AQUIND INTERCONNECTOR Jan 2020

Pre-Examination Stage – DRAFT ECOLOGICAL COMMENTS

CATEGORY 2

- Document Ref: 2.2
  Application document reference 2.2 Land Plans Sheet 3 of 10
  Comments:
  The route of the runs through Denmead Meadows and King's Pond Meadow Site of Importance for Nature Conservation (SINC) - a non-statutory designated site.
- Document Ref: 2.7
  Application document reference 2.7 Indicative Converter Station Area Layout Plans Option B(i)
  Comments:
  Ancient woodland is directly adjacent to proposed development. NPPF 2018 supports a buffer of a minimum of 15m from ancient woodland.

CATEGORY 3

- Document Ref: 3.1
  Draft Development Consent Order (DCO)Part 7 Miscellaneous and general
  Comments:
  Paragraph 41.1. states that "*The undertaker may fell or lop any tree within or overhanging the order limits". Para 41.4.(a) states that the undertaker can "remove any hedgerows within the Order Limits*" and 41.4. (b) "*remove important hedgerows as are within the Order limits*". These operations should be approved by WCC (or other relevant authority in that area) prior to undertaking.
  Paragraph 42.1 states that "*The undertaker may fell or lop any tree described in column (1) of Schedule 11*". Prior to any felling or work on trees and removal of hedgerow it shall be shown that no protected species will be impacted by the proposed works.
  Schedule 2. 23 States that "*During the operational period there will be no external lighting of Works No.2 during the hours of darkness save for in exceptional circumstances, including in the case of emergency and where urgent maintenance is required*". What is the definition of *urgent maintenance*?

CATEGORY 6

- Document Ref: 6.1.2
  Environmental Statement Chapter 2 Consideration of Alternatives
  Comments:
  Table 2.1 states that "*burying cables as opposed to building overhead lines ('OHLs') removes the associated visual impacts*". It is likely that burying cables has the potential to cause more ecological impacts than OHLs. It also states "*Highway installation reduces impacts on ecology, archaeology and associated designations*" and this implies that the cross country route could lead to ecological impacts, and this is especially true when related to the Denmead Meadows King's Pond Meadow SINC.
  Section 2.4.6.5 states "*avoidance of environmental designations/constraints*" in the positioning of the Lovedean station and connecting cable. The Denmead Meadows and King's Pond meadow SINC may not have appeared to be of high significance, but do include 8ha of Priority Habitat NVC classification MG5, plus MG6 and MG7. This area supports over 6,000 spikes of Green winged orchid (GWO – a Red Data List species – classified as vulnerable – considered to be facing a high risk of extinction in the wild) which is a notable species, and this is reputed to be the largest population in the region. This area also supports at least another six other neutral grassland indicator species including Adder's tongue.
  Section 2.4.10.2 states "*Environmental constraints in proximity to Lovedean Substation e.g. proximity to the SDNP, areas of residential development, heritage assets, presence of Ancient Woodland and SINCs*" as key considerations in refining the siting of the converter station. Has this been undertaken satisfactorily, as SINCs seem to have been omitted in this consideration.

  Section 2.4.10.4 states "*one of the proposed sites was situated on Ancient Woodland (Stoneacre Copse). This option was relocated further south and the site footprint was elongated to avoid the Ancient Woodland*."
  NPPF 2019 states:
  175. *When determining planning applications, local planning authorities should apply the following principles:*
  c) development resulting in the loss or deterioration of irreplaceable habitats (such as ancient woodland and ancient or veteran trees) should be refused, unless there are wholly exceptional reasons and a suitable compensation strategy exists. (NSIP qualify as wholly exceptional reasons).

  Table 2.4- Environmental Effects with Converter Station Options A – D. These effects should be measured on a local scale, as opposed to a national scale.

- Document Ref: 6.1.16
  Environmental Statement – Volume 1 – Chapter 16 Onshore Ecology
  Comments:
  Section 16.1.2.1. states that *dormouse, reptile and badger surveys were undertaken around the Converter Station Area and around the northern section of the Onshore Cable Corridor*,

does this mean that suitable habitat along the cable route has not been considered for impact on these protected species?
Great crested newt – A Study Area of 250 m from the Order Limits has been used to search for waterbodies in the assessment of great crested newts. Natural England Guidance states that ponds up to 500m of a development should be considered as terrestrial habitat and connectivity of ponds are of importance to GCN.

