

NICKY LEAR: ENVIRONMENTAL MATTERS

PROOF OF EVIDENCE

1. QUALIFICATIONS AND EXPERIENCE

- 1.1 My name is Nicky Lear. I am employed by Arcadis Consulting (UK) Ltd, part of a global company of more than 36,000 people, delivering sustainable design, engineering and consultancy services for natural and built assets. I am a Technical Director and a Chartered Environmentalist (CEnv) with over 21 years' experience in Environmental Impact Assessment (EIA). I am a Full Member of the Institution of Environmental Sciences (MIEnvSc) and I hold both a Masters and a Bachelor (Honours) degree. I have project managed and co-ordinated large multi-disciplinary environment teams on a range of energy, property and infrastructure projects in the UK, from environmental feasibility studies through to Environmental Statements, and post-submission and detailed design support.
- 1.2 I am part of the leadership team for the Environmental Planning Team at Arcadis, a team of over 350 people across the UK, with specialists in town planning and consents, environmental assessments, stakeholder engagement and socio-economics, ecology, arboriculture, biodiversity, cultural heritage, landscape, air quality and acoustics, soils and contamination, geospatial and data visualisation, waste and construction environmental management. I also lead multidisciplinary teams with further capabilities provided by the wider business.
- 1.3 As the Arcadis Environment Lead on the Cotswolds Visual Impact Provision project ("the **Project**"), I am responsible for co-ordinating multi-disciplinary inputs from the Arcadis environmental specialist teams commissioned on the Project (ecology, arboriculture, air quality, soils, water resources, flood risk, mining, minerals and transport) and also co-ordinating landscape and visual inputs from Land Use Consultants Ltd. ("**LUC**") on behalf of National Grid Electricity Transmission plc ("**NGET**").
- 1.4 Arcadis were instructed by NGET in January 2023 to provide ecology support to inform the cable route alignment. Following this, Arcadis' environmental specialists prepared the Ecological Impact Assessments, Biodiversity Net Gain Assessments, Arboricultural Impact Assessments, Construction Dust Assessments, Water Resources Assessments, Flood Risk Assessments, Transport Statement, Mining Risk and Minerals Impact Assessments and Agricultural Land Classification (ALC) and Landholding Assessment Reports for the Cable Sealing End Compound ("**CSEC**") planning applications.

2. INTRODUCTION AND SCOPE OF EVIDENCE

- 2.1 My evidence relates to the environmental aspects of the Project, including mitigation measures and environmental compliance to ensure the Project can be delivered in an environmentally responsible manner.
- 2.2 The remaining part of my statement of evidence is structured as follows:
- 2.2.1 Section 3 – Provides a brief summary of the Project
 - 2.2.2 Section 4 – Provides the environmental context for the Project
 - 2.2.3 Section 5 – Describes the environmental assessment methodology and approach
 - 2.2.4 Section 6 – Sets out the baseline environmental conditions

- 2.2.5 Section 7 – Summarises the outcomes of the environmental assessment of the Project
- 2.2.6 Section 8 – Details the environmental mitigation and management measures
- 2.2.7 Section 9 – Addresses compliance with environmental legislation and policy
- 2.2.8 Section 10 – Provides a response to the objections that have been received, insofar as they relate to my evidence
- 2.2.9 Section 11 – Sets out my summary and conclusion
- 2.2.10 Section 12 – Provides my declaration
- 2.3 References in my evidence to the core documents are made by the abbreviation, for example, “(CD XX)”. The evidence of other witnesses is referred to by the name of the author. There is a glossary of key terms used by all the NGET witnesses at (CD F2) (“the Glossary”) and my evidence adopts the terms defined in the glossary, as well as those in the glossary appended to my evidence.

