



East Anglia ONE North and East Anglia TWO Offshore Windfarms

Applicants' Comments on Suffolk Preservation Society's Deadline 5 Submission

Applicant: East Anglia TWO and East Anglia ONE North Limited

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Applicable to East Anglia ONE North and East Anglia TWO







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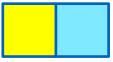


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Glossary of Acronyms

APP	Application Documents
DCO	Development Consent Order
dDCO	Draft Development Consent Order
ES	Environmental Statement
ExA	Examining Authority
HDD	Horizontal Directional Drill
LMP	Landscape Management Plan
LVIA	Landscape and Visual Impact Assessment
NG	National Grid
OLEMS	Outline Landscape and Ecological Management Strategy
OLMP	Outline Landscape Management Plan
PRoW	Public Rights of Way
SPR	ScottishPower Renewables
VP	Viewpoint





Glossary of Terminology

Applicants	East Anglia TWO Limited / East Anglia ONE North Limited
East Anglia ONE North project	The proposed project consisting of up to 67 wind turbines, up to four offshore electrical platforms, up to one construction, operation and maintenance platform, inter-array cables, platform link cables, up to one operational meteorological mast, up to two offshore export cables, fibre optic cables, landfall infrastructure, onshore cables and ducts, onshore substation, and National Grid infrastructure.
East Anglia TWO project	The proposed project consisting of up to 75 wind turbines, up to four offshore electrical platforms, up to one construction, operation and maintenance platform, inter-array cables, platform link cables, up to one operational meteorological mast, up to two offshore export cables, fibre optic cables, landfall infrastructure, onshore cables and ducts, onshore substation, and National Grid infrastructure.
Horizontal directional drilling (HDD)	A method of cable installation where the cable is drilled beneath a feature without the need for trenching.
Jointing bay	Underground structures constructed at intervals along the onshore cable route to join sections of cable and facilitate installation of the cables into the buried ducts.
Landfall	The area (from Mean Low Water Springs) where the offshore export cables would make contact with land, and connect to the onshore cables.
National electricity grid	The high voltage electricity transmission network in England and Wales owned and maintained by National Grid Electricity Transmission plc
National Grid substation	The substation (including all of the electrical equipment within it) necessary to connect the electricity generated by the proposed East Anglia TWO / East Anglia ONE North project to the national electricity grid which will be owned by National Grid but is being consented as part of the proposed East Anglia TWO / East Anglia ONE North project Development Consent Order.
National Grid substation location	The proposed location of the National Grid substation.
Onshore cable corridor	The corridor within which the onshore cable route will be located.
Onshore development area	The area in which the landfall, onshore cable corridor, onshore substation, landscaping and ecological mitigation areas, temporary construction facilities (such as access roads and construction consolidation sites), and the National Grid Infrastructure will be located.
Onshore infrastructure	The combined name for all of the onshore infrastructure associated with the proposed East Anglia TWO / East Anglia ONE North project from landfall to the connection to the national electricity grid.
Onshore preparation works	Activities to be undertaken prior to formal commencement of onshore construction such as pre–planting of landscaping works, archaeological investigations, environmental and engineering surveys, diversion and laying of services, and highway alterations.
Onshore substation	The East Anglia TWO / East Anglia ONE North substation and all of the electrical equipment within the onshore substation and connecting to the National Grid infrastructure.
Onshore substation location	The proposed location of the onshore substation for the proposed East Anglia TWO / East Anglia ONE North project.





1 Introduction

- The responses of East Anglia TWO Limited and East Anglia ONE North Limited (the Applicants) to comments received from the Suffolk Preservation Society (SPS) for the East Anglia ONE North project and the East Anglia TWO project (the Projects) at Deadline 5 (REP5-119) are provided in **section 2**.
- 2. This document is applicable to both the East Anglia ONE North and East Anglia TWO applications, and therefore is endorsed with the yellow and blue icon used to identify materially identical documentation in accordance with the Examining Authority's (ExA) procedural decisions on document management of 23rd December 2019. Whilst for completeness of the record this document has been submitted to both Examinations, if it is read for one project submission there is no need to read it again for the other project.



