles 44(1) and 44(2).</p>
Q1.5.55	The Applicant	<p><b>Art 44: Traffic regulation measures:</b></p> <p>Paragraph 5.6.19 of the EM (APP-020) says that subsection (3) would authorise "other temporary traffic regulation measures".</p> <ul style="list-style-type: none"> <li>• What measures? and</li> <li>• Why are they needed?</li> </ul>	<p>As noted in response to question 1.5.54, paragraph (3) also includes a general power that would authorise other traffic regulation measures. The inclusion of this power is justified as it allows a degree of flexibility to respond to changing conditions on the road network over the lifetime of the authorised development. This is necessary to ensure that the Applicant is able to maintain and decommission the Scheme at a future point in time, as required by the DCO. As noted above, the traffic authority must provide its written consent prior to any of the powers in Article 44 being used. See the answer to Q1.5.54 above for a more detailed explanation.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.56	The Applicant	<p><b>Art 44: Traffic regulation measures:</b> In subsection (3)(a)</p> <ul style="list-style-type: none"> <li>• what is meant by “vehicles”? Does it include emergency vehicles?</li> <li>• What is meant by “any road”? Is it a reference to roads specified in Schedule 14?</li> </ul>	<p>In the absence of any legal definition, “vehicles” is taken to have its ordinary meaning, which includes emergency vehicles. The ‘blue light’ exemptions in existing traffic legislation and regulations will still apply as nothing in the traffic regulation measures made under this DCO would prevent reliance on those exemptions. This includes, for example, the exemption under section 87 Road Traffic Regulation Act 1984 of fire brigade, ambulance and police vehicles from speed limits.</p> <p>The reference to ‘any road’ means all roads and not just those specifically referenced in Schedule 14. Whilst this power appears to be broad in scope, the power may only be exercised for the purposes of the construction, maintenance or decommissioning of the authorised development. Its exercise is subject to the written consent of the traffic authority concerned following consultation with the relevant chief officer of police.</p>
Q1.5.57	The Applicant	<p><b>Art 44: Traffic regulation measures:</b> Subsection (6)(a) provides for 4 weeks' notice in writing to be given to the chief officer of police and to the traffic authority. Could such information also be provided to users of the highways in question through implementation of a Communications Strategy?</p>	The Applicant confirms that the Construction Environmental Management Plan submitted at Deadline 2 has been updated to include a commitment for the appointed contractors to develop a Communication Strategy to ensure effective and open communication on traffic regulation measures is undertaken with relevant stakeholders, including the relevant planning authorities, local stakeholders and the public. This will include sharing information and advanced warning of the proposed traffic regulation measures with users of the highways.
Q1.5.58	The relevant highway authority/traffic authority	Question not for Applicant.	
Q1.5.59	The Applicant/The Crown Estate	<ul style="list-style-type: none"> <li>• Art 45: Crown rights</li> <li>• Should the words “lessee or” be added immediately before “licensee” in subsection (1)?</li> <li>• No reference is made to the inclusion of any portion of the shore or bed of the</li> </ul>	The Applicant has considered the drafting of Article 45(1) and agrees that if “licensee” is to be specifically included, then “lessee” should also be included. However pursuant to Article 33(8)(c) (Consent to transfer the benefit of the Order), where the undertaker has transferred or granted the benefit of the Order, the exercise of benefits or rights under the Order by that person is subject to the same restrictions, liabilities and obligations as would apply to the undertaker. Therefore Article 45(1) does not expressly need to include either licensees or

ExQ1	Respondent	Question	Applicant's Response
		<p>sea or any river, channel, creek, bay or estuary: please confirm that this drafting been omitted because this is deemed not necessary in this case.</p>	<p>lessees, as they would automatically be subject to the restrictions that are imposed upon the undertaker under Article 45(1), due to the operation of Article 33.</p> <p>The Applicant confirms that the drafting referenced in relation to the shore or bed of the sea etc, has been omitted because it is not deemed necessary given the location of the Scheme.</p>
Q1.5.60	The Applicant	<p><b>Schedule 1: Authorised development:</b></p> <p>Section 2 paragraph 1 defines the authorised development as the NSIP, Work No 1 (the authorised project) plus associated development (Works No 2-10): this is explained further in paragraph 4.1.6 of the EM (APP-020).</p> <ul style="list-style-type: none"> <li>• Are “authorised project” and “associated development” not defined at the start of Schedule 1 because they are already defined by reference to PA2008.</li> <li>• Should “ancillary” be defined at the start of Schedule 1?</li> <li>• Are jointing bays, fibre bays, cable ducts, cable protection, joint protection, manholes, kiosks, marker posts, underground cable marker, tiles and tape, send and receive pits for horizontal directional drilling, trenching and lighting adequately defined within the definition of part (e) of “electrical cables”? If not, should they be defined?</li> <li>• Should there be a separate definition of horizontal directional drilling (HDD) and trenchless techniques?</li> </ul>	<p>“Authorised project” is not defined because that term is not used in the draft DCO. The term “authorised development” is defined in Article 2 of the draft DCO, meaning the development described in Schedule 1. The preamble to Work No. 1 in Schedule 1 makes clear that Work No. 1 is the nationally significant infrastructure project, whilst the preamble ahead of Work No. 2 makes clear that all the works that follow in Schedule 1 are associated development within the meaning of section 115(2) of the Planning Act 2008. “Associated development” is therefore defined by reference to the Planning Act 2008 and the works comprising the associated development are set out in Schedule 1, and no specific definition is required.</p> <p>The Applicant does not consider the term “ancillary” needs to be defined. In the absence of a definition, the term would be given its ordinary meaning, which in this context means that the equipment being referred to is equipment that gives help or support to the works it is said to be ancillary to.</p> <p>In terms of the definition of “electrical cables”, the Applicant considers that paragraph (e) of the definition provides a detailed list of works associated with the cable laying, and that the items listed do not require further definition. Similar terms are used in Part 1 of Schedule 1 of The Cleve Hill Solar Park Order 2020 without being further defined, and the Applicant considers that approach to be appropriate.</p> <p>The Applicant does not agree that a separate definition of HDD and trenchless techniques is required. This is because Schedule 1 is describing the authorised development, being consented by the Order, and not the techniques for the construction of the authorised development, and further detail of those techniques is therefore not required in Schedule 1.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.61	The Applicant	<p><b>Schedule 1: Authorised development:</b></p> <p>With reference to paragraphs 2.4.6 and 2.4.7 of the Explanatory Memorandum (EM) [AS-294], there appears to be no upper limit to the gross electrical output capacity in paragraph 2.</p> <p>Please explain why, and how you can be sure that all environmental impacts have been assessed in the EIA.</p>	<p>The Applicant considers there are clear advantages in not imposing an upper limit on gross electrical output capacity. This would provide sufficient flexibility to enable the Applicant to take advantage of technological improvements and innovation that may emerge before construction to make the Scheme as efficient as possible. Such an approach is consistent with the Secretary of State's views in the decision letter making The Little Crow Solar Park Order 2022 (see in particular paragraph 4.35), which concluded as follows:</p> <p><i>"The Secretary of State has no information in front of him to conclude otherwise than that the Applicant would make best efforts to make the proposed Development as efficient as possible in terms of land use. Indeed the Applicant's request that the Secretary of State should not set a maximum generating capacity is indicative of its desire to ensure the most efficient use of land that it can in terms of the production of electricity. The Secretary of State anticipates it would in most cases be in an operator's commercial interest to do so."</i></p> <p>The absence of an upper limit on gross electrical output capacity does not mean that the environmental impacts of the Scheme cannot be fully assessed. Imposing a limit on capacity would not provide any greater certainty as to the Scheme's likely environmental impacts. Rather, it would only confirm that the Scheme's capacity could not be any higher than a prescribed limit, a limit which is not directly linked to any environmental impact given the Scheme already controls and manages these impacts through other measures.</p> <p>The design of the Scheme and its impacts are controlled in several ways through the DCO, and it is on this basis that the EIA has been undertaken. For example, the area in which the Scheme is to be located is clearly identified on the Works Plans [APP-007] and the DCO requires works to be constructed only in those areas. The detailed design of the Scheme must also be in accordance with the Design Principles [APP-264]. The Design Principles contain parameters relating to location, scale and design of Scheme components which have been assessed in the EIA. These parameters, which the Applicant considers are adequately secured through the DCO, would not be altered by any potential increase in capacity that may be enabled by through technological innovation or advancement.</p>

ExQ1	Respondent	Question	Applicant's Response
			Finally, the amount of electricity that can be imported and exported is restricted by the Applicant's agreed Grid Connection, which is 500MW.
Q1.5.62	The Applicant	<p><b>Schedule 1: Authorised development:</b></p> <ul style="list-style-type: none"> <li>• With reference to section 2 paragraph 2 of Schedule 1, and paragraph 4.1.1 of the EM [APP-020], please confirm by way of clarification that           <ul style="list-style-type: none"> <li>○ The Scheme is the authorised development, and</li> <li>○ it is the authorised development, rather than the NSIP, for which development consent is sought and which comprises "all or any of the work numbers in this Schedule or any part of any work number in this Schedule", with the NSIP being Work No 1 as stated in paragraph 4.1.7 of the EM [APP-020].</li> </ul> </li> </ul>	<p>The Applicant confirms that, pursuant to Article 3(1), the Order would grant development consent for the "authorised development". The "authorised development" is defined in Article 2 to mean the development set out in Schedule 1. Schedule 1 includes the NSIP (Work No. 1) and associated development (from Work No. 2 onwards). It follows that the Applicant seeks consent for both the NSIP and the associated development in Schedule 1.</p> <p>In other application documents, such as the Environmental Statement and the Explanatory Memorandum, the term "the Scheme" is used to mean the "authorised development". That is confirmed by the Environmental Statement - Chapter 0 - Table Contents, Glossary and Abbreviations [APP-032] which defines the "Scheme" as being the NSIP and associated development, and which cross refers to Schedule 1 of the draft DCO. Similarly, the glossary in the Explanatory Memorandum [APP-020] defines the "Scheme" as being described in Schedule 1 to the Order and referred to as the "authorised development".</p>
Q1.5.63	The Applicant	<p><b>Schedule 1: Authorised development: drafting</b></p> <ul style="list-style-type: none"> <li>• With reference to section 2 Work No 2A, should the wording "a battery energy storage compound" be inserted at the start of the description of each of Work Nos 2B and 2C in place of "works"?</li> <li>• With reference to section 2 Work No 7D, line 1, should "areas" read "area"? and</li> </ul>	<p>The Applicant agrees with the proposed amendment to the description for Work Nos. 2B and 2C, and will make this amendment to the draft DCO.</p> <p>With respect to Work No. 7D, this should be "area" as there is one construction laydown area within Sunnica West Site B and the Applicant will make this amendment to the draft DCO.</p> <p>With respect to the use of the term "unlikely" in the final paragraph of Schedule 1, this relates to the environmental impacts of the Scheme, as assessed. The Applicant has therefore adopted this term to reflect the language adopted with respect to such assessments in the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017, being the requirement to assess the "likely" significant effects of a development on the environment. However,</p>

ExQ1	Respondent	Question	Applicant's Response
		With reference to the penultimate line of the final paragraph of section 2 Work No 10, should "are unlikely to" read "do not"?	reflecting the approach in recently made energy DCOs, the Applicant has amended the drafting in Schedule 1 of the draft DCO to more closely reflect the wording in The Cleve Hill Solar Park Order 2020.
Q1.5.64	The Applicant	<p><b>Schedule 2: Requirements - general:</b></p> <p>Please provide a document giving details of the relationship of all plans, codes of practice, method statements and other documents to be secured by the DCO to the requirements and the associated outline plans, to include for each</p> <ul style="list-style-type: none"> <li>o The relevant requirement and what it relates to;</li> <li>o A summary description of each plan, code of practice, method statement and other document to be secured by that requirement; and</li> <li>o The outline or other plan or plans or other document cited in the requirement in accordance with which each plan, code of practice, method statement and other document is to be produced, with the Examination Library reference.</li> </ul> <p>For example, currently Requirement 6:</p> <p>i) relates to detailed design approval;</p>	<p>The Applicant's response is set out at Appendix H to this document. That document sets out:</p> <ul style="list-style-type: none"> <li>• <b>Column 1</b> – The relevant requirement under the draft DCO.</li> <li>• <b>Column 2</b> – The plan(s) or other document(s) secured by the relevant requirement, including a summary description of their purpose and contents.</li> <li>• <b>Column 3</b> – Any outline or framework plans cited in the relevant requirement.</li> <li>• <b>Column 4</b> – Any complementary sub-plans or procedures referred to in the relevant outline or framework plan(s).</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>ii) requires under Art 6(1) details of the layout, scale, proposed FGL etc to be provided;</li> <li>iii) which must accord with the design principles and the flood risk assessment; and Requirement 14:</li> <li>i) relates to construction environmental management;</li> <li>ii) requires under Art 14(1) a construction environmental management plan (CEMP), to include under Art 14(2) a construction resource management plan;</li> <li>iii) which must accord with the framework CEMP</li> </ul>	
Q1.5.65	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 4 is for written approval.</p> <p>Should this requirement also apply explicitly to the Secretary of State?</p>	<p>The Applicant confirms it has added the Secretary of State into Requirement 4 in the updated version of the DCO submitted at Deadline 2.</p>
Q1.5.66	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 6 relates to detailed design approval.</p> <p>There is no reference to maximum height of buildings, external electrical equipment or lightning protection masts above finished ground level, nor to the maximum number of lightning protection masts. Please explain why these are not stipulated in this Requirement.</p>	<p>Requirement 6 requires that the details to be submitted for approval must accord with the Design Principles.</p> <p>The Design Principles [APP-264] include maximum heights for buildings, for example, maximum heights for control rooms or containers within Work no. 1, for indoor solar stations within Work No. 1, for BESS containers in Work No. 2, for control building or containers in Work No. 3, for welfare facilities in Work No. 3 and for the welfare and office buildings in Work No. 8.</p> <p>The Design Principles also include parameters for works that may be considered “external electrical equipment”, including maximum heights for inverters, transformers, switchgear, weather stations, DC electrical boxes, and onsite substations.</p> <p>The authorised development does not include lightning protection masts.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.67	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 7 provides for a battery fire safety management plan, and paragraph 6.2.13 of the EM [APP-020] states that “<i>a Battery Fire Safety Management Plan (“BSFMP”), substantially in accordance with the outline battery fire safety management plan, must be submitted and approved by the Relevant Planning Authorities before commencement of Work No. 2 of the authorised development</i>”.</p> <ul style="list-style-type: none"> <li>• Should BSFMP read BFSMP?</li> <li>• Would it be clearer if this were entitled “battery energy storage system (BESS) fire safety management plan”?</li> <li>• In section (3), for the avoidance of doubt please delete the word “substantially” so that it is clear that the plan must be in accordance with the outline referred to; and</li> <li>• Should the emergency services such as the East of England Ambulance Service also be consulted?</li> </ul>	<p>Taking each of these points in turn:</p> <ul style="list-style-type: none"> <li>• The Applicant confirms that the next version of the Explanatory Memorandum will be updated so that it reads (“BFSMP”).</li> <li>• The Applicant’s view is that the plan has been called the battery fire safety management plan for simplicity and the name of the plan is sufficiently clear.</li> <li>• Without the term “substantially”, “in accordance with” can be construed as meaning exactly the same as. This is not appropriate for Requirement 7, or indeed any other Requirement in the draft DCO, as it is an ‘outline’ battery fire safety management plan that sets the outline for the final plan to be developed based on the detailed design of the Scheme and any updated in legislation or guidance. It is therefore important that the term “substantially” remains as part of this Requirement in order to build in the flexibility needed for the plan to be developed in accordance with the greater level of detail that will be known at a later stage.</li> <li>• The Applicant confirms that the emergency services are consulted as part of approving the battery fire safety management plan. Requirement 7 (fire safety management) of the draft DCO states that Work No. 2 must not commence until a battery fire safety management plan has been submitted to and approved by both relevant planning authorities. Whilst the responsibility is on the relevant planning authorities to approve the plan, Requirement 7 requires both relevant planning authorities to consult with the relevant fire services, being Cambridgeshire Fire and Rescue Service and the Suffolk Fire and Rescue Service, before determining an application for approval of the battery fire safety management plan. Requirement 7 has been updated in the draft DCO submitted at Deadline 2 to include the Health and Safety Executive as one of the bodies that the relevant planning authorities must consent before determining an application for approval. This secures the need for the relevant local planning authorities to get input from the fire services and the Health and Safety Executive as part of approving the final plan prior to commencement of Work No. 2. The Applicant’s view is that the East of England Ambulance Service does not need to be consulted as part of approving the plan as this is a fire safety plan so it is not necessary, and in</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			any event, they have not requested to be consulted. Please see the response to Q1.1.18.
Q1.5.68	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>As well as in Requirement 7, the word "outline" is also used in relation to the landscape and ecology management plan in Requirement 8.</p> <p>Would it be clearer if the word "outline" were to be used throughout?</p>	<p>The Applicant has reviewed the names used for the various plans referred to in Schedule 2 and considers that in each case the title of the document appropriately frames the status of the document that is envisaged at the close of Examination.</p>
Q1.5.69	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 8 provides for a landscape and ecology management plan.</p> <ul style="list-style-type: none"> <li>• In section (1), line 2, for the avoidance of doubt please delete the word "substantially" so that it is clear that the plan must be in accordance with the outline referred to.</li> <li>• Should reference be made to the associated work programme?</li> <li>• In respect of landscaping works, <ul style="list-style-type: none"> <li>◦ should reference be made to compliance with the relevant recommendations of the relevant British Standards? and</li> <li>◦ should reference be made to the need for replacement of any tree or shrub planted as part of the approved landscape and ecology management plan which within a period of five years after planting is removed,</li> </ul> </li> </ul>	<p>With respect to the first point on the inclusion of the word "substantially" please see the Applicant's response at Q1.5.67. For the reasons set out in that response, the Applicant does not propose to make this change.</p> <p>The Applicant is unclear as to the reference to the "associated work programme" as this is not a document that the Applicant has submitted to the Examination. The measures secured by this requirement are to be found in the Outline Landscape and Ecology Management Plan [APP-108] (OLEMP) which sets out measures to mitigate or avoid visual and ecological impacts, including any programme considerations in that respect. The OLEMP also sets out details of ongoing management and monitoring requirements. The approach taken (i.e. securing mitigation measures in a landscape and ecology management plan) is a standard approach for onshore energy projects, and the Applicant considers it is appropriate.</p> <p>With respect to the question on the relevant British Standards, the OLEMP references British Standard 5837: 2012 Trees in relation to design, demolition and construction – Recommendations, and the Applicant has updated the OLEMP to confirm the landscaping works will comply with the recommendations of other relevant British Standards.</p> <p>The OLEMP includes management, maintenance and monitoring provisions at section 1.8. With respect to trees, maintenance actions are set out at 1.8.13 and include checking and recording failed or defective plants, and replacement of failed or defective plants. At section 1.7, the proposed green infrastructure is set</p>

ExQ1	Respondent	Question	Applicant's Response
		dies, or becomes seriously damaged or diseased?	<p>out and at paragraph 1.7.41 the OLEMP sets out measures in relation to trees as follows:</p> <p><i>All new tree plantings would be subject to the maintenance regimes, in which all plants found to be dead or dying would be replaced within the first available planting season. If areas of trees are seen to be failing, soil samples may be needed to identify potential soil issues affecting tree health. Either soil remediation would be required or, if not practical, a more suitable tree species or location would be chosen. Following the completion of the initial five-year aftercare period all new planting plots will undergo an annual condition assessment and an appropriate programme of works developed to address changes in condition and site requirements. Such work may include; additional replacement planting, tube/stake removal, pruning, coppicing, or thinning out of plots to encourage establishment.</i></p> <p>Approval and implementation of the Landscape and Ecological Management Plan is secured by Requirement 8 of the DCO, and the Applicant therefore considers that appropriate measures are secured with respect to management of trees or shrubs.</p>
Q1.5.70	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 11 provides for fencing and other means of enclosure.</p> <p>Should there be a paragraph 11(6) inserted to specify that any approved permanent fencing must be completed prior to the works which are enclosed by that fencing being brought into use and maintained for the operational lifetime of those works?</p>	<p>The Applicant confirms that a new paragraph (6) has been added into Requirement 11 requiring that any approved permanent fencing must be completed prior to the works which are enclosed by that fencing being brought into use and maintained for the operational lifetime of those works. This amendment is in the version of the DCO submitted at Deadline 2.</p>
Q1.5.71	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 12 provides for surface and foul water drainage.</p>	<p>Taking each of these points in turn:</p> <ul style="list-style-type: none"> <li>• The drainage strategy is defined in Article 2(1) of the DCO as the document of that name identified in the table at Schedule 10 (<i>documents and plans to be certified</i>) and which will be certified by the Secretary of State as the</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• In section (2), <ul style="list-style-type: none"> <li>◦ what and where is the drainage strategy?</li> <li>◦ is an outline to be submitted and, if so, when? and</li> <li>◦ for the avoidance of doubt please delete the word "substantially" so that it is clear that the surface water drainage strategy must be in accordance with the drainage strategy.</li> </ul> </li> </ul>	<p>drainage strategy for the purposes of the DCO. Schedule 10 sets out that the drainage strategy can be found at Annex F to Appendix 9C Part 4 contained in Volume 2 of the Environmental Statement (APP- 098). The accompanying plans for the drainage strategy for Sunnica East A and B can be found at Figure 3-15 in Volume 3 of the Environmental Statement (APP-154) and for Sunnica West A and B at Figure 3-16 of Volume 3 of the Environmental Statement (APP-155).</p> <ul style="list-style-type: none"> <li>• The drainage strategy at Annex F to Appendix 9C Part 4 contained in Volume 2 of the Environmental Statement (APP- 098) that has already been submitted is the outline drainage strategy for the Scheme. This will be developed into the surface water drainage strategy that will be submitted to the relevant county authorities for approval in accordance with Requirement 12.</li> <li>• Without the term "substantially", "in accordance with" can be construed as meaning exactly the same as. This is not appropriate for Requirement 12, or indeed any other requirement in the draft DCO, as it is an 'outline' drainage strategy that sets the framework for the final strategy to be developed into based on the detailed design of the Scheme. It is therefore important that the term "substantially" remains as part of this Requirement so there is flexibility for the plan to be developed in accordance with the greater level of detail that will be known at a later stage.</li> </ul>
Q1.5.72	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 13 provides for a written scheme of archaeological evaluation for Work No 5 and a detailed archaeological mitigation strategy for the authorised development.</p> <ul style="list-style-type: none"> <li>• Do the scheme and/or the strategy take into account the archaeological trial trenching reports submitted with the application?</li> </ul>	<p>Responses to the bullet points are below:</p> <ul style="list-style-type: none"> <li>• Yes. The Sites have been archaeologically evaluated and reporting submitted within Environmental Statement - Appendix 7H – Sunnica East Sites A and B Archaeological Trial Trenching Report [APP-075], and Environmental Statement - Appendix 7I - Sunnica West Sites A and B Archaeological Trial Trenching Report) [APP-076] and in the Pre-Examination trial trenching report submitted in respect of Sunnica East A and B [PDA-002]. The results have been incorporated into the Environmental Statement - Chapter 7 - Cultural Heritage [APP-039], informed the brief prepared by the local planning authorities, and will inform the Detailed Archaeological Mitigation Strategy.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• Do the scheme and/or the strategy include investigation?</li> <li>• Are these the schemes referred to in subsection (3)?</li> <li>• Should Historic England also be consulted?</li> </ul>	<ul style="list-style-type: none"> <li>• Yes. The strategy referred to in paragraph (1) will include details of any further evaluation investigations required. The forthcoming Detailed Archaeological Mitigation Strategy (DAMS) will contain the methodology for mitigation (including evaluation investigations) subject to and in agreement with a brief prepared by the relevant host authorities.</li> <li>• Yes. The reference to 'strategy' and 'scheme' in sub-paragraph (3) refer back to the scheme and strategy referenced in sub-paragraphs (1) and (2).</li> <li>• Yes. Historic England will be consulted on the DAMS prior to its submission.</li> <li>• It should be noted that as indicated in other FWQ responses, the Applicant intends to submit a DAMS to the Examination in due course with the objective that it will become a certified document. As such, once this has happened, the Applicant intends to amend this requirement to reflect the new position of the DAMS having been submitted, rather than being a post-consent matter.</li> </ul>
Q1.5.73	The Applicant	<p><b>Schedule 2: Requirements: drafting</b></p> <p>Requirement 14 provides for a construction environmental management plan.</p> <p>In line 2, please delete the words "by substantially" and replace them with the word "be", both to make sense and to ensure that the construction environmental management plan is in accordance with the framework construction environmental management plan.</p>	<p>The Applicant considers the requested change to the drafting of Requirements 14, 15 and 16 is not necessary or appropriate to achieve the objectives stated in Q1.5.73-75. The drafting in question is clear in terms of what it is intended to achieve.</p> <p>A requirement for the detailed construction environmental management plan(s), operational environmental management plan and construction traffic management plan to be "substantially" in accordance with the relevant outline plans demands a high level of consistency – the substance of the detailed plans must be in accordance with their outline versions. This means that the key elements of these plans, including the mitigation measures secured, must be included in the detailed plans. Critically, however, the chosen drafting provides sufficient flexibility for certain aspects of the detailed plans to be developed and/or differ slightly from the outline versions, should this be required in order to respond to unforeseen variances or advances in technology, for example.</p>
Q1.5.74	The Applicant	<p><b>Schedule 2: Requirements: drafting</b></p> <p>Requirement 15 provides for an operational environmental management plan.</p> <p>In line 2, please delete the word "substantially" and replace it with the word "be", both to make sense and to ensure that the operational environmental management plan is in accordance with the framework</p>	<p>Without the term "substantially", "in accordance with" can be construed as meaning exactly the same as. This is not appropriate for Requirements 14-16 as it is an 'outline' document that sets the framework for the final strategy or plan to be developed into based on the detailed design of the Scheme. It is therefore important that the term "substantially" remains as part of this Requirement so</p>

ExQ1	Respondent	Question	Applicant's Response
		operational environmental management plan.	there is flexibility for the plan to be developed in accordance with the greater level of detail that will be known at a later stage
Q1.5.75	The Applicant	<p><b>Schedule 2: Requirements: drafting</b></p> <p>Requirement 16 provides for a construction traffic management plan.</p> <p>In line 2, please delete the word "substantially" and replace it with the word "be", both to make sense and to ensure that the construction traffic management plan is in accordance with the framework construction traffic management plan.</p>	
Q1.5.76	The Applicant	<p><b>Schedule 2: Requirements: drafting</b></p> <p>Requirement 16 provides for a construction traffic management plan.</p> <p>Please add drafting to section (2) to make it clear that the construction traffic management plan for any phase must be implemented upon commencement of that phase, and that the works are to be carried out in accordance with the approved construction traffic management plans.</p>	<p>The requirement has been drafted having regard to the nature of the construction traffic management plan (CTMP) and the measures within it, in particular that it is not a plan securing a set of works that is "implemented" at a specific point in time. The CTMP will consist of traffic management measures that are undertaken over the construction period. It is anticipated that the approved CTMP will include, where necessary, a programme or timetable in which any measures need to be delivered, and the requirement secures that the plan is implemented as approved.</p> <p>The drafting of the requirement is consistent with approach taken in other made Orders for onshore energy projects, for example Requirement 12 of The Cleve Hill Solar Park Order 2020 and Requirement 9 of The Little Crow Solar Park Order 2022.</p>
Q1.5.77	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 16 refers to a framework construction traffic management plan.</p> <ul style="list-style-type: none"> <li>• Is this plan the same as the framework construction traffic management plan and travel plan submitted with the application [APP-118]?</li> </ul>	<p>The framework construction traffic management plan (framework CTMP) referred to in Requirement 16(1) is defined in Article 2 of the draft DCO. The framework CTMP is defined as the document of that name, identified in Schedule 10, and certified as the "framework construction traffic management plan". Schedule 10 lists the framework CTMP, giving the document reference as Appendix 13C, Volume 2 of the Environmental Statement, Applicant's document ref 6.2. The revision no. and date of the framework CTMP are also provided. The title on that document is Framework Construction Traffic Management Plan and Travel Plan [APP-118].</p>

ExQ1	Respondent	Question	Applicant's Response
		Does it include a framework access management plan and a framework travel plan? If not, where are they provided for?	<p>Therefore, in answer to the first question, the framework CTMP in the draft DCO is the same as the Framework Construction Traffic Management Plan and Travel Plan [APP-118] submitted with the Application. The Applicant has set out above how that is made clear in the drafting of the Order.</p> <p>The framework CTMP includes all necessary mitigation measures required in association with traffic and travel during the construction period. The Applicant does not consider that any other additional plans are required.</p>
Q1.5.78	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 17 provides for an operational noise assessment and makes reference to rating levels as set out in the ES. However, this is only in respect of design, and there is no mention of monitoring of actual operational noise levels.</p> <p>Also there does not appear to be modelling in the ES associated with the operation of the extension to the existing Burwell substation, nor any predicted sound levels for monitoring and compliance purposes.</p> <p>Furthermore, the actual location of the extension to the existing Burwell substation has not yet been determined.</p> <p>Paragraph 11.7.6 of the ES [APP-043] acknowledges that "<i>noise emissions from new transformer plant associated with the Burwell National Grid Substation Extension may have tonal characteristics</i>" but concludes that "<i>due to the existing ...transformer plant noise ... and road traffic noise, it is not expected that any tonal</i></p>	<p><b>Response to bullet point 1:</b></p> <p>As set out by the Baseline Noise Survey [APP-111], noise monitoring at location LT1 (identified on Figure 11-1 [APP-233]) from 05/11/19 to 12/11/19. This defines the baseline noise levels at receptors to the southeast of Burwell Substation. Ambient noise conditions were measured at a daytime LAeq,16h of 49 dB and a night-time LAeq,8h of 40 dB.</p> <p>The assessment of noise effects considers the significance of proposed new infrastructure. All existing noise sources are defined as part of the baseline, which is in line with EIA Regulations 2017. As such, the significance of existing noise source is not part of the noise assessment.</p> <p><b>Response to bullet point 2:</b></p> <p>The operational noise assessment that is reported in Chapter 11, Noise and Vibration, of the ES [APP-043] includes noise effects due to Option 1 Burwell substation extension, which was modelled as part of the operational noise assessment. Noise predictions at receptor R1 (representative of receptors to the east of the Burwell Substation) of proposed new infrastructure (not including the existing Burwell Substation) indicate a rating noise level of 32 dB LAr,Tr during the daytime and 35 dB LAr,Tr during the night-time. The assessment concludes that there would be minor adverse (not significant) changes in noise levels at nearby receptors in Burwell.</p> <p>Requirement 17 provides a means to secure the achievement of free-field rating noise levels that are set out in Chapter 11, Noise and Vibration, of the ES [APP-043]. This will be confirmed through an operational noise assessment of the authorised development design, as required by Requirement 17 of the draft DCO [APP-019]. As significant effects were not identified, operational noise monitoring is not considered to be required.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>features from new transformers would be noticeable at receptors in Burwell”.</i></p> <ul style="list-style-type: none"> <li>• What are the existing transformer plant noise levels and road traffic noise levels at sensitive receptors near the existing Burwell substation, and are they deemed significant?</li> <li>• Should this Requirement include <ul style="list-style-type: none"> <li>○ specified rating levels for free field locations immediately adjacent to receptors in Burwell; and</li> <li>○ a requirement that Work No 5 must not begin operation until a scheme for monitoring compliance with these specified noise rating levels has been submitted to and approved by the LPA; and</li> <li>○ a requirement that the monitoring scheme must be implemented as approved?</li> </ul> </li> </ul>	<p>The proposed Burwell National Grid Substation Extension – Option 1 has been removed from the Scheme following the Relevant Representation from NGET. The preferred alternative option is to provide 33kV/400kV transformers at each of the onsite substation locations within Sunnica East Site A, Sunnica East Site B and Sunnica West Site A. However, until the Applicant has confirmed that it is content contractually that Option 3 can be delivered then Option 2 will remain within the Scheme. This should be confirmed relatively soon. The Option 2 substation is located 450m from the closest receptor in Burwell. Option 1 was to be located closer to sensitive receptors than Option 2. Option 1 was therefore modelled as a ‘worst case’ and no significant noise effects were identified. It is therefore not anticipated that there would be any significant noise effects for residents within Burwell due to proposed new infrastructure as part of the Option 2 substation, if it is required. As such, there is not considered to be any requirement to set specified rating free field levels or compliance monitoring for Work No 5.</p>
Q1.5.79	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Requirement 18 covers “geo-environmental investigations which must be designed with due consideration of the requirements of BS 10175:2011 ...”</p> <ul style="list-style-type: none"> <li>• What do you mean by due consideration?</li> </ul> <p>Will the investigations be in accordance with BS 10175:2011+A2:2017?</p>	<p>The wording ‘due consideration’ means having regard to the guidance in BS10175:2011+AS:2017 as part of designing the geo-environmental investigations to be included in the written strategy. Whilst this guidance is important and will inform the Applicant’s approach, the current wording in Requirement 18 is both sufficient and appropriate as it is just guidance, meaning it is not necessary to say the geo-environmental investigations must be designed ‘in accordance with’ BS10175:2011+AS:2017. “In accordance” with can be construed as meaning exactly, which is not appropriate for this requirement due to the status of this document as guidance. In addition, the Applicant’s view is that this guidance is particularly pertinent with respect to sites with a much higher likelihood of being heavily contaminated, such as a former gas works, landfill or power station. Given the nature of the site in this</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>case and its low sensitivity in terms of contamination, “in accordance with”, would be overly onerous.</p> <p>In any event, the written strategy is subject to approval by the relevant planning authorities who must approve it prior to the Applicant commencing the authorised development and certain permitted preliminary works, as set out in Requirement 18.</p>
Q1.5.80	The Applicant	<p><b>Schedule 2: Requirements:</b></p> <p>Is there a code of construction practice covering such matters as flood management, vibration, soil management, soil handling, air quality management and stakeholder communications?</p>	<p>The Framework Construction Environmental Management Plan (CEMP) (APP-123) refers to the following codes of practice or guidance that measures in the CEMP would need to comply with:</p> <ul style="list-style-type: none"> <li>• Soil management &amp; soil handling – British Standards, BS 6031: 2009 Code of Practice for Earthworks. This code is also relevant to control of site drainage.</li> <li>• Vibration – British Standards Institute (2014 with 2019 amendments) BS 5228:2009+A1:2014 – Code of practice for noise and vibration control on construction and open sites. Noise, BSi, London.</li> <li>• Air quality management – IAQM (2014). Guidance on the assessment of dust from demolition and construction, Institute of Air Quality Management.</li> </ul> <p>As part of the CEMP, the appointed contractor will be required to produce an Emergency Response Plan which will provide details of the response to an impending flood. Table 3-4 also sets out various industry guidelines and regulations that mitigation measures relating to flood risk, drainage and water resources would need to comply with.</p> <p>The CEMP also requires the development and implementation of a stakeholder communications plan that includes community engagement before work commences on-site.</p> <p>Compliance with all of the above is secured via Requirement 14, which requires approval and implementation of the CEMP in substantial accordance with the Framework CEMP.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.5.81	The Applicant	<b>Change application</b>  Plot 21-04 has been added to the Order land and its permitted use during construction is provided for under Article 27.  Should provision for its permitted use also be made under Article 28? If not, please explain why not.	<p>It is not necessary to amend article 28 to make express provision for the temporary use for the purposes of the maintenance of the authorised development, of plot 21-04. Article 28 would authorise the temporary possession of the “Order land” for the purposes of maintaining the authorised development.</p> <p>The term “Order land” is defined in article 2(1) as “the land shown on the land and Crown land plans which is within the limits of land to be acquired or used and described in the book of reference”.</p> <p>Sheet 21 of the land and Crown land plans (AS-253) clearly shows plot 21-04 coloured green, which the key denotes as meaning “Order land – temporary use of land...” and the book of reference (AS-269) describes plot 21-04 as “Temporary possession and use...”</p>