3. **PROJECT SUMMARY**

- 3.1 The purpose of the Project is to underground a section of 400kV overhead electricity transmission lines, to mitigate the visual impact of existing electricity infrastructure through part of the Cotswolds National Landscape. The Project includes the removal of a section of overhead lines, including the permanent removal of 16 pylons (18 pylons will be removed in total, however, two will be replaced under Permitted Development), the installation of underground cabling of approximately 7km in length and construction of two new CSECs at each end (north and south) and associated replacement terminal pylons (as mentioned above), to connect the new underground cables to the remaining existing overhead line. The works also involve associated temporary works to facilitate construction, including temporary/permanent access junctions and roads, a temporary haul road, construction compounds, material storage and welfare facilities, and ancillary off-site infrastructure (including installation of arcing horns and shunt reactor installation/connection). The majority of the works will be undertaken using Permitted Development rights under Schedule 2 of the Town and Country Planning (General Permitted Development) (England) Order 2015 (as amended), however, the CSECs required planning permission.
- 3.2 From hereon, ‘CSEC site’ refers to the CSEC planning application boundaries, northern or southern as specified, and ‘Project site’ refers to the boundary of the whole Project site, including both the CSEC planning application boundaries and the Permitted Development works.

4. **ENVIRONMENTAL CONTEXT**

- 4.1 This section summarises the environmental context of the Project location.

Landscape and visual

- 4.2 The Project is located within the Cotswolds National Landscape (previously known as Area of Outstanding Natural Beauty). The site consists of an area of elevated land with a section of 400kV overhead line, with associated pylons crossing it. The following summary is provided in the Landscape and Visual Appraisal (“LVA”) undertaken in respect of the Project (CD D5).

- 4.3 The northern part of the Project site rises steeply from the valley associated with the River Isbourne (to the south-west of Winchcombe), up through the steep sided slopes and woodland at Breakheart Plantation. The Project site then follows elevated, open and gently undulating, typically large scale agricultural land to the south-east of Cleeve Common, before crossing steep sided wooded valleys, namely Puckham Woods. Further to the south, the Project site crosses undulating farmland defined by native hedgerows with scattered trees, ending south of Ham Road to the north of Upper Colgate Farm. The Project site is crossed by numerous Public Rights of Way ("**PRoW**"), including the Cotswold Way National Trail and Winchcombe Way long distance path.
- 4.4 The 3km study area for the LVA is generally made up of predominantly elevated arable farmland and a pattern of large-scale regular fields extending across the area enclosed by a network of hedgerows, dry stone walls and post and wire fences. A pattern of geometric woodlands, coniferous shelterbelts and copses are found within or on the fringes of the valleys, where they provide a sense of enclosure and a backdrop to wide panoramas.
- 4.5 To the west, the land falls steeply towards Cheltenham and Bishops Cleeve, with the towns and villages situated on low lying and relatively level landscape. The town of Winchcombe lies to the north-east, situated within the River Isbourne valley, with B-roads and the railway line between Gloucestershire and Warwickshire occupying lower lying land further to the north. The A40 and A436 pass close to the southern site boundary which provide transport routes between Cheltenham and Oxford, with numerous minor roads providing links to smaller villages scattered within the agricultural landscape.
- 4.6 Cleeve Common is located to the north-west of the Project site, occupying steep ground used for recreational uses, including by the Cleeve Hill Golf Club. A number of long distance footpaths cross the landscape within the study area. The Project site passes close to ancient woodlands, including Dowdeswell Wood to the south-east.

Ecology and arboriculture

- 4.7 The Project site is not located within or adjacent to any internationally designated nature conservation sites, the closest is Dixon Wood Special Area of Conservation (SAC), just under 5km to the north west. The Project site is not located within any nationally designated nature conservation sites, the closest is Cleeve Common Site of Special Scientific Interest (SSSI) to the west. Two locally designated nature conservation sites are partly located within the Project boundary; Breakheart Plantation Local Wildlife Site and Colgate Farm, Dowdeswell conservation road verge. Bat, badger, breeding bird, otter, hazel dormouse, Roman snail, water vole and white-clawed crayfish surveys have been undertaken on site. All of these species are protected and are afforded protection under legislation. All species surveyed were present on site or within the zone of influence of the Project, other than water vole and Roman snail, although Roman snail are present within the local area. Reptiles are also present within the local area. Cheltenham, Cotswold and Tewkesbury Borough Councils have confirmed that no trees in the Project area are subject to Tree Preservation Orders or Conservation Area restrictions.