2 Applicants' Comments on SPS's Deadline 5 Submission

ID	Written Representation	Applicants' Comments
Lar	ndscape and Visual Impact Addendum	
1	The Landscape and Visual Impact Addendum presents the results of the Applicant's revised assessment of impacts on landscape views in light of the minor changes to the design and layout of the onshore substations and National Grid substation since submission of the Applications, as well as to the Outline Landscape and Ecological Management Strategy (OLEMS). The changes consist of a reduced footprint, revised micro siting of western substation, retention of woodland to the west of the substation sites, reduced ground level of eastern substation (2m) and NG substation (0.7m), limited reduction in heights of equipment of the western and eastern substations. SPS also notes the Applicant's commitment to irrigation and management of the planting belts to nursery standard to ensure that their suggested growth rate is achieved.	Noted
2	The OLEMS shows an area of woodland which is to be retained due to the repositioning of the western substation, which is welcomed. In addition, we note that planting belts to mitigate impacts on landscape views are indicated in the vicinity of Little Moor Farm and Woodside Farm. Assuming that the tree belts are planted on the standard 3m centres, the visualisations show only three rows of trees. Therefore, it is reasonable to assume that the planting strip is no more than 10m in depth. SPS considers this to be wholly inadequate to effectively mitigate the visual impacts and would expect to see a minimum of 30m. Furthermore, there is no information regarding species, size of the plants and percentage of evergreen. In the absence of this level of detail it is not possible to make a	The Applicants can confirm that there is an additional planting area to the south-east of Little Moor Farm, which consists of an edge woodland (W2) of 10m depth and screen woodland (W3) of 35m depth. There is also an additional planting area to the north of Woodside Farm, which is between 9-11m wide. The Applicants consider that in both cases this is adequate and effective. The planting species mixes for proposed woodland areas are set out in <i>Table 3.2</i> to <i>Table 3.5</i> of the <i>Outline Landscape and Ecological Management Strategy</i> (OLEMS) that was submitted at Deadline 3 (REP3-030). An updated version of the <i>OLEMS</i> has been submitted at Deadline 6 (document reference 8.7).



ID	Written Representation	Applicants' Comments
	robust assessment on the likely effectiveness of the proposed mitigation, but we remain of the view that the scale of the planting is insufficient and consider the visualisations to be highly optimistic	
3	Furthermore, we continue to remain concerned about the anticipated growth rate of the planting. This part of Suffolk is historically very dry and growth rate is typically not expected to exceed more than 300mm per year. The visualisations suggest a height in the region of 8/9m. This significantly exceeds the likely rate of growth. One only has to look at the site to see that there are no truly big trees in this landscape, this testifies to the difficult growing conditions.	The Applicants address the issue of growth rates in some detail in the <i>Updated Photomontages Clarification Note</i> (REP3-062) submitted at Deadline 3, particularly in <i>section 3.1.4</i> . A range of tree heights are shown in the visualisations depending on the planting mix proposed, with core woodland areas ranging between $6.5m - 7.8m$ and tree heights varying within this range. The heights of trees at 15 years post-planting are based on an average annual growth rate of 30cm per year for the first 5 years and 50cm per year for the next 10 years (average of 43cm per year), with a variation tolerance of +10% to -10% applied to allow for some variation in growth, above and below the average. The Applicants note concerns regarding the potential for dry spring/summer conditions in Suffolk to hamper plant establishment and is committed to ensuring that the Landscape Management Plan (LMP) includes provision for the implementation of adequate watering of newly planted and established trees during the aftercare period.
		The Applicants note that there are number of big trees in the landscape around the substations site including individual trees and large areas of woodland Laurel Covert and Grove Wood, which have average maximum heights of approximately 20m. This testifies to the suitability of the locality for tree growth as is plainly evident in the extent of tree and woodland cover in the local landscape.
4	Furthermore, we note the proposed irrigation to support these optimistic growth rates. Not only will this artificial level of support not guarantee robust growth in the medium to longer term, it is also considered to be a deeply unsustainable approach. Suffolk has declared a climate emergency and	An updated OLEMS has been submitted at Deadline 6 (document reference 8.7), and whilst there are refinements to the adaptive management measures proposed, no substantive additional information is proposed. The principles of the adaptive management measures set