## 8 Topic 1.6 Environmental Statement – general matters

ExQ1	Respondent	Question	Applicant's Response
Q1.6.1	The Applicant	<b>Overall sustainability of the solar panels</b>  Bearing in mind current trends in materials, efficiency and production, and taking into account issues of human rights and national security, please explain and quantify the total whole-life environmental and social footprint of the solar panels you propose to use. Please include a consideration of <ul style="list-style-type: none"><li>• the whole life cost including the materials to be used;</li><li>• where the panels will come from;</li><li>• where and how the panels will be produced;</li><li>• the cost of transport to the site;</li><li>• operational performance;</li><li>• decommissioning; and</li><li>• reuse/recycling of materials,</li></ul> so as to give a robust and transparent indication of the full environmental impact of your proposals measured against the benefit of the energy produced over the lifetime of the proposed development.	<p>Sunnica has completed a whole-life environmental footprint study, which includes an assessment of the climate change impacts of the solar panels that it proposes to use within the Scheme as well as the supporting infrastructure. Further details of this work are set out below.</p> <p>The social costs, considering issues of human rights and national security, were not scoped into the EIA, nor requested by PINS in its Scoping Opinion adopted by the Secretary of State on 23<sup>rd</sup> April 2019. A full human rights assessment would require knowledge of the country and manufacturer from which materials would be sourced, which is not known at this early stage of design. However, proposed measures to reduce adverse social impacts associated with the Scheme are outlined below.</p> <p><b><u>Environmental Lifecycle analysis</u></b></p> <p><b>Lifecycle GHG emissions</b></p> <p>A lifecycle GHG assessment is presented in Chapter 6: Climate Change [APP-038]. Paragraphs 6.3.6 - 6.3.24 of this chapter [APP-038] state how the lifecycle GHG emissions have been calculated. The GHG calculations include:</p> <ul style="list-style-type: none"><li>• Embodied carbon associated with the manufacture of components, including:<ul style="list-style-type: none"><li>◦ Solar PV modules (with embodied carbon emissions based on Environment Product Declaration data for PV panels produced in China)</li><li>◦ Steel supports</li><li>◦ Inverters, Transformers and Switchgear</li><li>◦ Substations</li><li>◦ BESS</li><li>◦ Cabling</li></ul></li></ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"><li>• GHG emissions associated with transportation of workers and materials to the Sunnica site, including transportation of materials via HGV and sea freight from China and South Korea for the modules, BESS and BESS inverters, and from Europe for all other materials.</li><li>• GHG emissions associated with construction activities (e.g. plant and machinery fuel use and water use on site).</li><li>• GHG emissions associated with the disposal of waste during construction, based on conservative assumptions of the quantities recycled and quantities sent to landfill.</li><li>• GHG emissions associated with maintenance during operation (including material replacement, transportation emissions and maintenance activities e.g. plant fuel use).</li><li>• GHG emissions associated with the disposal of waste during decommissioning of the Scheme, based on conservative assumptions of the quantities recycled and quantities sent to landfill.</li><li>• GHG emissions associated with decommissioning activities (e.g. plant fuel use).</li></ul> <p>Further, the assessment calculates energy generation data, including efficiency losses of the PV modules over time. Ongoing repair and maintenance activities during operation of the Scheme will help to reduce such efficiency losses.</p> <p>Section 6.8 of Chapter 6: Climate Change [APP-038] presents the findings of the calculations for lifecycle GHG impacts. GHG emissions arising as a result of the Scheme are first identified and assessed for each individual lifecycle stage (construction, operation (including maintenance) and decommissioning), before then assessing the whole-life GHG impact of the Scheme.</p> <p>The operational phase takes into account both the GHG emissions from the operation and maintenance of the Scheme, and also the GHG benefit from the renewable energy generation in the context of the wider energy generation sector and the projected National Grid average GHG intensity.</p> <p>Paragraph 6.8.31 of Chapter 6: Climate Change [APP-038] concludes that the <i>"adverse effect from operational emissions associated with the Scheme is far outweighed by the beneficial impact of the Scheme as a result of renewable"</i></p>

ExQ1	Respondent	Question	Applicant's Response
			<p>energy generation. The GHG variation between the Scheme and projected grid average generation achieved throughout the assessed lifetime of the Scheme demonstrates the role solar energy generation has to play in the transition to, and longer-term maintenance of, a low carbon economy. Without low-carbon energy generation projects such as the Scheme, the average grid GHG intensity will not decrease as is projected, which could adversely affect the UK's ability to meet its carbon reduction targets."</p> <p>Paragraphs 6.8.40 to 6.8.45 of Chapter 6: Climate Change [APP-038] present the significance of effect overall for the Scheme when considering all phases of development, stating that "<i>the operational GHG intensity of the Scheme is considerably lower than the current grid energy mix, and remains well below to projected grid average over the lifetime of the Scheme</i>" and that "<i>the beneficial impact of the Scheme during operation in relation to the UK meeting its carbon reduction targets is considered to be of high magnitude, and therefore represents a major beneficial effect on the climate.</i>"</p> <p>Based on the difference between the operational GHG intensity of the Scheme and the projected grid GHG intensity during operation, it is estimated that an additional 957,334 tCO<sub>2</sub>e would be emitted to generate the equivalent amount of electricity over the operational lifetime of the Scheme from the projected grid energy mix compared to the Scheme.</p> <p>Also, the lifetime GHG intensity of the Scheme compares favourably with fossil fuel electricity generation and is comparable with other low carbon energy generation types. This demonstrates the role solar energy generation has to play in the transition to a low carbon economy in line with the UK's net zero 2050 target.</p> <p><b>End of life waste disposal</b></p> <p>Due to uncertainties around reuse and recycling options that will be available at the time of decommissioning, a decision on the end use of the panels will be taken prior to decommissioning. Should they still be productive there would also be the option of resale or donation of panels to other end-users.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>For further details on the Applicant's position on end-of-life treatment of the panels, please refer to the response provided to Q1.6.6.</p> <p><b><u>Social impacts</u></b></p> <p>The Applicant intends that the construction, operation and decommissioning of the Development be undertaken pursuant to an ethical procurement policy and that this is a legal obligation on anyone who has the powers under the DCO. That would be achieved by securing the Skills, Supply Chain and Employment Plan by a requirement of the DCO (currently requirement 20).</p> <p>The Applicant proposes the following ethical procurement policy and will update the outline Skills, Supply Chain and Employment Plan accordingly:</p> <ul style="list-style-type: none"><li>• any potential supplier must complete a modern slavery supplier due diligence questionnaire as part of the tender exercise;</li><li>• any potential supplier must meet the statutory requirements under the Modern Slavery Act 2015 to prepare a modern slavery statement;</li><li>• any potential supplier must have a modern slavery policy;</li><li>• any potential supplier must provide relevant employees with modern slavery training;</li><li>• any contract to be entered into with a potential supplier must include the following warranties:<ul style="list-style-type: none"><li>• the supplier has not been and is not engaged in any form of slavery;</li><li>• the supplier pays its workers in compliance with applicable employment laws and minimum wage requirements;</li><li>• the supplier will take reasonable steps to prevent slavery and human trafficking in connection with its business;</li></ul></li><li>• any contract to be entered into with a potential supplier must include:<ul style="list-style-type: none"><li>o a right of audit; and</li><li>o a right of immediate termination in the event of any instances of slavery and human trafficking connected to the supplier.</li></ul></li></ul>

ExQ1	Respondent	Question	Applicant's Response
			<p><b>Conclusion</b></p> <p>A detailed whole-life carbon assessment was undertaken and presented in Chapter 6: Climate Change [APP-038] of the Environmental Statement, which concluded that the GHG emissions associated with the Scheme are far outweighed by the beneficial impact of the Scheme as a result of renewable energy generation, and that the overall impact of the Scheme is considered to represent a major beneficial effect on the climate.</p> <p>The Scheme is considered to have an important role to play in the transition to a low carbon economy in line with the UK's net zero 2050 target.</p> <p>In addition, the Applicant is committed to an ethical procurement policy, which will be secured via the DCO in the Skills, Supply Chain and Employment Plan. It is appropriate that this is dealt with at the stage of procurement, as the details of the supply chain are not known at this stage.</p>
Q1.6.2	The Applicant	<p><b>Environmental sustainability</b></p> <p>Will there be an Environmental Product declaration?</p> <p>Are figures relating to the environmental impact expressed as a CO<sub>2</sub> equivalent for construction and installation?</p>	<p>Environmental Product Declarations (EPDs) are usually undertaken by the manufacturer of a product or material to present its environmental credentials. It is not for the Applicant to undertake an EPD in relation to a third-party product. Until the materials for the Scheme have been selected through detailed design it will not be known if an EPD has been produced.</p> <p>With the exception of emissions associated with land use change, all GHG emissions reported in Chapter 6 Climate Change of the ES [APP-038] are expressed as CO<sub>2</sub> equivalent emissions. Land use change emissions are presented as CO<sub>2</sub> only, as per the emissions factors used, which estimate the change in carbon sequestered in the soil and vegetation with and without the Scheme.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.6.3	The Applicant	<p><b>Building sizes</b></p> <p>Paragraph 3.3.2 of the Scheme Description [APP-035] says that “<i>enclosure or building sizes may vary ...</i>” and Table 3.2 [APP-035] gives some information about maximum dimensions.</p> <p>Please explain why this variation is necessary, what the maximum sizes are, what the locations are and where and how in the Environmental Statement the impacts have been assessed, particularly in terms of landscape and agricultural land loss.</p>	<p>As discussed in Chapter 3: Scheme Description [APP-035], the design of some of the built infrastructure has yet to be finalised for the Scheme. The draft DCO [APP-019] and supporting Works Plans [AS-004] proposes a degree of flexibility to allow the latest technology for solar PV and Battery Energy Storage Systems (BESS) to be utilised at the time of construction, and to meet the changing demands of the UK market. The DCO and Works Plans also allow for a flexible use of space within the Scheme Sites.</p> <p>The Environmental Impact Assessment (EIA) has therefore been undertaken adopting the ‘Rochdale Envelope’, where appropriate, to ensure a robust assessment of the likely significant environmental effects of the Scheme in accordance with the Planning Inspectorate’s Advice Note 9: The Rochdale Envelope (Planning Inspectorate, 2012). This involves assessing the maximum (and where relevant, minimum) parameters for the Scheme where flexibility needs to be retained. This approach sets worst case parameters for the purpose of the assessment but does not constrain the Scheme from being built in a manner that would lead to lower environmental impacts. The draft DCO secures the likely worst-case parameters, providing certainty that the impacts of the Scheme will be no worse than those assessed as part of this environmental assessment.</p> <p>The maximum parameters of the Scheme assessed within the EIA are contained within Table 3-2 of Chapter 3 – Scheme Description of the Environmental Statement [APP-035] and locations shown on the Works Plans [AS-004]. Each chapter has applied the Rochdale Envelope approach, assessing the maximum parameters and Works Plans, unless otherwise stated. Where an assessment has been carried out on the illustrative layout presented in Figure 3-1 [APP-135] and 3-2 of the Environmental Statement [APP-146], this is stated and the applicability of the assessment relative to the flexibility allowed by the Rochdale Envelope is explained.</p> <p>In terms of landscape, the illustrative layout presented in Figure 3-1 and 3-2 of the Environmental Statement has been assessed. This incorporates the maximum footprints and heights for infrastructure and presents the worst case massing, which for example includes the BESS being built out in line with its maximum parameters (rather than if it is not built and solar PV replaces it, as is allowed by the Works Plans [AS-004]). The flexibility relating to locations of</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>BESS, internal tracks, and precise cable routes is discussed in Chapter 10 - Landscape and Visual Amenity of the Environmental Statement <b>[APP-042]</b>.</p> <p>For the assessment of agricultural land loss (refer to Chapter 12: Socio-economics and Land Use of the Environmental Statement <b>[APP-044]</b> and Appendix 12B of the Environmental Statement <b>[APP-115]</b>), this assessment is based on the maximum design parameters, assuming that any infrastructure or planting that is permanent will be built to its maximum footprint. This means that a worst-case assessment has been undertaken in terms of agricultural land loss.</p>
<b>Q1.6.4</b>	The Applicant	<p><b>DC electrical boxes</b></p> <p>Table 3.2 of the Scheme Description <b>[APP-035]</b> lists DC Electrical Boxes and makes reference to “the SCADA system” (page 3-8). SCADA does not appear to be listed in Chapter 0 of the Environmental Statement <b>[APP-032]</b>.</p> <p>What size are these DC electrical boxes?</p> <p>Are the DC electrical boxes above or below ground?</p> <p>Does SCADA stand for Supervisory Control and Data Acquisition?</p>	<p>The approximate size of DC electrical Boxes is 1500mm x 1000mm x 500mm (length X height X width).</p> <p>The DC electrical boxes are above ground and usually they are located under the solar PV panels attached to the structure (either by using a pile of the solar structure or by using an independent pile).</p> <p>SCADA does stand for Supervisory Control and Data Acquisition. A SCADA system is composed of a rack with different electronics equipment on it that could be installed into 20 feet container that has been specially adapted (with heaters, air cooling, ventilation etc.) or it could be installed into a room within the substation both of which are listed in the Chapter 3 of the Environmental Statement <b>[AS-299]</b>. The SCADA system is designed to monitor and control the solar system and may allow the user to:</p> <ul style="list-style-type: none"> <li>• Access any data monitored across the system</li> <li>• Store historical data from the system</li> <li>• Generate system level alerts in real time</li> <li>• Comply with API interface to push data to a third-party SCADA system</li> <li>• Fully editable and configurable by the user to a specific system or use case</li> </ul>
<b>Q1.6.5</b>	The Applicant	<p><b>Site restoration: removal/retention of piles</b></p> <p>Please confirm:</p>	<p>Whether underground piles are to be removed will depend on the piling method used. As per Section 3.8 of Chapter 3: Scheme Description of the Environmental Statement <b>[APP-035]</b>, there are different piling methods proposed for different infrastructure. Depending on the results of geotechnical surveys, the foundations for BESS containers, battery stations and substations may use piles to a</p>

ExQ1	Respondent	Question	Applicant's Response
		<ul style="list-style-type: none"> <li>• Whether it is proposed to remove or retain underground piling during site restoration following decommissioning; and</li> <li>• If piles are to be removed, whether it is proposed that they be recycled, and explain how this will be achieved.</li> </ul>	<p>maximum depth of 12m. For the Solar PV Module Mounting Structures, on the other hand, the foundations are most likely to be steel poles driven into the ground to a maximum of 3.5m depth.</p> <p>The shallower steel poles for the Solar PV Module Mounting Structures will be removed by machinery. Poles in soils that are more resistant can be removed hydraulically (using similar equipment to that which was used to install the piles). Once removed, the struts will be re-used and/or recycled in accordance with good practice at the time; the steel construction can be readily recycled in the UK. A steel recycling facility would be identified by the Contractor and contracts put in place to ensure they will receive the material ahead of decommissioning.</p> <p>It is proposed that deeper piles associated with the BESS containers, battery stations and substation foundations will be cut at 1m depth and the part of the piles below this depth will remain in situ following decommissioning (i.e., anything above 1m depth will be removed). As piles left in situ will be below a depth of 1m, they are not expected to interfere with agricultural operations or other land uses. Ploughing and deep ploughing occurs at depths shallower than 1m, and the relevant landowners have confirmed they are comfortable with this position.</p> <p>Full details of the removal and/or retention of underground piles during decommissioning will be provided within a detailed Decommissioning Environmental Management Plan (DEMP).</p>
<b>Q1.6.6</b>	The Applicant	<ul style="list-style-type: none"> <li>• Site restoration: removal of solar panels</li> <li>• Please confirm if it is proposed to recycle the solar panels after they are removed from the site</li> <li>• If they are to be recycled, please confirm where and how this will be achieved.</li> <li>• To what extent are you relying on future technology to be able to recycle the solar panels?</li> <li>• Please demonstrate that the relevant technology and recycling facilities will be available within the</li> </ul>	<p>A decision on the end use of the panels will be taken prior to decommissioning. Should they still be productive there would be the option of resale or donation of panels to other end-users.</p> <p>Where resale or donation is not feasible, solar panels will be recycled in accordance with relevant legislative requirements and good practice at the time of decommissioning. A Framework Decommissioning Environmental Management Plan (DEMP) is provided with the application in Appendix 16E of the Environmental Statement <b>[APP-125]</b>. The core waste management principles of prevention, reuse, recycle, recover and disposal as defined in the 'Waste Hierarchy' will be embedded within the Decommissioning Resource Management Plan (DRMP), which is a requirement in the Framework DEMP (see paragraph 2.8 and Table 3-11). Pursuant to the draft DCO <b>[APP-016]</b>, the Applicant must submit the final DEMP to the local planning authorities prior to decommissioning</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>timescale proposed for decommissioning or replacement of equipment for this development project.</p>	<p>and the final DEMP must be substantially in accordance with the framework DEMP.</p> <p>Further detail on the recycling of Scheme components will be identified and provided prior to decommissioning of the Scheme as part of the DRMP. It is expected that, where possible, the solar panels will be able to be readily recycled in the UK at that time (40 years ahead).</p> <p>Recycling solar PV infrastructure is an emerging industry as the current solar farms are reaching an age where they need to be decommissioned. The technology already exists in UK and Europe to recycle panels, and it is expected that recycling technology for solar equipment will be far more developed in the UK in over 40 years' time (when decommissioning is due to begin) than it currently is. At present, RecycleSolar is the only UK based solar panel recycling service, but more companies are expected to setup in the next decade as the current solar farms begin to be decommissioned.</p> <p>Technology removed prior to the end of the Scheme's operational life will also be recycled as far as possible and will undergo the same process as outlined above. Technology already exists in UK and Europe to recycle the mounts, panels, inverters, and other infrastructure on solar farms.</p>
<b>Q1.6.7</b>	The Applicant	<p><b>Long-term management of ecological mitigation land</b></p> <p>Please explain how long-term management of ecological mitigation land will be secured following decommissioning.</p>	<p>The Scheme will have a maximum operational life of 40 years and the land will be returned to the landowners at the end of this period, following decommissioning. The management of ecological mitigation land after decommissioning will therefore no longer be under the control of the Applicant.</p> <p>The Scheme will not remove landscape or ecological enhancements at the point of decommissioning. Only the infrastructure elements of the Scheme would be removed, as set out in the Framework Decommissioning Environmental Management Plan [APP-125]. If after decommissioning, when the land is no longer under the control of the Applicant nor covered by this consent (if granted), a landowner decides to remove vegetation, this would be subject to applicable planning and/or licensing requirements at that point in time.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>However, to assist the landowners with the long-term management of ecological mitigation land after the decommissioning, the Applicant will share the Operational Environmental Management Plan with landowners prior to decommissioning, so that they can incorporate management principles for these landscape and ecological enhancement areas into their own working practices.</p>
<b>Q1.6.8</b>	The Applicant	<p><b>Construction Environmental Management Plan</b></p> <p>With reference to paragraph 1.1.2 of the Framework Construction Environmental Management Plan [APP-123], please confirm that, as the scheme is split across four main areas and may be constructed in phases, the CEMP will be prepared in accordance with Requirement 14, albeit in phases, and that the completed CEMP will form part of the Health and Safety File for the project for use during the operational and decommissioning phases.</p>	<p>The Applicant can confirm that the Construction Environmental Management Plan (CEMP) will be prepared in accordance with Requirement 14 of the draft DCO <b>[APP-019]</b>. There may be more than one CEMP prepared for the Scheme, as a CEMP may be prepared per phase and / or per site. Should that be the case, each individual CEMP will be prepared in accordance with Requirement 14.</p> <p>The overall responsibility for implementation of the CEMP(s) will lie with the appointed contractor. The appointed contractor will confirm whether the CEMP(s) will form part of the Health and Safety File prior to the construction phase of the Scheme. The Framework CEMP <b>[APP-123]</b> includes various health and safety measures, protocols and plans. These include development of health and safety plans for construction activities; carrying out health and safety risk assessments prior to work commencing; appropriate use of Personal Protective Equipment (PPE) on-site; and application of relevant health and safety regulations and guidance.</p>
<b>Q1.6.9</b>	The Applicant	<p><b>Construction Environmental Management Plan</b></p> <p>With reference to paragraph 1.3.4 of the Framework Construction Environmental Management Plan [APP-123], please confirm that the land referred to in line 2 is the Order land.</p>	<p>The Applicant can confirm that line 2 in paragraph 1.3.4 of the Framework Construction Environmental Management Plan <b>[APP-123]</b> relates to land associated with the Order limits within the relevant administrative areas.</p>
<b>Q1.6.10</b>	The Applicant	<p><b>Construction Environmental Management Plan - drafting</b></p> <p>With reference to the Framework Construction Environmental Management</p>	<p>The Applicant can confirm the following:</p> <ul style="list-style-type: none"> <li>• Impacts from construction traffic will always be minimised through the implementation of the measures set out in Appendix 13C: Framework CTMP and Travel Plan <b>[AS-278, AS-279]</b>.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<p>Plan (CEMP) [APP-123], please confirm that</p> <ul style="list-style-type: none"> <li>i) In paragraph 2.6.1 impacts from construction traffic will always be minimised;</li> <li>ii) In paragraph 2.6.2 all freight traffic includes abnormal loads;</li> <li>iii) In paragraph 2.6.3 the detailed CTMP will be developed and approved by the relevant planning authority;</li> <li>iv) In paragraph 2.7.1 there will be no detrimental effect on either the highway or users of the highway</li> </ul>	<ul style="list-style-type: none"> <li>• In paragraph 2.6.2 of the Framework Construction Environmental Management Plan [AS-277] 'all freight traffic' includes abnormal loads.</li> <li>• The detailed Construction Traffic Management Plan will be developed by the contractor and approved by the relevant county planning authority (not the relevant planning authority) in accordance with requirement 16 contained in Schedule 2 to the draft DCO [APP-019]. The Applicant considers that the county planning authority, which is also the local highway authority, is the appropriate body to have the function of determining whether to approve the Construction Traffic Management Plan and Travel Plan.</li> <li>• With regards paragraph 2.7.1, which states 'For loads unable to use the fixed wheel wash facility, localised wheel washing will be set up to ensure no detrimental effect to the highway' we can confirm that this also includes no detrimental effect to users of the highway.</li> </ul>
<b>Q1.6.11</b>	The Applicant	<p><b>Working methods to minimise ecological impacts</b></p> <p>With reference to the fifth bullet point in Table 3-3 of the CEMP [APP-123] on page 16C-17 in respect of birds attempting to nest on cleared ground, but also more generally, what will be the maximum time between site clearance and commencement of construction?</p>	As set out in the first and second bullets in Table 3-3 of the CEMP [APP-123], any vegetation clearance will be undertaken outside of the breeding bird season, where practicable, and will be maintained in a disturbed state, where necessary. This is to minimise the risk of vegetation re-establishing and providing nesting habitat during the breeding season immediately after winter clearance. No maximum time has been set between site clearance and commencement of construction, as this will depend on the relevant aspect of construction and individual ecological receptor. During construction all activities will be overseen and reviewed by the Ecological clerk of Works (ECoW).
<b>Q1.6.12</b>	The Applicant	<p><b>Working methods to minimise ecological impacts</b></p> <p>The first bullet point in Table 3-3 of the Construction Environmental Management Plan (CEMP) [APP-123] on page 16C-20 says that vegetation (including topsoil) is to be removed.</p> <p>Why is it necessary to remove topsoil?</p>	Excavation will be required to lay the cables throughout the Scheme and for creating the foundations for built infrastructure, such as the BESS and on-site substations. There will be no wholesale removal of topsoil required across the PV array areas, but any excavations undertaken will need to carefully remove the topsoil, particularly where it is to be re-instated after the laying of cables.



## 9 Topic 1.7 Landscape and Visual Effects

ExQ1	Respondent	Question	Applicant's Response
Q1.7.1	The Applicant	<b>Visual impact</b>  Given that Figure 10-11F [APP-206] shows that there would be visibility of the site from the city of Ely, why has Ely Cathedral been excluded from the Visual Impact Assessment?	<p>As noted in paragraph 10.4.2 of Chapter 10 of the Environmental Statement [APP-042], “<i>the LVIA study area covers the area which the Scheme may influence in a significant manner. It has been reviewed throughout the design process in response to the iterative design process.</i>” This is in accordance with paragraph 5.2 of the Guidelines for Landscape and Visual Impact Assessment, 3<sup>rd</sup> Edition (GLVIA3), which advocates a proportionate approach to the assessment of landscape and visual effects. The study area has been informed by detailed desk study and fieldwork carried out between 2018 and submission of the DCO Application, including the preparation of Zones of Theoretical Visibility (ZTV) to test and refine the design. Based on the distance between Ely Cathedral and the Scheme and the extent of intervening screening, it was not considered likely that impacts would result in significant effects and therefore views from Ely Cathedral were not assessed within Chapter 10 of the Environmental Statement.</p> <p>The ZTVs presented in Figures 10-11a to 10-11f [APP-201 to APP-206] show areas where there would theoretically be views of the Scheme. Paragraph 6.10 of GLVIA3 recognises the limitations of ZTV mapping and explains that this is the desk study component of visibility analysis. ZTVs are computer-generated maps which illustrate whether a part of the Scheme would theoretically be visible or not. In reality many other factors, including the presence of intervening features not captured in the model, such as individual trees and hedgerows, the time of day and weather conditions affect whether the Scheme would be visible and to what extent it would be distinguishable. It does not express how much of each part of the Scheme would be visible and does not take account of the acuity of the eye, which relates to the ability to resolve details at distance. Therefore, the ZTVs can indicate theoretical visibility extending many kilometres from the Scheme, but in reality it may not be discernible.</p> <p>Ely Cathedral, formally the Cathedral Church of the Holy and Undivided Trinity, lies in the centre of the city of Ely. It represents the historic focus of the town, the present structure being an 11<sup>th</sup> century replacement of the 7<sup>th</sup> century monastery. It occupies a central position in the prominent area of higher ground referred to as the Isle of Ely, which rises to approximately 29m Above Ordnance Datum (AOD) above the surrounding Cambridgeshire fenland over which it historically held</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>control. This fenland is largely flat and at or slightly below sea level, with sparse vegetation patterns, making the 66m west tower more prominent. This contributes to the unique setting and function of Ely Cathedral as a nationally recognisable landmark. The historical and cultural associations of the Cathedral, its architecture and its extensive complex of ecclesiastical buildings mean that it is a popular local tourist attraction.</p> <p>The Applicant's landscape planning specialist visited Ely Cathedral on 12 October 2022 and attended a public guided tour of the West Tower to further assess the visibility of the Site and likelihood of visual effects relating to the Scheme. These tours require a general admission fee and a tour fee to be paid and run Wednesdays to Saturdays most weeks. The tour lasts an hour, with approximately 30 minutes spent at the top of the tower, looking first to the east, then the north, west and south. A guide describes the history of the building and explains its historical context and points out landmarks in the immediate area and wider landscape. Baseline photographs captured during this tour are presented in Appendix I.</p> <p>The West Tower, which stands at approximately 66m above ground level, is the tallest part of the Cathedral, giving rise to panoramic views from the roof at the top of the tower's 288 steps. Due to the elevation, on a clear day the horizon can be approximately 20km to 30km away, with the top of the tall buildings and silos associated with the British Sugar plant in Bury St. Edmunds to the east just visible with the naked eye. Framed views are gained through the gaps between the turrets and castellations which adorn the top of the tower. There are no visual aides at the top of the tower, such as a fixed telescope, and therefore most people experience views with the naked eye. The sensitivity of visual receptors visiting the West Tower of Ely Cathedral is high, considering the high value attached to views and their high susceptibility to change.</p> <p>The closest part of the Scheme, which lies approximately 13km to the south east of the West Tower, is Parcel E05 within Sunnica East Site A. The most distant part of the Scheme is Sunnica West Site A, which lies between 16.6km and 19.8km from the West Tower.</p> <p>The foreground of views is dominated by the distinctive and intricate roofscape and architecture of Ely Cathedral. Many ecclesiastical buildings and open spaces, which surround the Cathedral, are visible below the tower, including monastic</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>buildings and Queen's Hall. These elements are the key focus of views from the West Tower. The city centre of Ely, including the High Street, shopping areas and King's School Ely surround the cathedral complex. Beyond the city centre, residential suburbs and industrial areas stretch out into the middle ground. Vast swathes of largely flat arable land extend into the distance in all directions. Distant settlements, including Chatteris (16km to the northwest) and Soham (8km to the southeast) are just distinguishable within the agricultural setting, amongst trees and woodland. Development is otherwise mostly limited to isolated farms and industrial buildings.</p> <p>Principal views southeast towards the Scheme are available from the south facing side of the West Tower. These views are across the roof of the Nave towards the Octagonal Tower, which is the main focus of the view approximately 70m to the east. In the background, residential development, railway lines and sidings, the Ely Southern Bypass and industrial and commercial buildings stretch out towards the River Great Ouse, which defines the eastern edge of the City. Flat arable fields interspersed with tree belts and blocks of woodland extend several kilometres into the distance. A row of tall pylons crosses the view at a distance of approximately 5km, below the wooded skyline.</p> <p>The top of the distinctive tower of St. Andrew's Church in Soham is a distant landmark to the southeast. Above the tower of the church and to its left in the view in the very far distance (approximately 20km), are the limekilns gallops, barely distinguishable with the naked eye. Intervening vegetation in the landscape between screens the land within the Scheme in this direction. Further to the east, trees and woodland layer to screen the majority of settlement within the background. Occasional larger farm and industrial buildings are distinguishable up to a distance of approximately 10km, including on East Fen Drove east of Soham (9.5m southeast) and Hasse Road (8km south east). It is not possible to identify the land within the Site with the naked eye and even with a pair of binoculars, existing features are not distinguishable. Distant landmarks, which assist in understanding the location and context of the Site, which are only discernible with binoculars, include the distinctive domes of the Bay Farm Anaerobic Digestion (AD) Plant, north of Red Lodge (18.4km from the West Tower of Ely Cathedral. The adjacent solar farm is not visible. The tops of the massive hangers of RAF Mildenhall are also just visible, approximately 15km to</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>the east. Large military aircraft departing RAF Mildenhall are a common sight in the skies to the east.</p> <p>In summary, the location of the Site is barely perceptible with the naked eye, due to the flat and open topography, intervening vegetation across the landscape layers to disrupt distant views. Even with a pair of binoculars, it is difficult to distinguish features in the background, where the Site is located. Even if small parts of the Scheme are theoretically visible, they would be isolated and very distant and would not be discernible against the backdrop of distant topography and woodland. The magnitude of impact would be at the lower end of very low. Considering these impacts against the high sensitivity of visual receptors, effects would be at worst negligible adverse in all scenarios and would not lead to significant effects.</p>
Q1.7.2	The Applicant	<p><b>Glint and glare</b></p> <p>The Glint and Glare Assessment [APP-121] refers to selected locations rather than general areas of visibility such as are set out in the figures relating to zones of theoretical visibility [APP-201 to APP-206]. Why have areas with potentially high levels of visibility, such as the Limekiln Gallops, been omitted from the Glint and Glare Assessment?</p>	<p>The Glint and Glare Assessment presented in Appendix 16A of the Environmental Statement <b>[APP-121]</b>, which is desk-based, specifically addresses the potential for impacts on people relating to the sun reflecting from solar panel surfaces including residents and users of public rights of way. It also considers the potential impacts on railway and aviation operations relating to RAF Mildenhall, RAF Lakenheath, and Cambridge Airport. The Glint and Glare Assessment first considers whether reflections from solar panels are geometrically possible. This assessment is based on the reflection calculation methodology set out in Appendix E of Appendix 16A of the Environmental Statement. These complex, three-dimensional calculations account for:</p> <ul style="list-style-type: none"> <li>a. The Earth's orbit around the Sun;</li> <li>b. The Earth's rotation;</li> <li>c. The Earth's orientation;</li> <li>d. The reflector's location;</li> <li>e. The reflector's 3D Orientation.</li> </ul> <p>The Glint and Glare Assessment also considered the time of year and time of day when such impacts would be geometrically possible. Paragraph 2.52.4 of the Draft NPS for Renewable Energy Infrastructure (EN-3) states that "<i>Solar PV panels are designed to absorb, not reflect, irradiation. However, the Secretary of State should assess the potential impact of glint and glare on nearby homes and</i></p>