Air Quality and noise

- 4.8 As identified in the Construction Dust Assessments (**CD B31, CD B32**), the Project is not located in an Air Quality Management Area (AQMA) and there are no AQMAs within the surrounding area of Gloucestershire.
- 4.9 The Construction Noise Impact Assessments (**CD B20, CD B21**) identify that the closest noise receptors to the northern CSEC include Dan Deri and Middle Mill Cottage Corndean Cottages

and Postlip Lodge. The closest noise receptors to the southern CSEC include Upper Colgate Farm, Whittington Court and Wood Farm.

Water environment

- 4.10 The Water Resources Assessments (**CD B35, CD B36**) identify that the Project is located within the hydrological catchments of the Rivers Chelt, Isbourne, Swilgate and Coln. There is one Environment Agency designated main river; the River Chelt, flowing through the study area of the assessment in the south. There are several ordinary watercourses within the local area, namely Langley Brook, and a tributary of the River Coln, which flows to the east of the Project, and the headwaters of the River Isbourne, which becomes an Environment Agency designated main river approximately 9km to the north. Parts of the Project lie downstream of Dowdeswell Reservoir.
- 4.11 The Flood Risk Assessments (**CD B33, CD B34**) identify that the Environment Agency Flood Map for Planning (Rivers and Sea) shows that the majority of the northern CSEC is located in Flood Zone 1, with an annual chance of flooding from rivers and the sea of less than 1 in 1,000 (0.1%). Parts of the northern CSEC planning application boundary are located in Flood Zones 2 and 3. Land in Flood Zone 2 has an annual chance of flooding from rivers of between 1 in 100 (1%) and 1 in 1000 (0.1%) or from the sea of between 1 in 200 (0.5%) and 1 in 1,000 (0.1%). Land in Flood Zone 3 has an annual chance of flooding from rivers greater than 1 in 100 (1%) or greater than 1 in 200 (0.5%) from the sea. The areas of Flood Zone 2 and 3 are associated with the River Isbourne and the River Chelt. The southern CSEC is located entirely in Flood Zone 1.
- 4.12 The cable route does not cross any watercourses, but it crosses three surface water flow routes which lie in topographic depressions and along field boundaries; in these locations, the risk of flooding from surface water is low. The Project lies within an area where the risk of groundwater flooding is moderate, however, given the nature of the Project, vulnerability to groundwater flooding is low. All other sources of flooding assessed in the Flood Risk Assessments are considered to pose a low risk to the Project.

Cultural heritage

- 4.13 The Project is not located within a Scheduled Monument or Conservation Area and no works to Listed Buildings are required. Scheduled Monuments in the local area include Whittington Moated site, the bowl barrow (north-west of Wood Farm) and the churchyard cross at the Church of St Bartholomew. Listed Buildings in the local area include the Grade II listed 18th-century gates, gate piers and railings at the entrance to the drive of Postlip Hall. Postlip Hall itself includes the Grade I listed mainly 17th-century country house, and the Grade II listed coach house, stables, shelter, gate piers and walls near the house. Further south are the Grade II listed buildings at Whalley Farm, which date from the 17th and 18th centuries, the Grade II* listed Church of St Bartholomew and the Grade II listed cross in the churchyard. A group of five Grade II listed tomb monuments are also located in the churchyard.

Public rights of way

- 4.14 PRoWs cross, or are located within, the Project corridor. To the south, the Cotswold Way routes to the west of the construction corridor and is contiguous with this corridor for approximately 1.9km. PRoWs that cross the construction corridor (cable route) include, Southam Restricted Byway 64 and 140, Stevenhampton Restricted Byway 23, Southam Restricted Byway 64 and Winchcombe Footpath 22, 23, 24, 31, 63 and 70.