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	bringing water to site to irrigate trees is considered to be an entirely	out in the OLEMS are considered appropriate for this outline document,
	unsustainable approach to horticulture.	with detail to be provided within the final Landscape Management Plan which will require approval from the relevant planning authority.
		The Applicants note the extensive use of reservoirs and irrigation systems within the East Anglia region. Given the importance of maximising the screening effect and condition of planting around the substations of such nationally significant infrastructure projects, and considering the inherent ecological benefits that such landscaping will deliver, targeted and efficient watering of planting when required is justified.
Re	visions to the assessment of landscape impacts	
5	In particular we note that the Applicant has revised the magnitude of change (operation, 15 years post construction) from medium-high to medium from landscape viewpoint 2 which is at the beginning of the PRoW from St Mary's Church towards the substation site. SPS disagrees with this assessment as the current open views across Friston Common will be lost and the design changes and additional proposed planting does not mitigate this.	The Applicants would refer to the <i>Landscape and Visual Impact Assessment Addendum</i> (REP4-031) <i>section 3.4.1.2</i> , which describes the changes in height and scale of the Projects' substations which together with the revised mitigation proposals in the <i>Outline Landscape Mitigation Plan</i> (OLMP) (REP4-015) (an updated version of the OLMP has been submitted at Deadline 6 as part of the <i>OLEMS</i> (document refence 8.7)), offer further mitigation and a subsequent reduction in the magnitude of change arising at Year 1 and Year 15. The Applicants' assessment is that the magnitude of change derives primarily from the visibility, size and scale of the substation infrastructure, which have a reduced height, scale and visibility at all intervals. In views of the eastern substation at both Year 1 and Year 15, an essentially open, attractive, rural view is maintained, albeit with some increase in woodland cover as a component of the view, which is already characteristic in the baseline views north of Friston, as such the effect is assessed as not significant. With respect to the western substation, the buildings and infrastructure would be more visible and introduce elements that do contrast with the rural character of the view, despite the woodland screening, such that the



ID	Written Representation	Applicants' Comments
		effect of the eastern substation is assessed as remaining significant (despite the decrease in magnitude that arises compared to the assessments within the Applications).
Am	ended landscape impact viewpoints	
6	The SPS wishes to comment specifically on those visualisations in regard to the concerns previously raised in our submission and whether we agree that they mitigate the identified visual landscape harm:	This is noted and the Applicants' comments are provided below.
7	Landscape Viewpoint 1 - The re-siting of the west substation in a north easterly direction, moves it further away from this viewpoint, and together with additional planting will reduce the impact to a degree. However, we note that the OLEMS describes the areas of planting that would effectively screen the development as "W1 Potential Early Core Woodland Planting and "W2 Potential Early Screen Woodland". We do not understand why this mitigation is qualitied by the use of the word potential. Moreover, we remain unconvinced by the scale of the tree belt and the achievable growth rate and therefore the SPS retains its objection as set out in our previous representation.	A change is terminology has been applied to the wording of the <i>OLEMS</i> (an updated version has been submitted at Deadline 6 (document reference 8.7) to change the term 'pre-construction planting' to 'potential early planting'. This does not change the Applicants' commitment to these opportunities for early planting, which are shown in Figure 7 OLMP Timing of Planting and described in <i>section 3.5.5</i> of the <i>OLEMS</i> submitted at Deadline 3 (REP3-30). This is clear that "early planting and re-instatement of gappy hedgerows will be implemented in order to establish plants and provide for screening".
8	Landscape Viewpoint 2 - The current open views across Friston Common from Church Road will be lost and the design amendments and additional proposed planting provide no mitigation for this. Moreover, we note that the OLEMS describes the areas of planting that would effectively screen the development as "W1 Potential Early Core Woodland Planting and W2 Potential Early Screen Woodland". We do not understand why this mitigation is qualitied by the use of the word potential. Moreover, we remain unconvinced by the scale of the tree belt and the achievable growth rate and therefore the SPS retains its objection as set out in our previous representation.	Please see the Applicants' comments above at ID5 in respect of Viewpoint 2 and ID7 in respect of the 'potential early planting' terminology.