ExQ1	Respondent	Question	Applicant's Response
			<p><i>motorists</i>". Paragraph 2.52.5 goes on to state that "<i>there is no evidence that glint and glare from solar farms interferes in any way with aviation navigation or pilot and aircraft visibility or safety. Therefore, the Secretary of State is unlikely to have to give any weight to claims of aviation interference as a result of glint and glare from solar farms.</i>"</p> <p>The Landscape and Visual Impact Assessment (LVIA) presented in Chapter 10 – Landscape and Visual Amenity of the Environmental Statement <b>[APP-042]</b> considers the range of impacts on views and visual amenity that people might experience as a consequence of the construction, operation and decommissioning of the Scheme, including glint and glare, and is therefore broader in scope. The LVIA has used Zones of Theoretical Visibility (ZTV) to test where the Scheme would theoretically be visible from. These ZTVs have been used to identify visual receptor groups and representative viewpoints, against which the visual effects of the Scheme have been assessed. The ZTVs are not referred to in the Glint and Glare Assessment because it is concerned with identifying areas where glint and glare impacts are geometrically possible, as set out above. The Glint and Glare Assessment concludes that reflections from solar panels are not geometrically possible across much of the study area. This is why the Glint and Glare Assessment refers to specific locations rather than general areas of visibility.</p> <p>The approach to these separate assessments and the effects which they report are therefore different, but related. They share a common baseline and some receptor groups are the same. Where the Glint and Glare Assessment has identified effects in Appendix 16A, which relate to visual receptors identified in the LVIA, these are cross-referenced in Chapter 10 – Landscape and Visual Amenity of the Environmental Statement <b>[APP-042]</b> and have informed the assessment of visual effects and underpin the conclusions for relevant receptors.</p> <p>Section 5.7 of Appendix 16A addresses potential glint and glare effects on horse facility receptors, including users of the Limekilns Gallops. Table 7.11 on page 50 of Appendix 16A sets out geometric calculation results for horse facility receptors. This demonstrates that solar reflections are not geometrically possible for the Limekilns Gallops, Godolphin Stables, Bury Hill Gallops and Long Hill Gallops. Whilst solar reflections are possible for the Snailwell Gallops and the British</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Riding School, no impacts are predicted due to the screening provided by existing vegetation.</p> <p>A Technical Note is provided in Appendix J to this response to further assist the ExA in understanding the relationship between the LVIA and Glint and Glare Assessment.</p>
<b>Q1.7.3</b>	East Cambridgeshire District Council (ECDC)	Question not for Applicant.	
<b>Q1.7.4</b>	Suffolk County Council (SCC)	Question not for Applicant.	
<b>Q1.7.5</b>	The Applicant	<p><b>Landscape and visual assessment</b></p> <p>ES chapter 10 [APP-042], Table 10-2, provides a response to a number of comments within the Scoping Opinion and from other consultation bodies. Some of these are not fully responded to or are not included within the relevant section of the ES chapter.</p> <p>Please provide the methodologies for the Type 2 photomontages (as the Type 4 methodology is detailed in the relevant appendix but Type 2 is not), including an explanation as to why only selected viewpoints have the photographs and wireframe montages, and why this section uses the terminology Type 2 or 4 whereas the rest of the document refers to Type 1 and 4.</p>	<p>The Landscape Institute advocates a proportionate approach to the assessment and visualisation of development proposals in the Guidelines for Landscape and Visual Impact Assessment, 3<sup>rd</sup> Edition (GLVIA3) and Technical Guidance Note (TGN) 06/19: Visual Representation of Development Proposals. Paragraph 3.5.8 of TGN 06/19 states that "<i>combination of simpler and more sophisticated graphics may be appropriate to illustrate specific points. So, for example, 3D models, or annotated viewpoint photos (Types 1 and 2) at less important locations, may usefully support more sophisticated (Types 3 and 4) visualisations at key locations</i>". This is the proportionate approach taken in preparation of the Landscape and Visual Impact Assessment (LVIA) set out in Chapter 10 – Landscape and Visual Amenity of the Environmental Statement <b>[APP-042]</b>, whereby only selected, key viewpoints have photomontages (Type 4). The locations of these key viewpoints were selected through consultation with Suffolk County Council and West Suffolk Council as set out in Table 10-2 of Chapter 10 of the Environmental Statement. Further clarification on the methodology for the LVIA and the intra-project cumulative landscape and sequential visual effects is provided in Technical Notes which accompany this response in Appendix L.</p> <p>Regarding the reference to Type 2 images in Table 10-2 of Chapter 10 – Landscape and Visual Amenity of the Environmental Statement <b>[APP-042]</b>, this is an error and should read Type 1. As set out in Table 2 of TGN 06/19, the aim of</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>these Type 1 Annotated Viewpoint Photographs is to “represent context and outline or extent of development and of key features”. Section 4.1.1 of TGN 06/19 explains that Type 1 annotated viewpoint photographs are “reproduced at a size which aids clear understanding of the view and context, these simply show the extent of the site within the view, and annotate any key features within the view. Type 1 is the most basic form of visual representation with a focus on the baseline information.”</p> <p>The photographs for the Type 1 annotated viewpoint photographs presented within Figure 10-20a [APP-215] to Figure 10-84b [APP-219] were captured by landscape architects during fieldwork for the preparation of the LVIA. They were stitched in Adobe Photoshop and annotated in Adobe InDesign. Relevant camera and image data is presented in accordance with TGN 06/19.</p>
<b>Q1.7.6</b>	Suffolk County Council (SCC)	Question not for Applicant.	
<b>Q1.7.7</b>	The relevant local authorities	Question not for Applicant.	
<b>Q1.7.8</b>	East Cambridgeshire District Council (ECDC)	Question not for Applicant.	
<b>Q1.7.9</b>	The Applicant	<b>Landscape mitigation</b>  Please confirm whether a hedgerow is proposed between plots E12 and ECO3.	<p>A hedgerow is proposed along the boundary between Parcel ECO3 and Parcel E12 as shown on Figure 10-14c [APP-211]. This will link with hedgerows and tree belts leading south from Freckenham Road, reinforcing habitat connectivity. These hedgerows, once established, will be maintained at a height of between 2m and 3m to maximise landscape integration and visual screening, in accordance with the Outline Landscape and Ecology Management Plan set out in Appendix 10I [APP-108].</p>
<b>Q1.7.10</b>	The Applicant	<b>Construction impacts on landscape</b>	<p>Paragraph 2.2.1 of Appendix 16C: Framework Construction Environmental Management Plan [APP-123] states that “the current expectation is that site</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>ES chapter 10 [APP-042], paragraphs 10.1.2 and 10.3.9 states that effects of a short construction period extension beyond 24 months are not noted to be enough to change the assessment.</p> <p>Please confirm:</p> <ul style="list-style-type: none"> <li>i) Why this is considered to be the case, as limited evidence has been provided.</li> <li>ii) At what point in time additional assessment would be required as the location, duration, magnitude or significance of effects has changed.</li> </ul>	<p><i>preparation, construction, and commissioning of the Scheme will take approximately 24 months, however, there is the possibility that the construction will be phased and the overall period could therefore be longer</i>". As explained in Chapter 10 – Landscape and Visual Amenity of the Environmental Statement [APP-042] paragraph 10.3.9(a), "<i>construction activity is conservatively assumed to be undertaken across all of the Sites, Burwell Substation Extension and within the cable corridors at the same time and during winter</i>". This represents a worst-case scenario.</p> <p>The methodology for the Landscape and Visual Impact Assessment (LVIA) is set out in detail in Appendix 10C of the Environmental Statement [APP-102] and is summarised in Chapter 10 – Landscape and Visual Amenity of the Environmental Statement [APP-042]. Paragraph 10.4.20 of Chapter 10 explains that "<i>the magnitude of impact considers the size and scale, duration and reversibility of the Scheme</i>", which is in line with paragraph 3.26 of the Guidelines for Landscape and Visual Impact Assessment, 3<sup>rd</sup> Edition. Therefore, as the duration of an impact is one of several considerations in reaching judgements on the overall magnitude, a short extension would not change the significance of effects reported in the Environmental Statement.</p> <p>Should the overall construction programme become longer than the assumed 24 months, which might be the case if it is phased sequentially field by field for example, it would not extend the duration of impact for a specific visual receptor. The visual receptors that have been assessed do not have views over large swaths of the Order limits; their views are limited to relatively small areas of the Order limits.</p> <p>Landscape effects can be influenced more by the pace of construction because it is not based on views from a specific location. In this case, should duration be extended the geographic extent of the impact becomes reduced (because the footprint of the construction works happening at any one point in time is less). As mentioned above, the size and scale is another factor (as well as duration) in determining the magnitude of impact and offsets the change in duration. Solar farm construction is transient; the construction works would only be in one location for a few weeks or months and continually moves across the Order limits.</p> <p>The point in time at which a longer construction period would change the significance of effect occur where the duration of construction extends without a</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>reduction in geographic extent or severity, which again would not be the case for the Scheme (if this did happen it would be a small increase to the construction duration in a field).</p> <p>The Applicant is therefore satisfied that the assessment presents a worst-case and would not be affected by a slightly longer or phased construction.</p>
<b>Q1.7.11</b>	The Applicant	<p><b>Trees &amp; woodland</b></p> <p>With reference to Environmental Statement Chapter 10, Landscape and Visual Amenity [APP-042] paragraph 10.3.4, please explain why you consider it appropriate not to have undertaken a detailed Arboricultural assessment at the application stage?</p>	<p>The design has been developed to avoid and minimise impacts to trees and hedgerows from the outset. This has been informed by high level tree assessment data and site walkovers by qualified arboriculturists which mapped the likely quality and spatial constraint associated with trees, which the design then sought to avoid where feasible. The detailed design is not fully defined and will not be for some time and therefore this process is ongoing. The applicant is confident that loss or damage to significant trees has and can be avoided via the detailed design process and the principles set out in the Precautionary Arboricultural Method Statement included as Annex C of the Tree Constraints Report <b>[APP-101]</b> and secured by the CEMP.</p> <p>However, the Applicant has, further to discussions with stakeholders, undertaken further work in relation to trees and the intention is that this will be submitted to Examination at a future Deadline in the form of an Arboricultural Impact Assessment.</p>
<b>Q1.7.12</b>	The Applicant	<p><b>Trees &amp; woodland</b></p> <p>[APP-264] paragraph 2.2.70 states that there are “no ancient woodland or veteran trees within the order limits”; however para 5.1.7 of the Tree Constraints Report [APP-101] states that several trees with veteran characteristics were identified during survey work.</p> <p>Please reconcile these two statements.</p>	<p>The Applicant confirms that this is a drafting error in paragraph 2.2.70 <b>[APP-264]</b> and that whilst it is correct that there are no recorded ancient woodlands within the Order limits, there are a number of trees considered to qualify as veteran. The majority of veteran trees with the potential to be impacted by the Scheme are located in Sunnica West B, with some located along the cable corridor and internal access routes. The design of that site is under consideration following the comments of archaeological consultees, but in any event mitigation will be proposed to avoid the loss of or impact to, any veteran trees and this will be added to the OLEMP <b>[APP-108]</b> in due course.</p>



## 10 Topic 1.8 Noise and Vibration

ExQ1	Respondent	Question	Applicant's Response
<b>Q1.8.1</b>	The Applicant, relevant local authority	<b>Health and safety related consents:</b>  Item 6 of the Consents and Agreements Position Statement [APP-021] refers to consents under Section 61 of the Control of Pollution Act 1974.  What is the position if the application is not successful?	<p>Sections 60 and 61 of the CoPA provide the main legislation regarding demolition and construction site noise and vibration. A Section 60 notice may be issued by the local authority with instructions to cease work until specific measures to reduce noise have been adopted.</p> <p>Section 61 of the CoPA provides a means for applying for prior consent to carry out noise generating activities during demolition and construction. Once prior consent has been agreed under Section 61, a Section 60 notice cannot be served provided the agreed measures in the Section 61 consent are maintained on the site.</p> <p>Construction works may commence if an application for consent under Section 61 is not successful; however, there is a risk that, if noise complaints are received, a Section 60 notice may be issued by the Local Authority with instructions to cease work until specific conditions to reduce noise have been adopted.</p>
<b>Q1.8.2</b>	The Applicant	Question duplicated, please refer to Q1.1.2.	



## 11 Topic 1.9 Socio-Economics and Land Use

ExQ1	Respondent	Question	Applicant's Response
Q1.9.1	The Applicant	<p><b>Solar tracking systems</b></p> <p>Does the Applicant agree with the general proposition that solar tracking systems increase electricity production over fixed panel installations which latter cost less to install but require more panels to achieve a similar gain than tracking systems, thus requiring a larger land take. If not why not?</p> <p>Has the Applicant performed a cost benefit analysis that demonstrates the extra area of land that would be required for the Proposed Development over the use of a solar tracking system in order to produce the same amount of energy? If so please indicate where this is in the application documents.</p>	<p><b>Introduction</b></p> <p>The Applicant agrees with the first part of the general proposition set out in the ExA's question that tracking systems increase production but cost more. However, the Applicant disagrees with the second part of the general proposition set out that all tracking systems use less land when compared to fixed panel installations.</p> <p>The Applicant has a holistic approach to inform solar PV technology selection and design which considers the potential environmental and planning constraints alongside technical and economic considerations.</p> <p>The Applicant has considered the key environmental and planning constraints and the key technical and economic considerations below which has informed the decision to select a fixed panel design. A simple comparative analysis highlights why the fixed south-facing option was the preferred technology design choice.</p> <p><b>Environmental and Planning Constraints</b></p> <p>One of the primary environmental and planning constraints that informed the selection and design of solar PV technology for the Sunnica project was the height of the PV panels above ground level. The original design work undertaken pre-application was that the height of the PV arrays needed to be limited to 2.5m Above Ground Level (AGL) so as to limit the land landscape and visual impact.</p> <p>The Landscape and Visual Impact Assessment, the results of which are presented in Chapter 10 of the Environmental Statement [APP-042], has informed the design of the Scheme from the earliest stage. This included consideration of east-west PV array orientation and PV arrays of greater height. The landscape within the site is generally flat or gently undulating and taller panels were found to increase the extent of visibility. This is because they would extend above the height of hedgerows, which are important boundary features across much of the area. This principle meant that tracking panels which were 2V</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>in portrait had to be discounted as they would exceed the maximum height of 2.5 AGL. This is explained in more detail below.</p> <p>The view from the Limekilns Gallops was given particular consideration because the elevated, open aspect gives rise to more extensive views across the landscape. In this view, tracking panels would be more conspicuous due to their height, but also the movement as they track the sun across the sky. This would expose more of the framework of the panels towards the viewpoint in the morning and late afternoon, drawing attention to them, rather than the continuous appearance of the face of panels receding into the background in the south-facing, fixed orientation proposed.</p> <p><b>Technical and economic considerations</b></p> <p>Solar PV panel design is determined in part by a series of technical and economic considerations. The following technical considerations are the most relevant to understanding the design choices made at the Sunnica scheme.</p> <p><u>Technical considerations</u></p> <p>The two key technical considerations are the panel height and the row pitch.</p> <p>The maximum panel height is set out in Chapter 3 of the Environmental Statement [<b>AS-299</b>]. This constraint is one of the key limiting factors in determining potential panel selection and configuration for the Sunnica scheme. Within these constraints the panels would be arranged in portrait format and either as single panels (1V) or as two in portrait (2V). This constraint limits the assessment to:</p> <ul style="list-style-type: none"><li>• 2V 550 W south-facing fixed – 2.5m</li><li>• 1V 550W E-W tracker – 2.5m</li></ul> <p>The row pitch is the spacing between the rows of panels fixed onto the racking that supports them. The spacing of the rows impacts energy yield in terms of:</p> <ul style="list-style-type: none"><li>• Specific yield (kWh/ kWp/year)</li></ul>

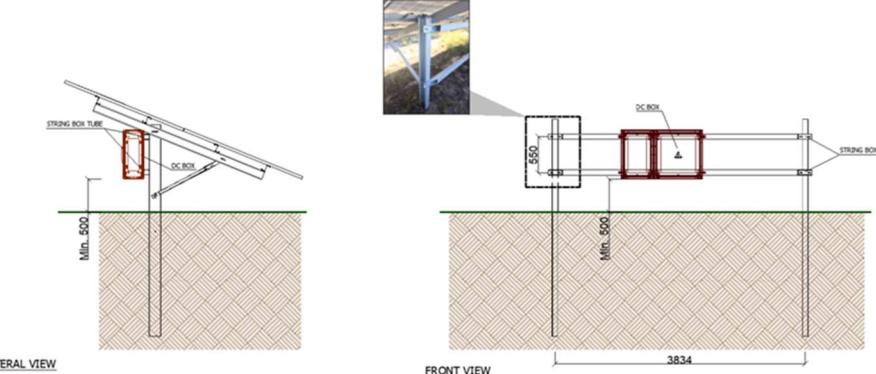
ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"><li>• Energy output per hectare (MWh/ha)</li><li>• Capacity per hectare (MWp/ha)</li></ul> <p>The row pitches that have been considered in this analysis are the following:</p> <ul style="list-style-type: none"><li>• 2V 550 W south-facing fixed - pitch 6.8m</li><li>• 1V 550W E-W tracker – pitch 4.5m</li></ul> <p>In order to maximize the installed peak power (for energy production) within the minimum area, pitches have been selected which have the minimum clearance required between rows for maintenance purpose (such as for cleaning modules or conducting other maintenance).</p> <p><b>Economic considerations</b></p> <p>An economic analysis needs to assess the capital expenditure and the operational expenditure and compare the differences between them for a fixed system versus a tracker system.</p> <p><b>Capital expenditure</b></p> <p>The capital expenditure of a scheme is determined by the up-front costs of construction and installation. The key difference between the two systems relates to the increased cost of the tracking system over the fixed system. The cost relates to the amount of metal involved with the deeper foundations and substructure, the motors, tracking system, safety equipment, software and hardware (electronics) required and the additional construction costs.</p> <p>The extra system cost estimated for change from fixed 2 modules on portrait solution to tracker 1 module portrait is around 50% more which is equivalent to an uplift of £40,000 per MWp.</p> <p><b>Operational expenditure</b></p>

ExQ1	Respondent	Question	Applicant's Response																							
			<p>The operational costs relate to all those costs that are required to keep the solar scheme operational. The key difference between the tracking system and the fixed system relates to maintenance and the fact that a tracking system has lots of moving parts over a 40-year lifetime that will need regular preventative and reactive maintenance to keep operating optimally. These costs relate to the increased frequency of servicing required for the tracking system and the likelihood for needing to replace parts and monitor performance more carefully.</p> <p>The extra cost estimated for operational costs between fixed 2V (2 modules in portrait solution) and tracker 1V (1 module in portrait solution) in terms of operational costs is around 64% or £2,100 per MWp/ year.</p> <p><b>Comparative analysis for fixed south-facing over tracking system</b></p> <p>The table below demonstrates two potential panel technology configurations demonstrating the results of a simple comparative analysis highlighting the difference between fixed system and E-W tracking system for a set of given assumptions. The two technology configurations are:</p> <ul style="list-style-type: none"> <li>• 2V (2 modules in portrait) fixed south-facing with 550W panel</li> <li>• 1V (1 module in portrait) E-W tracker with 550W panel</li> </ul> <table border="1"> <thead> <tr> <th>Panel configuration</th><th>Specific yield (kWh/kWp/year)</th><th>Energy output per hectare (MWh/ha)</th><th>Capacity per hectare (MWp/ha)</th><th>Comparison of maximum height (m)</th><th>Pitch (m)</th></tr> </thead> <tbody> <tr> <td>Fixed structure 2V</td><td>1015</td><td>1270,65</td><td>1,25</td><td>2,5</td><td>6,8</td></tr> <tr> <td>Tracker 1V</td><td>1119</td><td>1069,57</td><td>0,96</td><td>2,17</td><td>4,5</td></tr> </tbody> </table>	Panel configuration	Specific yield (kWh/kWp/year)	Energy output per hectare (MWh/ha)	Capacity per hectare (MWp/ha)	Comparison of maximum height (m)	Pitch (m)	Fixed structure 2V	1015	1270,65	1,25	2,5	6,8	Tracker 1V	1119	1069,57	0,96	2,17	4,5					
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ExQ1	Respondent	Question	Applicant's Response
			<p>The table above enables the following analysis:</p> <p><b>Panel height constraint:</b> both panel configurations fit within the 2.5m maximum panel height constraint. A tracker system would exceed the 2.5m maximum panel were it to be 2V (2 panels in portrait) given the dimensions of panels.</p> <p><b>Specific yield:</b> the tracking system can produce approximately 10% more yield than the fixed system.</p> <p><b>Energy output and capacity per hectare:</b> the tracking system needs to have a greater row pitch and therefore has a lower energy output and capacity per hectare than the fixed system by approximately 25%.</p> <p>This analysis shows that the fixed system produces more energy for a given land area at a lower cost than the tracking system when these two configurations are compared.</p> <p><b>Conclusion</b></p> <p>In conclusion the Applicant does not agree with the premise that tracking systems are able to produce a greater capacity per hectare or energy output per hectare albeit for a higher cost than fixed system in all cases. This is because design considerations limit the deployment of all permutations of technology solutions. In the case of the Sunnica scheme the constraints on the maximum panel height make the choice of E-W tracker not economically preferable.</p>
Q1.9.2	The Applicant	<b>Dual use of land</b> <ul style="list-style-type: none"> <li>Does the Applicant agree with the general proposition that the "dual use" of land for renewable energy and ecosystem services, agriculture</li> </ul>	<p>The Applicant agrees with the general proposition that the 'dual use' of land for renewable energy, agriculture or livestock has the potential to reduce solar farm operational costs and valued agricultural products.</p> <p>The Applicant has assessed and implemented the following elements within the Scheme design:</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>or livestock has the potential to reduce solar farm operational costs whilst creating new habitats and valued agricultural products. If not, please explain why?</p> <ul style="list-style-type: none"> <li>• How has the Applicant assessed, if at all, the potential offered by the Order Land for such dual use, what conclusions were reached and why?</li> </ul>	<p>The potential for reducing operational costs arises for the maintenance of the grass below and around the panels using sheep grazing versus machine cutting. The sheep can be rotated in different fields in and around the panels through the year. As well as the benefit for operational costs, it also provides farming meat production at the same time. This rotation of grazing is a commitment on page 50 of the Outline Landscape and Ecology Management Plan [APP-108] and which is secured by Requirement 8 of the draft Development Consent Order. Across the Sunnica scheme there are large areas of 'non-developable' land. Chapter 2: Scheme Description [APP-034] outlines that there will be 621ha of developable land within the 981ha available in the four sites (63%). Approximately 360ha (37%) of the four sites is land that has been set aside to provide for services including: landscape mitigation, ecological enhancements, archaeological set aside areas, ecological mitigation areas – details of all these areas can be found in Chapter 2: Scheme Description [APP-034] and the Landscape and Ecology Management Plan [APP-108].</p> <p>The non-developable areas being used as set out in the paragraph above do not reduce the solar farm operational cost. The opposite is true, they reduce the area available for developable area and therefore increase the operational costs of the plant.</p>
Q1.9.3	The Applicant	<p><b>DC Electrical boxes</b></p> <p>Table 3.2 of the Scheme Description [APP-035] lists "DC Electrical Boxes" (page 3-8).</p> <ul style="list-style-type: none"> <li>• What size are these DC electrical boxes?</li> <li>• Are the DC electrical boxes above or below ground?</li> <li>• Will they interfere with agricultural operations?</li> </ul>	<p>The approximate size of DC electrical boxes is 1500mm x 1000mm x 500mm (length X height X width).</p> <p>The boxes are located above ground and are usually located on a metal structure which could be supported by a dedicated pile or the existing piling under the solar PV panels. An example of this is shown in the images below.</p>

ExQ1	Respondent	Question	Applicant's Response
			 <p>DC Boxes are located under the PV structure and there will be minimum 0.5m of clearance between the DC boxes and the ground. Therefore, they will not interfere with agricultural operations. The only agricultural operations that is proposed in close proximity to the PV panels during the operating life of the Scheme relate to the maintenance of the grass below the panel structure by mechanical mowing or sheep grazing.</p>

ExQ1	Respondent	Question	Applicant's Response
			
Q1.9.4	The Applicant	<p><b>Jointing bays within the cable corridor</b></p> <p>Table 3.2 of the Scheme Description [APP-035] covers several pages and would benefit from repeat headers and numbering of the scheme components to aid the reader. It lists "Jointing bays within the cable corridor (Work No 4)" (page 3-14) and paragraph 3.5.7 gives dimensions of cables with dimensions of up to 30m by 8m and a depth of 2.5m.</p> <ul style="list-style-type: none"> <li>• Do the jointing bays extend above ground? and</li> <li>• Will they interfere with agricultural operations?</li> </ul>	<p>Table 3-2 of the Scheme Description [APP-035] already features a repeating header row and the Work Numbers of the scheme components are provided in the first Scheme Component column.</p> <p>The Scheme Description provided in Table 3-2 reflects the Design Principles, a certified document, provided in Appendix B of the Design and Access Statement [AS-312].</p> <p>Jointing bays do not extend above ground level, as illustrated in the cross section provided in Figure 3-24 [APP-167].</p> <p>As they are below ground level, jointing bays are not expected to interfere with agricultural operations and it is expected that agricultural operations could continue above the jointing bays.</p>
Q1.9.5	The Applicant	<p><b>Fibre bays within the cable corridor</b></p> <p>Table 3.2 of the Scheme Description [APP-035] covers several pages and would benefit from repeat headers and numbering of the scheme components to aid the</p>	<p>Table 3-2 of the Scheme Description [APP-035] already features a repeating header row and the Work Numbers of the scheme components are provided in the first Scheme Component column.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>reader. It lists “Fibre bays within the cable corridor (Work No 4)” (page 3-14) and paragraph 3.5.8 in the following section of the document gives dimensions of approximately 1.5m x 1m x 2m deep.</p> <ul style="list-style-type: none"> <li>• Do the fibre bays extend above ground? and</li> <li>• Will they interfere with agricultural operations?</li> </ul>	<p>The Scheme Description provided in Table 3-2 reflects the Design Principles, a certified document, provided in Appendix B of the Design and Access Statement [AS-312].</p> <p>Fibre bays do not extend above ground level. As noted in paragraph 3.5.8 there will be an access hatch from the surface however these will be located in hard surface or at edges of fields, as such, fibre bays are not anticipated to interfere with agricultural operations. The final locations are to be determined at detailed design.</p>
Q1.9.6	The Applicant	<p><b>Land Restoration: Removal or retention of piles</b></p> <p>Please confirm</p> <ul style="list-style-type: none"> <li>• whether it is intended to remove or retain the underground piling when the site is restored following decommissioning;</li> <li>• if the piles are to be removed, how this will be achieved;</li> <li>• if the piles are to be removed, whether and if so how they will be reused and/or recycled; and</li> <li>• if the piles are to remain, that they will not interfere with any agricultural operations or other use of the land.</li> </ul>	<p>As per Section 3.8 of Chapter 3: Scheme Description of the Environmental Statement [APP-035], there are different piling methods proposed for different infrastructure. Depending on the results of geotechnical surveys, the foundations for BESS containers, battery stations, substations, and the Burwell National Grid Substation Extension may use piles to a maximum depth of 12m. Whereas for the Solar PV Module Mounting Structures, the foundations are most likely to be steel poles driven into the ground to a maximum of 3.5m depth. The most common solution for installing these steel poles on existing UK solar farms is ramming; however, depending on ground conditions and other constraints such as buried archaeology, predrilling, micro-piles, screw foundation, or concrete foundations may be utilised.</p> <p>The shallower steel poles for the Solar PV Module Mounting Structures can be removed hydraulically (using similar equipment to that which was used to install the piles). Once removed the struts will be re-used and/or recycled in accordance with good practice at the time; the steel construction can be readily recycled in the UK.</p> <p>However, it is assumed that deeper piles associated with the BESS containers, battery stations, substations, and the Burwell National Grid Substation Extension foundations will be excavated to and cut at 1m depth using equipment such as breakers and will remain in situ following decommissioning (i.e., anything above 1m depth will be removed using standard site equipment). As piles left in situ will be below a depth of 1m, they are not expected to interfere with agricultural operations or other land uses.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Full details of the decommissioning will be provided within a detailed Decommissioning Environmental Management Plan (DEMP), that will be in substantial accordance with the Framework DEMP [APP-125] the Applicant has submitted. The Framework DEMP states that equipment on the Sites will be removed and recycled or disposed of in accordance with good practice at the time (see paragraph 2.1.1) and at paragraph 2.8.2 a Decommissioning Resource Management Plan is required to be prepared with respect to recycling and disposal.</p>
Q1.9.7	The Applicant	<p><b>Operational life of the proposed development</b></p> <p>Paragraph 3.2.4c of the Scheme Description [APP-035] says that "<i>The operational life of the Scheme is to be 40 years and decommissioning is therefore estimated to be no earlier than 2065. Some parts of the Scheme may be decommissioned earlier if the landowner requires it.</i>"</p> <ul style="list-style-type: none"> <li>• Does this mean that all land lost to agriculture will be returned to agriculture at the end of the operational life of the Proposed Development?</li> <li>• Which parts do you envisage decommissioning earlier and why?</li> <li>• How will you achieve this in a sustainable way?</li> <li>• Will any part or parts of the Proposed Development remain, for instance the below ground cabling, piling, substation and cabling required to connect to the national grid?</li> </ul>	<p>Decommissioning of the authorised development will be undertaken pursuant to the approved Decommissioning Environmental Management Plan (DEMP) that must be approved prior to decommissioning under requirement 22 of the draft DCO. The DEMP must be substantially in accordance with the Framework Decommissioning Environmental Management Plan that has been submitted with the DCO Application in Appendix 16E of the Environmental Statement [APP-125]. The DEMP will enable the land, once decommissioned, to be returned to agriculture. Once decommissioning is complete, the land will be returned to the landowner pursuant to the terms of the respective Leases (which will then end). At that point, the Applicant will have no control over the land, but the land will be in a condition that can be returned to agriculture by its freehold owner.</p> <p>It should be noted that the following would not be removed as part of the decommissioning under the approved DEMP, but they form a minority of the Order limits:</p> <ol style="list-style-type: none"> <li>1. landscape and ecological enhancements;</li> <li>2. the Burwell Substation Extension (should it be required), which would be handed to NGET.</li> </ol> <p>In addition, the underground cables connecting the on-site substations, the underground cable along the cable route to the Burwell National Grid Substation, and any other infrastructure below one metre in depth will remain in situ following decommissioning, unless legislation at the time requires otherwise. Leaving this infrastructure in the ground below one metre in depth would not restrict agricultural use of the land following decommissioning and aligns with current industry practice.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>The impact of the Scheme's use of agricultural land is set out in Chapter 12 Socio-Economics and Land Use [APP-044]. This highlights that there is 'a negligible effect' to the Agricultural Land Resource and therefore the impact is not considered to be significant.</p> <p>The land will retain its agricultural status – the land will not have Brownfield status after decommissioning - and the Framework Construction Environmental Management Plan (CEMP) [APP-123] states that a soil management plan will be produced post consent; the purpose of this document is to expand the mitigation measures presented in the ES to protect soils, such as avoiding heavy vehicle movements during periods of heavy rain (to minimise soil compaction) and appropriate storage and management of top soils that are excavated. Chapter 12 Socio-Economics and Land Use [APP-044] demonstrates that there will be a negligible effect on soil resources, which is not considered significant. Other than the small areas of land permanently lost to landscaping and ecology enhancement or to the Burwell Substation Extension, the land can be returned to agricultural use (and indeed is largely available for some agricultural use during operation such as sheep farming).</p> <p>Regarding "early decommissioning", under the private terms of the voluntary leases there is the ability for the landlord of certain small discreet developable areas of the Scheme to elect for those discreet areas to be returned before the end of the full lease. If this election happened, then the Applicant would submit the DEMP for those discreet areas to the respective local planning authority and upon approval, decommission the Scheme in that part and return the land parcel to the landowner upon which the landowner could return it to agricultural use before the end of the wider Lease. As will be appreciated, these are commercial terms which remain confidential.</p> <p>The Framework Decommissioning Environmental Management Plan (DEMP) [APP-125] outlines how the Scheme will be decommissioned sustainably. As explained above, these principles will also apply to any infrastructure that is decommissioned prior to the end of the 40 year operational life. Paragraph 2.1.1 of the Framework DEMP commits to: "All equipment located on the Sites will be removed and recycled or disposed of in accordance with good practice at the time". Section 2.8, along with Tables 3-1 and 3-11, of the Framework DEMP provides more detail and commit to: "Increasing recyclability by segregating decommissioning waste to be reused and recycled where reasonably</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>practicable;... Disposing of wastes locally where reasonably practicable to reduce emissions associated with transportation”, and “The core waste management principles of prevention, reuse, recycle, recover and disposal as defined in the ‘Waste Hierarchy’ will be embedded within the Decommissioning Resource Management Plan (DRMP) and the DEMP(s), produced by the contractor prior to decommissioning.</p>
Q1.9.8	The Applicant	<p><b>Land use and food production</b></p> <ul style="list-style-type: none"> <li>• What area of agricultural land will be lost to the Proposed Development?</li> <li>• How much agricultural land relates to arable and how much is pasture?</li> <li>• What crops are currently grown on this land?</li> <li>• How much land is used for grazing livestock?</li> <li>• What are the actual current yields in terms of arable, pasture and livestock?</li> <li>• What is the estimated loss in yield due to the Proposed Development?</li> </ul>	<p>The Sites cover an area of approximately 981ha of predominantly agricultural land. The proposed development consent for the Scheme includes a requirement limiting its operation and requiring that decommissioning of the Scheme will commence after no more than 40 years of operation (Requirement 22 in Schedule 2 to the draft DCO). The Scheme is therefore temporary and reversible. Upon decommissioning the Sites will be returned to the landowners and would be available for agricultural use. Agricultural land use is maintained throughout the operational period, the land below and between the solar panel rows being managed as low input pasture available to be grazed. Therefore, loss of agricultural land will be minor, limited to the small areas of landscaping, ecological enhancement and the Burwell Substation Enhancement. For the vast majority of the Sites, there will be no loss of agricultural land.</p> <p>Current cropping on the arable land includes cereals in rotation with irrigation dependant crops such as potato, carrot and onion. Some farms also include outdoor pigs (the land let to the pig producer) in their arable rotation.</p> <p>Agricultural land within the Sites is predominantly in arable rotations. Some livestock is rotated on this arable land, for instance outdoor pigs housed temporarily on fields. A single area of land with no arable cropping was identified by the agricultural field survey work. This is the low lying land to the north of Snailwell (south west of Chippenham Fen). The area is estimated as being less than 30ha. The land form (tussocks, ditches and hollows) indicates that this land has not been cultivated in modern times. To the east of Snailwell (south west of Foxburrow Plantation) are a group of fields that when surveyed, were managed for grazing. The high quality fencing suggests that the paddocks have equestrian use, but were also grazed by cattle when surveyed. This is a common practice to manage weed species that horses may avoid grazing. In contrast to the pasture north of Snailwell this land had been cultivated and reseeded to establish a</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>pasture. These fields could be cultivated for arable crops and may have been over the last decade.</p> <p>Information on yield has not been requested from the agricultural occupants. Such information is not relevant to the ALC grade or an application for development consent. As noted on page 2 of Natural England's TIN049, "<i>The current agricultural use, or intensity of use, does not affect the ALC grade.</i>"</p> <p>Yield is sensitive to natural variables such as weather and drought curtailment of irrigation. It is also subject to land management decisions, and the market and regulatory influences on land management. Yield is also not the only measure of a crop value. For instance, a farmer will manage fertiliser for a malting barley crop to keep protein content down (as required by the brewing industry) with the intention that the premium price for such a crop will outweigh the lost tonnage per hectare when compared to a lower value feed barley crop. Were yield to be taken into consideration for land use planning, it would give landowners a perverse incentive to deliberately suppress yield in order to secure planning consent.</p> <p>No estimate of a loss of yield caused by the proposed development has been made. Were it possible to have confidence in making such an appraisal, the estimate would not be relevant to a planning application. Any such estimation would also have to be considered against the background noise. For instance, the Defra UK Food Security Report for 2021 notes that UK wheat yield dropped by 40% in 2020 owing to adverse weather.</p> <p>The Applicant notes that, in terms of the policy tests relevant to the consideration of the Application, these are as set out at Section 6.12 of the Planning Statement [APP-261] and relate to the impact of the proposed scheme on BMV land, as informed by the ALC grades. The relevant assessment for policy purposes (and therefore decision-making purposes under the Planning Act 2008) is one that is based on the grade of the agricultural land, rather than its current use (including whether it is currently grazed or current yields).</p>



## 12 Topic 1.10 Traffic, Transport and Highway Safety

ExQ1	Respondent	Question	Applicant's Response
Q1.10.1	The Applicant	<b>General</b>  Both the Transport Assessment [APP-117] and the Framework Construction Traffic Management and Travel Plan [APP-118] contain many figures, in the form of maps, photographs and swept path diagrams. To aid our understanding of the Proposed Development, for each figure, please ensure that v) each photograph is labelled with the direction of view and all street names; and ii) each map and swept path diagram has a clear legible background identifying the location, a north point and all street names, and includes vehicle configuration and direction of travel.	The Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been updated alongside the Applicant's Proposed Changes to the Application [AS-243], which was accepted by the Examining Authority in its procedural decision contained in Appendix B to its letter dated 4 October 2022. The updated Framework Construction Traffic Management Plan and Travel Plan have been given examination library references <b>AS-300</b> and <b>AS-301</b> . These documents include the swept path analysis along the crane and Abnormal Indivisible Load (AIL) routes provided within the main body of the report. This information therefore supersedes Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118]. The figures provided within the main body of the report includes location, north arrow, street names, direction of travel (entry/egress) and vehicle profile for the swept path analysis.
Q1.10.2	The Applicant	<b>General</b>  The pages of the annexes and appendices to annexes which form part of the Framework Construction Traffic Management and Travel Plan [APP-118] do not carry the document header and are not consecutively numbered. For example, the final page (21) of Annex D2 has no document title header and is followed by Annex E - Stage 1 Road Safety Audit which has a document header but is page number 13C-64. However, page 13C-63 does not immediately precede page 13C-64 but is the Annex D header sheet.	Noted, formatting will be amended where required in the next revision of the document which is intended to be submitted at a future Deadline and revised to take into account the Applicant's consideration of the Local Impact Report.