Overview of environmental legislation and policy framework applicable to the Project

- 4.15 This section provides an outline of the key overarching environmental legislation and policy framework applicable to the Project.
- 4.16 As explained in the evidence of Juan Murray, formal requests for an EIA screening opinion were made to Cotswold District Council and Tewkesbury Borough Council, under Regulation 6 (1) of the Town and Country Planning (Environmental Impact Assessment) Regulations 2017 (as amended). As some elements of the Project (such as the temporary line diversions) require consent under the Electricity Act 1989, a formal request for an EIA screening opinion under Regulation 10 (1) of The Electricity Works (Environmental Impact Assessment) (England and Wales) Regulations 2017 was made to the Secretary of State. It was concluded that the Project will not be likely to have significant environmental effects having regard to its nature, size and location and is therefore considered not to be EIA development requiring the submission of an Environmental Statement.
- 4.17 The adopted Development Plans applicable to the Project are the Cotswold District Local Plan and the Minerals Local Plan for Gloucestershire. The Cotswold District Plan was adopted in August 2018 and covers the period 2011-2031; the plan sets out the policies and proposals needed to meet the challenges facing the area over the plan period. The Minerals Local Plan for Gloucestershire was adopted in March 2020 and sets out the policies which minerals development must conform to, as well as designated Mineral Safeguarding Areas.
- 4.18 The Cotswolds National Landscape Board has published a Management Plan, which is a statutory plan and guides the work of the Landscape Board and other stakeholders in delivering the Management Plan's vision and outcomes. .
- 4.19 The National Planning Policy Framework (NPPF) sets out the Government's planning policies for England and how these are expected to be applied. The Framework is purposefully opportunity focused and pro-growth in seeking to facilitate development which will contribute to meeting wider Government objectives.
- 4.20 The assessments have been undertaken in accordance with national legislation, national planning policy, local plans and policies in the context of the Project. Further detail can be found in the legislation and policy sections of the reports.

5. ENVIRONMENTAL ASSESSMENT METHODOLOGY AND APPROACH

- 5.1 This section provides an overview of the environmental assessment methodology used for the Project. The approach to the LVA is covered in the evidence of Ms Rebecca Greatrix.
- 5.1.1 Ecological Impact Assessments – The baseline was established through a desk study and field surveys. Data sources for the desk study included Defra, Ordnance Survey (OS) mapping and aerial photography, the Gloucestershire Centre for Environmental Records and the Cleeve Common Trust. The surveys comprised a Phase 1 habitat survey, which was extended to include an assessment of suitability for all protected and notable species relevant to the survey area. A UKHab survey and assessment of habitat condition using Biodiversity Metric 4.0 was undertaken for the purposes of a Biodiversity Net Gain (BNG) assessment. Following the initial habitat suitability assessment, further ecology surveys were undertaken for bats, breeding birds, badger otter, water vole, white-clawed crayfish, hazel dormouse, Roman nail and great crested newts (GCN). The surveys were undertaken in accordance with best practice guidance including Joint Nature Conservation Committee guidance, Natural England's Biodiversity Metric 4.0 and species-specific guidance as referenced in the reports (**CD B18, CD B19, CD B22,**

CD B24). The Ecological Impact Assessments were undertaken in line with the Chartered Institute of Ecology and Environmental Management guidelines.