ID	Written Representation	Applicants' Comments
9	Landscape Viewpoint 5 - The visualisation effectively demonstrates that the views over the wider landscape and in particular towards St Mary's Church, will be lost. The landscaping proposed merely exacerbates the loss of this visual, historical and cultural link. Despite the reduction in height of some of the structures the gantries of the National Grid and Western substation remain highly prominent in the landscape.	The Applicants note the visual effects shown in LVIA VP 5 and the presence of the substation infrastructure in the view towards St Mary's Church. The Applicants would note that the openness of the wider view over the landscape would be retained, even in the presence of the substation infrastructure. The landscape proposals will reduce the visual impact of the substation infrastructure. Re-instated hedgerows and tree lines will contribute towards a network of re-instated historic field boundaries which have been lost to agricultural intensification over the years.
Her	ritage Addendum	
10	The Heritage Addendum submitted on 15 January 2021 presents the Applicant's revised assessment of impacts on the significance of heritage assets in the vicinity of the onshore substations, in light of the minor changes to the design of the onshore substations and National Grid substation since submission of the Applications, as well as to the Outline Landscape and Ecological Management Strategy (OLEMS). The changes consist of a reduced footprint, revised micro siting of western substation, retention of woodland to the west of the substation sites, reduced ground level of eastern substation (2m) and NG substation (0.7m), limited reduction in heights of equipment of the western and eastern substations, and additional potential planting.	Noted
Rev	visions to the assessment of cultural impacts	
11	The Applicant's revisions to the assessment of impacts on cultural heritage amount to a reduction of the magnitude of impact on Woodside Farm from medium to low adverse and significance of effect from moderate to minor. The magnitude of impact on Little Moor Farm is also judged to have decreased from medium to low adverse and the significance of this effect	This summary of the Applicants' revised assessment by SPS is not entirely accurate or complete. Please refer to <i>Table 1</i> and <i>Table 2</i> in the <i>Heritage Assessment Addendum</i> (REP4-006) for an accurate summary of the revised assessments.



ID	Written Representation	Applicants' Comments
	from moderate to minor. All other impacts are judged to be unchanged by the revisions.	
12	The SPS agrees that the changes will not alter the level of impact on St Mary's Church, Friston war memorial, Friston House and High House Farm. However, we continue to strongly disagree with the applicant's assessment of the levels of harm identified.	Noted.
13	The SPS disagrees with the suggested reduction in impact on Little Moor Farm. Whilst the various changes to the substation design are welcomed, the potential 2m reduction to the ground level of the eastern substation will have only a marginal effect upon the visibility of the structure in views southwards from Little Moor Farm – see comments on viewpoints CHVP3 and CHVP4 below. The SPS is also unconvinced that the impact on Woodside Farmhouse has been adequately assessed – see our comment on viewpoint CHVP5.	The Applicants consider that SPS may have misunderstood the revised assessment of Little Moor Farm, conflating the assessment of this asset with and without landscape mitigation. SPS appears to assign our revised conclusions on impact with landscape mitigation to the scenarios without any mitigation.
		Quoting from the assessments of Little Moor Farm in the <i>Heritage</i> **Assessment Addendum** (REP4-006):
		Without landscape mitigation (Table 3 Section 1.1):
		"Proposed reductions in finished ground levels, heights of structures and extent of the project substations would not be sufficient to materially reduce the impact of the proposals The conclusions regarding this asset therefore remain unchanged".
		However, with landscape mitigation (Table 3 Section 2.1):
		" these revised proposals for the OLMP would allow Little Moor Farm to continue to be experienced in a setting that retained much more of its rural agricultural character The conclusions regarding this asset have therefore changed. Significance would largely be retained, and the predicted loss would amount to a residual adverse impact of low magnitude for all three operational arrangements".