ExQ1	Respondent	Question	Applicant's Response
		To aid our understanding of the Proposed Development, please ensure that each page of the Framework Construction Traffic Management and Travel Plan [APP-118] carries the full document header, and is consecutively numbered and properly identified.	
Q1.10.3	The Applicant	<p><b>General</b></p> <p>Reference is sometimes made to a Construction Traffic Management Plan, for example in paragraph 7.3.1 of the Framework Construction Traffic Management and Travel Plan [APP-118], but then there is reference to a Transport/Travel Plan coordinator in paragraph 7.3.2 of the Framework Construction Traffic Management and Travel Plan [APP-118].</p> <p>Will the Framework Construction Traffic Management and Travel Plan [APP-118] be developed into separate Construction Traffic Management and Travel Plans?</p>	<p>It is envisaged that the Framework Construction Traffic Management Plan and Travel Plan will be developed into a separate Construction Traffic Management Plan and a Travel Plan, pursuant to requirement 16 contained in Schedule 2 to the draft DCO.</p> <p>The provision of a combined Framework Construction Traffic Management Plan and Travel Plan was agreed within the local highway authorities in a meeting on 25/03/2021.</p>
Q1.10.4	The Applicant	<p><b>Other projects - A11 Barton Mills/Fiveways junction</b></p> <p>Improvement of the nearby A11 Fiveways junction at Barton Mills is in the National Highways five-year delivery plan for 2020 to 2025.</p> <p>How has this been taken into account in your plans for the construction and operation of the proposed development?</p> <p>Are there any other projects which need to be taken into account?</p>	<p>The improvements to the A11 Fiveways junction are intended to improve the operation of the junction. Therefore, those travelling to/from the scheme via the A11 Fiveways would benefit through the improvements of the Fiveways junction once those works have been completed. In the event of diversions or closure of the A11 or the Fiveways junction during construction period of that improvement scheme, the construction vehicles travelling to or from the Sunnica Energy Farm would follow the signposted diversions. Any diversions and traffic management that National Highways put in place for any works on the Strategic Road Network will need to be suitable to accommodate all traffic on the network, of which the proportion associated with Sunnica is minimal. It is therefore reasonable to conclude that the use of any diversionary routes would not result in additional impacts requiring assessment.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>In addition, National Highways has made the Applicant aware of plans for gap closures of the A11 between Red Lodge and Fiveways. The proposed scheme consists of three gap closures and is scheduled for 2022-2023. Given the scheduling of this scheme, it is likely to be complete prior to commencement of construction. In the event that it is delayed, construction traffic travelling to/from the Sunnica Energy Farm will follow any signposted diversions if required. As stated above, any diversions and traffic management that National Highways put in place for any works on the Strategic Road Network will need to be suitable to accommodate all traffic on the network, of which the proportion associated with Sunnica is minimal. It is therefore reasonable to conclude that the use of any diversionary routes would not result in additional impacts requiring assessment.</p>
Q1.10.5	The Applicant	<p><b>Abnormal loads</b></p> <p>Do you envisage plant and materials being imported through ports? If so, which ones have you considered? and Which routes would you use for abnormal loads to access the various parts of the proposed development?</p>	<p>It is envisaged that plant and materials would be imported using ports. At this stage it is not yet known precisely which port would be used. Consideration has been given to the use of Ipswich Docks or Immingham Docks with Southampton Docks and Liverpool Docks considered unlikely at this stage, given the distance from the site. The port used will have well established road access infrastructure for use to transport abnormal loads to the Strategic Road Network. The A14 and A11 form the parts of the Strategic Road Network which will be used to transport abnormal loads to the vicinity of the site.</p> <p>As part of the Framework Construction Traffic Management Plan and Travel Plan [APP-118], a route review for cranes and Abnormal Indivisible Loads (AILs) was undertaken from the A14 and A11 to the required site accesses. The routes which are included within the reviews and the swept path analysis of the AILs are shown in Figure 21 in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301].</p> <p>These routes include the A11 to Elms Road to access Sunnica East Site B and A11 to La Hogue Road to access Sunnica West Site A. In addition, the A11 would be used to access Sunnica East Site A via the B1105 and B1102. The route to National Grid Substation at Burwell has been identified via the A14, B1103, Reach Road and Weirs Drove.</p> <p>The route review identified that there was a practical and achievable route from the Strategic Road Network to the site accesses that were required. In places, temporary signage removal was identified to accommodate the crane or AIL swept paths. The swept path analysis for the AILs is provided within the updated</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Framework Construction Traffic Plan Management and Travel Plan <b>[AS-300, AS-301]</b> and have superseded the information provided in Appendix C of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b>.</p>
Q1.10.6	The Applicant	<p><b>Abnormal loads</b></p> <p>Is there a report giving a detailed operational assessment of the routes to be used for access to the various parts of the site by abnormal loads, giving details of matters including vehicle configurations, structural restrictions, structural assessments, route inspections, parking restrictions, traffic management, temporary diversions (particularly for emergency vehicles), movement timings under police escort, and removal and replacement of street furniture?</p> <p>If so, please provide it and summarise its contents and conclusions.</p>	<p>The report to be referred to is the updated Framework Construction Traffic Management Plan and Travel Plan, and the document references are <b>AS-300</b> and <b>AS-301</b>, which demonstrates the accessibility of the site from the Strategic Road Network. The vehicle configuration of the AILs are identified in Figure 14 - Figure 19. Other than the weight limit of the bridge at the Ferry Lane / Isleham Road junction (Unique Street Reference Number: 14601046), which is discussed in Q1.10.12, and in paragraphs 5.6.3 and 5.6.4, no other structural restrictions have been identified.</p> <p>The finalised route of the abnormal vehicles will be identified and planned by an experienced haulier in compliance with the regulations that govern the movements of abnormal loads on the highway network. At this stage no temporary diversions are considered required as the AILs are expected to be escorted to the proposed scheme. The street furniture required to be temporarily removed to allow the AILs to pass are identified throughout Chapter 5 of the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p> <p>At this stage, the Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> is a Framework document, and the full Construction Traffic Management Plan will be produced by an experienced contractor. The Framework Construction Traffic Management Plan establishes the parameters and ensure that the proposed Scheme is deliverable in providing access for the required AILs. The updated Framework Construction Traffic Management Plan and Travel Plan document references are AS-300 and AS-301. Requirement 16 contained in Schedule 2 of the draft DCO requires the relevant county authority's approval of the Construction Traffic Management Plan before the commencement of the development.</p> <p>In addition, the locations at which it is proposed to temporarily remove street furniture to enable the passage abnormal loads are listed in Part 2 of Schedule 5 to the draft DCO and are shown on the Access and Rights of Way Plans <b>[AS-257]</b>. The Applicant confirms that temporary removal of street furniture includes</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>the prompt reinstatement of that furniture once the relevant vehicles have completed their transit.</p>
Q1.10.7	The Applicant	<p><b>Abnormal loads - cranes and transformers</b></p> <p>Please confirm that both cranes and transformers will be AIL.</p> <p>Will there be any other loads which are AIL?</p> <p>Will there be any abnormal loads which are not AIL? If so, please explain.</p>	<p>It is correct that cranes and the vehicles used to transport the transformers will be AILs. The vehicles to be used to transport the transformers are expected to be either STGO CAT 2 or STGO CAT 3 low loader. The Government Guidance on abnormal loads identifies an AIL to be a vehicle with any of the following:</p> <ul style="list-style-type: none"> <li>• A weight more than 44,000kg</li> <li>• An axle load of more than 10,000kg for a single non-driving axle and 11,500kg for a single driving axle</li> <li>• A width of more than 2.9 metres</li> <li>• A rigid length of more than 18.65 metres.</li> </ul> <p>The number of AILs are outlined within the Framework Construction Traffic Management and Travel Plan <b>[APP-118]</b> in Table 2-2. An update of the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> has been provided with further explanation provided regarding the definition of an AIL above and also in paragraph 2.3.13 of the update Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>. Due to the length and weight of the cranes and the size of the transformers, the vehicles are all expected to be AILs. For the purposes of the scheme assessment and ensuring that construction routes can accommodate the largest vehicles expected to use the site, all abnormal loads are considered to be AILs.</p> <p>In some instances, there may be opportunities for Abnormal Loads to be divided into smaller delivery vehicles. However, for the purposes of the assessment, the worst-case of the loads being indivisible has been assumed.</p>
Q1.10.8	The Applicant	<p><b>Abnormal loads - permitting</b></p> <p>Item 5 of the Consents and Agreements Position Statement <b>[APP-021]</b> refers to the need for a permit for the transport of abnormal loads.</p> <p>Please</p>	<p>It is correct that the transportation of abnormal loads and AILs will be undertaken in line with the Government and the local highway authority's guidance, and that timely applications will be made. Advance notice will be given to the Department for Transport, National Highways, the relevant highway authorities, the police and bridge owners where necessary in line with the requirements depending on the vehicles' weight, width and length which applies to abnormal loads and AILs.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>vi) confirm that timely applications will be made to the Department for Transport, National Highways, the relevant highways authority, the police and bridge owners as necessary;</p> <p>vii) explain the process; and</p> <p>confirm that it applies to all abnormal loads and not just abnormal indivisible loads.</p>	<p>The precise process and procedure that applies will vary depending on the dimensions of the AIL, and Highways England (now known as National Highways) have produced a useful aide memoire for the notification requirements for the movement of abnormal indivisible loads or vehicles by road when not complying with the Roads (Vehicles (Construction and Use) Regulations 1986, which is reproduced as an Appendix to the Transportation Technical Note [APP8.42] as outlined in chapter 11 of that document which is also submitted at Deadline 2. In general terms, this explains that for smaller abnormal loads (whether or not they are indivisible) it is sufficient to give 2 clear days' notice to the relevant authorities, and in the case of larger vehicles as much as 10 weeks' notice may be required to enable National Highways to prepare a Special Order. Before movements of the AILs the police and other relevant authorities will be given advanced notification in accordance with the provisions of the Road Vehicle Authorisation of Special Types Order 2003 as they apply to the specific AIL movement in question.</p> <p>The haulier of the AIL will be responsible for the final route survey and arranging the temporary removal of any street furniture. Information provided of the route review is provided within the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301] which supersedes the information provided in Appendix D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118].</p> <p>For the purposes of the assessment of the Project, all abnormal loads are considered to be AILs, as a "worst- case".</p>
Q1.10.9	The Applicant	<p><b>Abnormal loads - trips and routes</b></p> <p>In paragraph 1.1.4 e of the Transport Assessment [APP-117] you quote up to 16 abnormal indivisible loads (AIL) per substation, 52 in total.</p> <ul style="list-style-type: none"> <li>i) Do these figures include the substation extension at Burwell?</li> <li>ii) How many other abnormal loads will there be?</li> <li>iii) What will be the total number of trips (ie delivery trip plus return trip)?</li> </ul>	<p>(i) Paragraph 1.1.4 e_ of the Transport Assessment confirms that 'up to' 16 abnormal indivisible loads (AILs) are required per substation with 52 in total. It is confirmed that this total includes the substation extension at Burwell, if Option 2 were to proceed. However, as set out in the Applicant's Change Request [AS-243] the total number of AILs is expected to be reduced if the Applicant proceeded with Option 3 because it would decrease the number of AILs as a result of there being one fewer substations required for the overall project (see row 13 of table 5-1 of the Applicant's Proposed Changes Application (AS-243). If the Applicant were to proceed with Option 2 the number of AILs quoted in paragraph 1.1.4 e of the Transport Assessment would</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>iv) Which routes are specified for each delivery location? And What physical mitigation measures, temporary or permanent, will be required?</p>	<p>remain unchanged, this is confirmed in row 13 of Table 4-1 of the Applicant's Proposed Changes Application <b>[AS-243]</b>.</p> <p>(ii) No other abnormal loads are anticipated, i.e. there will be a maximum of 52 in total throughout the construction.</p> <p>(iii) The numbers identified in Table 2-2 of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> and also in the updated version of that document submitted with the Applicant's Proposed Changes Application <b>[AS-300, AS301]</b> are the number of vehicles associated with all of the sub-stations contained within the respective sites. Therefore, there would be one inbound trip and one outbound trip associated with each of these vehicles.</p> <p>(iv) The haulier of the AIL will undertake a detailed route review for each AIL. However, the route review provided within the main body of the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300]</b> and demonstrates there is a viable route from the Strategic Road Network to the required site accesses for the AILs.</p> <p>The routes which are included within the route reviews and the swept path analysis of the AILs are shown in Figure 21 in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> submitted with the Applicant's Proposed Changes Application. These routes include the A11 to Elms Road to access Sunnica East Site B and A11 to La Hogue Road to access Sunnica West Site A. In addition to this, the A11 would be used to access Sunnica East Site A via the B1105 and B1102. The route to National Grid Substation at Burwell has been identified via the A14, B1103, Reach Road and Weirs Drove.</p> <p>The temporary works to facilitate the passage of the AILs are identified within Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> with the physical temporary works including temporary removal of street furniture to accommodate the swept path of the AILs where it overhangs the verge referenced throughout Chapter 5 of the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>. All the identified measures are temporary and are reflected in Part 2 of</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Schedule 5 to the draft DCO [<b>AS-293</b>] to be carried out at the corresponding locations shown on Access and Rights of Way Plans [<b>AS-257</b>]. No permanent physical mitigation works are required.</p>
Q1.10.10	The Applicant	<p><b>Abnormal loads - signage and street furniture</b></p> <p>In Annex D to ES Appendix 13C [APP-118] which deals with the routes to be used by cranes to access the proposed development, you state in several places that it will be necessary to remove signage and street furniture temporarily.</p> <p>In paragraph 5.5.1a of ES Appendix 13C [APP-118] you state, with reference to La Hogue Road, that "<i>signage will be promptly reinstated</i>".</p> <p>Please confirm in the interests of safety that, wherever you propose to remove signage and street furniture temporarily to allow the passage of abnormal loads, this signage and street furniture will be replaced as soon as the abnormal load has passed.</p>	<p>That is correct. All street furniture (including signage) that is required to be removed temporarily to enable the passage of abnormal vehicles will be replaced promptly after the abnormal vehicle has passed.</p>
Q1.10.11	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Pages 16 and 17 of Annex D to ES Appendix 13C [APP-118] describe the proposed crane access route to Sunnica East Site A from the A11 northbound, via the B1085 through Chippenham, the B1104 and the B1102 to Ferry Lane.</p> <p>v) Will this route also be used for access by transformers? and</p>	<p>(i) Swept path analysis has been undertaken for the vehicle that would transport the transformer using a 46.63m (long) AIL with the information provided within the updated Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>]. The updated Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>] has superseded the information provided in Annex D of the Framework Construction Traffic Management Plan and Travel Plan [<b>APP-118</b>]. This demonstrates the AIL used to transport the transformer can use the same route as</p>

ExQ1	Respondent	Question	Applicant's Response
		if the crane is to access the site from the north via the A11 southbound, how will this be achieved?	<p>the crane route originally set out in the Framework Construction Traffic Management Plan and Travel Plan [APP-118].</p> <p>(ii) If the crane/AIL accessed the site from the north it would be expected that this would be via the A11 southbound off-slip and via the Red Lodge Dumbbell Roundabouts and via Elms Road. The haulier of the AIL will undertake the final route review, if that route is required. However, the route review provided within the Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301] demonstrates there is a viable route from the Strategic Road Network to the required site accesses.</p>
Q1.10.12	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Pages 16 and 17 of Annex D to ES Appendix 13C [APP-118] describe the proposed crane access route to Sunnica East Site A, via the B1085 through Chippenham, the B1104 and the B1102 to Ferry Lane.</p> <p>Paragraph 5.6.4 of ES Appendix 13C [APP-118] states that "<i>the weight limit of the bridge on Ferry Lane is 44 tonnes</i>".</p> <p>Please</p> <ul style="list-style-type: none"> <li>i) Advise who owns and maintains the bridge;</li> <li>ii) supply swept path diagrams for the bridge and for the junction;</li> <li>iii) supply vertical clearance diagrams for the bridge;</li> <li>iv) advise in which direction the photograph at Figure 32 has been taken;</li> <li>v) give an update in respect of the weight restriction on the bridge;</li> </ul>	<ul style="list-style-type: none"> <li>i. The bridge in question is owned and maintained by Historical Railways Estate (on behalf of Department for Transport). This was identified during email correspondence in May 2021 with National Highways (previously Highways England) and Historical Railways Estate.</li> <li>ii. As a result of the bridge weight limit, an alternative route was identified via Beck Road which did not require the AILs/cranes to pass over the bridge. Therefore, no vehicle swept paths were undertaken of an AIL/crane over the bridge in question as it is not proposed to be used for such vehicles.</li> <li>iii. The vehicle is not proposed to travel under the bridge, so no vertical clearance diagrams are required. Swept paths of the AILs are provided accessing the scheme via Sunnica East Site A: Site Access K located on Beck Road as shown in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301]</li> <li>iv. Google Earth Aerial Photography is provided in Figure 32 and is therefore taken from a birds eye view of the proposed site access with La Hogue Road running in a north-south direction.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
		<p>vi) advise of any measures, particularly in respect of the bridge, which would make the route viable;</p> <p>vii) confirm or otherwise that your chosen route is viable; and</p> <p>viii) advise of your access proposals should this route no longer be viable.</p>	<p>v. As a result of the bridge weight limit, an alternative route was identified via Beck Road which did not require the AILs/Cranes to pass over the bridge. Therefore no update is needed.</p> <p>vi. An alternative route has been identified and therefore there is no need for measures in respect of the bridge to make the route viable.</p> <p>vii. And (viii); It is confirmed the AIL route identified in Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b>, which avoids using the weight restricted bridge that is the subject of this question, related to the site access on Beck Road is viable.</p> <p>It should be noted that, the information previously provided in Annex D of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> has been superseded with the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p>
Q1.10.13	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraph 5.6.5 of ES Appendix 13C [APP-118] states that "<i>an additional review of the site access options for the cranes for the Ferry Lane site access was undertaken</i>".</p> <p>Why was an additional review undertaken?</p>	<p>The additional review was undertaken due to the weight limit identified on the bridge in question as per the response above in Q1.10.12. The swept paths of the AIL are identified in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> and summarised in section 5 of that document.</p>
Q1.10.14	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraph 5.6.6 of ES Appendix 13C [APP-118] says that "<i>the existing agricultural access on Beck Road (alternative option 2) has been identified as the preferred site access for the cranes</i></p>	<p>The vehicle route to Sunnica East Site A: Site Access E on Ferry Lane is via a Ferry Lane / Isleham Road junction where a bridge is located. It was identified that there is a weight limit on the bridge as discussed in response to Q1.10.12. Therefore, an alternative site access was identified for Abnormal Indivisible Load (AILs) to use which is referenced as Sunnica East A: Site Access K on Beck Road. In summary, the Ferry Lane (Site Access E) will accommodate HGVs and</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>and AILs ... The other HGVs using the existing site access on Ferry Lane".</i></p> <p>Paragraph 5.9.3 of ES Appendix 13C [APP-118] states that "<i>This access will only be used for entry and egress of cranes with HGVs and the mini-bus using the site access on Ferry Lane</i>".</p> <p>Please confirm that, to enter and leave Sunnica East Site A,</p> <ul style="list-style-type: none"> <li>i) all abnormal loads including AIL and cranes will use access K on Beck Road; and</li> <li>all HGV will use access E on Ferry Lane.</li> </ul>	the Beck Road (Site Access K) will accommodate AILs and the locations are identified on ES Figure 3-13 [APP-152].
Q1.10.15	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>On page 9 of Annex D2 to ES Appendix 13C [APP-118], dealing with the route to and from the A11, you say that "... <i>the number 1 identifying the approximate location of site access option 1 and the number 2 the approximate location site access option 2</i>".</p> <p>Please confirm that</p> <ul style="list-style-type: none"> <li>i) this annex relates to an alternative access to Sunnica East Site A;</li> <li>ii) Figure 17 relates to the entry route as implied in paragraph 2.1; and</li> </ul> <p>resubmit Figure 17 at a suitable scale and clarity, showing Options 1 and 2 clearly.</p>	<p>We can confirm that Annex D2 of [APP-118] relates to an alternative option for AIL access to Sunnica East Site A. This alternative Sunnica East Site A site access is referred to as Site Access K on Beck Road which is to be used for AILs only (not HGVs) during the construction phase. Figure 3 in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS301] identifies the location of the Site Access E on Ferry Lane for Sunnica East Site A which is to be used by HGVs. Figure 3 in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS301] identifies the location of the Site Access K on Beck Road for Sunnica East Site A which is to be used by AILs.</p> <p>We can confirm that Figure 17 relates to the entry and egress out to/from this site access.</p> <p>An overview of the AIL route review is provided within the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301] in Figure 21. Option 2 described on page 9 of Annex D2 of [APP-118] has not been taken forward and as a result is not shown in Figure 21 in the updated Framework Construction Traffic Management Plan [AS-300, AS-301].</p> <p>A package of site access drawings has been provided to the local highway authorities for comments. These site access drawings are currently being updated and will be provided in the next iteration of the Framework Construction</p>

ExQ1	Respondent	Question	Applicant's Response
			Traffic Management Plan and Travel Plan which is expected to be submitted at a future Deadline and which will be updated to reflect the Applicant's consideration of the Local Impact Report [REP1-024].
Q1.10.16	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraphs 2.2, 2.3 and 2.4 of Annex D2 to ES Appendix 13C [APP-118] deal with the Beck Road/Ferry Lane egress and entry manoeuvres. However, paragraph 2.5 deals only with the right turn egress manoeuvre from Ferry Lane onto B1102 Mildenhall Road.</p> <p>Please advise whether the left turn from B1102 Mildenhall Road to Ferry Lane can be made safely within highway land and whether it will be necessary to remove the traffic signs temporarily.</p>	<p>It is confirmed the left turn from B1102 Mildenhall Road to Ferry Lane can be made safely within highway land. The swept path analysis for the 1000T crane and 46.63m AIL is shown in Figure 28 of the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>. Figure 28 shows that at the B1102 Mildenhall Road/Ferry Lane junction the 1000T crane can manoeuvre the junction within the carriageway with the body slightly overhanging the verge at the junction.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews which is shown in the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p> <p>The purpose of the route reviews were to identify that a route from the Strategic Road Network to the required site accesses was possible for the cranes and AILs. The 46.63m AIL will be disassembled into smaller pieces before it makes its egress journey and therefore it is not considered to be an AIL or require swept path analysis of the egress journey.</p> <p>The outbound swept path analysis was undertaken however, and as no issues were identified, the swept path was not presented in the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b>. The haulier will be responsible for the final route of the AILs.</p>
Q1.10.17	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraphs 2.2, 2.3 and 2.4 of Annex D2 to ES Appendix 13C [APP-118] deal with the Beck Road/Ferry Lane egress and entry manoeuvres. However, paragraph 2.6 deals only with the right turn egress</p>	<p>We can confirm that the left turn from The Street onto B1102 Mildenhall Road can be made safely within highway land and without affecting the tree in the central reservation.</p> <p>Figure 27 in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-302]</b> provides the swept path for the 1000T crane at the B1102 The Street / Mildenhall Road Junction.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>manoeuvre from B1102 Mildenhall Road onto The Street.</p> <p>Please advise whether the left turn from The Street onto B1102 Mildenhall Road can be made safely within highway land and without affecting the tree in the central island.</p>	<p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p>
Q1.10.18	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraphs 2.2, 2.3 and 2.4 of Annex D2 to ES Appendix 13C [APP-118] deal with the Beck Road/Ferry Lane egress and entry manoeuvres. However, paragraph 2.7 deals only with the egress manoeuvre from B1102 Fordham Road onto B1104.</p> <p>Please advise whether</p> <ul style="list-style-type: none"> <li>i) the turn from B1104 onto Fordham Road can be made safely within highway land and</li> </ul> <p>the full width of both roads would be required.</p>	<p>We can confirm the turn from B1104 onto Fordham Road can be made safely within highway land. We can confirm the full width of both sides of the carriageway would be required. When performing this manoeuvre the vehicle would be under escort to/from the site which is the normal practice.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p>
Q1.10.19	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraph 2.8 of Annex D2 to ES Appendix 13C [APP-118] is headed "B1104 to B1085 High Street" and states that "<i>The 1000T crane can manoeuvre the right turn from B1104 onto B1085 High Street</i>".</p> <p>Please</p> <ul style="list-style-type: none"> <li>i) confirm that the manoeuvre from B1104 onto B1085 is a left turn and is the</li> </ul>	<p>We can confirm the manoeuvre from B1104 onto B1085 is a left turn at the T-Junction as shown in Figure 35 in Annex D2 to ES Appendix 13C <b>[APP-118]</b>.</p> <p>We can confirm the entry manoeuvre from B1085 onto B1104 can be made safely within highway land and no road traffic signs would be required to be temporarily removed.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>egress manoeuvre as shown on Figure 35; and advise whether or not the entry manoeuvre from B1085 onto B1104 can be made safely within highway land and whether any road traffic signs would require temporary removal.</p>	
Q1.10.20	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraph 2.9 of Annex D2 to ES Appendix 13C [APP-118] is headed "Chippenham" and includes Figures 37 to 42.</p> <p>Should Figures 39 and 40 refer to the East S-bend?</p> <p>Please confirm that the entry manoeuvres can also be made safely within highway land without removal of street furniture or road traffic signs.</p>	<p>It is confirmed Figures 39 and 40 should refer to the 'East S-Bend'. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [REP1-024].</p> <p>We can confirm the entry manoeuvre in question can be made safely within highway land without removal of street furniture or road traffic signals.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301]. The swept path analysis within Chippenham at the two 'S' bends are provided for the 46.63m AIL and 1000T crane within Figure 24 to Figure 26 of the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301].</p>
Q1.10.21	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site A</b></p> <p>Paragraph 2.10 of Annex D2 to ES Appendix 13C [APP-118] is headed "Dane Hill Roundabout" and includes Figures 43 and 44.</p> <p>Please confirm that the entry manoeuvre from the A11 off slip left onto the B1085 can also be made safely within highway</p>	<p>No constraints were identified for the manoeuvre from the A11 off-slip onto the B1085.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in Figure 23 of the Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301].</p>

ExQ1	Respondent	Question	Applicant's Response
		land without removal of street furniture or road traffic signs.	
Q1.10.22	The Applicant	<p><b>Abnormal loads - access to Sunnica East Site B</b></p> <p>Paragraph 5.9.4 of ES Appendix 13C [APP-118] and pages 23, 24 and 25 of Annex D to ES Appendix 13C [APP-118] describe the proposed crane access route to Sunnica East Site B, with entry from the A11 northbound off slip to Elms Road and egress via the Red Lodge dumb-bell roundabout junction.</p> <p>i) If the crane is to access the site from the north via the A11 southbound, how will this be achieved?  ii) Will this route also be used for access by transformers? and</p> <p>In the title to Figure 36 on page 13C-40, should "Beck Road" read "Elms Road"?</p>	<p>The purpose of the route reviews were to identify that a route from the Strategic Road Network to the required site accesses was possible for the cranes and AILs. The route review demonstrates there is a feasible route for the AILs between the A11 and the required site accesses. An experienced haulier who specialises in AILs would be responsible for the final route and coordination with the relevant authorities e.g., the police and the local highway authorities. If the haulier chose to utilise an alternate route of the crane accessing the site from the north it would be expected that this would be via the A11 southbound off-slip and via the Red Lodge Dumbbell Roundabouts and via Elms Road. The haulier of the AIL will undertake the final route review.</p> <p>The route review included within the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>, as shown on drawing number 60589004_ES_CTMP_016 in Figure 23 (Page 13-C-40) identifies that the 46.63m AIL used to transport the transformer could use the same route.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p> <p>We can confirm that Figure 36 on page 13C-40, should read "Elms Road". This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will also take into account the Applicants response to the Local Impact Report [REP1-024].</p>
Q1.10.23	The Applicant	<p><b>Access to Sunnica East Site B</b></p> <p>Paragraph 5.9.5 of ES Appendix 13C [APP-118] says that "<i>Figure 37 presents a selection of swept path analysis of a large car for entry and egress into Sunnica East Site Access C on Elms Road (Site Access C)</i>".</p>	<p>The word 'selection' was intended to mean that a variety of combinations of movements were shown to demonstrate that construction staff vehicles can pass one another upon entering and egressing the Sunnica East Site B: Site Access C on Elms Road at the same time. It was not intended to suggest that only the worst-case movements were presented. The movements show two vehicles passing each other along Elms Road to the south and two vehicles passing each</p>

ExQ1	Respondent	Question	Applicant's Response
		Please explain how you know that the selection includes the worst case.	other to the north. This demonstrates construction staff can pass one another entering and egressing the site access.
Q1.10.24	The Applicant	<p><b>Access to Sunnica East Site B</b></p> <p>With reference to Annex C1 to ES Appendix 13C [APP-118]: Table 8 on page 29 is headed "Sunnica East - Access I" but related Figure 21 is headed "Sunnica East Access J". Figure 22 (Access I) states that Access I is "<i>only to be used in the operational phase</i>". Figure 3-13 shows access I coloured grey (secondary access: construction and decommissioning) and adjacent to the A11, and access J coloured green (secondary access: operation only) on Golf Links Road.</p> <p>i) Are these the accesses I and J as shown on Figure 3-13?  ii) Are the designations on Figure 3-13 correct?  iii) Should reference also be made in Table 8 to Figures 21, 22 and 24?  Do Figures 23 and 24 refer to access I or access J?</p>	<p>The designations on Figure 3-13 [<b>APP-035, APP-135</b>] are correct for Sunnica East Site B: Site Accesses I and J.</p> <p>Table 8 in Annex C1 to ES Appendix 13C [APP-118] relates to the access shown on figures 20 to 22. Figure 23 is in reference to another site access on Golf Links Road which was considered, but not taken forwards following statutory pre-application consultation,</p> <p>Figure 3 within the Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>] identifies the Sunnica East site access locations. Site Access I is located on Newmarket Road between Golf Links Road and the A11, which is intended to be used during the construction period only. Site Access J is located on Golf Links Road and is an existing gated access to the land, which is intended to be used infrequently during the operational phase.</p> <p>The Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>] will be updated in the next iteration that the Applicant proposes to submit at a future Deadline which will provide further clarification regarding the site accesses taken forward.</p> <p>Sunnica East Site B: Site Access J on Golf Links Road is proposed to be used during the operational phase only as it is an existing gated access to the land. The original proposals were to use Sunnica East Site A: Site Access J on Golf Links Road during the construction phase. However, as part of the consultation process and feedback from the public, a review of this site access on Golf Links road was undertaken. The conclusion identified that Golf Links Road would not be used during the construction phase. Therefore, Sunnica East Site A: Site Access I on Newmarket Road adjacent to the A11 was identified to be used during the construction and decommissioning phases. Table B-9 contained in Appendix B Design Principles to the Design and Access Statement [<b>AS-250</b>] together with requirement 6 in Schedule 2 to the draft DCO, secures the phases (construction, operation and decommissioning) in which each of the site accesses are to be used.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.10.25	The Applicant	<p><b>Abnormal loads - access to Sunnica West Site A</b></p> <p>Paragraph 5.9.2 of ES Appendix 13C [APP-118] and pages 26 and 27 of Annex D to ES Appendix 13C [APP-118] describe the proposed crane access route to Sunnica West Site A, with entry from the A11 northbound off slip to La Hogue Road and egress from La Hogue Road to the A11 via the northbound on-slip.</p> <p>If the crane is to access the site from the north via the A11 southbound, how will this be achieved?</p> <p>Will this route also be used for access by transformers?</p>	<p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the Applicant's Change Request [AS-243], showing the swept path analysis of the AIL route reviews [AS-278, AS-279].</p> <p>If the crane and AIL were to access from the north via the A11 southbound, it is assumed the vehicles would access La Hogue Road via the same route proposed as the HGVs via the A14 J37. The purpose of the route review was to identify that there is a viable route for the AILs to access the site from the Strategic Road Network. If this includes the crane accessing the site from the north via the A11 southbound, an experienced haulier who specialises in AILs would be responsible for the final route and coordination with the relevant authorities e.g., the police and the local highway authorities.</p> <p>The route will be used by all AILs, including those transporting transformers.</p>
Q1.10.26	The Applicant	<p><b>Access to Sunnica West Site A</b></p> <p>With reference to Annex C1 to ES Appendix 13C [APP-118]:</p> <p>i) why does Table 10 on page 38 make reference to access G? and noting the footnote and that Annex C is in two parts, why has the document not been revised and material about access M (a cable route access) moved into Annex C2?</p>	<p>Table 10 on page 38 refers to access 'G' as this was the site access' original reference at the time of writing however the table should have been updated to refer to the site access as 'Access M'. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [REP1-024].</p>
Q1.10.27	The Applicant	<p><b>Access to Sunnica West Site A</b></p> <p>With reference to Annex C1 to ES Appendix 13C [APP-118]:</p> <p>i) why does Table 11 on page 45 show access C as reference E? and ii) noting the Order limits shown on Figure 3-14, why do Figures 35 and 36 show a 90 degree entry and exit?</p>	<p>The route review was an iterative process as the site access strategy was developed for the grid connection corridors. At the time of writing the access review, the site access on Dane Hill Road was referenced as Site Access E. However, as the site access strategy evolved the reference/ naming of the site accesses were updated. The Dane Hill Road site access is now referenced as Site Access C, which is consistent with Figure 3-14 [APP-153] in the ES. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>future Deadline which will take into account the Applicants response to the Local Impact Report <b>[REP1-024]</b>.</p> <p>Figure 35 and Figure 36, the swept path at the angle shown indicates that the HGV can utilise the existing gated site access without additional works i.e. without widening the existing gated access.</p>
Q1.10.28	The Applicant	<p><b>Access to Sunnica West Site B</b></p> <p>With reference to Annex C1 to ES Appendix 13C [APP-118]:</p> <ul style="list-style-type: none"> <li>i) why does Table 12 on page 49 show access D as reference F? and</li> <li>ii) in the comments in Table 12, do you mean to say “<i>nearby bridge</i>”? and does the weight limit on the bridge affect or restrict access?</li> </ul>	<p>The route review was an iterative process as the site access strategy was developed for the grid connection corridors. At the time of writing the access review, the site access on Fordham Road was referenced as Site Access F. However, as the site access strategy evolved the reference/ naming of the site accesses were updated. The Fordham Road site access is now referenced as Site Access D, which is consistent with Figure 3-14 <b>[APP-153]</b> in the ES. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report <b>[REP1-024]</b>.</p> <p>The bridge on Fordham Road has a weight limit of 7.5 tonnes which is approximately 150m to the west of the Sunnica West Site A: Site Access D on Fordham Road. Therefore, the access strategy for Sunnica West Site B: Site Access D on Fordham Road does not include vehicles crossing the bridge. The vehicles' route are via Fordham Road to the south of the site access and avoids crossing the bridge.</p>
Q1.10.29	The Applicant	<p><b>Abnormal loads - access to Burwell National Grid substation</b></p> <p>Please provide details of the route taken for the delivery of a new transformer from Ipswich docks to the National Grid Burwell substation on 6 June 2021.</p>	<p>The Applicant has reviewed information provided on the National Grid website in reference to the new transformer being transported from Ipswich docks to the National Grid Burwell substation, details are provided below.</p> <p>The route described matches the route assessed as part of the route review provided within the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> from the A14 J37 to the Burwell Substation. This route includes the A142, B1102, High Street, Reach Road and Weirs Drove (noting that the information on the National Grid website refers to ‘Weirs Drove’ as ‘Weirs Road’). The confirmation that National Grid delivered a new transformer from</p>