- 5.1.2 Biodiversity Net Gain Assessments – The UKHab survey referred to above, informed the BNG assessments. The assessments estimate the potential net change in biodiversity value based on the indicative proposals provided for full planning permission for the northern and southern CSECs. This approach uses information on the habitats and features of the CSEC sites before and after the development to calculate the change in biodiversity value using the Statutory Biodiversity Metric issued by Defra and Natural England (2024).
- 5.1.3 Arboricultural Impact Assessments – The assessments were informed by a desk study including Defra, Local Authority and Woodland Trust data, and an arboricultural survey of the CSEC sites, including a 15m buffer, undertaken in accordance with BS 5837: 2012 Trees in relation to design, demolition and construction – Recommendations. The assessment identified and evaluated the extent of direct and indirect impacts on existing trees and hedgerows that may arise as a result of the implementation of Project and identification of mitigation measures.
- 5.1.4 Construction Noise Impact Assessments – The assessments were undertaken by WSP UK Ltd. They were informed by details of the main construction activities, construction working hours and a plant list, provided by NGET. Construction noise levels were predicted using the methodology outlined in Annex F of British Standard (BS) 5228:2009+A1:2014: Code of practice for noise and vibration control on construction and open sites – Part 1: Noise. It has been assumed that all plant will be stationary and located on the activity boundary at the closest point to the noise sensitive receptors for a worst-case assessment. In reality, plant will be spread out across the site and best practice mitigation will be in place.
- 5.1.5 Construction Dust Assessments – The assessments were undertaken in line with the Institute of Air Quality Management (IAQM) Guidance on Land-Use Planning and Development Control: Planning for Air Quality v1.2 (2017) and IAQM Guidance on the Assessment of Dust from Demolition and Construction v2.2 (2024), using Defra baseline data and traffic data from the Transport Statement to determine the worst-case flows for the peak construction year for the assessment, to provide a worst-case assessment. Risk was predicted based on a worst-case scenario of works being undertaken at the edge of the site boundary, therefore, actual risk is likely to be lower than that predicted during the majority of the construction phase.
- 5.1.6 Archaeological Statement - The statement was prepared by Cotswolds Archaeology and is informed by desk-based archaeological research and geophysical survey, which has been carried out with ongoing consultation with Gloucestershire County Council and Historic England. This has been undertaken in line with relevant legislation, policy and guidance, including Good Practice Advice in Planning: Note 2: Managing Significance in Decision-Taking in the Historic Environment (Historic England, 2015), Good Practice Advice in Planning: Note 3: The Setting of Heritage Assets, Second Edition (Historic England, 2017) and Historic England Advice Note 12 Statements of Heritage Significance: Analysing Significance in Heritage Assets (2023).

- 5.1.7 Water Resources Assessments– The assessments were informed by a desk study, in consultation with key statutory bodies, and drew on sources of guidance for appraising the effects of development on the water environment, including the Design Manual for Roads and Bridges LA 113 – Road Drainage and the Water Environment (2020), Construction Industry Research and information Association Report C628: Control of water pollution from linear construction projects (2006), NPPF Flood Risk and Coastal Change Planning Practice Guidance (PPG) (2022) and Water Framework Directive (WFD) Advice Note 184. Baseline information sources include Defra, Environment Agency, British Geological Survey and Lead Local Flood Authority (LLFA) data.
- 5.1.8 Flood Risk Assessments – The assessments are informed by desk-based research, including LiDAR, Defra, Environment Agency and British Geological Survey data, the Cheltenham and Tewkesbury Strategic Flood Risk Assessments and consultation with Gloucestershire County Council as the LLFA. The assessments have been undertaken in accordance with the requirements of the NPPF.
- 5.1.9 Transport Statement – The transport appraisal methodology is based on the Institute of Environmental Management and Assessment (IEMA) Environmental Assessment of Traffic and Movement guidelines (2023) and assessment criteria developed for similar infrastructure projects. The appraisal has been informed by a desk-based study which included a review of existing traffic baseline data, transport policy/plans, potential future transport improvements and major development proposals. Discussions with NGET and the Front-End Engineering Design (FEED) contactor were held, in particular around anticipated construction traffic movements and proposed mitigation measures. Initial engagement was undertaken with the Local Highway Authorities and Gloucestershire County Council on the primary construction routes to/from the strategic road network and the site.
- 5.1.10 Mining Risk and Minerals Impact Assessments – The assessments are informed by a desk-based study, including British Geological Survey and Gloucestershire County Council data, historical mapping, and a site walkover. The assessment considers, firstly, the risk of historic mining to the Project and, secondly, the potential for the Project to adversely affect mineral resource capacity within the CSEC sites, located within the defined Mineral Safeguarding Area in Gloucestershire.
- 5.1.11 Agricultural Land Classification (ALC) and Landholding Assessment Reports – A desk study to collate baseline information for the site from British Geological Survey, Defra, Environment Agency, Meteorological Office and national soil survey data was undertaken, to provide geology, available ALC and soil data and climatic baseline information. A detailed ALC survey was then undertaken on site. Protecting Best and Most Versatile (BMV) agricultural land based on a detailed ALC survey is supported by Natural England Guidance to assessing development proposals on agricultural land (2021). The impact of the Project on agricultural landholdings was also assessed.
- 5.2 Following the initial studies undertaken for the EIA screening (prepared by The Environmental Partnership Ltd), further environmental studies were undertaken for the following environmental topics. The purpose of these studies was to identify and secure the mitigation required to ensure that no significant environmental effects would arise:

- 5.2.1 Landscape and visual
 - 5.2.2 Ecology and biodiversity
 - 5.2.3 Arboriculture
 - 5.2.4 Soils and agricultural land
 - 5.2.5 Air quality (construction dust)
 - 5.2.6 Noise (construction)
 - 5.2.7 Water resources and flood risk
 - 5.2.8 Mining risk and minerals
 - 5.2.9 Archaeology and heritage
 - 5.2.10 Transport (construction).
- 5.3 The assessment for the operational phase of the Project was scoped out of the Transport Statement (**CD B23**) as it is understood that operational traffic would be limited to normal NGET personnel attendance and infrequent maintenance visits and is not anticipated to alter from current levels. Air quality was also scoped out of the assessment for the operational phase due to the nature of the Project and the limited potential for impacts on receptors due to the low number of operational vehicular movements.
- 5.4 As stated in the Construction Noise Impact Assessments (**CD B20, CD B21**), operational noise was scoped out based on the low noise levels generated by the operational CSECs and the distance to noise sensitive receptors; significant noise impacts are therefore not expected.
- 5.5 Vibration effects from the construction works were also scoped out. Potential sources of vibration from the works include construction traffic on access and haul roads, digging and drilling works. Vibration levels from these sources would be considered negligible at 30 m from the works. All site works are at least 70 m from vibration sensitive receptors.
- 5.6 Construction road traffic noise was scoped out of the assessment as the number of construction vehicles is anticipated to be small relative to flows on existing roads; therefore, significant impacts are not expected at any receptor.
- 5.7 Vibration generated by construction traffic on public roads was scoped out of the assessment, as road surfaces are expected to be well maintained and free from irregularities, so operational vibration will not have the potential to lead to significant adverse effects.

6. BASELINE ENVIRONMENTAL CONDITIONS

Landscape and visual

- 6.1 Landscape and visual baseline conditions are provided in the evidence of Ms Rebecca Greatrix.

Ecology and Biodiversity

- 6.2 Two internationally designated SACs are located within 10km of the Project site, the closest of which is Dixon Wood SAC approximately 4.91km to the north west. There are five SSSIs

located within 5km of the Project site, the closest of which are Cleeve Common SSSI adjacent to the construction boundary to the west and Puckham Woods SSSI approximately 1.1km to the east. There are twelve non-statutory sites located within 1km of the site, two of which are partly located within the Project site; Breakheart Plantation Local Wildlife Site and Colgate Farm, Dowdeswell conservation road verge.