ID	Written Representation	Applicants' Comments
		The SPS comment on Woodside Farm is addressed below under ID17.
Am	ended cultural heritage viewpoints	
14	The Applicant submitted revised cultural heritage viewpoints to reflect the proposed design changes. The SPS wishes to comment specifically on those visualisations in regard to the concerns previously raised in our submission and whether we agree that they mitigate the identified heritage harm:	Noted. The Applicants would highlight that revised cultural heritage photomontages were submitted rather than viewpoints.
15	CHVP3 Moor Farm and Little Moor - The visualisation effectively demonstrates the SPS objection that the view from Moor Farm and Little Moor Farm will be lost, together with its relationship to the wider landscape and in particular St Mary's Church. The landscaping proposed merely exacerbates the loss of this visual, historical and cultural link. Despite the reduction in height of some of the structures the gantries of the National Grid and Western substation remain highly prominent in the landscape.	The Applicants note that the proposed mitigation planting between Little Moor Farm and Moor Farm (illustrated in CHVP3) has been designed to reinstate historic field boundaries, lost during amalgamation of fields during the 20 th Century to facilitate mechanised arable agricultural practices. As a result, the planting would create a more enclosed landscape in the vicinity of the farms and obstruct some currently open views.
		It is considered that this more-enclosed landscape is historically authentic and creates a setting that supports the heritage significance of the listed 17 th Century farmhouses. The longer-range views that would be obstructed by the proposed planting do not make a substantive contribution to the significance of these assets and their loss would not cause material harm.
		It is accepted that the planting would not entirely screen the highest structures from view (given predicted growth after 15 years) but our assessment is that the level of screening achieved would provide substantive mitigation of the impact to landscape character. It therefore



ID	Written Representation	Applicants' Comments
		would mitigate the predicted harm to the significance of the Listed farmhouses.
16	CHVP4 PRoW E of Little Moor Farm - The visualisation effectively demonstrates that the relationship between Moor Farm and Little Moor Farm and the wider landscape and in particular St Mary's Church, will be lost. The landscaping proposed merely exacerbates the loss of this visual, historical and cultural link. Despite the reduction in height of some of the structures the gantries of the National Grid and Western substation remain highly prominent in the landscape.	The comments here by SPS are essentially the same as those addressed in the previous response on CHVP3. The Applicants consider that the proposed planting offers substantive mitigation of the adverse change in the character of the setting of Little Moor Farm. The loss of the views towards the church, which had already been identified in the original heritage assessment (ES <i>Appendix 24.7</i> (APP-519/520) would impact on the significance of the church and this is recognised in both the original and revised assessments of the church. However, the loss of this view does not materially affect the significance of Little Moor Farm and therefore the provision of screening vegetation at this location is judged to be an effective mitigation measure in this case.
17	CHVP5 PRoW near to Woodside Farmhouse - We continues to argue that this viewpoint is not helpful in assessing the impact on Woodside Farmhouse as the asset blocks the view of the substation site. We do not agree that the visualisation needs to be from the PRoW. The impact from the rear of the designated heritage assets should be shown. The re-siting of the west substation in a north easterly direction moves it further away from Woodside Farm which, together with the planting, does reduce the impact to a degree. However, we note that the OLEMS describes the areas of planting that would effectively screen the development as "W1 Potential Early Core Woodland Planting and W2 Potential Early Screen Woodland". We do not understand why this mitigation is qualified by the use of the word potential. There is also a lack of information regarding the scale of the tree belt and the achievable growth rate and there is no information regarding species, size of the plants and percentage of evergreen.	This viewpoint was selected to show how the projects would appear in combination with the Listed Building and, as a result, the Applicants recognise that the building partially screens both the proposed substations and mitigation planting from view. This partial screening has not significantly affected our ability to understand the visual relationship between asset and projects because we know that the maximum proposed building heights and relationship with screening vegetation remains constant as these features run behind the Listed farmhouse in the photomontage. We can therefore understand the visual prominence of the substations and the likely effectiveness of screening in the setting of the farmhouse without recourse to additional photomontages. It is important to note that cultural heritage impact assessment is not a viewpoint-based assessment (unlike visual impact assessment where the assessor reaches conclusions about impact on a specific view). Nor does