ExQ1	Respondent	Question	Applicant's Response
			Ipswich Docks to the National Grid Burwell substation provides reassurance that the AIL can be accommodated on the local highway network.
Q1.10.30	The Applicant	<p><b>Abnormal loads - access to Burwell National Grid substation</b></p> <p>Paragraph 5.8.1 of ES Appendix 13C [APP-118] describes the proposed route. Further information is provided in Annex D to ES Appendix 13C [APP-118].</p> <p>Paragraph 5.8.1b refers to overrunning the footpath by the White Swan public house and says that "<i>conditional surveys will be undertaken, and any damage caused will be rectified</i>".</p> <p>As well as undertaking condition surveys, which you would presumably undertake at other locations as well, would it be prudent to strengthen the footway temporarily to avoid damage to buried services?</p>	<p>As part of the AIL route review prior to transporting the AIL, conditional surveys would be undertaken at all necessary locations along the vehicle route. An experienced haulier who specialises in AILs would be responsible for the final route and coordination with the relevant authorities e.g., the police and the local highway authorities. The haulier will identify potential measures to limit or avoid damages, such as temporarily strengthening the footway, in consultation with the local highway authority. The obligation on the undertaker to carry out the conditional surveys is secured by paragraph 7.2.14 of the Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>], compliance with which is secured by requirement 16 contained in Schedule 2 to the draft DCO.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [<b>APP-118</b>] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the updated Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>].</p>
Q1.10.31	The Applicant	<p><b>Abnormal loads - access to Burwell National Grid substation</b></p> <p>Paragraph 5.8.1 of ES Appendix 13C [APP-118] describes the proposed route. Further information is provided in Annex D to ES Appendix 13C [APP-118].</p> <p>Paragraph 5.8.1d makes brief mention of an alternative access route through the residential area of Burwell and a swept path analysis and concludes that "<i>the cranes were unable to manoeuvre across the bridge and therefore this was not considered an appropriate route</i>".</p>	<p>It is correct that the route through the residential area of Burwell was not considered feasible as a result of the initial swept path analysis undertaken, and this route has not been taken further. The point of origin of the transformers is not yet known, and it is a reasonable assumption that AILs can navigate from a port to the Strategic Road Network, and along the Strategic Road Network itself i.e., along A-Roads and Motorways. Therefore, the route review focused on the route to/from the A11 to the required site accesses, including Burwell. An experienced haulier who specialises in AILs would be responsible for the final route and coordination with the relevant authorities e.g., the police and the local highway authorities.</p> <p>It is noted that the new transformer delivery referenced in the question does not relate to the proposed scheme or works undertaken by Sunnica. The route used for the delivery referenced in the question matches the route assessed as part of the route review provided within the Framework Construction Traffic Management Plan and Travel Plan [APP-118] from the A14 J37 to the Burwell Substation. This</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Please confirm that this was not considered a feasible route and was not considered further.</p> <p>With reference to alternative routes, please explain why you have apparently not considered the route used to deliver a new transformer from Ipswich docks to the National Grid Burwell substation on 6 June 2021.</p>	<p>route includes the A142, B1102, High Street, Reach Road and Weirs Drove (noting that the National Grid article refers to 'Weirs Drove' as 'Weirs Road'). The confirmation that National Grid delivered a new transformer from Ipswich Docks to the National Grid Burwell substation provides reassurances that the AIL can be accommodated on the local highway network.</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [<b>APP-118</b>] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>].</p>
Q1.10.32	The Applicant	<p><b>Abnormal loads - access to Burwell National Grid substation</b></p> <p>Paragraph 5.9.7 of ES Appendix 13C [<b>APP-118</b>] says that "<i>There are two potential options for the Burwell National Grid Substation Extension</i>".</p> <p>Please advise whether this is still the case and update as necessary.</p>	<p>As part of the Applicant's Change Request [<b>AS-243</b>], Option 1 of the National Grid Substation Extension has been removed from the scheme and so there is one remaining option in the application for a substation extension in the vicinity of the Burwell National Grid Substation. This is reflected in the latest iteration of the Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>] where the track changes show the deletion of the information relating to Option 1.</p>
Q1.10.33	The Applicant	<p><b>Abnormal loads - access to Burwell National Grid substation - drafting</b></p> <p>In paragraph 5.9.13 of ES Appendix 13C [<b>APP-118</b>], should "100T" read "1000 tonne?"</p>	<p>That is correct, it should read '1000 tonne'. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [<b>REP1-024</b>].</p>
Q1.10.34	The Applicant	<p><b>Access to Burwell National Grid substation</b></p> <p>Annex C2 to ES Appendix 13C [<b>APP-118</b>] is headed "Grid Connection Route A and Grid Connection Route B Site Access Review" but nevertheless includes information about options for access to the</p>	<p>The reference to Grid Connection route A and Grid Connection Route B includes the connection of the grid connection route to the existing Burwell National Grid substation. It is considered appropriate to include the connection to the existing Burwell National Grid substation within the grid connection route.</p> <p>This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [<b>REP1-024</b>].</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Burwell National Grid substation as well as for the connection routes.</p> <p>i) For clarity please amend the heading and add letter references corresponding to those in Figure 3-25 to each table and figure.</p> <p>Should the text at the top of page 28 be in a table?</p>	<p>The swept paths for the Burwell National Grid substation and the Grid Connection Route A and B are updated within the main body of the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p>
Q1.10.35	The Applicant	<p><b>Access to the cable route on La Hogue Road</b></p> <p>In Table 11 on page 32 of Annex C2 to ES Appendix 13C <b>[APP-118]</b></p> <p>i) Should the second column read "La Hogue Road"? and</p> <p>ii) In the last bullet point in column 3, do you mean to say that La Hogue Road provides access (to the south) to and from the A11 northbound?</p>	<p>That is correct, it should read La Hogue Road.</p> <p>The La Hogue Road/ A11 junction provides a northbound off-slip onto La Hogue Road and a northbound on-slip onto the A11. The reference to the junction in Table 11 of Annex C2 to ES Appendix 13C <b>[APP-118]</b> is to the entire junction.</p> <p>This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report <b>[REP1-024]</b>.</p>
Q1.10.36	The Applicant	<p><b>HGV access</b></p> <p>Paragraph 3.2.4 and Table 3-2 of ES Appendix 13C <b>[APP-118]</b> refer to "<i>recommended routes for Heavy Goods Vehicles when travelling within and through the county</i>" and Table 3-2 sets out examples of the route types.</p> <p>i) Please confirm that the A11, A14 and A142 are the only strategic routes that you will use; and</p> <p>ii) Table 3-2 shows examples of local routes: please confirm details of all the local routes you intend to use.</p>	<p>The A11, A14 and A142 are the strategic routes that are closest to the site accesses which are identified in the Cambridgeshire Advisory Freight Map. There is the potential, depending on the origin of the HGV, for the wider Strategic Road Network to be used outside of Cambridgeshire.</p> <p>The HGV routes to and from the site accesses are provided within Figure 4 to Figure 9 of the Framework Construction Traffic Management Plan <b>[AS-300, AS-301]</b>. Compliance with these HGV routes is secured through requirement 16 of the draft DCO.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.10.37	The Applicant	<p><b>HGV access</b></p> <p>Paragraph 3.2.5 of ES Appendix 13C [APP-118] deals with weight and height restrictions in Cambridgeshire. In respect of the second road referred to</p> <p>i) Is the bridge located approximately 150m west of “<i>a proposed access to the Sunnica West Site B</i>”? and</p> <p>ii) What other access is proposed to Sunnica West Site B?</p>	<p>The bridge on Fordham Road is located approximately 150m west of Sunnica West Site B: Site Access D. The HGV routes to/from the site access on Fordham Road is presented in Figure 4 and Figure 5 within the Framework Construction Traffic Management Plan [AS-300, AS-301]. The vehicle route avoids the bridge subject to a weight restriction. A cable route site access is proposed on Chippenham Road (Cable Route Site Access N) which connects to Sunnica West Site B.</p>
Q1.10.38	The Applicant	<p><b>HGV access</b></p> <p>Paragraph 4.1.3 of ES Appendix 13C [APP-118] says that “<i>The main access to the Sunnica West Site A and B is proposed ... in close proximity to the A11/La Hogue Road/Norwich Road T-junction.</i>”.</p> <p>i) Is there a T-junction at A11/La Hogue Road/Norwich Road?</p> <p>ii) Is it possible to gain access to La Hogue Road from Norwich Road and/or the A11 southbound?</p>	<p>Given the arrangement at the A11/LA Hogue Road/Norwich Road Junction, it is not possible to travel directly between Norwich Road and La Hogue Road without travelling along the A11. The reference made in this paragraph should read “Junction” and not “T-Junction”. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [REP1-024].</p> <p>The following movements are permitted at the A11/La Hogue Road/Norwich Road Junction:</p> <ul style="list-style-type: none"> <li>• A11 to La Hogue Road via the northbound off-slip</li> <li>• La Hogue Road to A11 via the northbound on-slip</li> <li>• A11 to Norwich Road via the southbound off-slip; and</li> <li>• Norwich Road to A11 via the southbound on-slip.</li> </ul> <p>When reference is made to the La Hogue Road/ A11 Junction, it is in reference to the movements between La Hogue Road, Norwich Road and the A11 as outlined above.</p>
Q1.10.39	The Applicant	<p><b>HGV access</b></p> <p>With reference to paragraph 4.1.6 of ES Appendix 13C [APP-118] please explain</p>	<p>If temporary or unforeseen road closures or diversions were put in place by the relevant traffic authority, then the HGVs' route would be required to follow the signed diversions. These would be temporary and short-term changes to the HGV routes, using diversions introduced by the relevant traffic authority and</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>i) in what circumstances you would seek to make changes to the HGV routes used for the proposed development; and how you would demonstrate that the changes were within the Rochdale envelope.</p>	<p>would be out of the control of the Applicant. In the case of using signed diversions, it is reasonable to assume that the use of the signed diversion route by HGVs is acceptable and would not have significant additional environmental effects on the basis of the route being introduced by the relevant traffic authority.</p> <p>The Applicant has identified an appropriate HGV routeing and has no desire to change it at this stage but it is reasonable to provide a degree of properly supervised flexibility to allow changes to the HGV routeing if the circumstances merit them.</p> <p>If the Applicant sought to change the HGV routes from those set out in the Framework Construction Traffic Management Plan and Travel Plan it would need to supply the relevant county authority the evidence it reasonably requires to be satisfied that the proposed altered routeing would not lead to any materially new or materially different significant environmental effects than those assessed in the Environmental Statement when seeking its approval under requirement 16 of the draft DCO. The nature of the evidence required would depend on the nature of the change proposed.</p>
Q1.10.40	The Applicant	<p><b>Site access and crane routes</b></p> <p>With reference to paragraph 5.1.4 of ES Appendix 13C [APP-118] please explain</p> <p>i) in what circumstances you would seek to make changes to the information provided; and</p> <p>ii) how you would demonstrate that the changes were within the Rochdale envelope.</p>	<p>The Framework Construction Traffic Plan and Travel Plan [<b>APP-300, APP-301</b>] is a framework document. The detailed CTMP and TP will be produced by the contractor prior to the start of construction and submitted to the relevant county authority for approval under requirement 16 of the draft DCO. At that time, when more precise information will be known of the detailed design of the scheme and its construction. It is anticipated that the final documents will primarily provide additional detail to the information contained within the framework documents. Changes required in the final CTMP and TP would be as a result of identifying improvements which could be made, or responding to conditions which could not be foreseen at the framework stage, including those outside of the Applicant's control.</p> <p>With regards to the Rochdale envelope, the ES and accompanying documents have been based as far as possible on a worst-case scenario, and has been sufficient to enable the main, likely significant effects to be identified and assessed. The level of flexibility within the F-CTMP and ES is not unreasonable for a DCO project at this stage, and changes included within the final documents</p>

ExQ1	Respondent	Question	Applicant's Response
			would need to be approved by the relevant county authorities in accordance with requirement 16 contained in Schedule 2 to the draft DCO.
Q1.10.41	The Applicant	<p><b>Site access and crane routes</b></p> <p>With reference to paragraph 5.2.2 of ES Appendix 13C [APP-118]</p> <ul style="list-style-type: none"> <li>i) Does a 16.5m articulated vehicle always have the least favourable (ie worst case) swept path?</li> <li>ii) What happens when two articulated vehicles attempt to pass each other?</li> <li>iii) What type of vehicle will be used to transport large items of plant, eg transformers, and how will such vehicles be accommodated?</li> </ul>	<p>The 16.5m articulated vehicle represents the worst-case scenario in terms of swept paths of the HGVs that would regularly use the site accesses (noting that while certain site accesses would be used by AILs, these movements would be infrequent and appropriately supervised).</p> <p>Annex D of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] has been superseded with the information provided within the main body of the report showing the swept path analysis of the AIL route reviews as shown in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301].</p> <p>The majority of the HGV movements are forecast on the Strategic Road Network which provides adequate width for two HGVs to pass each other. The primary site accesses for HGVs are located on Elms Road for Sunnica East and La Hogue Road for Sunnica West. These are located in close proximity to the A11.</p> <p>As part of Chapter 12 of the Transportation Technical Note [APP/8.42] submitted at Deadline 2, further swept paths analysis has been undertaken to demonstrate where highway works is required to provide passing places to accommodate two-way HGV movements along Elms Road and La Hogue Road. This demonstrates that the proposed works are sufficient to enable two HGVs to safely pass each other.</p> <p>A 46.63m AIL is identified to transport the transformer to site. The swept path analysis of the 46.63m AIL is provided within the Framework Construction Traffic Management Plan and Travel Plan [Applicant's Change Request AS-300, AS-301]. The 46.63m AIL is considered to be the worst-case scenario in terms of the largest vehicle requiring access to the site. Therefore, the swept path analysis shown indicates the worst-case scenario in terms of the measures required to facilitate its passage.</p>
Q1.10.42	The Applicant	<p><b>Site access and crane routes</b></p> <p>Paragraph 5.2.3 of ES Appendix 13C [APP-118] refers to the east and west site accesses and paragraph 5.3.4 of ES</p>	<p>The operational site accesses are identified Figure 2 to Figure 7 within the Framework Construction Traffic Management Plan and TP [APP-118]. Maintenance and replacement activities during the operational phase will be made through those identified site accesses only. The operational site accesses</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Appendix 13C [APP-118] refers to the grid connection route site accesses.</p> <p>Please confirm that in all cases you are seeking the necessary rights to enable you to deal with unplanned maintenance and replacement activities during the operational phase of the Proposed Development.</p>	<p>make use of existing site accesses and unplanned maintenance and replacement activities are not considered to intensify the use of the existing site accesses and are considered de-minus in impact on the local highway network.</p> <p>While the Applicant remains committed to seeking the rights and interests in land it requires for the delivery of the project through negotiation, the Applicant is seeking the authorisation of the compulsory acquisition of the land and rights required to secure the use of such accesses through the operational lifetime of the proposed development. In the case of the accesses, where not otherwise sited on land over which the Applicant seeks the power to compulsorily acquire the land (shown in pink on the Land and Crown Land Plans <b>[AS-281]</b>, it seeks the 'access rights' described in Schedule 8 to the draft DCO.</p>
Q1.10.43	The Applicant	<p><b>Site access and crane routes</b></p> <p>Paragraph 5.2.5 of ES Appendix 13C [APP-118] says that "<i>In the Manual for Streets, 4.8m is identified as the width of carriageway which can accommodate an HGV passing a car.</i>" This reference appears to be to Figure 7.1 in the Manual.</p> <p>With reference to the Manual for Streets, please explain</p> <p>iv) why a document intended for use in urban areas with design speeds often of 20mph is relevant here, particularly as there are generally no footways; and .</p> <p>why 4.8m is a realistic figure, bearing in mind rural road geometry, likely visibility and vehicle speeds.</p>	<p>The purpose of the reference to Manual for Streets (MfS) was to identify the minimum width required for an HGV to pass a car, it would be expected that this passing would occur at low speeds. Whilst MfS applies to urban areas, advice on geometries required for vehicles to pass each other is relevant as it relates to the physical widths of vehicles. The locations in question have typically good forward visibility, and it is not unreasonable to expect that drivers will reduce speeds on sight of an oncoming vehicle, as typically occurs in rural areas across the country.</p> <p>Since the submission of the ES, further consultation was undertaken with the local highway authorities who have requested that local widening is provided to accommodate two passing HGVs, including avoiding wingmirrors overhanging verge. To meet this additional requirement, swept path analysis has been undertaken of the wheel path and vehicle envelope of two 16.5m articulated lorries, noting that this would be a rare occurrence. Section 12 of the Transportation Technical Note <b>[APP/8.42]</b> identify the indicative locations of passing bays to accommodate two way HGV movements along Elms Road and La Hogue Road.</p>
Q1.10.44	The Applicant	<p><b>Site access and crane routes</b></p> <p>Paragraph 5.2.5 of ES Appendix 13C [APP-118] says that, in response to Suffolk County Council, you undertook a review into the widths of key local roads</p>	<p>All local roads where HGV trips would occur at any point in the life of the project have been identified and assessed as shown within the Transport Assessment <b>[APP-117]</b>. This includes a thorough assessment within the Transport chapter of the ES <b>[APP-045]</b>, and a review of the physical capacity of the roads and junctions to accommodate the safe passage of the largest HGVs and AILs which would be required to use the routes. Temporary physical works have been</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>where the majority of the HGV trips would be undertaken.</p> <p>Please</p> <ul style="list-style-type: none"> <li>i) provide details of any local roads, ie any roads other than the A11, A14 and A142, where any HGV and/or AIL trips would occur at any time in the life of the project which have not been assessed;</li> <li>ii) explain why these roads have not been assessed; and</li> <li>iii) detail any further mitigation proposals you consider to be necessary in respect of these roads.</li> </ul>	<p>identified where required for Elms Road and La Hogue Road, and these will be secured through the provisions of the DCO. These two drawings for Elms Road and La Hogue Road are provided within the Transportation Technical Note <b>[APP/8.42]</b> submitted at Deadline 2 identify where passing places can be provided to accommodate passing places of two HGVs. This includes consideration of the geometry of the highway and other characteristics such as the verge and vegetation as well as adequate space for wingmirrors of the two HGVs to pass one another. These two drawings are also intended to be provided within the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline.</p> <p>The majority of the HGV movements on local roads are forecast to occur on Elms Road and La Hogue Road as these are where the main site accesses are located for Sunnica East and Sunnica West respectively. These site accesses are located 400m (0.25 miles) and 1km (0.6 miles) from the A11 respectively.</p> <p>In addition, HGV routes include Newmarket Road, Freckenham Road, Chippenham Road and Dane Hill Road and the route review undertaken identified these roads to be wide enough to accommodate an HGV passing a car as centre white lines are provided along the carriageway.</p> <p>Conditional surveys of the highway on HGV routes are committed to be undertaken prior, during and after construction to identify, and subsequently make good, any damage caused. The detailed scope of the conditional surveys will be agreed with the local highway authorities, which is secured through the Framework Construction Traffic Management Plan and Travel Plan and requirement 16 of the draft DCO.</p> <p>In relation to AILs, the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, 301]</b> demonstrates that there are viable routes from the strategic road network for the largest AILs that would be required to access the Sunnica Energy Farm and outlines the temporary works that may be required to facilitate the passage of such vehicles. The locations for these temporary interventions in the highway are shown on the Access and Rights of Way Plans <b>[AS-283]</b> and are described in Part 2 of Schedule 5 of the draft DCO <b>[AS-293]</b>.</p> <p>It is reasonable to assume that the strategic road network is suitable for AILs and that the major ports by which components requiring transport by AILs will be similarly well served by appropriate connections to the strategic road network. It</p>

ExQ1	Respondent	Question	Applicant's Response
			would be disproportionate to require detailed swept path analysis of every conceivable route between port and the relevant site accesses. In any event, the final routing will be determined by an experienced haulier in compliance with the regulations that apply to the movement of AILs on the highway, as is summarised in the Applicant's response to question 1.10.8.
Q1.10.45	The relevant highway authority	Question not for Applicant.	
Q1.10.46	The relevant highway authority	Question not for Applicant.	
Q1.10.47	The Applicant	<p><b>Site access - Golf Links Road</b></p> <p>Paragraph 5.11.1 of ES Appendix 13C [APP-118] deals with site access to Sunnica East site B and says that ... “<i>a site access was identified on Golf Links Road ... which avoided the A11/Newmarket Road Junction.</i>” but does not identify which access by cross reference to Figure 3-13 which shows Sunnica East A and B site accesses.</p> <p>i) Is this access J as shown on Figure 3-13?  ii) If not, which access are you referring to?</p> <p>Why is access needed off Golf Links Road?</p>	<p>Yes, paragraph 5.11.1 is referring to the Sunnica East Site B: Site Access J on Golf Links Road. This is an existing gated access which provides vehicle access to the land. Site Access J on Golf Links Road was previously identified during the statutory pre-application consultation to be used during the construction period. However, based on feedback from members of the public, Site Access J is no longer to be used during the construction phase. Site Access I on Newmarket Road located between the A11 and Golf Links Road is now identified to provide access during the construction and decommissioning periods.</p> <p>The existing site access located on Golf Links Road (Access J) is proposed to be used during the operational phase only. The use of this access will be infrequent and for maintenance requirements. This is considered to be comparable with its existing usage.</p> <p>Table B-9 contained in Appendix B Design Principles to the Design and Access Statement <b>[AS-250]</b> together with requirement 6 in Schedule 2 to the draft DCO, secures the phases (construction, operation and decommissioning) in which each of the site accesses are to be used.</p>
Q1.10.48	The Applicant	<p><b>Site access - Golf Links Road</b></p> <p>Paragraph 5.11.1 of ES Appendix 13C [APP-118] deals with site access to Sunnica East site B and says that ... “<i>a site</i></p>	There appears to be some confusion between two different roads with the same name. A summary is provided below for clarity.

ExQ1	Respondent	Question	Applicant's Response
		<p><i>access was identified on Golf Links Road ... which avoided the A11/Newmarket Road Junction ... It was agreed that development related vehicles would be permitted to undertake left in and left out movements and would be prohibited to undertake right in and right out movements at the A11/Newmarket Road junction".</i></p> <p>The A11/Newmarket Road junction is a grade separated junction with dumb bell roundabouts, so</p> <ul style="list-style-type: none"> <li>i) why are you seeking to avoid it?</li> <li>ii) why would National Highways stipulate that right in and right out manoeuvres be prohibited? And</li> <li>iii) Would the prohibition of right in and right out manoeuvres apply instead to the at-grade junction of the A11 with Golf Links Road?</li> </ul>	<p>Paragraphs 5.11.3 and 5.11.4 of ES Appendix C are in relation to the Stage 1 Road Safety Audit carried out at the A11/Newmarket Road at grade junction which is located in close proximity to Golf Links Road and the proposed Sunnica East Site B: Site Access J.</p> <p>The question appears to relate to the Red Lodge Dumbbell Roundabouts. The applicant does not seek to avoid this junction or prohibit movements. One of the approaches to the north of the roundabout is also named Newmarket Road, which provides a route between the Red Lodge Dumbbell Roundabouts and Worlington. No discussions with National Highways have been made to implement a prohibition at the Red Lodge Dumbbell Roundabouts, as none is proposed by the Applicant.</p>
Q1.10.49	The Applicant	<p><b>Site access - Newmarket Road</b></p> <p>In paragraph 5.11.4 of ES Appendix 13C [APP-118] you propose that "<i>appropriate signage is provided as a 'gateway' on entry to Newmarket Road to warn both right and left turning vehicles of the construction site access</i>".</p> <p>By "<i>appropriate signage</i>" do you mean suitable warning signs, including countdown markers and a 30mph speed limit, both on the way in to Worlington from the A11 and on the way out of Worlington towards the A11?</p>	<p>There appears to be some confusion caused by the fact that there are two different roads with the same name (Newmarket Road) in the area. A summary is provided below for clarity.</p> <p>Paragraphs 5.11.3 and 5.11.4 of ES Appendix C are in relation to the Stage 1 Road Safety Audit carried out at the A11/Newmarket Road at grade junction which is located in close proximity to Golf Links Road and the proposed Sunnica East Site B: Site Access J. Suitable warning signs will be provided on approach to Site Access J on Newmarket Road adjacent to the A11. This was identified as part of the Stage 1 Road Safety Audit which was undertaken for the Sunnica East Site B: Site Access J on request of the local highway authority. The warning signage provided will be in line with the 'Traffic Signs Manual Chapter 8: Traffic Safety Measures and Signs for Road Works and Temporary Situations'. Site Access J is in close proximity to the A11/Newmarket Road at grade junction.</p>

ExQ1	Respondent	Question	Applicant's Response
			The road referenced in the part of the question that refers to a 30-mph speed limit, relates to where Sunnica East Site A: Site Access D and Site Access H are located, between Worlington and the Red Lodge Dumbbell Roundabouts.
Q1.10.50	The Applicant	<p><b>Proposed traffic management</b></p> <p>With reference to paragraph 6.1.2 of ES Appendix 13C [APP-118], and to your inference that the final proposals may change from those outlined here, please confirm that the measures outlined in your Framework Construction Traffic Management Plan and Travel Plan will be updated in accordance with Requirement 16 in Schedule 2 to the dDCO [AS-293].</p>	The contractor will be responsible for the production of the final Construction Traffic Management Plan and Travel Plan. Any changes that are proposed will be updated for the approval of the relevant county authorities in accordance with Requirement 16 in Schedule 2 to the dDCO.
Q1.10.51	The Applicant	<p><b>Proposed traffic management</b></p> <p>With reference to paragraph 6.1.5 of ES Appendix 13C [APP-118], please explain</p> <ul style="list-style-type: none"> <li>i) why vehicle speeds are unlikely to be affected by the recent public health restrictions; and</li> <li>ii) why the surveys were necessary, given that it is normal practice to introduce a speed limit, usually 30mph, at site accesses if one is not already in place?</li> </ul>	<p>As discussed with the local highway authorities in a meeting on 25/03/2021, the local highway authorities stated that volumetric traffic counts were not considered appropriate at the time, however speed surveys would be accepted. The local highway authority also advised that speed surveys were being accepted as valid data, as they are robust with speeds during Covid restrictions typically being unaffected, but any effect on speeds would be an increase rather than decrease, as a result of reduced traffic. Therefore, higher speeds would require larger visibility splays for the site access junctions (and associated loss of vegetation with potential environmental effects) if no other mitigation was being provided i.e. the temporary speed limit reductions, temporary traffic signals and warning signage (all of which are being provided - see below).</p> <p>The speed surveys were carried out as requested by the local highway authorities to inform the proposed temporary speed limit reductions and temporary traffic signals through an understanding of current vehicle speeds. The temporary speed limits reductions are part of the package of measures to provide safe entry and egress of vehicles to/from the construction site accesses. These are alongside temporary traffic signals and the signage to be provided warning motorists of upcoming site accesses and temporary traffic signals.</p> <p>These measures are detailed in the Framework Construction Traffic Management Plan <b>[AS-300, AS-301]</b> and shown on the Traffic Regulation Measures –</p>

ExQ1	Respondent	Question	Applicant's Response
			Temporary Measures Plans [AS-287 - AS-288], to be implemented by the provisions of the draft DCO.
Q1.10.52	The Applicant	<p><b>Proposed traffic management measures</b></p> <p>With reference to paragraph 6.4.1 of ES Appendix 13C [APP-118],</p> <ul style="list-style-type: none"> <li>i) Please clarify the sites, access points and options to which each of the proposals applies; and</li> <li>ii) please signpost the reader to a plan showing the location and extent of the temporary traffic signal and temporary speed limit proposals.</li> </ul>	<p>The summary of the temporary traffic signals and temporary speed limits are outlined in the bullet points in paragraph 6.4.1 of ES Appendix 13C [AS-278, AS-279].</p> <p>The temporary traffic signals and temporary speed limit reductions are shown on the Traffic Regulation Measures Plan Temporary Measures in document reference [AS-287 – AS-288]. These plans also indicate the location of the site accesses. The locations of the temporary speed limits and traffic signals are described in Parts 1 and 4 respectively of Schedule 14 to the draft DCO. Below provides a summary of the temporary traffic signals and temporary speed limit reductions and the site accesses they relate too:</p> <ul style="list-style-type: none"> <li>a) Proposed temporary traffic signals at the site access on Weirs Drove – is no longer required as outlined on sheet number 60589004-TRM-TM-001 within the Traffic Regulation Measures Plans – Temporary Measures [AS-287, AS-288];</li> <li>b) Proposed speed limit reduction to 40mph along a short section of the B11102 Ness Road with temporary traffic signals at the Grid Connection Route Site Access I outlined on sheet number 60589004-TRM-TM-002 and sheet number 60589004-TRM-TM-003 within the Traffic Regulation Measures Plans – Temporary Measures [AS-287, AS-288];</li> <li>c) Proposed speed limit reduction to 40mph along a short section of Newmarket Road (north of the A142 roundabout) with temporary traffic signals at the Grid Connection Route Site Access K and the grid connection crossing the highway outlined on sheet number 60589004-TRM-TM-004 and sheet number 60589004-TRM-TM-005 within the Traffic Regulation Measures Plans – Temporary Measures [AS-287, AS-288];</li> <li>d) Proposed temporary traffic signals along a short section of Newmarket Road (north of the A142 roundabout) outlined at Grid Connection Route Site Access K and the grid connection crossing the highway on sheet number 60589004-TRM-TM-004 and sheet number 60589004-TRM-TM-</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>005 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</p> <ul style="list-style-type: none"><li>e) Proposed speed limit reduction to 30mph along a short section of Snailwell Road at Sunnica West Site B Site Access D with temporary traffic signals at the site access outlined on sheet number 60589004-TRM-TM-006 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li><li>f) Proposed speed limit reduction to 30mph along a short section of Fordham Road at Sunnica West Site B Site Access D with temporary traffic signals at the site access outlined on sheet number 60589004-TRM-TM-006 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li><li>g) Proposed speed limit reduction to 40mph along a short section of Chippenham Road with temporary traffic signals at the Sunnica West Site A Site Access B and Grid Connection Site Access M and N outlined on sheet number 60589004-TRM-TM-007 and sheet number 60589004-TRM-TM-008 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li><li>h) Proposed speed limit reduction to 40mph along a short section of La Hogue Road at Grid Connection Site Access O with temporary traffic signals at the site access outlined on sheet number 60589004-TRM-TM-009 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li><li>i) Proposed speed limit reduction to 40mph along a short section of the B1085 at Grid Connection Site Access P and Q with temporary traffic signals at the site access outlined on sheet number 60589004-TRM-TM-010 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li><li>j) Proposed speed limit reduction to 40mph along a short section of Dane Hill Road at Sunnica West Site A Site Access C with temporary traffic signals at the site access outlined on sheet number 60589004-TRM-TM-011 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li></ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>k) Proposed speed limit reduction to 30mph along a short section of Elms Road at Sunnica East Site B Site Access A, B and C with temporary traffic signals outlined on sheet number 60589004-TRM-TM-012 and sheet number 60589004-TRM-TM-013 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>;</li> <li>l) Proposed temporary traffic signals along a short section of the B1102 Freckenham Road at the Grid Connection Site Access R and S outlined on sheet number 60589004-TRM-TM-014 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b> and</li> <li>m) Proposed speed limit reduction to 40mph along a short section of Newmarket Road (Worlington) with temporary traffic signals at the Sunnica East Site B Site Access D and H outlined on sheet number 60589004-TRM-TM-015 and sheet number 60589004-TRM-TM-016 within the Traffic Regulation Measures Plans – Temporary Measures <b>[AS-287, AS-288]</b>.</li> </ul>
Q1.10.53	The Applicant	<p><b>Proposed traffic management measures</b></p> <p>With reference to paragraph 6.4.1 of ES Appendix 13C <b>[APP-118]</b>, are there any proposals in respect of</p> <ul style="list-style-type: none"> <li>i) Grid Connection Route A site access point T on Isleham Road (Figure 3-25); and</li> <li>ii) East A access points E, F, G and K on Beck Road and Ferry Lane? (Figure 3-13)</li> <li>iii) If not, please explain why not.</li> </ul>	<p>The Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> has been updated alongside the Applicant's Proposed Changes to the Application <b>[AS-243]</b>, which was accepted by the Examining Authority in its procedural decision contained in Appendix B to its letter dated 4 October 2022. The updated Framework Construction Traffic Management Plan and Travel Plan have been given Examination Library references <b>AS-300 and AS-301</b>. These documents include the swept path analysis along the crane and Abnormal Indivisible Load (AIL) routes provided within the main body of the report. This information therefore supersedes Annex D of the Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b>.</p> <p>The swept path analysis indicated that the HGVs could enter and egress the existing site access that are provided to the land without any traffic management required for the following site accesses and therefore no traffic management is proposed as the existing site access can accommodate the inbound and outbound movement of the HGV and existing visibility at the site access:</p> <ul style="list-style-type: none"> <li>• Grid Connection route A: Site Access T on Isleham Road</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<ul style="list-style-type: none"> <li>• Sunnica East Site Access A: Site Access E on Ferry Lane (with the exception of minor vegetation trimming)</li> <li>• Sunnica East Site Access A: Site Access F on Beck Lane</li> </ul> <p>No HGVs are forecast to be required to access to Sunnica East Site A: Site Access G on Beck Lane, which is an existing access to the land and a residential property. Therefore no traffic management is proposed.</p> <p>Sunnica East Site A: Site Access K on Beck Lane is required to provide access for AILs, which will be escorted to/from the site which is set out in the Framework Construction Traffic Management Plan. Reference is made within the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300 AS-301]</b> in paragraph 7.2.18 to the Police being given advanced notification under the Road Vehicle Authorisation of Special Types Order 2003 regarding the movement of cranes and AILs.</p> <p>Figure 29 of the Framework Construction Traffic Management Plan and Travel Plan shows the Beck Road / Ferry Lane junction.</p>
Q1.10.54	The Applicant	<p><b>Proposed traffic management measures</b></p> <p>With reference to the Traffic Regulation Measures Plan [AS-284 to AS-288] please explain why the proposed temporary speed limit does not extend southwards beyond the proposed site access opposite the La Hogue farm shop access.</p>	<p>The Traffic Regulation Measures Plans – Temporary Measures [AS-278, AS-279] at this location relate to the Grid Connection Site Access O. The speed limit reduction is proposed due to the temporary traffic signals proposed to provide safe entry and egress of vehicles to the Grid Connection Route Site Access O as shown on Figure 11 within the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>. Temporarily regulating traffic in this way avoids the substantial vegetation clearance that would otherwise be required to provide visibility for the temporary accesses.</p> <p>However, the full visibility splay requirement for Sunnica West Site A: Site Access A on La Hogue Road is achievable. Therefore, no temporary speed limit or traffic signals are required to deliver safe and suitable access, as visibility requirements can be met without vegetation clearance.</p>
Q1.10.55	The Applicant	<p><b>Proposed traffic management measures</b></p> <p>With reference to sheet 15 (of 16) of the Traffic Regulation Measures Plan [AS-284 to AS-288] please confirm that the</p>	<p>The Applicant can confirm that this is correct. The northern extent of the proposed temporary speed limit on Newmarket Road between Worlington and the Red Lodge Dumbbell Roundabouts is contiguous with the existing 40mph speed limit.</p>

ExQ1	Respondent	Question	Applicant's Response
		northern extent of the proposed temporary speed limit is contiguous with the existing speed limit.	
Q1.10.56	The Applicant	<p><b>Proposed traffic controls</b></p> <p>In paragraph 7.2.3b of ES Appendix 13C [APP-118], do you mean compliance with the limits on number of deliveries arriving at and departing from any particular location at any one time and over the course of the day?</p>	<p>This is set out in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>. It will be the contractor's responsibility to ensure implementation of all aspects of the CTMP.</p> <p>The statement is in relation to the ability for the contractor to schedule deliveries to manage the number of HGVs arriving and departing the site accesses at any one time, over the course of the day to minimise HGVs related with the scheme passing one another on the local roads or at the site accesses themselves.</p> <p>Compliance in this instance relates to delivery scheduling as set out in the Delivery Management System (DMS). The "limits" in question will be set through the DMS as an operational management tool, to manage the different activities on site on a day-to-day basis. No specific limits on the total number of HGV movements for the construction phase are proposed to be established through the DCO.</p>
Q1.10.57	The Applicant	<p><b>Proposed traffic controls</b></p> <p>In paragraph 7.2.5 of ES Appendix 13C [APP-118], in respect of HGV routes, you say that "<i>Local HGV deliveries ....would be required where possible to follow Sunnica HGV routes</i>".</p> <p>In what circumstances would it not be possible to follow Sunnica HGV routes, and why?</p>	<p>This relates to HGV movements where both the origin and destination are within the Sunnica sites, e.g. along the B1085 to/from the A11 for the Grid Connection Route Site Access P and Site Access Q as well as Grid Connection Route Site Access 'T' on Isleham. The Sunnica HGV routes are established to link the site access with the Strategic Road Network. There may be a small number of instances where HGVs are needed to use sections of public highway between two access points, which are not part of the HGV routes between the site and the Strategic Road Network. This will apply to very few vehicles and the impact will not be significant. All public highway HGV restrictions, such as weight limits, will be observed.</p>
Q1.10.58	The Applicant	<p><b>Proposed traffic controls - drafting</b></p> <p>In line 4 of paragraph 7.2.6 of ES Appendix 13C [APP-118], in respect of timing restrictions, should the words "<i>avoid the</i>" be deleted?</p>	<p>The Applicant can confirm that this is correct. Text updated below. The Framework Construction Traffic Management Plan and Travel Plan <b>[AS279, AS-279]</b> will be revised as necessary in any future iteration.</p> <p><i>'To reduce the potential impact of the HGV deliveries, the arrival and departure times will be managed to minimise the number of HGVs travelling to the site'</i></p>