- 6.3 Habitats in the area include Habitats of Principal Importance in England (HPIE) (for example Deciduous Woodland and Hedgerow HPIEs), arable fields, woodland, trees and hedgerow, tall ruderal vegetation, scrub, wet flush, running water, standing water and grassland, supporting a number of species.
- 6.4 Badgers are present within the Project site and within the proposed construction area. Works will result in the closure of three setts, two of which are outlier setts and one is a subsidiary sett. It is not anticipated that any main setts will be impacted by works. Prior to the commencement of construction, an update survey will be undertaken and all setts will be closed under licence from Natural England in advance of construction work.
- 6.5 Otters are present onsite, although no confirmed resting sites or holts were recorded during survey. The presence of otters will be mitigated using standard best practice and pollution control measures to prevent pollution of watercourses. Prior to the commencement of construction, an update survey will be undertaken to ensure the otter status remains the same.
- 6.6 Water vole habitat on site was deemed to be sub-optimal and no confirmed water vole field signs were found during surveys.
- 6.7 Hazel dormice are present within the Project site and within the proposed construction area. Through habitat replacement and enhancement, there will be no net loss of suitable dormouse habitat. The presence of dormouse will be mitigated using standard best practice and pollution control measures and an Ecological Clerk of Works (ECoW) will be present during vegetation removal. A Natural England dormouse licence will be sought.
- 6.8 Reptiles are present within the local area, with notable populations of slow-worm, grass snake, adder and common lizard adjacent to the Project site at Cleeve Common SSSI. Habitats on site are predominantly sub optimal dominated by agricultural fields, with reptile hibernacula such as stone walls will be dismantled by hand during spring/summer and reinstalled as close to their original state as possible post construction ensuring they remain suitable for hibernacula and refugia.
- 6.9 Roman snails are present within the local area but were not recorded on site. An ECoW will be present during vegetation removal to check for protected species.
- 6.10 GCN fall under a District Level Licence for both CSEC planning applications. GCN are present in ponds within 250m of permitted developments works. Works within 250m of these ponds will be undertaken under precautionary working methods and an ECoW will be present to supervise vegetation clearance of suitable habitat.

Arboriculture

- 6.11 At the northern CSEC, 25 arboricultural features (including individual trees, hedgerows and woodland) have been identified within the study area (the planning application boundaries plus a buffer area of 15m). In relation to the southern CSEC, 40 arboricultural features have been identified. The majority of these features will be retained in the Project. Each feature was assigned to one of four categories (high quality, moderate quality, low quality or poor quality

in line with the guidance in BS 5837: 2012)¹). The majority of features were identified to be of low quality. No designated ancient woodlands or veteran trees have been identified within the study areas of either CSEC.

- 6.12 Across the Project as a whole, sixteen trees were identified as veteran trees and will be protected. A total of eight woodland blocks and one group are designated ancient woodland and as noted above, it was confirmed by the Cheltenham Borough, Cotswold District and Tewkesbury Borough Councils that no trees surveyed are subject to Tree Preservation Orders or Conservation Area restrictions. The majority of features will be retained in the Project.

Soil

- 6.13 The ALC grade of land within the northern CSEC site comprises predominantly Grade 3b land (non-BMV land). Grade 3a (BMV) land was identified in the areas used to support access for the CSEC and do not comprise a permanent loss of land. The total area of Grade 3a land required temporarily is 0.7 ha and the total area of Grade 3b land which would be permanently lost due to the construction of the CSEC is 3.1 ha. The agricultural land use at the time of the survey was arable cropping and grassland. Topsoil textures recorded included medium clay loam, heavy clay loam, heavy silty clay loam and silty clay (**CD B28**).
- 6.14 The ALC grade was Grade 3b across the entirety of the southern CSEC site which comprises a total of 1.9 ha of agricultural land. The permanent land loss is entirely non-BMV land. Topsoil textures recorded included medium clay loam, medium silty clay loam, heavy silty clay loam and heavy clay loam (**CD B27**).