Section 16.3.2.1. states that *in February 2018 consultation with NE was initiated, covering potential effects on **Denmead Meadows** (which is adjacent to Kings Pond Meadow SINC). Further, more detailed consultation regarding Denmead Meadows was undertaken with NE in November 2018. Details of consultations undertaken prior to PEIR are provided in Appendix 16.1 (Consultation Responses).*
Has botanical survey been considered in certain areas such as Denmead Meadows where there is significant importance including the Kings Pond meadow SINC which hosts a regionally-important Green-winged orchid site (classified as Near Threatened on the Vascular Plant red Data List for Great Britain).
Section 16.5.1.3. *Agricultural pasture south of Kings Pond Meadow SINC (see below for description) comprises unimproved grassland enclosed by species-rich hedgerows (some with trees), known as 'Denmead Meadows'. All fields within Denmead Meadows are hay meadows left un-grazed, and surveys by both WSP and wildlife groups (Appendix 16.4 (Non-Statutory Designated Sites Report) of the ES Volume 3 (document reference 6.3.16.4)) have revealed them to be botanically diverse, supporting important plants such as green-winged orchid and adders-tongue fern. In addition, plants characteristic of wet meadows are present due to the water course that flows through this area from Kings Pond SINC. 16.5.1.4. Botanical survey work undertaken in July 2019 (Appendix 16.4 (Non-Statutory Designated Sites Report)) showed the plant community in all fields comprising Denmead Meadows conforms to the "Lowland Meadow" HPI designation under Section 41 of the NERC Act 2006*.
Kings Pond Meadow is classified as important at the County scale.
Section 16.6.2.21 states that *trenching and the work compound …will lead to the temporary loss of approximately 1.7 ha of this habitat type, and potential alterations to soil structure which could affect the botanical community in the long-term. Thus, magnitude of direct adverse impacts will be medium, and major to moderate effects that are significant.*
Section 16.6.2.23. states that *positioning the HDD exit site and work compound within the southern-most paddock adjacent to Hambledon Road cannot be avoided, and up to 0.5 ha of HPI-quality Lowland Meadow habitat at this location will be temporarily removed to make way for this activity, with associated potential changes to soil structure which could affect the botanical community here in the long-term.*
Section 16.6.2.41. states that during construction *the impact of lighting* (on bats) *would be of medium magnitude, constituting a moderate effect that is significant.*
Section 16.8.2.3 relates to mitigation and enhancement measures for the Denmead meadows and states *works areas will be securely fenced and procedures put in place to prevent damage to grassland habitats adjacent to them (e.g. by the use of Herras fencing).*
These areas will have to be mapped and the boundaries approved prior to works. It is also stated that *surveys to inform the construction methodology for the works in this area may be carried out during the plant growing season/winter wet season to assist with the works*

being carried out outside of that period. Why have these surveys not been undertaken already? This information is required upfront.
Section 16.8.4. states that seed harvesting will take place, but it is unknown whether this would be suitable for the specific habitat in question, with certain key indicator species being notably difficult to translocate. The survey work and methods are required in advance.
Section 16.8.6.2. states that *lighting of construction work will be designed with reference to recommendations issued by The Bat Conservation Trust (2014) and Institute of Lighting Engineers (2009).* This guidance has been superseded by The Bat Conservation and Institute of Lighting Professional Guidance Note 08/18.

In relation to Broadleaved semi-natural **Woodland**, section 16.3.5.1. Table 16.1 states that no woodland will be felled or damaged to make way for the Proposed Development.
Section 16.5.1.19. states that *both Crabden's Copse and Crabden's Row are relatively small and encompass 12.2 ha and 12.1 ha respectively. Similar sized patches which represent relicts of more extensive woodland that would have been present historically, are present fairly widely within Hampshire, and contribute to the national ancient woodland resource. Crabden's Copse SINC & Crabden's Row SINC are considered important at the County scale.* These fragmented relicts of more extensive woodland can offer opportunity for mitigation/enhancement in terms of connective planting to link the pockets of valuable habitat, potentially to offset some woodland loss.
16.5.1.26. *other woodland has been scoped out of the assessment ???*
Fragmentation and loss of connectivity of woodland around the converter station is a potential issue.

Section 16.9.1.2. Residual Effects states that *permanent loss of calcareous grassland underneath the footprint of the Converter Station will be mitigated by the improvement of remaining grassland soil horizon and ground protection measures will offset effects to remaining grasslands.* How has this been calculated?

Table 16.7 – Summary of Important Ecological Features

Feature	Section	Importance
Chichester and Langstone Harbour SPA	7-9	International
Milton Common SINC	8	County
Kings Pond Meadow SINC	3	National
Denmead Meadows	3	National
Crabden's Copse SINC	1	County
Crabden's Row SINC	1	County
Ancient Woodland	1	County
Great Salterns Lake SINC	8	County
Broadleaved trees	1-6	District
Species-rich hedgerows, with and without trees	1-4	District
Species-poor hedgerows, with and without trees	1-10	District
Semi-improved neutral and calcareous grassland	1, 3, 4, 8	District
Badgers	1	Local
Bats	1	County
Hedgehogs	1-3	District
Reptiles	1-3	Local
Wintering intertidal birds	7-9	International

Section 16.6.1.1. states that hedgerow removed for the cable route will be re-planted. The hedgerow will need to be removed at a time and under certain methods where it will not impact protected species including nesting birds. Embedded mitigation during construction phase – approved.