ID	Written Representation	Applicants' Comments
		the level of visual change in any view predict the degree of impact on the significance of an asset, this will depend on how setting contributes to significance. As a result, the conclusions reached regarding impacts on the significance of Woodside Farm do not specifically or directly reflect the level of visual change in the view illustrated by CHVP5. More importantly, simply changing the viewpoint that is illustrated, or adding a second photomontage, will not change the assessment of impacts unless it changes our understanding of the predicted change in setting in a substantive way.
		However, the Applicants understand from the nature of the question posed, that the SPS would prefer some additional evidence on this point. The Applicants will therefore illustrate a second viewpoint relating to this asset, a location immediately to the north of the farmhouse where there would be an uninterrupted view towards the substations. This additional visualisation will be submitted into the Examinations at Deadline 8.
18	CHVP7 Views from Friston House – The re-siting of the west substation in a north easterly direction moves it further away from Friston House which, together with the proposed planting, does reduce the impact to a degree. However, we note that the OLEMS describes the areas of planting that would effectively screen the development as "W1 Potential Early Core Woodland Planting and W2 Potential Early Screen Woodland". We do not understand why this mitigation is qualitied by the use of the word potential. There is also a lack of information regarding the scale of the tree belt and the achievable growth rate and there is no information regarding species, size of the plants and percentage of evergreen.	A change in terminology has been applied to the wording of the OLEMS to change the term 'pre-construction planting' to 'potential early planting'. This does not change the Applicants' commitment to these opportunities for early planting, which are shown in Figure 7 OLMP Timing of Planting and described in section 3.5.5 of the OLEMS (document reference 8.13). This is stated clearly within the OLEMS: 'early planting and re-instatement of gappy hedgerows will be implemented in order to establish plants and provide for screening'. The planting species mixes for proposed woodland areas are set out in the OLEMS (REP3-30), Tables 3.2 – 3.5. The Applicants address the issue of growth rates in some detail in the Updated Photomontages Clarification Note (REP3-062) submitted at Deadline 3, particularly in Section 3.1.4.



ID	Written Representation	Applicants' Comments			
19	CHVP8 – Friston War Memorial – SPS continues to argue that the selection of the viewpoint failed to properly illustrate the damage to a wide range of views from across the churchyard and not just one highly selective view behind a copse of trees. The amended visualisation does not address this fundamental issue.	The Applicants remain confident that the viewpoint selected as CHVP8 is entirely representative of the experience of a person standing close to the war memorial and looking north towards the proposed substations. The effect of the proposals on locations on the north side of the churchyard with more open views to the north is illustrated by photomontages from LVIA VP1, on Church Road.			
Col	Conclusion				
20	While the SPS acknowledges that SPR has sought to mitigate the identified heritage and landscape harm by changes to the size of the footprint and siting of the east and west substations, together with a reduction in height of some of the ground levels and structures and the retention of woodland to the west and increased planting, the impact of the scale and character of the structures on the receiving landscape remains extremely damaging and incapable of meaningful mitigation.	The Applicants welcome the acknowledgement that it has sought to mitigate the identified heritage and landscape harm through its proposed design refinements of the Projects' substations.			
21	We remain unconvinced by the scale of the tree belt and the achievable growth rate, and there is no information regarding species, size of the plants and percentage of evergreen. Therefore, the SPS retains its objection as set out in our previous representation and continues to object to the choice of Friston for the onshore infrastructure associated with EA1(N) and EA2.	The Applicants consider that there is no reason to suppose that an effective and deliverable landscape planting and screening cannot be established, subject to approval of the detailed LMP design and appropriate preparation of soil, species, stock selection and quality of planting and aftercare. The Applicants' rationale for the choice of Grove Wood, Friston for the onshore infrastructure associated the Projects substations is set out in <i>Chapter 4 Site Selection and Consideration of Alternatives</i> (APP-052).			