ExQ1	Respondent	Question	Applicant's Response
			<i>during the highway peak hours. In addition, the HGV deliveries can be arranged to avoid the need for vehicles to depart the Site within the PM network peak hour (17:00-18:00). The HGV deliveries will be routed onto the Strategic Road Network(A11 / A14) to travel to / from the site.'</i>
Q1.10.59	The Applicant	<b>Proposed traffic controls</b>  With reference to paragraph 7.2.8a of ES Appendix 13C [APP-118], does this mean that deliveries will occur before 0800 and/or after 1800 on weekdays?	The Delivery Management System (DMS) will be implemented to control bookings of HGVs. Deliveries, and therefore HGV movements, will occur within the working hours of the construction staff which is 07:00-19:00 with the exception of 08:00-09:00 and 17:00-18:00 to avoid the highway peak hours. Therefore, some deliveries will take place in the periods 0700-0800 hours and 1800-1900 hours. A Traffic Management and Monitoring System (TMMS) will also be developed as set out in chapter 7 of the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> .
Q1.10.60	The Applicant	<b>Proposed traffic controls</b>  With reference to paragraph 7.2.8a of ES Appendix 13C [APP-118], please explain what you mean by TMSS.	<p>"TMSS" should read "TMMS".</p> <p>This is outlined in paragraph 7.2.3 of the Framework CTMP and TP Appendix 13C <b>[APP-118]</b>, as updated in the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>.</p> <p><i>'A Traffic Management and Monitoring System (TMMS) will be developed. The TMMS will provide details of the technologies and other means employed to monitor HGVs to/from the development site (e.g. Global Positioning System (GPS), Automatic Number Plate Recognition (ANPR)). This will enable the Applicant to monitor the following:</i></p> <ul style="list-style-type: none"> <li><i>• Compliance with the HGV routes;</i></li> <li><i>• Compliance with the number of HGV limits in terms of number of deliveries arriving and departing at any one time and over the course of the day; and</i></li> <li><i>• Compliance with the timing restrictions.'</i></li> </ul>
Q1.10.61	The Applicant	<b>Communications strategy</b>	As identified in the Framework Construction Environmental Management Plan <b>[AS-302]</b> , a Community Liaison Group will be set up prior to construction and a

ExQ1	Respondent	Question	Applicant's Response
		Should the communications strategy outlined briefly in paragraph 7.2.12 of ES Appendix 13C [APP-118] also include communications with the public through a stakeholder communications plan, to be part of your Code of Construction Practice or your Construction Traffic Management Plan and secured through a Requirement in Schedule 2 to the dDCO?	Community Liaison Officer will be appointed to lead discussions with local communities during construction. Contact details will also be available on the display board at the site entrance, and searchable online, should anyone wish to make contact. The Construction Environmental Management Plan, which must be substantially in accordance with the Framework Construction Environmental Management Plan, is secured in a requirement in Schedule 2 to the draft DCO.
Q1.10.62	The Applicant	<p><b>Staff vehicles</b></p> <p>With reference to paragraph 7.2.21 of ES Appendix 13C [APP-118],</p> <ul style="list-style-type: none"> <li>i) what do you mean by “<i>where appropriate</i>”?</li> <li>ii) Please confirm that staff will be directed to use the SRN and PRN to access the site (the A142 is not part of the SRN) in the same way as construction vehicles, and that this will be a condition of use of the car park permit referred to in paragraph 7.2.29 of ES Appendix 13C [APP-118].</li> </ul>	<p>If construction staff live within the immediate vicinity of either of the two main staff car parks on Elms Road or La Hogue Road it might not be appropriate to direct construction staff to join the Strategic Road Network. E.g., from Red Lodge to Sunnica East staff car park would not use the A11, A14 or A142.</p> <p>The Applicant can confirm that this is correct, construction staff, prior to the start of construction, will be directed to use the Strategic Road Network (SRN) (A14 and A11) and the Primary Route Network (PRN) (A142) to access the two staff car parks on Elms Road and La Hogue Road. This will be part of the car parking permit system. Construction staff will be assigned a parking permit for either the Sunnica West or Sunnica East staff car park. This is outlined in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-278, AS-279]</b>.</p>
Q1.10.63	The Applicant	<p><b>Staff vehicles</b></p> <p>With reference to paragraph 7.4.5 of ES Appendix 13C [APP-118]</p> <ul style="list-style-type: none"> <li>i) Are the development peak hours the times when all staff will arrive and leave?</li> <li>ii) do you intend that staff will be enabled to arrive and leave at different times in these hours so as to spread arrival and departure times evenly and minimise the impact on the local highway network; and</li> <li>iii) if so, how will this be achieved?</li> </ul>	<p>The Applicant can confirm that this is correct. The construction working hours are 07:00-19:00. Therefore, construction staff will travel on the highway network before 07:00 which is before the network AM peak hour (08:00-09:00) and depart after 19:00, after the PM network peak hour (17:00-18:00). Therefore, the Sunnica Energy Farm would be using the spare highway capacity outside of the network peak hours and inherently minimising the impact on the local highway network by avoiding staff travelling to or from the site within the network peak hours.</p> <p>The working hours are secured under the draft DCO (with reference to the requirement relating to the Construction Environmental Management Plan [AS-302]). There are no proposals to stagger arrival and departure times of staff. This is because it is not considered necessary as there is spare highway capacity at</p>

ExQ1	Respondent	Question	Applicant's Response
			the relevant times. It will also happen naturally to a degree as staff will take varying amounts of time to travel to and from different parts of the Order limits to their cars.
Q1.10.64	The Applicant	<b>Transport/Travel Plan coordinator</b> In paragraph 7.3.2a of ES Appendix 13C [APP-118] i) do you mean that the Transport/Travel Plan coordinator will liaise proactively? And ii) will Parish Councils be included?	The Applicant can confirm that this is correct for both questions. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [REP1-024].
Q1.10.65	The Applicant	<b>Compliance and enforcement</b> With reference to paragraph 8.2.2c.iii of ES Appendix 13C [APP-118] i) Do you intend for the Construction Traffic Management Plan and Travel Plan (CTMP and TP) to be a single document or separate documents? And ii) please confirm that updates to the CTMP and TP will always be considered to resolve the risk of repeated breaches.	The intention is for the final Construction Traffic Management Plan and Travel Plan to be two separate documents. However, if the contractor considers it appropriate, the two documents could remain as one single document, as functionally it is likely to make little difference in their application. The Applicant can confirm that this is correct, updates to the Construction Traffic Management Plan and Travel Plan will be considered to resolve the risk of repeated breaches. This will be addressed in the next iteration of the Framework Construction Traffic Management Plan and Travel Plan that the Applicant proposes to submit at a future Deadline which will take into account the Applicants response to the Local Impact Report [REP1-024].
Q1.10.66	The Applicant	<b>Compliance and enforcement</b> With reference to paragraph 8.2.6 of ES Appendix 13C [APP-118] i) What sanctions are you considering? And ii) How will they be enforced?	Further details of sanctions will be provided in the final Construction Traffic Management Plan and Travel Plan. Enforcement procedures are summarised in paragraph 8.2.5 of ES Appendix 13C [APP-118], and also set out in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301]. Further details will be provided in the final CTMP and Travel Plan. The purpose of the Framework CTMP and TP is to provide a framework for the Construction Traffic Management Plan and Travel Plan. An experienced contractor will prepare the final CTMP, on behalf of the Applicant, and will be required to consider and include relevant sanctions and the method by which they will be enforced. Requirement 16 contained in Schedule 2 to the draft DCO requires the relevant county authority's approval of the CTMP before the commencement of the development.

ExQ1	Respondent	Question	Applicant's Response
			<p>Relevant sanctions may include e.g. financial penalties. Compliance with the approved CTMP, and hence any corresponding sanctions or enforcement, will form part of the contractual basis by which companies and personnel are procured to work on the project.</p>
Q1.10.67	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 1.2.1 of the Transport Assessment [APP-117],</p> <ul style="list-style-type: none"> <li>i) Have traffic flows returned to their normal level?</li> <li>ii) How do you know?</li> <li>iii) If not, do you expect traffic flows to return to their normal level?</li> <li>iv) If not, does this mean that links which have not been assessed will need to be assessed?</li> </ul>	<p>A comparison has been undertaken of the 2022 and 2019 traffic data for the A11 and A14 near the Scheme. This is set out in paragraphs 4.21 and 4.22 of the Transportation Technical Note [EN010106/APP/8.42]. These locations have been chosen as they are the closest parts of the Strategic Road Network to the Scheme, for which there is comprehensive and comparable data available to monitor changes in traffic flow levels over time.</p> <p>Traffic data has been obtained from WebTRIS for locations which have both 2019 and 2022 data available to determine if traffic flows have returned to pre-Covid levels. Traffic data for 2022 was only available up to August. The January to August 24-hour Average Daily Traffic (ADT) and 18 Hour Average Weekday Traffic (AWT) has been used for the comparison as this data is available for both years. This comparison indicates that 2022 traffic flows on the A11 and A14 between January and August are between 5% to 12% lower than the January to August 2019 average.</p> <p>It is not possible to know whether or not traffic flows will return to normal levels. Indications at this stage are that traffic flows are not substantially lower than pre-covid levels, although this will vary in different locations. It is notable that the Department for Transport (DfT) has not revised its guidance on forecasting (TAG) to reflect any anticipated medium to long term effects of Covid on traffic flows. Thus the September 2019 traffic flows used in the Transport Assessment [APP-117] and Transport and Access Chapter of the Environmental Statement [APP-045] are robust.</p> <p>The assessment presented is thorough and on the basis of established traffic growth forecasting methodology. In response to the specific question, there are no links which have not been assessed that would need to be assessed in the event that traffic flows do not fully return to pre-Covid levels. The selection of links to be assessed is predominantly influenced by the level of construction staff or HGVs forecast to use each link. Further details on this review can be found in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.10.68	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 1.2.2. of the Transport Assessment [APP-117], will the speed survey data collected during the pandemic be an overestimate as the network is less congested?</p>	<p>The temporary speed limits reductions are part of the package of measures to provide safe entry and egress of vehicles to/from the construction site accesses. These are alongside temporary traffic signals and the signage to be provided warning motorists of upcoming site accesses and temporary traffic signals <b>[AS-287, AS-288]</b>.</p> <p>The speed surveys were carried out as requested by the local highway authorities in relation to the proposed temporary speed limit reductions and temporary traffic signals, as discussed with the local highway authorities in a meeting on 25/03/2021.</p> <p>During discussions with the local highway authorities, they stated that speed surveys would be accepted as valid data. The local highway authority also advised that speed surveys were being accepted as they are robust with speeds during Covid restrictions typically being unaffected, but any effect on speeds would be an increase rather than decrease. This is as a result of reduced traffic-speed surveys on quieter roads are likely to record higher speeds than on busier roads, therefore the results of the speed surveys are considered to be robust as they are likely to overstate average speeds expected when/if traffic returns to pre-covid levels.</p> <p>Measures designed for potentially higher speeds than may occur in practice are typically more robust in terms of safety.</p>
Q1.10.69	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraphs 3.4.4 and 4.5.6 of the Transport Assessment [APP-117] please confirm that</p> <ul style="list-style-type: none"> <li>i) The A11 and A14 are part of the Strategic Road Network (SRN);</li> <li>ii) The A142 is part of the primary route network (PRN); and</li> <li>iii) All other roads affected by the proposed development are A, B and unclassified roads.</li> </ul>	<p>The Applicant can confirm that this is correct. The A11 and A14 are part of the Strategic Road Network (SRN) and the A142 is part of the Primary Route Network (PRN). All other roads affected by the proposed development are A, B and unclassified roads.</p>

ExQ1	Respondent	Question	Applicant's Response
Q1.10.70	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 3.4.5 of the Transport Assessment [APP-117] and the “<i>appropriateness of the traffic survey data</i>” please confirm that you are referring to the suitability, fitness for purpose and robustness of the data.</p>	<p>The term “fit for purpose” means that they are suitable to be used as the baseline for the assessment. This is specifically stated to confirm this point due to the existence of later data sets. The 2019 traffic data obtained from the WebTRIS database for the A11 and A14 are considered fit for purpose due to the impact the coronavirus pandemic had on traffic flows in 2020 and 2021, meaning that 2019 is the latest suitable source of this data.</p> <p>A comparison has been undertaken of the 2022 and 2019 traffic data for the A11 and A14 near the Scheme with further explanation provided in A1.10.67 regarding the traffic data. No further links would need to be assessed if traffic flows do not fully return to pre-Covid levels, as the selection of links to be assessed is predominantly influenced by the level of construction staff or HGVs forecast to use each link. Further details on this review can be found in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p>
Q1.10.71	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 3.4.14 of the Transport Assessment [APP-117] you say that “<i>staff will be sourced from within a 30km radius of the Order limits</i>”.</p> <p>Please explain how you will achieve a construction staff car occupancy rate of 1.5 if staff live over such a wide area.</p> <p>Where is there a map showing the study area?</p>	<p>The 30km travel distance for staff assumption is broadly in line with the latest UK-wide Construction Industry Training Board (CITB) Construction workforce mobility reporting (2018/19) which finds workers travel a mean distance of 18 miles (circa 29km) to work. The 30km staff travel distance is consistent with the assumptions used for the Socio-economic Assessment in the Chapter 12 of the Environmental Statement [APP-044]. Please see section 3 of the Transportation Technical Note [EN010106/APP/8.42] submitted at Deadline 2 for more information on this and Figure 3-1 illustrating the relevant study area.</p> <p>In terms of the construction staff car occupancy rate, further work has been undertaken to determine whether it is a robust occupancy parameter. This is also set out in section 3 of the Transportation Technical Note [EN010106/APP/8.42], to include sensitivity testing. The conclusion is that the rate of 1.5 is robust.</p> <p>As part of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] and the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301] measures to encourage lift sharing will be implemented.] This includes a Car Share Scheme which will actively match potential sharers and be available to staff so that they can find their own match as well as that identified by the Transport coordinator. This is secured under the draft DCO - Requirement 16 contained in Schedule 2 to the draft DCO requires the</p>

ExQ1	Respondent	Question	Applicant's Response
			relevant county authority's approval of the CTMP before the commencement of the development, and the CTMP must be substantially in accordance with the Framework CTMP.
Q1.10.72	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 3.4.14 of the Transport Assessment [APP-117], where convenient to the reader is there a map showing the study area?</p>	<p>A plan showing the 30km study area is provided in at Figure 3-1 in Section 3 of the Transportation Technical Note [EN010106/APP/8.42], which is submitted at Deadline 2.</p> <p>Figure 2-1 in section 2 of the Transportation Technical Note [EN010106/APP/8.42] illustrates the location of the links that have been assessed in the Transport Assessment and Transport and Access Chapter of the ES.</p>
Q1.10.73	The Applicant	<p><b>Baseline conditions and development traffic</b></p> <p>With reference to paragraphs 3.4.14 and 5.4.39 of the Transport Assessment [APP-117], please explain what a MSOA is and its role in establishing the study area.</p>	Middle Super Output Areas (MSOA) are geographical zones that are used to report statistics for small areas in England and Wales. MSOAs are used for census data and represent areas that have a population between 5,000 and 15,000 people or have between 2,000 and 6,000 households. The 2011 Census population data was extracted for MSOAs where all or part of the MSOA is within a 30km radius of the Scheme and has been converted into proportions based on the total population within the 30km radius. This MSOA data was used in the forecast of the trip distribution for construction staff. Further information is provided within Section 3 of the Transportation Technical Note [EN010106/APP/8.42], submitted at Deadline 2.
Q1.10.74	The relevant highway authority	Question not for Applicant.	
Q1.10.75	The Applicant	<p><b>Baseline conditions</b></p> <p>Figure 3 of the Transport Assessment [APP-117] shows the junction numbered 3 as being on the A14 at Kentford, but there is no junction with the A14 here.</p> <p>Should the junction numbered 3 be shown as being on the B1506 to the south of the A14, as described in para 3.4.19?</p>	The Applicant can confirm that this is correct that this is an error. The number 3 on Figure 3 of the Transport Assessment [APP-117] should be on the B1506 Bury Road / Herringswell Road / Gazeley Road junction. This plan has been updated accordingly and provided in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].

ExQ1	Respondent	Question	Applicant's Response
Q1.10.76	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to paragraph 3.4.20 of the Transport Assessment [APP-117], you say that “<i>No traffic survey data was (sic) available to the west of the A142 along Route Connection A, however there is a low number of forecast HGVs and staff along this section of the Scheme</i>”.</p> <ul style="list-style-type: none"> <li>i) Should “<i>Route Connection A</i>” read “<i>Route Connection B</i>”?</li> <li>ii) Do “<i>these gaps in traffic survey data ... not result in limitations to the ability to draw conclusions regarding the traffic effects</i>” because the number of forecast construction HGV is in any event high?</li> <li>iii) Will all construction HGV use the A142, the B1102 and haul roads to access the works at Route Connection B and at the Burwell substation?</li> <li>iv) Will all operational HGV use the A142 and the B1102 to access the cable route and the extended Burwell substation?</li> </ul>	<p>Ixii) The sentence should read ‘<i>No traffic survey data was available to the west of the A142 along Route Connection B (between the A142 and Burwell however there is a low number of forecast HGVs and staff along this section of the Scheme</i>’.</p> <p>Ixiii) There is a low number of staff and HGVs forecast on these roads during construction. It is forecast that there will be approximately 11 daily HGVs on Freckenham Road during the peak of the construction period. The impact of HGVs in this area will be short term and temporary. This is therefore not anticipated to have a significant impact on the local highway network in EIA terms due to the low absolute increase in the number of HGVs, regardless of percentage increase over the baseline.</p> <p>Furthermore, additional traffic surveys were carried out between Thursday 7<sup>th</sup> to Wednesday 13<sup>th</sup> July 2022 on Freckenham Road in the form of an Automatic Traffic Count. This has been reviewed in terms of the conclusions drawn within the ES. Utilising the additional data as part of the assessment has not resulted in any significant environmental effects being identified. This is set out in detail in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>Ixiv) In order to access Burwell substation and Cable Route Connection B, construction HGVs will use the A142, the B1102 and internal haul roads. The proposed HGV routes are provided in Section 4 of the Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>].</p> <p>Any potential HGV movements during the operational phase will be minimal, as demonstrated by the operational phase transport effects being scoped out of the Environmental Statement. This was agreed with the Planning Inspectorate in the Scoping Opinion [APP-052] in April 2019. To the extent that operational HGVs are required, the A142 and the B1102 would be used to access the cable route and the extended Burwell substation.</p>
Q1.10.77	The Applicant	<p><b>Baseline conditions</b></p> <p>Are the flows in Table 3-3 of the Transport Assessment [APP-117] classified?</p>	The traffic flows in Table 3-3 of the Transport Assessment [APP-117] are not classified. The traffic survey data presented in the DC-18-0628-HYB and 19-00376-OUM applications is not classified into vehicle types.
Q1.10.78	The relevant local planning	Question not for Applicant.	

ExQ1	Respondent	Question	Applicant's Response
	and highway authorities		
Q1.10.79	The Applicant	<p><b>Baseline conditions</b></p> <p>In paragraph 3.4.41 of the Transport Assessment [APP-117] do you mean to say that the traffic flows identified are considered fit for purpose?</p>	<p>The term “fit for purpose” means that they are suitable to be used as the baseline for the assessment. This is specifically stated to confirm this point due to the existence of later data sets. The 2019 traffic data obtained from the WebTRIS database for the A11 and A14 are considered fit for purpose due to the impact the coronavirus pandemic had on traffic flows in 2020 and 2021, meaning that 2019 is the latest suitable source of this data. Further information is provided in response to Q1.10.67 and chapter 3 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>Since the DCO application was submitted, the passage of time has allowed for a comparison of 2022 and 2019 traffic data for the A11 and A14 near the Scheme. These locations have been chosen as they are the closest parts of the Strategic Road Network to The Scheme, for which there is comprehensive and comparable data available to monitor changes in traffic flow levels over time. Traffic data has been obtained from WebTRIS for locations which have both 2019 and 2022 data available to determine if traffic flows have returned to pre-Covid levels. Traffic data for 2022 was only available up to August. The January to August 24-hour Average Daily Traffic (ADT) and 18 Hour Average Weekday Traffic (AWT) has been used for the comparison as this data is available for both years. This comparison indicates that 2022 traffic flows on the A11 and A14 between January and August are between 5% to 12% lower than the January to August 2019 average. This further demonstrates that the traffic flows used in the assessment are fit for purpose.</p>
Q1.10.80	The Applicant	<p><b>Baseline conditions</b></p> <p>With reference to Transport Assessment [APP-117] Figure 4: WebTRIS Data Collection Locations, please explain why there appear to be two locations labelled 7?</p>	<p>Figure 4 from the Transport Assessment [APP-117] has been updated with one of the locations labelled at location 8 and this is provided in section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p>
Q1.10.81	The Applicant	<p><b>Baseline conditions</b></p> <p>You say at the end of paragraph 3.4.43 of the Transport Assessment [APP-117] that</p>	<p>The weekday assessment considers both the proportional increase in traffic flows as a percentage impact, as well as a comparison between the development peak hour, and the network peak hour, in order to draw conclusions on the effect of</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>"A Saturday assessment has not been undertaken as the weekday baseline traffic flows are expected to be higher."</i></p> <p>Surely a Saturday assessment should be undertaken as the additional construction traffic will be proportionally higher?</p>	<p>absolute traffic levels, as well as proportions. This is important in assessing the effect on driver delay.</p> <p>The proportional impact would be higher on a Saturday because of a lower baseline, however the impact in terms of delay would be greater during the weekday. Therefore, the use of the weekday scenario is considered to be robust for the purposes of the Transport and Access assessment within Chapter 13 – Transport and Access of the Environmental Statement <b>[AP-045]</b>.</p> <p>The potential requirement for a Saturday assessment was raised by the LHAs through their Relevant Representations, e.g. SCC-113 and CCC-94, and discussed in further meetings. The LHAs concern was whether there was a scenario where construction flows and baseline flows combined were likely to be higher than in the weekday assessment, and not whether there would be a higher proportionate impact.</p> <p>In order to address this, the Applicant has confirmed that Saturday working hours will be 0700-1900 hours, as per weekdays, and commissioned additional traffic surveys to make a weekday to Saturday comparison. These working hours are provided for in the Framework Construction Environmental Management Plan <b>[APP-123]</b> and the updated version <b>[AS-302]</b>. Requirement 14 in Schedule 2 to the draft DCO requires that no phase of the authorised development can commence until a CEMP has been approved by the relevant authority (or authorities), and the CEMP must be substantially in accordance with the Framework version.</p> <p>Additional traffic surveys were carried out between Thursday 7th to Wednesday 13th July 2022 at the following locations, as also discussed in Q1.10.99. These survey locations were chosen primarily as additional data collection in these locations would provide additional confidence in the conclusions drawn in the ES, and the opportunity was taken to collect comparable weekday and Saturday data:</p> <ul style="list-style-type: none"> <li>• Elms Road;</li> <li>• A11/Elms Road T-Junction;</li> <li>• La Hogue Road; and</li> <li>• Freckenham Road.</li> </ul>

ExQ1	Respondent	Question	Applicant's Response
			<p>A comparison of the Saturday traffic flows, and weekday average traffic flows has been undertaken.</p> <p>During the survey period, the Saturday traffic flows were consistently lower than the average weekday traffic flows in each and every instance.</p> <p>Further information on this review of Saturday traffic data can be found in Section 4, specifically paragraph 4.1.17, of the Transportation Technical Note [EN010106/APP/8.42].</p>
Q1.10.82	The Applicant	<p><b>Baseline conditions</b></p> <p>In paragraph 3.4.50 of the Transport Assessment [APP-117], by “appropriateness” do you mean validity, suitability and fitness for purpose?</p>	<p>The Applicant can confirm that this is correct. The main purpose of the exercise was to examine whether the available survey data used for the assessment was the most valid, suitable and fit for purpose baseline, compared with the alternative of collecting additional data in 2020 or 2021. The exercise showed that 2020 or 2021 baseline survey data would not have been a valid baseline. The comparison with 2022 data, as described in response to Q.1.10.67 and Q1.10.79, also demonstrated that 2019 data is valid, suitable and fit for purpose.</p>
Q1.10.83	The Applicant	<p><b>Baseline conditions</b></p> <p>In paragraph 3.4.56 of the Transport Assessment [APP-117], when you say that “<i>it has not been appropriate to collect more recent baseline traffic survey data ...</i>” and that “<i>the use of pre-Covid survey data is considered appropriate and robust ...</i>”</p> <p>i) do you mean that it has not been possible to collect more recent data?  ii) do you mean that the use of pre-Covid survey data is considered sufficiently robust? And  iii) do you plan to collect data to validate your assumptions now that public health restrictions have eased?</p>	<p>At the time that the Transport Assessment [APP-117] was being prepared (2020 / 2021) it was not considered appropriate to collect traffic survey data due to the impact lockdowns had on traffic flows as a result of the Pandemic. A comparison of September 2019 and September 2020 traffic flows was undertaken of available traffic data in close proximity to the Scheme on the Strategic Road Network and local highway. The comparisons outlined in Table 3-14 and Table 3-15 in the Transport Assessment [APP-117] indicate that the 2020 traffic flows were lower than the 2019 traffic flows and therefore the pre-Covid traffic data is considered robust.</p> <p>The potential requirement for additional data collection has been discussed with the LHAs. The data which has been used to underpin the ES is sufficiently robust in quality and coverage, however, there has been some discussion regarding areas where increased coverage of traffic surveys would provide additional confidence in the conclusions drawn within the ES. These locations were Elms Road, the A11/Elms Road T-Junction, La Hogue Road and Freckenham Road. Traffic surveys were carried out between Thursday 7th to Wednesday 13th July 2022. The purpose of these surveys has been to increase the geographical coverage of baseline data as outlined in Q1.10.81 and Q1.10.99. No additional traffic surveys are proposed to be undertaken at locations where 2016-2019</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>traffic survey is available as the baseline data has been shown to be fit for purpose and there is no further need to increase the geographical coverage of data. Further information on the additional traffic survey is provided in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>A comparison has also been undertaken of the 2022 and 2019 traffic data for the A11 and A14 near the Proposed Scheme. The purpose of this data is to draw comparisons between pre-covid and current traffic flows. These locations (A11 and A14) have been chosen as they are the closest parts of the Strategic Road Network to the Scheme, for which there is comprehensive and comparable data available to monitor changes in traffic flow levels over time. Traffic data has been obtained from WebTRIS for locations which have both 2019 and 2022 data available to determine if traffic flows have returned to pre-Covid levels. Traffic data for 2022 was only available up to August. The January to August 24 hour Average Daily Traffic (ADT) and 18 Hour Average Weekday Traffic (AWT) has been used for the comparison as this data is available for both years. This comparison indicates that 2022 traffic flows on the A11 and A14 between January and August are between 5% to 12% lower than the January to August 2019 average. Therefore, the September 2019 traffic flows used in the Transport Assessment and Transport and Access Chapter of the ES are robust. Further details on this review can be found in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p>
Q1.10.84	The Applicant	<p><b>Baseline conditions</b></p> <p>From the figures quoted in paragraph 3.5.3 and Tables 3-20 and 3-21 of the Transport Assessment [APP-117], the killed and seriously injured (KSI) rate for the surrounding network appears to be around 19%.</p> <p>Do you consider this to be high, low or normal and why?</p> <p>Please explain whether and if so how you expect this value to change with the levels of forecast staff and HGV construction traffic, and why.</p>	<p>It is assumed that the 19% quoted relates to the proportion of all casualties classed as Killed or Seriously Injured (KSI), rather than the total number of collisions or casualties recorded on the network. There is no industry standard as to what proportion of KSIs is considered to be high, low or normal, the key point in reviewing Personal Injury Collision (PIC) data is whether there are clusters of collisions, particularly KSIs, and common causation factors.</p> <p>For the purposes of the Proposed Development a review was undertaken at individual links and junctions to assess whether the number and characteristics of the collisions on record suggest a potential underlying highways safety issue, and hence whether the development related traffic would have a significant impact on highway safety. The Personal Injury Collision (PIC) analysis presented in the Transport Assessment [APP-117] does not indicate a particular safety concern that is likely to be exacerbated by the scheme proposals. This is the Industry</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Standard method of assessing the potential highways safety impact of development proposals. However, it is not feasible to robustly forecast the potential change in numbers of collisions, or proportions of KSIs, as a result of construction staff and HGV trips.</p> <p>It should be noted for context that during discussions with the Local Highway Authorities, AECOM was requested to review safety risks relating to HGVs performing the 'Boomerang' movement at the A14 J37. This is where vehicles are required to exit the westbound off-slip, turn right onto the A142 and then turn right onto the eastbound on-slip, effectively making a U-turn movement. This movement is required for vehicles travelling southbound on the A11 or westbound on the A14 to access La Hogue Road. A further in-depth review of the PIC data was undertaken and shows that the PIC data does not indicate an underlying safety issue that could result in a requirement on the Sunnica development to provide highways safety mitigation in this location. Further details on the PIC review of the 'Boomerang' movement is provided in Section 9 of the Transportation Technical Note [EN010106/APP/8.42].</p>
Q1.10.85	The relevant highway authority	Question not for Applicant.	
Q1.10.86	The Applicant	<p><b>Site accesses</b></p> <p>In paragraph 4.2.1 of the Transport Assessment [APP-117] you say that "<i>Sunnica East Site B will be accessed via the A11 and B1085.</i>".</p> <p>Is this correct?</p>	Sunnica East Site B will be accessed via the B1085 Elms Road which is located approximately 1km / 0.6 miles to the north of the A11 northbound off-slip/Elms Road T-Junction and 1.6km / 1 mile from the Red Lodge Dumbbell Roundabouts.
Q1.10.87	The Applicant	<p><b>Temporary road closures</b></p> <p>In paragraphs 4.3.1 and 4.3.2 of the Transport Assessment [APP-117] you list the roads to be closed temporarily and say that advanced warning will be provided in accordance with highway authority guidance.</p>	The Applicant can confirm that the public and local road users will be informed well in advance of any road closures as part of the Communication Strategy, as provided for in the updated Framework Construction Environmental Management Plan submitted at Deadline 2 [EN010106/APP/6.2_Rev02]. This is secured via Requirement 14 of the draft DCO.

ExQ1	Respondent	Question	Applicant's Response
		Would you also inform the public and local road users well in advance of any closure as part of a stakeholder communications plan, to be part of your Code of Construction Practice or your Construction Traffic Management Plan, to be secured through a Requirement in Schedule 2 to the DCO?	
Q1.10.88	The Applicant	<p><b>Temporary PRoW closures</b></p> <p>In paragraph 4.4.2 of the Transport Assessment [APP-117] you list those PRoW to be closed temporarily at some point during construction and say that timing and routeing are currently unknown. When better information is available, particularly in respect of diversion routes, would you inform the public and local PRoW users well in advance of any closure as part of a stakeholder communications plan, to be part of your Code of Construction Practice or your Construction Traffic Management Plan, to be secured through a Requirement in Schedule 2 to the dDCO?</p>	<p>We can confirm any PRoW closures will be made public as part of the Communication Strategy, as provided for in the updated Framework Construction Environmental Management Plan submitted at Deadline 2 [EN010106/APP/6.2_Rev02]. This is secured via Requirement 14 of the draft DCO.</p> <p>However, the closures identified are considered the worst-case scenario for the purposes of the EIA. The contractor will assess each of the proposed PRoW closures to consider if the PRoW can remain open to the public in a safe and controlled manner.</p>
Q1.10.89	The Applicant	<p><b>Temporary PRoW closures</b></p> <p>In paragraph 6.1.5 of the Transport Assessment [APP-117] you acknowledge that temporary closures will impact on users, but say that you have not carried out an assessment.</p> <p>Please explain why.</p>	<p>At the time of producing the Transport Assessment [APP-117], it was not considered representative or valid to undertake surveys of the PRoW due to the pandemic and therefore it was not possible to accurately quantify the number of users affected by the temporary closures.</p> <p>However, this does not mean that an assessment was not undertaken. An EIA assessment of the impact of the scheme on Non-Motorised Users was undertaken from a range of perspectives, including the effect of temporary PRoW closures as presented in paragraphs 13.8.62 to 13.8.65, 13.8.128 to 13.8.131, 13.8.159 to 13.8.162 and 13.8.241 to 13.8.245 within the Transport and Access chapter of the ES [APP-045], which is also discussed in the Transport</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>Assessment [APP-117] and also Chapter 6 of the Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301]. Based on the locations of the routes, including the destinations that they serve, it was considered reasonable to base an assessment on the likelihood that there will be some Non-Motorised Users (NMUs), but it was concluded that levels would not be so substantial that a temporary closure for three weeks would be classified as a significant adverse effect in EIA terms. This is particularly the case as the routes in question are likely to be mostly used as leisure routes, of which there are a range of alternatives in the locality.</p> <p>To provide further confidence to this conclusion, PRoW surveys were carried out in July 2022 to capture the existing usage of the PRoW that are proposed to be temporarily closed. The results of the PRoW surveys identified a low number of daily users of the PRoWs. As a result, and taking account of the July 2022 surveys, the conclusion presented in the Transport Assessment and Transport and Access chapter of the ES [APP-117] remains unchanged and it was concluded that there would be no significant adverse impact on NMUs as a result of the PRoW closures during the construction period.</p> <p>Through discussions with the Local Highway Authorities, it is understood that their preference is to avoid PRoW closures where they are required for vehicles to cross the PRoW, with the preferred method to be the use of marshals (banksman/banks person) to enable uses of the PRoW to cross the point the closure is required. This was discussed during the 4<sup>th</sup> October video conference meeting with the Local Highway Authorities. This is supported by the Applicant, however, the contractor will make the final decision as to whether marshals can be used, and this will be decided on a case-by-case basis based on health and safety of workers and users of the public rights of way. As such, the ES assesses temporary closures, rather than managed crossings, for the purpose of a robust assessment, i.e. a worst-case scenario.</p> <p>Further information on the additional PRoW surveys that were carried out is provided in Section 10 of the Transportation Technical Note submitted at Deadline 2 [EN010106/APP/8.42].</p>
Q1.10.90	The Applicant	<b>Temporary PRoW closures</b> Please confirm that the public rights of way (PRoW) listed in paragraph 6.3.9 of	The PRoW to be temporarily closed for a maximum of three weeks during the construction of the Scheme are as follows:

ExQ1	Respondent	Question	Applicant's Response
		ES Appendix 13C [APP-118] are to be closed temporarily rather than permanently.	<ul style="list-style-type: none"> <li>• W-257/002/X;</li> <li>• W-257/007/0;</li> <li>• W-257/003/0;</li> <li>• W-257/002/0;</li> <li>• 49/7;</li> <li>• 204/1;</li> <li>• 92/19; and</li> <li>• 35/10.</li> </ul> <p>Further details on the proposed temporary PRoW closures are provided in the Applicants response for Q1.10.89 and in Section 10 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>It should also be noted that the draft DCO does not contain any powers to permanently stop up any highway or public right of way.</p>
Q1.10.91	The Applicant	<p><b>Construction staff car share: occupancy factor</b></p> <p>In paragraph 5.4.4 of the Transport Assessment [APP-117] you cite an actual average vehicle occupancy value of 1.54 obtained from the Hinkley Point C project and say that "<i>applying a staff car share factor of 1.5 persons per vehicle for Sunnica is considered appropriate.</i>".</p> <p>Has the figure of 1.54 been achieved consistently throughout the Hinkley Point C project to date?</p> <p>By appropriate, do you mean applicable to this project?</p> <p>If so, explain your reasoning.</p>	<p>The headline car occupancy value from Hinkley Point C has been used in the assessment as there is limited UK construction project data available in the public domain for outturn car occupancy data, rather than forecast data. Furthermore, the 1.5 car occupancy parameter has been used and accepted in the recent Sizewell DCO which was granted development consent in July 2022. As such it was considered to be a reasonable basis for the assessment. We are not aware of any publicly available data on whether Hinkley Point C has consistently achieved a staff car occupancy of 1.54 throughout the lifespan of the project to date, or whether it is an average. The LHAs have also asked for further evidence on whether 1.5 is an appropriate vehicle occupancy parameter. A review has been undertaken on the staff vehicle occupancy assumptions used for other DCO projects, using publicly available Examination Documentation, to determine if the current assumption of 1.5 staff per vehicle, which represents a 67% car driver mode share, is applicable for the type of Scheme. The review considers a range of energy projects in order to gather a large sample size focusing on wind, solar and power stations examples in analysis. This included four wind farm examples and three solar farm examples as well as three power station examples because</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>What measures did the Hinkley Point C project take to achieve the figure of 1.54? Do you propose to take any of these measures?</p> <p>Are you able to provide other examples of similar projects where a value of 1.5 or more has been consistently achieved?</p> <p>Given the very different locations and relative lack of knowledge of where your staff will live, explain why you are confident of being able to achieve a staff car share factor of 1.5 persons per vehicle for Sunnica.</p> <p>In the event that a figure of 1.5 is not achieved, what steps will you take?</p>	<p>the Applicant considers these appropriate construction schemes to use as comparable examples. The review showed that a 1.5 average staff vehicle occupancy has been used for a variety of DCO projects under the Planning Act 2008 and several schemes assumed a higher average car occupancy (up to 3 people per vehicle). The majority of schemes used factors of 1.5 average vehicle occupancy or greater, including three wind projects and one solar project. Further information on the review and the DCO projects that have been compared is provided in section 3 the Transportation Technical Note [EN010106/APP/8.42]. This also presents a sensitivity test demonstrating that the conclusions of the ES would remain valid if a lower level of car occupancy (1.3) was achieved. This factor (1.3) was chosen as the lowest car occupancy of all the DCO projects in the aforementioned review.</p> <p>At this stage in the project, it is unknown where the construction staff will come from. The 30km travel distance for staff assumption is broadly in line with the latest UK-wide Construction Industry Training Board (CITB) Construction workforce mobility reporting (2018/19) which finds workers travel a mean distance of 18 miles (circa 29km) to work. Whilst it is appreciated that a 30km radius is a relatively wide area, this is typical of major construction projects, for which a 1.5 or greater average vehicle occupancy is commonly used. Within that 30km there are likely to be clusters of staff within population centres, who will be able to car share. The assessment does not rely on this to achieve a 1.5 staff car occupancy rate, as it is not possible to define this level of detail at this stage of the project, but it is highly likely and will further increase the level of car sharing. As demonstrated in the review of similar DCO schemes, the car share factor is considered robust for considering staff vehicle trips. The 30km travel distance is discussed further in Section 3 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>The Framework Construction Traffic Management Plan and Travel Plan [<b>APP-118</b>] will be the mechanism by which measures will be introduced to achieve the equivalent of a 67% car driver mode share, which is equivalent to all staff travelling by car with a 1.5 vehicle occupancy. This is outlined in the updated Framework Construction Traffic Management Plan and Travel Plan [<b>AS-300, AS-301</b>]. As per the usual approach, at Framework stage it includes examples of the strategy to be used and potential measures to be implemented. When more detail is known on the future workers, a detailed CTMP and Travel Plan will be</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>developed for approval setting out the specific measures to be introduced, as required in a requirement under the dDCO.</p> <p>As part of the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>, staff will be encouraged to lift share. The benefits of car sharing will be promoted to staff, such as reduced fuel costs, ease of parking with possibility of dedicated spaces for those sharing provided nearer to the mini-bus collection points within the compounds. In addition, a Car Share Scheme will be implemented which will actively match potential sharers and be available to staff so that they can find their own match as well as that identified by the Transport coordinator. The potential to use the mini-bus to collect clusters of staff will also be investigated, and implemented depending on its feasibility.</p> <p>The measures set out above are relatively common for major construction projects at this stage of the DCO process, and it has been demonstrated that the car occupancy proportion used is comparable.</p>
Q1.10.92	The Applicant	<p><b>Forecast peak HGV movements on local roads</b></p> <p>On plates 2 and 3 of the Transport Assessment [APP-117] should there be a coloured line representing the A11 northbound off slip access to Elms Road?</p>	<p>Plates 2 and 3 of the Transport Assessment <b>[APP-117]</b>, are a visual representation of the HGVs forecast to use the local highway network during the construction period. The A11 northbound off slip access to Elms Road is shown diagrammatically in the Plates, however a coloured line is not applied as the A11 northbound off slip is part of the Strategic Road Network, rather than the local highway network. This applies to other parts of the Strategic Road Network in these plates.</p>
Q1.10.93	The Applicant	<p><b>Forecast peak HGV movements on local roads</b></p> <p>Forecast figures are summarised in tables 6-3 and 6-4 of the Transport Assessment [APP-117].</p> <p>What class or classes of HGV are these? What is/are the classification(s) of HGVs currently using these local roads?</p>	<p>The breakdown of HGV classes for the construction vehicles is forecast to be 75% 4-axle and 25% 5-axle. Therefore, the use of the maximum legal articulated lorry, which is 16.5m long and 2.55m wide for the swept path analysis, is considered appropriate as this represents the 5-axle HGV, and is therefore a worst-case assessment of the largest vehicle.</p> <p>An Automatic Traffic Count (ATC) was carried out on La Hogue Road between Thursday 7th to Wednesday 13th July 2022. La Hogue Road will carry the greatest number of daily construction HGVs (as indicated in Table 6-3 in the Transport Assessment [APP-117]) and has therefore been chosen as an appropriate link to provide data for. The survey data indicates that the majority of HGVs currently using La Hogue Road are 7.5T to 18T lorries.</p>

ExQ1	Respondent	Question	Applicant's Response																																												
			<p>The two-way Monday to Friday average (07:00-19:00) HGV movements on La Hogue Road excluding the highway peak hours of 08:00 to 09:00 and 17:00 to 18:00, when there will be no construction HGVs) from the July 2022 traffic survey data per HGV weight classification is set out in the table below.</p> <table border="1" data-bbox="1073 393 2091 949"> <thead> <tr> <th colspan="2">HGV Weight Classification (Maximum)</th> <th colspan="2">Monday to Friday (07:00-19:00 excluding 08:00-09:00 and 17:00-18:00) (Two-Way)</th> </tr> <tr> <th></th> <th></th> <th>Hourly Average</th> <th>Total Vehicles</th> </tr> <tr> <th></th> <th></th> <th>Vehicles</th> <th>%</th> </tr> </thead> <tbody> <tr> <td>7.5T-18T</td> <td>2</td> <td>73%</td> <td>23</td> </tr> <tr> <td>25T</td> <td>0</td> <td>3%</td> <td>1</td> </tr> <tr> <td>30T</td> <td>0</td> <td>0%</td> <td>0</td> </tr> <tr> <td>26T</td> <td>1</td> <td>17%</td> <td>5</td> </tr> <tr> <td>36T</td> <td>0</td> <td>0%</td> <td>0</td> </tr> <tr> <td>40T</td> <td>0</td> <td>8%</td> <td>3</td> </tr> <tr> <td><b>Total</b></td> <td><b>3</b></td> <td><b>100%</b></td> <td><b>32</b></td> </tr> <tr> <td></td> <td></td> <td></td> <td><b>100%</b></td> </tr> </tbody> </table> <p>This table is subject to rounding, i.e. average vehicles is presented to the nearest whole number, and not multiple decimal places, and therefore the individual values may not equal the total. For example, the hourly average for 25T and 40T vehicles is zero when rounded to the nearest whole number, rather than to multiple decimal places from which the percentage is calculated.</p>	HGV Weight Classification (Maximum)		Monday to Friday (07:00-19:00 excluding 08:00-09:00 and 17:00-18:00) (Two-Way)				Hourly Average	Total Vehicles			Vehicles	%	7.5T-18T	2	73%	23	25T	0	3%	1	30T	0	0%	0	26T	1	17%	5	36T	0	0%	0	40T	0	8%	3	<b>Total</b>	<b>3</b>	<b>100%</b>	<b>32</b>				<b>100%</b>
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Q1.10.94	The Applicant	<p><b>Forecast peak HGV movements on local roads</b></p> <p>In paragraph 6.2.16 of the Transport Assessment [APP-117] you say that there will be a peak of 48 heavy goods vehicle (HGV) movements per day on La Hogue Road but that this is a low number of HGVs per hour and "<i>is not considered to</i></p>	<p>The 48 daily HGV movements forecast at Sunnica West Site A: Site Access A on La Hogue Road are only anticipated to occur for one month during construction (month 3). This equates to circa five HGVs per hour between 07:00 and 19:00, excluding the highway peak hours of 08:00 to 09:00 and 17:00 to 18:00, when there will be no construction HGVs. The daily HGV movements are identified in Table 6-3 in the Transport Assessment [APP-118].</p>																																												

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		<p><i>have a significant impact on the operation of La Hogue Road.”.</i></p> <p>Please explain, clarifying</p> <ul style="list-style-type: none"> <li>i) The current comparable daily and hourly HGV flows along La Hogue Road by HGV class; and</li> <li>ii) the breakdown of forecast daily and hourly HGV flows by class</li> </ul>	<p>Additional traffic surveys have been carried out at locations where it has been agreed with the Local Highway Authorities that is would be beneficial to provide confidence in the conclusions of the ES. An Automatic Traffic Count (ATC) was carried out on La Hogue Road between Thursday 7<sup>th</sup> and Wednesday 13<sup>th</sup> July 2022.</p> <p>As noted in the response to Q1.10.93, the 2022 survey data identifies an average of three HGVs per hour between 07:00 and 19:00 (excluding the highway peak hours of 08:00 to 09:00 and 17:00 to 18:00, when there will be no construction HGVs) on La Hogue Road. The 2022 survey data identifies an average of 32 HGVs between 07:00-19:00 excluding the highway peak hours of 08:00-09:00 and 17:00-18:00, on La Hogue Road, with the highest hourly number of HGVs surveyed being 14:00-15:00 as shown in the table below. The majority of HGVs currently using La Hogue Road are 7.5T to 18T lorries. The table below sets out the Monday to Friday average HGV traffic flows by weight classification on La Hogue Road from the 2022 survey data.</p> <table border="1" data-bbox="1073 759 1657 1251"> <thead> <tr> <th rowspan="2">HGV Weight Classification (Maximum)</th> <th colspan="2">Monday - Friday Average Peak Hour (14:00-15:00) (Two-Way)</th> </tr> <tr> <th>Vehicles</th> <th>%</th> </tr> </thead> <tbody> <tr> <td>7.5T-18T</td> <td>5</td> <td>75%</td> </tr> <tr> <td>25T</td> <td>0</td> <td>3%</td> </tr> <tr> <td>30T</td> <td>0</td> <td>0%</td> </tr> <tr> <td>26T</td> <td>1</td> <td>16%</td> </tr> <tr> <td>36T</td> <td>0</td> <td>0%</td> </tr> <tr> <td>40T</td> <td>0</td> <td>6%</td> </tr> <tr> <td><b>Total</b></td> <td><b>6</b></td> <td><b>100%</b></td> </tr> </tbody> </table> <p>This table is subject to rounding, i.e. average vehicles is presented to the nearest whole number, and not multiple decimal places, and therefore the individual values may not equal the total. For example, the hourly average for 25T and 40T</p>	HGV Weight Classification (Maximum)	Monday - Friday Average Peak Hour (14:00-15:00) (Two-Way)		Vehicles	%	7.5T-18T	5	75%	25T	0	3%	30T	0	0%	26T	1	16%	36T	0	0%	40T	0	6%	<b>Total</b>	<b>6</b>	<b>100%</b>
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ExQ1	Respondent	Question	Applicant's Response
			<p>vehicles is zero when rounded to the nearest whole number, rather than to multiple decimal places from which the percentage is calculated.</p> <p>Further to this, discussions have taken place with the LHAs regarding ensuring safe passage of HGV trips on La Hogue Road, and Elms Road. The swept path analysis of 16.5m articulated lorries travelling in both directions has been carried out for sections which would be used by construction traffic which is outlined within the Transportation Technical Note submitted at Deadline 2 [EN010106/APP/8.42]. It is proposed that suitable passing places will be provided at appropriate intervals with sufficient visibility between passing places. This has been proposed by the Applicant to ensure safe and suitable access, with details provided along with plans in Section 12 of the Transportation Technical Note [EN010106/APP/8.42]. Thus suitable mitigation is proposed to ensure that construction HGVs will not have a significant impact on the operation of La Hogue Road.</p>
Q1.10.95	The Applicant	<p><b>Cumulative effects</b></p> <p>Paragraph 13.11.1 of the Transport and Access chapter of the ES [APP-045] says that the future baseline has been calculated for 2023 using TEMPro growth factors which include forecast development growth.</p> <p>Which districts or areas have you selected for growth factors?</p> <p>Are you satisfied that they are sufficiently robust given the effects of the pandemic, local planned projects and local growth considerations?</p>	<p>TEMPro growth factors for the Forest Heath 006 and East Cambridgeshire 007 Middle Super Output Areas (MSOA) have been applied to the baseline traffic survey data within the relevant areas in order to calculate 2023 traffic flows.</p> <p>Due to the Covid-19 pandemic and the impact of national and local lockdowns traffic flows, the use of pre-Covid survey data is considered appropriate and robust, with applied growth factors to determine the future baseline. Chapter 3 of the Transport Assessment [APP-117] provides details the derivation of calculation of future traffic growth, including local planned projects and growth. This has been carried out in line with Department for Transport (DfT) Transport Appraisal Guidance (TAG), with the methodology agreed with the Highways Authorities.</p>
Q1.10.96	The relevant highway authority	Question not for Applicant.	
Q1.10.97	The Applicant	<p><b>Assessment methodology</b></p> <p>In paragraph 13.4.14 of the Transport and Access chapter of the ES [APP-045] you</p>	The October 2019 IEMA Impact Assessment Strategy does not provide an update on the IEMA guidelines for Transport and Access assessments. Therefore, it has

ExQ1	Respondent	Question	Applicant's Response
		<p>say that your methodology has been based on the 1994 Guidelines for the Environmental Assessment of Road Traffic (GEART) from the Institute of Environmental Assessment (IEMA).</p> <p>Has the 2019 IEMA Impact Assessment Strategy resulted in any material changes to the GEART criteria or the way in which the impacts of road traffic are assessed?</p>	not resulted in any material changes to the GEART criteria or the way in which the impacts of road traffic are assessed
Q1.10.98	The relevant local planning and highway authorities	Question not for Applicant.	
Q1.10.99	The Applicant	<p><b>Assessment: new traffic data</b></p> <p>Paragraph 13.3.1 of the Transport and Access chapter of the ES [APP-045] highlights the limitations and the assumptions made in respect of the assessment.</p> <p>Since the easing of public health restrictions in March of this year, have you collected any new traffic data to assess whether traffic flows are returning to normal and to assist in filling gaps in the data available to you prior to submitting this application?</p> <p>If so, how does the new information inform your assessment of the impacts and consequential effects of construction traffic and the consequential need for mitigation, particularly in tranquil locations?</p> <p>If not, do you have any proposals to gather new and more up to date information to help you to assess the impacts and</p>	<p>The potential to undertake additional traffic surveys to provide further confidence in the conclusions in the ES was discussed with the Local Highway Authorities and is set out in detail in Section 4 of the Transportation Technical Note [EN010106/APP/8.42]. It was agreed between the Applicant and the Local Highway Authorities that there are areas where additional data would increase the level of confidence in the conclusions through providing a more comprehensive geographical coverage of data. These locations are as follows:</p> <ul style="list-style-type: none"> <li>• La Hogue Road;</li> <li>• Elms Road (to the west of the A11 Northbound Off-Slip T-Junction);</li> <li>• Freckenham Road; and</li> <li>• A142 and Burwell.</li> </ul> <p>The Local Highway Authorities were unable to provide any additional data. Additional traffic surveys were therefore carried out from Thursday 7<sup>th</sup> to Wednesday 13<sup>th</sup> July 2022, with the LHAs provided with an opportunity to comment on the survey scope (no comments were received). The traffic surveys included Elms Road, the A11/Elms Road T-Junction, La Hogue Road and Freckenham Road. It was agreed with the Local Highway Authorities that there was no additional data requirement for the A142 and Burwell, given low number</p>

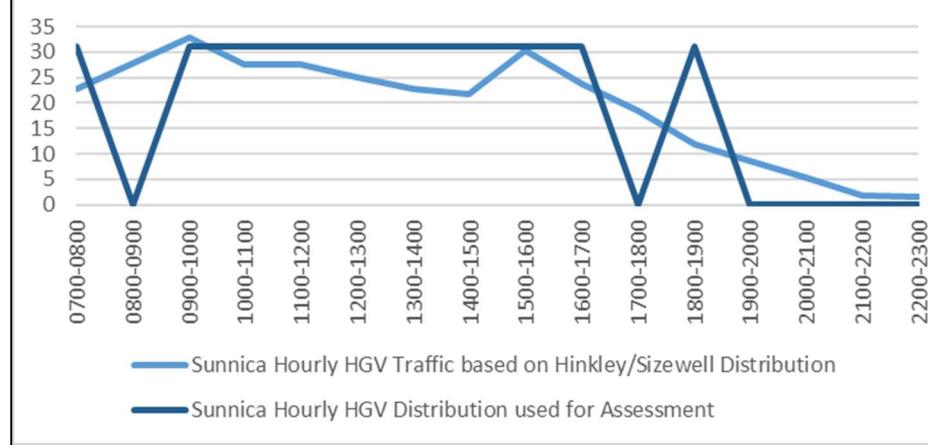
ExQ1	Respondent	Question	Applicant's Response
		mitigate the effects of construction traffic more accurately?	<p>of staff and HGVs, and therefore there was no need to undertake additional surveys to provide additional confidence in the assessment conclusions.</p> <p>The analysis applied within Chapter 13 – Transport and Access of the Environmental Statement [APP-045] has been updated using the July 2022 survey data. This includes severance, driver delay and fear and intimidation. The results of the updated analysis indicate that in the AM and PM development peak hours the links in question are forecast to have either a negligible or minor adverse impact in terms of severance, pedestrian delay, pedestrian / cycle amenity and fear and intimidation. This is not considered to be significant in EIA terms.</p>
Q1.10.100	The Applicant	<p><b>Assessment: professional judgement</b></p> <p>In paragraphs 13.3.2 and 13.4.5 of the Transport and Access chapter of the ES [APP-045] you say that in the absence of baseline traffic data professional judgement has been applied to form a conclusion.</p> <p>Please give examples of instances where you have done this.</p> <p>What evidence do you have that baseline flows are returning to normal following the lifting of public health restrictions?</p> <p>Would the availability of new data now that the public health restrictions have been lifted be a useful validation of your professional judgement?</p> <p>In line 4, to which paragraph are you referring in respect of the assessment of links where the traffic flows are predicted to increase by more than 30%?</p> <p>If traffic flows do not return to normal, would there be additional links requiring assessment?</p>	<p>In Chapter 13 – Transport and Access of the Environmental Statement [APP-045], professional judgement was applied for the assessment of locations where there were acknowledged limitations in the coverage of baseline traffic data available at the time the report was produced, and traffic surveys could not be carried out due to the impact of Covid restrictions on traffic flows. These locations included Elms Road, the A11/Elms Road T-Junction, La Hogue Road and Freckenham Road.</p> <p>As discussed in the response for Q.1.10.99, since the production of the Transport Assessment [APP-117], traffic surveys were undertaken in July 2022 at the locations where availability of new data would be a useful validation of the conclusions drawn.</p> <p>The analysis undertaken within Chapter 13 – Transport and Access of the Environmental Statement [APP-045] has been refreshed utilising the July 2022 survey data. The results of the analysis indicate that in the AM and PM development peak hours there will be no significant effects in terms of severance, pedestrian delay, pedestrian / cycle amenity and fear and intimidation. Therefore, it is considered that the conclusions of the Transport and Access chapter remain valid. Further details on the additional traffic surveys and the analysis are provided in Section 4 of the Transportation Technical Note [EN010106/APP/8.42].</p> <p>Discussion on whether baseline flows are returning to normal is set out in Q1.10.67. This states that traffic data has been obtained from WebTRIS for locations which have both 2019 and 2022 data available to determine if traffic flows have returned to pre-Covid levels. Traffic data for 2022 was only available</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>up to August. The January to August 24-hour Average Daily Traffic (ADT) and 18 Hour Average Weekday Traffic (AWT) has been used for the comparison as this data is available for both years. This comparison indicates that 2022 traffic flows on the A11 and A14 between January and August are between 5% to 12% lower than the January to August 2019 average. In summary, indications at this stage are that traffic flows are not substantially lower than pre-covid levels, although this will vary in different locations</p> <p>The increase in traffic flows of more than 30% is the rule which has been applied to determine the study area for assessment for Chapter 13 – Transport and Access of the Environmental Statement [APP-045]. This refers to Rule 1 of the IEMA guidelines which is set out in paragraph 13.4.4.</p> <p>No further links would need to be assessed if traffic flows do not fully return to pre-Covid levels, as the selection of links to be assessed is predominantly influenced by the level of construction staff or HGVs forecast to use each link, rather than exact levels of baseline flow. Thus, the ES has assessed the links which are forecast to experience increases in traffic as a result of the construction of the Scheme, which would not change if baseline traffic flows do or do not return to normal.</p>
Q1.10.101	The Applicant	<b>Assessment: gaps in data</b> In paragraph 13.3.3 of the Transport and Access chapter of the ES [APP-045] when referring to the west of the A142, do you mean to say Grid Connection Route B?	The Applicant can confirm that this is correct. In line with the response to Q.1.10.76 the sentence should read ' <i>No traffic survey data was available to the west of the A142 along Grid Connection Route B (between the A142 and Burwell) however there is a low number of forecast HGVs and staff along this section of the Scheme</i> '.
Q1.10.102	The Applicant	<b>Assessment: construction programme</b> In paragraph 13.3.4 of the Transport and Access chapter of the ES [APP-045] you say that the traffic impacts have been assessed over a 24-month construction programme and that this represents the worst case as if the construction period were longer then the effects would be extended but be lower in magnitude.	<p>The Applicant is not considering phased construction, other than the need to time construction activities over the course of the programme due to interdependencies to activities, as per a typical construction project.</p> <p>The Applicant has considered how the environmental impact of the construction of the Scheme would be affected if the construction period was increased. The number of HGV movements and staff Full Time Equivalents (FTE) days needed to deliver the project would stay the same, and therefore the daily and peak hour trips would be reduced, but would occur over a longer period of time. Over a 24-month construction period, the Scheme would require a maximum of 155 daily HGVs at its peak, with an average of 119 daily HGVs. This is set out in Paragraph</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>Are you considering phased construction of the Proposed Development? If so, which parts of the Proposed Development might be built in phases?</p> <p>Are there aspects of construction and/or particular sensitive locations where a longer construction period could represent the worst case, particularly for local residents?</p>	<p>5.4.22 and 5.4.23 in the Transport Assessment [APP-117]. These HGVs would be spread across all of the site HGV access points. We have considered how an increase in duration, but decrease in magnitude, of impact, would affect EIA findings. Traffic is not an impact in itself, it is the effect of traffic which results in environmental impact, in terms of severance, driver delay, fear and intimidation, and pedestrian and cycle amenity.</p> <p>In terms of severance, by reducing the number of daily staff/HGVs that will be travelling to/from the Site, the ability for individuals to cross roads will improve due to the greater number of gaps in traffic and therefore reduce the impact of severance.</p> <p>A reduction in the volume of additional daily staff/HGV traffic in the local area caused by the construction of the Scheme would reduce the impact on driver delay. With fewer vehicles on the road, there would be lower levels of congestion on the local highway network which will result in less queuing and delay for general traffic.</p> <p>Reducing the daily number of HGVs travelling to/from the Site will help NMUs travelling in the local area feel safer with a lower presence of large vehicles. Also, by reducing the amount of additional Annual Average Weekday Traffic (AAWT), the impact that the construction of the Scheme will have on fear and intimidation in the local area will decrease.</p> <p>In conclusion, the level of impact of construction activities would be lower in magnitude than that assessed in the ES, but of a more prolonged duration. The scale of environmental impact reported is sufficiently low that an extension to the duration of that impact would not result in a worsening of environmental impact, particularly because the extension of duration would be coupled by a proportionate reduction in magnitude of impact.</p> <p>Thus a longer construction period would not represent the worst case. This is the case for all aspects of construction and at all locations where sensitive receptors have been assessed in Chapter 13 of the ES [APP-045].</p>
Q1.10.103	The Applicant	<p><b>HGV deliveries</b></p> <p>At the foot of page i of the Executive Summary of the Transport Assessment [APP-117] you say that "<i>The proportion of</i></p>	<p>At this stage the proportion of HGV deliveries using the identified delivery routes cannot be determined. It is a reasonable assumption that all HGVs will not originate from the same location or travel from the same direction. Assessing all 155 HGVs on all of the HGV delivery routes is not considered to be a realistic</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>HGV deliveries using the determined delivery routes cannot be determined at this time and the 155 HGVs per day have been evenly distributed between the A11 North, A14 East and A14 West ...”.</i></p> <p>In the absence of defined numbers on each delivery route, please explain how an even distribution of trips is statistically robust and thereby provides a proper assessment of impacts.</p> <p>In this situation, would a more robust and conservative assessment of the impacts of HGV trips at this stage be obtained by assigning all trips to each delivery route?</p>	<p>worst-case assessment of the impact of the construction HGVs. The assessment of an equal proportion of delivery routes on the Strategic Road Network has been agreed as appropriate with National Highways. This is confirmed in Table 2 of the Statement of Common Ground with National Highways, submitted at Examination Deadline 2, which sets out that the assessment methodology, assumptions and findings are agreed.</p> <p>Table 6-2 in the Transport Assessment [APP-117] sets out the 2023 baseline HGVs along the A11 and A14. From this table, the lowest number of HGVs forecast on the Strategic Road Network between 07:00 and 19:00 in a single direction in 2023 is on the A14 (East of Junction 38) with 2,144 HGVs. If we assume that all 155 development related HGVs will use this route to travel to the Scheme, this would result in a 7% increase in HGVs at this point of the A14. This is the highest proportional impact that would be forecast to occur on the Strategic Road Network if all HGVs were assumed to use any one of the identified HGV routes. Therefore, the conclusion that the development-related construction HGVs are not forecast to have a significant impact on the Strategic Road Network is still valid. Within the IEMA guidance, Rule 1 outlines '<i>highway links where traffic flows will increase by more than 30% (or the number of heavy good vehicles by more than 30%)</i>' and Rule 2 outlines '<i>other specifically sensitive areas where traffic flows have increased by 10% or more</i>'. Therefore, the percentage increase forecast is less than those outlined in the two IEMA rules, meaning that it is reasonable to conclude that any resulting impact would not be significant.</p> <p>Having left the Strategic Road Network, the use of the local highway network has been determined based on the access at which those HGVs would be required, i.e. the known destination rather than the unknown origin of the trips.</p>
Q1.10.104	The Applicant	<p><b>HGV deliveries</b></p> <p>On page ii of the Executive Summary of the Transport Assessment [APP-117], given that there will be no deliveries during network peak hours, you appear to arrive at a figure for the number of HGVs on the local road network associated with the construction of the Proposed Development</p>	<p>The distribution of the HGVs on the local highway network is set out in section 5 of the Transport Assessment [APP-117]. Plate 2 and Plate 3 in the Transport Assessment diagrammatically show the construction HGV distribution on local roads for the daily peak number of HGVs and daily average number of HGVs in a single direction.</p> <p>It is unclear from the question whether the issue with an even distribution relates to the previous question regarding origins on the Strategic Road Network, i.e.</p>

ExQ1	Respondent	Question	Applicant's Response
		<p>by an even distribution across the non-peak working hours.</p> <p>i) In the absence of defined numbers on each local delivery route, please explain how an even distribution of trips is statistically robust and thereby provides a proper assessment of impacts.</p> <p>ii) In this situation, would a more robust and conservative assessment of the impacts of HGV trips on the local road network be obtained by assigning all trips to each delivery route?</p>	<p>geographically, or an even distribution of trips through the day, i.e. temporally. For clarity, an answer to both is provided.</p> <p>Having left the Strategic Road Network, the use of the local highway network has been determined based on the access at which those HGVs would be required, i.e. the known destination rather than the unknown origin of the trips. The assessment of HGV impacts on the local road network therefore is not reliant on the even assignment of trips across Strategic Road Network arrival points.</p> <p>During discussions with the LHAs, questions were raised regarding the assumption of an even distribution of HGVs throughout a construction day. Based on professional experience, this approach is both commonly taken and a reasonable assumption. Furthermore, the use of an even distribution to identify a peak hourly flow of HGVs is considered robust as it excludes network peak hours.</p> <p>At the request of the LHAs, further analysis has been undertaken on the hourly numbers of HGVs using the temporal distribution applied to the Sizewell C Power Station which was based on observed HGV profiles at Hinkley Point C. The LHAs advised that they considered this a comparable example project for this purpose.</p> <p>Using the Sizewell C distribution identifies a peak inbound movement of 20 HGVs compared to 16 based on the Sunnica distribution and the Sizewell C Power Station identifies a peak outbound movement of 17 HGVs compared to the Sunnica distribution of 16 outbound HGVs. When comparing the two-way HGV traffic flows, the Sizewell C Power Station distribution identifies a peak two-way movement of 33 HGVs whereas the Sunnica distribution identifies a peak two-way movement of 31 HGVs. Therefore, it is concluded the difference in hourly distribution identified is an immaterial difference and the use of an even profile, excluding peak hours for the purposes of Chapter 13 – Transport and Access of the Environmental Statement [APP-045] is reasonable as the conclusions of the assessment would remain unchanged.</p> <p>The graph below illustrates the Sunnica daily peak number of HGVs (155) based on the Sunnica and Hinkley Point C/Sizewell C distributions.</p>

ExQ1	Respondent	Question	Applicant's Response																																																			
			 <table border="1"> <caption>Data for Sunnica Hourly HGV Traffic</caption> <thead> <tr> <th>Hour</th> <th>HGV Traffic (based on Hinkley/Sizewell Distribution)</th> <th>HGV Distribution used for Assessment</th> </tr> </thead> <tbody> <tr><td>0700-0800</td><td>28</td><td>25</td></tr> <tr><td>0800-0900</td><td>28</td><td>5</td></tr> <tr><td>0900-1000</td><td>32</td><td>30</td></tr> <tr><td>1000-1100</td><td>28</td><td>28</td></tr> <tr><td>1100-1200</td><td>28</td><td>28</td></tr> <tr><td>1200-1300</td><td>28</td><td>25</td></tr> <tr><td>1300-1400</td><td>28</td><td>22</td></tr> <tr><td>1400-1500</td><td>28</td><td>22</td></tr> <tr><td>1500-1600</td><td>28</td><td>30</td></tr> <tr><td>1600-1700</td><td>28</td><td>22</td></tr> <tr><td>1700-1800</td><td>28</td><td>5</td></tr> <tr><td>1800-1900</td><td>28</td><td>30</td></tr> <tr><td>1900-2000</td><td>28</td><td>2</td></tr> <tr><td>2000-2100</td><td>28</td><td>2</td></tr> <tr><td>2100-2200</td><td>28</td><td>2</td></tr> <tr><td>2200-2300</td><td>28</td><td>2</td></tr> </tbody> </table> <p>Further details on this assessment are provided in section 5 of the Transportation Technical Note [EN010106/APP/8.42].</p>	Hour	HGV Traffic (based on Hinkley/Sizewell Distribution)	HGV Distribution used for Assessment	0700-0800	28	25	0800-0900	28	5	0900-1000	32	30	1000-1100	28	28	1100-1200	28	28	1200-1300	28	25	1300-1400	28	22	1400-1500	28	22	1500-1600	28	30	1600-1700	28	22	1700-1800	28	5	1800-1900	28	30	1900-2000	28	2	2000-2100	28	2	2100-2200	28	2	2200-2300	28	2
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Q1.10.105	The Applicant	<p><b>HGV deliveries</b></p> <p>In respect of a more robust and conservative assessment of likely actual HGV movements on local roads, and assuming that the HGV measures and controls outlined briefly in section 7.2 of the Framework Construction Traffic Management Plan and Travel Plan [APP-118] are in place, please</p> <ol style="list-style-type: none"> <li>detail the difference in HGV flows on sensitive links;</li> <li>explain why you do not consider this to have a significant impact on the local highway network; and</li> <li>explain what measures you will take to mitigate the impacts and how these will be secured in the Order.</li> </ol>	<p>It is not a realistic worst case to assume that all HGVs will use a single arrival route from the Strategic Road Network (SRN) due to the widespread locations of HGV site access points for the Scheme. The HGV arrival profile on the SRN has not influenced the trip profile on the local highway network. Therefore there would be no difference in HGV flows on sensitive links, and thus no change in impact on the local highway network in comparison with that already assessed.</p> <p>Within the Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS301]</b>, management measures and controls are outlined in chapter 6. This includes a Delivery Management System (DMS), HGV routes, HGV timing restrictions, HGV emission standards, communications strategy, site accesses and cranes and AIL management measures. A DMS will be implemented to control bookings of HGV deliveries from the start of the construction period. This will be used to effectively plan all HGV deliveries in accordance with the construction programme, regulate the flow of HGVs via timed delivery slots and monitor compliance of HGV routeing.</p> <p>In addition, a Traffic Management and Monitoring System (TMMS) will be developed. The TMMS will provide details of the technologies and other means employed to monitor HGVs to/from the development site (e.g. Global Positioning</p>																																																			

ExQ1	Respondent	Question	Applicant's Response
			<p>System (GPS), Automatic Number Plate Recognition (ANPR)). This will enable the Applicant to monitor the following:</p> <ul style="list-style-type: none"> <li>a. Compliance with the HGV routes;</li> <li>b. Compliance with the number of HGV limits in terms of number of deliveries arriving and departing at any one time and over the course of the day; and</li> <li>c. Compliance with the timing restrictions.</li> </ul> <p>The DMS and the TMMS are provided for in the updated Framework Construction Traffic Management Plan and Travel Plan [AS-300, AS-301]. This is secured under the draft DCO – the relevant requirement in Schedule 2 to the draft DCO requires the relevant authority's approval of the CTMP before the commencement of the development, and the CTMP must be substantially in accordance with the Framework.</p>
Q1.10.106	The Applicant	<p><b>Staff travel</b></p> <p>In respect of staff traffic during construction, the fourth paragraph on page ii of the Executive Summary of the Transport Assessment [APP-117], says that “<i>The peak number of vehicles associated across the Scheme is 937 staff vehicles per day ...</i>”. Paragraph 2.4.5 of ES Appendix 13C Framework Construction Traffic Management Plan and Travel Plan [APP-118] quotes the peak number of staff as 1393 (implying that average vehicle occupancy will be 1.5) and in section 7.2 you provide a brief outline of staff vehicle measures and controls.</p> <p>You conclude on page iii of the Executive Summary of the Transport Assessment [APP-117] that “<i>the proposed Scheme is</i></p>	<p>The LHAs have also asked for further evidence on whether 1.5 is an appropriate vehicle occupancy parameter. A review has been undertaken on the staff vehicle occupancy assumptions used for other DCO projects, using publicly available Examination Documentation, to determine if the current assumption of 1.5 staff per vehicle, which represents a 67% car driver mode share, is applicable for the type of Scheme. The review considers a range of energy projects in order to gather a large sample size and focused on wind and solar examples in analysis. The review showed that a 1.5 average staff vehicle occupancy has been used for a variety of granted applications considered by PINS schemes and several schemes assumed a higher average car occupancy (up to 3 people per vehicle). The majority of schemes used factors of 1.5 average vehicle occupancy or greater, including three wind projects and one solar project. Further information on the review and the PINS schemes that have been compared is provided in section 3 the Transportation Technical Note [EN010106/APP/8.42]. This also presents a sensitivity test demonstrating that the conclusions of the ES would remain valid if a lower level of car occupancy (1.3) was achieved. This factor (1.3) was chosen as the lowest car occupancy of all the DCO Construction Projects in the aforementioned review.</p> <p>At this stage in the project, it is unknown where the construction staff will come from. The 30km travel distance for staff assumption is broadly in line with the</p>

ExQ1	Respondent	Question	Applicant's Response
		<p><i>not considered to have a significant impact on the highway network ..."</i></p> <p>Please</p> <ul style="list-style-type: none"> <li>i) explain why you think that this average vehicle occupancy figure is realistic;</li> <li>ii) provide more detail on how it will be achieved;</li> <li>iii) detail the difference in traffic flows on sensitive links;</li> <li>iv) explain why you do not consider this to have a significant impact on the local highway network; and</li> <li>v) explain what measures you will take to mitigate the impacts and how these will be secured in the Order.</li> </ul>	<p>latest UK-wide Construction Industry Training Board (CITB) Construction workforce mobility reporting (2018/19) which finds workers travel a mean distance of 18 miles (circa 29km) to work. Whilst it is appreciated that a 30km radius is a relatively wide area, this is typical of major construction projects, for which a 1.5 or greater average vehicle occupancy is commonly used. Within that 30km there are likely to be clusters of staff within population centres, who will be able to car share. The assessment does not rely on this to achieve a 1.5 staff car occupancy rate, as it is not possible to define this level of detail at this stage of the project, but it is highly likely and will further increase the level of car sharing. As demonstrated in the review of similar DCO schemes, the car share factor is considered robust for considering staff vehicle trips.</p> <p>The Framework Construction Traffic Management Plan and Travel Plan <b>[APP-118]</b> will be the mechanism by which measures will be introduced to achieve the equivalent of a 67% car driver mode share, which is equivalent to all staff travelling by car with a 1.5 vehicle occupancy. This is outlined in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-278, AS-279]</b>. As is typical for a CTMP and Travel Plan, at Framework stage it includes examples of the strategy to be used and potential measures to be implemented. When more detail is known on the future workers, a detailed Travel Plan will be developed for approval setting out the specific measures to be introduced, as required under the dDCO.</p> <p>As part of the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b>, staff will be encouraged to lift share. This is outlined in the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-278, AS-279]</b>. The benefits of car sharing will be promoted to staff, such as reduced fuel costs, ease of parking with possibility of dedicated spaces for those sharing provided nearer to the mini-bus collection points within the compounds. In addition, a Car Share Scheme will be implemented which will actively match potential sharers and be available to staff so that they can find their own match as well as that identified by the Transport coordinator. The potential to use the mini-bus to collect clusters of staff will also be investigated, and implemented depending on its feasibility.</p>

ExQ1	Respondent	Question	Applicant's Response
			The measures set out above are relatively common for major construction projects at this stage of the DCO process, and it has been demonstrated that the car occupancy proportion used is comparable.
Q1.10.107	The Applicant	<p><b>Staff travel</b></p> <p>With reference to the second paragraph on page iii of the Executive Summary of the Transport Assessment [APP-117] please confirm that staff will always be directed to use the strategic road network (SRN) (A11 and A14) and also the primary route network (PRN) [A142] to travel to and from the Proposed Development.</p>	The Applicant can confirm that this is correct. Staff will be directed to use the Strategic Road Network (A11 and A14) and the Primary Route Network (A142) when travelling to/from the Scheme, as outlined in paragraphs 7.2.21 and 7.2.25 the updated Framework Construction Traffic Management Plan and Travel Plan <b>[AS-300, AS-301]</b> . This is secured under the draft DCO - Requirement 16 in Schedule 2 to the draft DCO requires the relevant authority's approval of the CTMP before the commencement of the development, and the CTMP must be substantially in accordance with the Framework.
Q1.10.108	The Applicant	<p><b>Change application</b></p> <p>There appears to be some repetition at the start of paragraph 3.5.51 of the Scheme Description [AS-249]. Please redraft as necessary.</p>	<p>The redraft of paragraph 3.5.51 is provided below:</p> <p><i>"Access to Burwell National Grid Substation Extension will be provided from the existing access via Weirs Drove and access to Burwell National Grid Substation Extension - Option 2 will be provided from Newnham Drove. A further 18 access points will be provided along Grid Connection Route A and Grid Connection Route B. These are shown on Figures 3-25a to d and further details are provided in Appendix 13C of this Environmental Statement [EN010106/APP/6.2]."</i></p>
Q1.10.109	The Applicant	<p><b>Change application</b></p> <p>In Table 3-5 on page 53 of the Scheme Description [AS-249] an estimate is given of the number of crane and low loader movements and that there would be fewer movements if Option 2 is not selected.</p> <p>How many crane movements and how many low loader movements would be required if Option 2 is not selected?</p>	If Option 2 is not selected and the extension of the Burwell National Grid is not required, then seven fewer crane movements would be required as they are already included within the count for Sunnica West A. The same number of low loaders would still be required in order to transport the transformers to site.