Section 16.6.1.11. states that an unknown number of trees will be lost to the development and this will have to be reviewed with the tree officer. These category A trees will need to be assessed for their suitability to support protected species.

Section 16.6.1.19. states that *Construction of the Converter Station will lead to the direct, permanent loss of 4.2 ha of semi-improved calcareous grassland, and further habitat will be converted from to other habitats for landscaping in this area. Trenching for the Onshore Cable Corridor, installation of access routes, laydown areas and compounds will lead to further direct, temporary loss and degradation of neutral and calcareous semi-improved grassland. This will lead to loss of vegetation and alterations to the soil structure, likely lowering its botanical diversity.* How will this loss be mitigated/offset?

- Document Ref: 6.1.16
  Environmental Statement –Chapter 30 Summary and Conclusions - Onshore Ecology
  Comments:
  Section 30.2.12.1. States that a negligible adverse effect is predicted for Denmead Meadows and Kings Pond Meadow SINC. As mentioned above, it is unclear how this has been concluded without in-depth survey and analysis of the site.

- Document Ref: 6.6
  MitigationSchedule
  Comments:
  Section 11.2. and 15.5. state measures in the CEMP to counter impacts on marine birds during construction and construction stage environmental impacts.
  Section 11.4. states the winter restrictions on work in relation to terrestrial and intertidal features of Chichester and Langstone Harbours SPA to counter displacement effects on marine birds.
  Section 15.4 (onwards). references the Outline Landscape and Biodiversity Strategy (document reference 6.10)

- Document Ref: 6.9
  Onshore Outline Construction Environmental Management Plan
  Comments:
  Section 5.3.1.1. states that *where practicable, any mature trees and hedgerows which are within the site boundary will be retained*. Measures are needed to ensure the protection of protected species utilising any trees or hedgerows which are to be removed.
  Section 6.2.1.11. states that *at Kings Pond Meadow SINC and Denmead Meadows, where vegetation has a wet meadow character, work will avoid the plant growing season and winter wet season as both these are important for maintaining the conditions within the habitat. Work in this area will be undertaken in late summer/autumn to facilitate this.* How will the wet season be measured/monitored or characterised? Which months will the work take place, and which months will there be no works permitted?
  Table 7.1. the onshore monitoring plan states that seed harvesting and botanical monitoring will take place subject to landowner permissions. What agreements are in place with the landowner to ensure the suitable long term management (& monitoring) of this land? (document reference 6.10)

- Document Ref: 6.10
  Outline Landscape and Biodiversity Strategy
  Comments:
  Section 1.4.2.12. *states that all land temporarily impacted upon through the installation of the cable route would be reinstated with a compatible grass mix.* This would not be a suitable approach where you have complex and scarce habitats including certain wet grasslands as there is on Denmead Meadows.
  Section 1.4.3.3. states that the construction of the converter station would lead to the direct permanent loss of semi-improved calcareous grassland and the access routes etc would lead to temporary loss and degradation of neutral and calcareous semi-improved grassland. Where is this loss to be mitigated/offset?
  Section 1.4.3.5. states that Denmead Meadows would receive direct impacts through open cut trenching. Mitigation for this would be to maintain soil horizons and preserve grassland turf. Method statements and the reasoning behind the proposed mitigation is required.
  Section 1.4.3.31. states that an Ecological Clerk of Works is required for delivery of environmental components of the proposals. Details of how the ECoW will be employed, where and when, are required to ascertain the suitability of this approach.

Section 1.4.3.33. mentions an Ecological Management Plan to be produced setting out mitigation measures on ecological receptors. What is this document and how does it fit in with the CEMP. This should be available now.

Section 1.4.4.3. states that tree groups and hedges at the Lovedean Converter Station site, and the onshore cable corridor are at risk of removal. This is contrary to initial statements in the Environmental Statement where it states in section 16.3.5.1. (Table 16.1) that no woodland will be felled or damaged to make way for the Proposed Development. At this stage we should know where trees/hedges are to be removed.

Section 1.4.5. relates to habitat enhancement, and no habitat enhancement measures are proposed on the onshore cable corridor. Denmead Meadows offer a significant opportunity for mitigation and enhancement in the form of management of the whole area to ensure it is under suitable management and this could offset some of the habitat loss felt from the proposals as a whole.

Section 1.6.2.1. states that established woodland provides intrinsic ecological value and where practicable and protected during the construction stage and *repaired* where appropriate. How will woodland be repaired? Ancient and semi natural woodland is judged to be irreplaceable.