## 13 Topic 1.11 Water Resources, Flood Risk and Drainage

ExQ1	Respondent	Question	Applicant's Response
<b>Q1.11.1</b>	The Applicant	<p><b>Flood risk</b></p> <p>The flood risk summary on page ii of the Flood Risk Assessment [AS-012] says that pluvial (surface water) flood risk varies with some areas susceptible to surface water flooding, that flooding is localised and that the Applicant will undertake further ground investigation, groundwater monitoring and infiltration testing.</p> <ul style="list-style-type: none"> <li>i) At which locations does the localised flooding occur?</li> <li>ii) How deep are the flood waters and for how long?</li> <li>iii) What further ground investigation do you intend to undertake; and for what purpose?</li> <li>iv) When, where and for how long do you intend to undertake this further ground investigation, groundwater monitoring and infiltration testing?</li> <li>v) Will the results be made public?</li> <li>vi) How will this work inform good design?</li> </ul>	<p>In response to each point:</p> <p>i) Page 3 of Annex C, Environment Agency Flood Map for Planning, of the FRA, Appendix 9-C [AS-008] indicates the Order Limits on the plan using the latest mapping from the online flood map for planning, indicating where surface water flood risk is present across the Order Limits. Locations are difficult to more particularly describe, as they are in fields at natural low spots. The majority of these low spots where ponding may occur are in Sunnica West, PV Areas W04, W06 and W07.</p> <p>ii) The majority of the Order limits are at low risk (0.1%AEP) of flooding (noted on Page 3, Environment Agency Flood Map for Planning, of Annex C, FRA [AS-008], with only a few areas up to 900mm deep (from the online Gov.uk mapping). In these areas, the drainage strategy proposes to retain these as natural detention basins (as noted in section 3 of the Drainage Technical Note within Annex F or the FRA Part 4 [AS-010]). For return periods of 1% AEP and below, the mapping shows these PV areas are unlikely to have deep water (&lt;300mm deep). The surface water risk is still considered to be low.</p> <p>The duration of surface water flooding is not provided by the online flood map for planning. Infiltration testing to a nationally recognised standard will be secured through the requirement 12 of the draft DCO (see also page 48 of the Construction Environmental Management Plan [AS-277] second bullet, which is itself secured through requirement 14) to assist in determining drain down times for surface water runoff features. This will inform the detailed design and assist in sizing of attenuation components.</p> <p>iii) Further ground investigation will be required to confirm the soil for PV panel leg piling, and also to confirm groundwater depths to confirm suitability for the proposed 600mm deep swales. This will be undertaken post-consent either using powers under the DCO [AS-293] or in agreement with landowners, with the specific details to be provided for under the surface water and foul water drainage and ground requirement (requirement 12 of the draft DCO).</p> <p>iv) Ground Investigation locations will be selected to inform the most suitable drainage strategy for detailed design. The groundwater monitoring regime will be</p>

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			<p>agreed as part of the surface water and groundwater DCO requirement (requirement 12) and will take place for a period of time that will include the winter season as a minimum.</p> <p>v) Requirement 12 of the draft DCO [AS-293] requires details of the surface water drainage strategy to be submitted to and approved by the relevant county planning authority prior to commencement of any phase of the authorised development. The Applicant would expect the relevant planning authority to publish information in relation to submissions for approval under requirements in the same manner in which they publish information in relation to discharge of planning conditions.</p> <p>vi) The GI work will inform the construction requirements for PV panel installation, the locations of swales at detailed design, and that the final design depths of swales are suitable for construction, with no increased risk to groundwater quality from surface water runoff.</p>
<b>Q1.11.2</b>	The Applicant	<p>Please explain how the design of the Proposed Development and the ES assessments have been established in relation to groundwater protection and management in the absence of ground investigation to establish groundwater levels?</p> <p>Please confirm how future ground investigation works would be managed, including what mitigation, monitoring and remedial measures would be in place?</p>	<p>Groundwater levels have been established based on interpretation made by the Environment Agency and their consultants in the conceptual model development for the Chalk aquifer in this area referenced in Chapter 9 - Flood Risk, Drainage and Water Resources [<b>APP-041</b>].</p> <p>These interpreted levels are provided as groundwater elevation contours within the Order Limits. Depths of site structures that are installed below ground such as solar PV mountings, substation concrete foundations, cable routes, and horizontal drilling beneath rivers and other surface features have been compared to estimated groundwater levels to determine effects of the scheme in terms of groundwater protection.</p> <p>The Framework Construction Environmental Management Plan [<b>AS-277</b>] describes pollution prevention measures during construction works. This is secured under the DCO.</p> <p>Future ground investigation work will be undertaken post-consent either using powers under the DCO [<b>AS-293</b>], or in agreement with landowners, with the specific details to be provided for under the surface and foul water drainage and ground conditions DCO Requirements.</p>

ExQ1	Respondent	Question	Applicant's Response
<b>Q1.11.3</b>	The Applicant	ES Chapter 9 [APP-041], paragraphs 9.6.164 and 9.6.165 state that no significant changes to current baseline conditions are predicted for the future baseline, as the main reasons for differences in water body importance are unlikely to change. Please confirm whether the requirement for waterbodies to have 'good' status by 2027 (referred to in paragraph 9.6) affects the potential future baseline for those waterbodies identified currently as having poor ecological or chemical status?	<p>Chapter 9 - Flood Risk, Drainage and Water Resources [APP-041] describes the current and future baseline environment in the area of the Order Limits. Potential impacts have been described and mitigation measures put in place such that the assessment determined that there were no significant effects from the scheme on surface water and groundwater. The Scheme does not affect the future baseline and therefore does not impinge on the requirement to achieve 'good' status by 2027.</p> <p>Table 9-1 outlines the Criteria to Determine Receptor Importance for the water features. The 'general' criteria is the principle criteria, with the information under each specific category examples of what may fall under each importance grade. Table 9-1 Note 1 also states "The WFD status of a watercourse is not an overriding factor and in many instances, it may be appropriate to upgrade a watercourse which is currently at poor or moderate status to a category of higher importance to reflect its overall value in terms of other attributes and WFD targets for the watercourse. Likewise, a watercourse may be below Good Ecological Status, this does not mean that a poorer quality discharge can be emitted [deterioration is not permitted irrespective of the starting WFD class]." Overall, a holistic approach to water body importance is used based on scale, flow, whether a watercourse is designated or not under the WFD, ecological designations and presence of protected species, and social-economic uses such as abstractions for potable supply. WFD status (and individual parameter classes), and water quality more generally, are not used in the criteria for the reasons stated in Note 1 of Table 9-1. The criteria to determine the importance of the receptor is defined in Table 9-1 of Chapter 9 – Flood Risk, Drainage and Water Resources [APP-041]. For surface water, whether the watercourse has a designated WFD status and its receiving flow is one determining factor. If a watercourse is currently Poor, status or potential, and with a receiving flow of under 1m<sup>3</sup>/sec the water feature will be considered to be of High Importance. If the watercourse meets Good status or potential in future, this will still be deemed to be a High Importance receptor. Therefore, whether a water body may improve in the future from one WFD status class to another is not relevant to the decision of its importance.</p>
<b>Q1.11.4</b>	EA	Question not for Applicant.	

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<b>Q1.11.5</b>	The Applicant	ES Chapter 9, section 9.7.18 [APP-041] states that " <i>For this assessment, it has been assumed that launch and receive pits will be no greater than 4m by 3m by 2m deep</i> ". Would the relatively shallow depth of the pits be adequate to achieve the required 2m minimum headroom under the watercourse? Please provide details on the design process so that the ExA may understand how these dimensions have been arrived at.	The launch pit is not required to be at the same depth as the deepest part of the directional drilling due to the directional drilling travelling downwards at an angle from the launch pit to travel under the watercourse before angling upwards again to meet the receive pit on the far side of the watercourse. Appropriate dimensions for the launch pits were advised by experienced contractors and the depth of the launch pits is expected to be adequate to achieve the required 2m minimum headroom under the watercourse.
<b>Q1.11.6</b>	The Applicant	ES Chapter 9, section 9.7.18 [APP-041] states that " <i>The fluid component of the drilling mud would be mains water, obtained from a nearby supply</i> ". Please confirm the likely extent of the supply required and how the potential effects of the drilling methodology have been assessed?	The water for the drilling mud will be sourced from a supply point on the existing mains network and it is not anticipated that the volumes required would have an impact on local supplies or infrastructure. Potential effects of the drilling methodology are addressed in ES Chapter 9 [APP-041], which considers the risk of pollution to groundwater and surface water during construction (the risk associated with the break-out of drilling fluids or their spillage on land is included in the assessment of pollution risks to each water body). Measures to mitigate risks associated with the use of drilling fluids for non-intrusive techniques for cable route construction are included in the Framework CEMP [AS-277], see for examples pages 16C-11 to 16C-12 and 16C-28 to 16C-30.
<b>Q1.11.7</b>	The Applicant	ES Chapter 9, section 9.6.154 and 9.7.7 [APP-041] indicate that there are currently 13 water related licences within the Order limits. Please confirm which if any of these licences are required to be retained. In relation to those that are not required to be retained, what would be the effect of the project on these licences?	ES Chapter 9, section 9.7.7 [APP-041] refers to consents that may be required for the scheme and not existing abstraction licence holders described in section 9.6.154. In the case of the licences referred to in paragraph 9.6.154, these are held by other landowners and would not be transferred to the Applicant. In relation to paragraph 9.6.154, the assessment determined that there will be no significant effects on surface water or groundwater and therefore abstraction licence holders will not be affected by the scheme.
<b>Q1.11.8</b>	The Applicant	ES Chapter 9, section 9.7.42 [APP-041] states that no solar PV panels or other infrastructure would be located in fluvial Flood Zone 3b land. However, there may be solar PV panels in Flood Zone 3a and 2 which would be raised on higher struts up to	The land within the Order Limits is to be used for the generation, storage and transfer of electricity, and for environmental mitigation and landscape planting. The environmental mitigation land and proposed landscaping within Flood Zone 1 performs important roles, for example protecting potential below ground archaeological assets, providing important habitats and helping the Scheme fit

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		850mm Above Ground Level to mitigate flood risk. Please explain why it is necessary to site infrastructure in flood zones 2 and 3a instead of areas of lower flood risk?	<p>into the landscape. This land is therefore not available for the installation of solar PV arrays.</p> <p>The Applicant has avoided placing infrastructure such as substations and BESS within Flood Zone 3a and 2 and proposes raising the minimum heights of the lowest part of solar panels in these areas to 850mm above the ground level as mitigation to ensure that the Scheme does not increase flood risk at the sites or elsewhere. The standard lowest part of the PV panel height above ground is 600mm.</p> <p>This was considered an appropriate approach rather than avoiding Zones 2 and 3a completely. Should solar PV have been omitted on Zones 2 and 3a it would have been a missed opportunity to maximise renewable energy generation from the Scheme. Solar PV coexists well with Zones 2 and 3 due to the inherent flood resilience of the cabling and metal struts, and for the panels to be elevated above flood water. Please refer to paragraph 6.1.1 of Flood Risk Assessment - Part 1 [AS-007] for further details.</p>
<b>Q1.11.9</b>	The Applicant	ES Chapter 10, Landscape and Visual Amenity [APP-042] states at paragraph 10.3.10 that the Landscape and Visual Impact Assessment (L VIA) is based on a height of 2.5m Above Ground Level. Please explain how the additional height required in areas of higher flood risk has been assessed?	<p>Solar panel arrays will not exceed 2.5m Above Ground Level (AGL) across the Scheme. This is the basis of the design which has been assessed within Chapter 10 - Landscape and Visual Amenity of the Environmental Statement [APP-042].</p> <p>In the parts of the Site within Flood Zone 3, the minimum height of the lowest part of the photo-voltaic (PV) modules will be 0.85m AGL. In such areas, the maximum height to the top of the PV modules of 2.5m AGL will be achieved by changing the angle of the panels.</p>
<b>Q1.11.10</b>	The Applicant	ES Chapter 9 [APP-041] Table 9-12 indicates that parts of Sunnica West B are in Flood Zones 2 and 3. Given the large area available, there may appear to be adequate space to locate these buildings outside Flood Zone 2 or 3. Please explain how, this has been considered. If no adequate space is available for these buildings please explain.	<p>No buildings or permanent above ground structures (other than PV panels) are located within Flood Zones 2 or 3 within Sunnica West Site B.</p> <p>Fluvial modelling undertaken in Sunnica West B indicates the PV areas are not at fluvial risk, up to the design event of 1 in 100 year plus 20% climate change (current climate change allowances in this region are 19% for design purposes; therefore the PV areas are considered to be at very low risk of fluvial flooding).</p> <p>An FRA Addendum is being prepared, in liaison with the EA, to present the fluvial modelling results and updated assessment of flood risk. Work on the FRA Addendum is ongoing and it will be submitted to the examination once available.</p>

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<b>Q1.11.11</b>	The Applicant	Table 9-13 in Chapter 9 ES [APP-041] shows the watercourse crossing methodologies. For cable route construction and installation below watercourses the exact dimensions of excavations for launch and receiving pits await future site and ground investigation (paragraph 9.3.5). Please confirm all such excavations will take place within the Order limits.	Dimensions of the launch and receive pits are described in paragraph 9.7.18 of Chapter 9 of the ES [APP-041]. All excavations will be within the Order Limits.
<b>Q1.11.12</b>	NG	Question not for Applicant.	
<b>Q1.11.13</b>	The Applicant	Please describe the connection apparatus related to Option 3 specifying the exact location and how it interacts with the surface water drainage system.	<p>The connection apparatus proposed in relation to Option 3 described in the Applicant's Proposed Changes to the Application [AS-243], in particular in chapter 4 (in relation to the 400kV cabling) and chapter 5 (in relation to the 33kV to 400kV transformers) and would be located within the limits of deviation for Work Nos. 3A, 3B and 3C shown on the Works Plans [AS-258] and in relation to the 400kV cabling, within the limits of deviation shown on the Works Plans for Work No. 4.</p> <p>As is set out in the Applicant's Proposed Changes to the Application, should Option 3 be taken forward, the substations at Sunnica West Site A, Sunnica East Site A and Sunnica East Site B will need to change in terms of their electrical configuration and therefore their general arrangement and layout would also be different, but within the parameters assessed in the ES submitted as part of the Application. This is owing to the introduction of a 33kV/400KV transformer in place of the 33kV/132kV transformers that would be required under Options 1 and 2. A shunt reactor would also need to be introduced at Sunnica East Site B.</p> <p>Further details pertaining to Option 3 are provided in the Proposed Changes to the Application Document [AS-243] which confirms that the proposed change is within the parameters as assessed in Chapter 9: Flood Risk, Drainage and Water Resources [APP-041] of the ES; therefore, there are no changes to the assessment as a result of NMC-03. All mitigation as stated in that chapter will remain, for example bunding. The revised AIL swept path analysis does not have any effect on the assessment of Flood Risk, Drainage and Water Resources. Should NMC-03 proceed and eliminate the need for Burwell National Grid</p>

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			<p>Substation Extension Option 2, this would result in a reduction in fluvial flood risk of the Scheme and have a beneficial effect for the Scheme (albeit not considered to be material to the results of the assessment).</p> <p>The area proposed for the substations comprised in Work No. 3 has already been included within the drainage strategy as an area for BESS/Compounds which has been assessed as an impermeable area with appropriate attenuation provided. Locating the substation in this area will not impact the drainage proposals / runoff rates and volumes. The detail of the drainage solution will be developed so as to be substantially in accordance with the Drainage Strategy, in accordance with Requirement 12 of the draft DCO [<b>AS-293</b>].</p> <p>Connection apparatus, such as the 400kV cabling, will not impact the drainage strategy as SuDS features are shallow and the 400kV cabling will be designed so as not to conflict the Site's drainage features.</p>
<b>Q1.11.14</b>	NG	Question not for Applicant.	
<b>Q1.11.15</b>	The Applicant	ES Chapter 9 [APP-041] paragraph 9.4.2 refers to a wider study area for the Flood Risk Assessment (FRA). Please indicate where in the application such locations are described and their extent downstream in relation to the specific watercourse(s) considered.	<p>ES Chapter 9 [<b>APP-041</b>] paragraph 9.4.2 refers to a wider study area where impacts may propagate downstream, and does not state that this is specific to FRA. For example the locations of abstractions and groundwater dependent water features are described and risks assessed over an area beyond the Order Limits within Section 9.8 of ES Chapter 9 [<b>APP-041</b>].</p> <p>Refer to FRA, Appendix 9-C [<b>AS-007</b>], for assessment of flood risk. The FRA concludes flood risk is not increased downstream, or elsewhere.</p>
<b>Q1.11.16</b>	EA	Question not for Applicant.	
<b>Q1.11.17</b>	The Applicant	Have you assessed whether the groundwater level estimates in 'Aquifer Designations' at paragraph 9.6.139 to 9.6.152 of ES Chapter 9 [APP-041] are accurate and there would be a minimum of 1.2m clearance between the base of infiltration Sustainable Drainage System	<p>The groundwater levels described are best estimates interpreted from locations of groundwater monitoring across the catchment. These have been determined by the Environment Agency and their consultants. Figure 9-3 [<b>APP-190</b>] and Chapter 9 [<b>APP-041</b>] include peak seasonal groundwater levels.</p> <p>Groundwater and SuDS proposals are discussed in Appendix 9C FRA Parts 1 and 4 [<b>AS-007</b>] and [<b>AS-010</b>]. Measured clearance to groundwater levels will be</p>

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		(SuDS) and peak seasonal groundwater levels at all relevant locations?	confirmed during GI surveys which is secured by the surface and foul water drainage and ground conditions Requirements under the draft DCO [AS-293]. This will be undertaken either in agreement with landowners or using the relevant powers under the DCO.
<b>Q1.11.18</b>	EA	Question not for Applicant.	
<b>Q1.11.19</b>	MoD  The Applicant	Please clarify whether it is agreed between the MoD and the Applicant that details of the drainage scheme are to be approved by the MoD before they are finalised, are to be consulted upon with MoD or notified to MoD after finalisation. Is it necessary for the dDCO to make provision for the involvement of the MoD and if so how?	The Applicant understands that the Examining Authority's question is directed at the Defence Infrastructure Organisation's relevant representation [RR-1274] in which it confirms:  <i>"The MOD has reviewed the proposals and the associated documentation from an air safety safeguarding perspective and can confirm, after performing the appropriate technical assessments, that we have no objections to raise at this time. The MOD must emphasise that this advice is in response to the data and information detailed in the Flood Risk Assessment Part 4 [AS-010]"</i>  The Applicant consulted the MOD on its Proposed Changes to the Application and no response was received from the Ministry of Defence. The Applicant notes that the MOD have not requested to be a consultee in relation to the matters to be approved under requirement 12, or any other requirement, contained in its draft DCO [APP-293].
<b>Q1.11.20</b>	The Applicant	Has the Applicant identified the location(s) of dry watercourses and if so where are these described? How have they been taken into account in terms of their individual propensity for flow or flooding following heavy rainfall?	Main River and Ordinary watercourses were identified during site walkovers and are discussed within the ES (APP-041) and Appendix 9-C FRA (AS-007). No dry watercourses were identified for Sunnica East and West areas. The topographical survey has not identified further watercourses/waterbodies. At this stage of outline design, it is proposed to capture existing greenfield runoff volumes from PV areas within swales and detention basins and new impermeable areas from BESS and compound areas will also be captured in these features to ensure no increase in flood risk to adjacent watercourses, whilst providing a reduction in surface water flood risk downstream. More detail can be found in the drainage technical note in Annex F of the FRA (FRA Part 4; AS-010).
<b>Q1.11.21</b>	NE	Question not for Applicant.	

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<b>Q1.11.22</b>	EA  The Applicant	How have records of any sewers been obtained and reviewed to inform the drainage technical note and the Flood Risk Assessment [APP-095 to APP-098] and the CEMP?	Appendix 9-C FRA ( <b>AS-007</b> ) addresses sewer asset locations and confirms no public sewers in the vicinity of BESS and site compounds (within 100m). The DigDat online service was interrogated for Anglian Water sewer and water assets only, in the vicinity of the BESS and site compound areas, as no other public sewerage or water supply authority operates within this area. No sewer or water assets were found within the vicinity of the BESS and site compound areas; as such no mapping has been provided by Anglian Water.
<b>Q1.11.23</b>	EA	Question not for Applicant.	
<b>Q1.11.24</b>	The Applicant	<p>What progress has been made on establishing the means of ensuring a suitable water supply for your cleaning needs, such as an approved agricultural irrigation reservoir that would allay the concerns of Worlington PC (see ES Chapter 9 [APP-041] Table 9-4)? If abstraction from a local watercourse provides the water supply, please quantify the volume of water required per day.</p> <p>Please clarify what is the volume of water required daily for operation of the Proposed Development more generally, including such matters as dust suppression, and identify where in the application documents the relevant assessment and calculations have been made.</p>	<p>It will be the responsibility of the contractor to ensure there is a suitable water supply for their needs, working within the parameters set out within the ES and DCO [<b>AS-293</b>].</p> <p>There are currently no proposals to abstract water from a local watercourse but if this was proposed, any abstraction greater than 20m<sup>3</sup> /day would require an Abstraction Licence from the Environment Agency. Worlington PC can be assured no abstraction will occur against intended use because the Environment Agency would be required to determine any new licence or change of use of existing licensed abstraction.</p> <p>It is anticipated that water required for the operation of the Scheme will be sourced from and tankered to site by an appropriately licenced contractor.</p> <p>Dust suppression is not anticipated during operation of the Scheme, however PV modules will be cleaned a maximum of once per year which will require approximately 2,900m<sup>3</sup> of water per year, or 8m<sup>3</sup> per day, which is below the minimum volume to require an Abstraction Licence from the Environment Agency. For Comparison, an average 4 person residential dwelling uses approximately 0.6m<sup>3</sup> per day (150 Litres, i.e. 0.15m<sup>3</sup>, per person – taken from British Water Flows and Loads Version 4 (2013).</p> <p>It is also expected that approximately 3m<sup>3</sup> of water per day will be required for operational staff welfare purposes.</p> <p>Vehicle movements associated with tankering water to site have been accounted for in the operational traffic assessment.</p>

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<b>Q1.11.25</b>	The Applicant	Please identify where the “WFD Mitigation and Enhancement Plan” referred to in ES Chapter 9 [APP-041] Table 9-4, is located in the application documents. How does the dDCO (Change Request 30 August 2022 Appendix G - Draft Development Consent Order - Tracked [AS-251]) secure its provision?	The Scheme is committed to providing enhancement of WFD watercourses within the Order Limits to support future attainment of WFD objectives, subject to details being set out in a WFD Mitigation and Enhancement Strategy, which will be secured through Paragraph 4.1.1 of the Framework CEMP in Appendix 16C of the Environmental Statement <b>[AS-277]</b> . Compliance with the Framework CEMP is secured through Requirement 14 of the draft DCO <b>[AS-293]</b> . Provision of the WFD Mitigation and Enhancement Strategy is not altered by the changes application, which has now been accepted.
<b>Q1.11.26</b>	The Applicant	The potential BESS foundation option with piling to a depth of 12m at Sunnica West Site A (in the upgradient groundwater flow direction) is likely to encounter groundwater (see ES Chapter 9 [APP-041] Table 9-4). Please explain your conclusion that “no significant impediment” to groundwater flow is anticipated, with reference to the detailed information as to the proposed foundation area and the extent of the aquifer. What specification, standard, methodology or professional judgement was involved in arriving at this conclusion?	The characteristics of the Chalk aquifer in the area are described in a conceptual model report developed by the EA and their consultants and referenced in Chapter 9 <b>[APP-041]</b> . This demonstrates that the aquifer is of significant extent compared to the design of the BESS foundations and is of high permeability being capable of transmitting significant quantities of groundwater.  The foundations are of limited extent in comparison to the extent of the aquifer, and the high permeability of the aquifer means groundwater can readily find a flow path around such impediments. Therefore, the BESS foundations are not anticipated to cause an impediment to groundwater flow and the impact would be negligible.
<b>Q1.11.27</b>	The Applicant	What specific measures does the Applicant propose to protect the level of the river Lark against increased rain water run-off, reduction in water absorption due to absence of crops on the Order land, and reduction in large scale water extraction for irrigation?	No significant change to runoff from the change in land use is anticipated to be caused by the scheme because the Drainage Strategy secures the provision of greenfield run-off rates and provides sufficient attenuation to account for climate change <b>[AS-010]</b> .  Chapter 9 <b>[APP-041]</b> describes the Water Framework Directive water bodies underlying the site as not being at good status. A reduction in absorption due to absence of crops and reduction in large scale water extraction is beneficial for the status of the water bodies.  The Environment Agency Cam and Ely Ouse abstraction licensing strategy document shows that this area is over-abstracted and a reduction in abstraction due to the change in land use is consistent with the aims of the strategy. Although licenced abstractions are typically limited at lower flows, these abstractions would

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			<p>not be continuous and are unlikely to coincide at all times with spate flows, meaning any cessation of their use is unlikely to be a material effect on flood risk.</p> <p>Refer to FRA report and drainage strategy technical note in Appendix 9-C FRA Parts 1 and 4 [<b>AS-007</b>] and [<b>AS-010</b>]. To protect water levels in the River Lark, PV areas are to drain as per the existing Greenfield regime, with infiltration edge swales to intercept excess runoff. This will reduce peak surface water runoff into the River Lark, reducing the flood risk downstream. BESS area runoff further south on the Kennett / Lee Brook, will be also intercepted and captured in Swales and detention basins, and attenuated for the design storm event to ensure no increases in flood risk occurs in the Order limits or elsewhere, in line with planning policy. Requirement 12 in Schedule 2 to the draft DCO [<b>AS-293</b>] requires the Applicant to submit for the approval of the relevant county authority details of its proposed surface water drainage system which must be substantially in accordance with the Drainage Strategy.</p>
<b>Q1.11.28</b>	The Applicant	<p>Please provide comments in relation to the RR of Suffolk County Council (SCC) [RR-1340] at paragraphs 6.2 and 6.6, concerning the updating of the national pluvial flood mapping and the Newmarket surface water management plan.</p>	<p>Please refer to response already provided to RR-1340 (SCC-040) in [<b>REP1-016</b>]. The revised pluvial flood risk mapping has been used in the FRA, Rev 01 (January 2022), with no change to the pluvial flood risk within the Order limits, or elsewhere.</p>
<b>Q1.11.29</b>	The Applicant	<p>Please provide comments in relation to the RR of Cambridgeshire County Council (CCC) [RR-1178] at paragraphs 5.2, 5.4, and 5.6 concerning ground water levels, quick storage estimate calculations, the requirement for rainfall data, and a surface water hydraulic model.</p>	<p>Paragraph 5.2:- Please refer to response already provided to RR-1178 (CCC-031) in [<b>REP1-016</b>] in relation to paragraph 5.2 for infiltration testing approach. In addition a ground investigation will be secured in the ground conditions Requirement 14 in the draft DCO [<b>AS-293</b>], to confirm groundwater levels and inform the detailed drainage strategy proposals and any mitigation, such as for groundwater vulnerability in source protection zones. The detailed drainage strategy will be secured within Requirement 12 of the DCO. Section 3.6 of the Drainage Strategy in Annex F of the FRA [<b>AS-010</b>] describes the water quality approach to demonstrate no detriment.</p> <p>Paragraph 5.4:- Please refer to response already provided to RR-1178 (CCC-033) in [<b>REP1-016</b>] in relation to paragraph 5.4, for detail on QSE approach. The quick storage estimate is also discussed within the Flood Risk Assessment Part 1 Rev 1 [<b>AS-007</b>].</p>

ExQ1	Respondent	Question	Applicant's Response
			Paragraph 5.6:- Please refer to response already provided to RR-1178 (CCC-034) in [REP1-016] in relation to paragraph 5.4, for discussion on a drainage hydraulic model.
<b>Q1.11.30</b>	The Applicant	In light of the comments in the RR referred to in Q.11.28 and 29 will the Applicant provide an updated FRA and if so please indicate when it will be provided?	The submitted FRA Revision 01, dated 22 January 2022, Parts 1 to 4 [ <b>AS-007</b> to <b>AS-010</b> ], includes reference to the revised pluvial online flood maps in relation to Q1.11.28. Surface water queries in response to Q1.11.29 have been responded to in [REP1-016] as noted in Q1.11.29. It is not proposed to update the FRA in relation to Q1.11.28 and Q1.11.29 prior to DCO consent. The detailed design and GI phases will be secured within Requirement 12 and 14 respectively in the DCO.
<b>Q1.11.31</b>	The Applicant	Please provide comments in relation to the RR of SCC [RR-1340] at paragraphs 6.4 to 6.11, and the RR of CCC [RR-1178] at paragraphs 6.1, 5.7 to 5.10 and regarding the design parameters of the scheme based on the current ES chapter and FRA methodologies.	<p>SCC Para 6.4 – Refer to Section 3.6 Drainage Strategy, Annex F of the FRA [FRA Part 4 AS-010] for water quality and pollution mitigation assessment.</p> <p>SCC Para 6.5 – Please refer to response already provided to RR-1340 [<b>REP1-016AS-007</b>] (SCC-43) for response to Paragraph 6.5.</p> <p>SCC Para 6.6 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-44) for response to Paragraph 6.6.</p> <p>SCC Para 6.7 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-45) for response to Paragraph 6.7.</p> <p>SCC Para 6.8 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-46) for response to Paragraph 6.8.</p> <p>SCC Para 6.9 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-47) for response to Paragraph 6.9.</p> <p>SCC Para 6.10 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-48) for response to Paragraph 6.7.</p> <p>SCC Para 6.11 - Please refer to response already provided to RR-1340 [<b>REP1-016</b>] (SCC-49) for response to Paragraph 6.11.</p>

ExQ1	Respondent	Question	Applicant's Response
			<p>CCC Para 5.7 – Please refer to response already provided to RR-1178 [<b>REP1-016</b>] (CCC-35) for response to Paragraph 5.7. Flood level assessment is ongoing in liaison with the EA, and will be submitted to the examination when available.</p> <p>CCC Para 5.8 - Please refer to response already provided to RR-1178 [<b>REP1-016</b>] (CCC-36) for response to Paragraph 5.8.</p> <p>CCC Para 5.9 Please refer to response already provided to RR-1178 [<b>REP1-016</b>] (CCC-37) for response to Paragraph 5.9.</p> <p>CCC Para 5.10 - Please refer to response already provided to RR-1178 [<b>REP1-016</b>] (CCC-38) for response to Paragraph 5.10.</p> <p>Also, please refer to FRA, Appendix 9-C Parts 1 and 4 [<b>AS-007</b>] and [<b>AS-010</b>] for design parameters and assumptions for the drainage strategy. Responses to questions Q1.11.17 / 20 / 28 / 29 and 30 also address current and revised design parameters and methodology.</p> <p>CCC Para 6.1 – Please refer to response already provided to RR-1178 [<b>REP1-016</b>] (CCC-39) for response to Paragraph 6.1.</p>