Air Quality and Noise

- 6.15 As noted above, the Project is not located in an Air Quality Management Area (**AQMA**) and there are no AQMAs within the surrounding area of Gloucestershire.
- 6.16 The northern CSEC Construction Dust Assessment (**CD B32**) identified a number of sensitive human receptors within 250m of the planning application boundary; mainly farms and other residential properties in the area. Two ecological sites were identified within 50m of the construction vehicle routes from the CSEC site entrances for the works. These sites are Dowdesdell Wood and Arle Grove (both Ancient Woodland).
- 6.17 The southern CSEC Construction Dust Assessment (**CD B31**) identified a number of sensitive human receptors within 250m of the planning application boundary; mainly farms and other residential properties in the area. No sensitive ecological receptors were identified within 50m of the site boundaries associated with the southern CSEC planning application or within 50m from the construction vehicle route up to 250m from the CSEC site entrance.
- 6.18 For the northern CSEC works, the Construction Noise Impact Assessment (**CD B20**) identifies the nearest noise sensitive receptors as Dan Deri and Middle Mill Cottage (approximately 70m to the north of the permanent access road improvements and 190m northeast of the CSEC construction), Postlip Lodge (approximately 160m west of the temporary bellmouth construction and Corndean Cottages (approximately 170m east of the temporary access roads and 190m south of the overhead line outages).

¹ High-quality trees (Category A) with an estimated remaining life expectancy of at least 40 years. Moderate-quality trees (Category B) with an estimated remaining life expectancy of at least 20 years. Low-quality trees (Category C) with an estimated remaining life expectancy of at least 10 years. Poor quality trees (Category U), trees that may have existing or potential conservation value, but are not suitable for retention due to their condition or other factors.

- 6.19 For the southern CSEC works, the Construction Noise Impact Assessment (**CD B21**) identifies the nearest noise sensitive receptors as Upper Colgate Farm (approximately 190m southwest of the overhead line outages and 415m southwest of the permanent bellmouth construction), Whittington Court (approximately 220m east of the temporary bellmouth construction) and Wood Farm (approximately 440m northeast of the CSEC construction).

Drainage

- 6.20 In relation to the northern CSEC, the Project is located in the Avon – Midlands West operational catchment and drains to the headwaters of the River Isbourne. The headwaters are located within 500m of the CSEC site. These are ordinary watercourses, with the River Isbourne becoming an Environment Agency designated main river approximately 9km north of the CSEC site. The CSEC site is underlain by a variety of bedrock geology types; Birdlip Limestone, Whitby Mudstone, Marlstone Rock and Dyrham. There are very few drift deposits in the study area. Where they do occur, they follow the corridors of watercourses. The majority of the CSEC site is at very low risk of tidal and fluvial flooding, lying in Flood Zone 1. There are small areas within the CSEC site boundaries which lie in Flood Zones 2 and 3, associated with the River Isbourne. The majority of the land within the CSEC site is at very low risk of flooding from surface water, equivalent to a less than 0.1% (1 in 1000) chance of flooding in any year, including the CSEC itself. Localised areas of land are at medium and high risk of flooding from surface water; these areas all form part of surface water flow routes towards the watercourses. Flooding from ‘river-groundwater interaction’ is considered a low risk (**CD B36**).
- 6.21 In relation to the southern CSEC, there is one Environment Agency designated main river; the River Chelt, which flows to the west of the planning application boundary associated with the temporary bellmouth. A tributary of the River Coln is also located to the southeast. This tributary is designated an ordinary watercourse and flows in a south-easterly direction where it eventually becomes the River Coln approximately 1.5km downstream of the CSEC site. The River Coln becomes an Environment Agency designated main river approximately 7km to the south. Dowdeswell Reservoir lies 1.1km south of the CSEC. The CSEC site is underlain by the Birdlip Limestone and Whitby Mudstone. Land within the CSEC site lies within Flood Zone 1. The land is at very low risk of flooding from surface water, equivalent to a less than 0.1% (1 in 1000) chance of flooding in any year. In the vicinity of the proposed works area at the A40, there is a very narrow strip of land that is at low risk of flooding from surface water, representing an overland flow path to the River Coln. The distance between the CSEC site and the closest watercourses, as well as the prevailing topography also limits the risk of flooding by river-groundwater interaction (**CD B35**).

Mining and Minerals

- 6.22 The northern CSEC site is partially within a Mineral Consultation Area, whilst the southernmost area of the planning application boundary is located entirely within a primary mineral resource area (limestone) as defined by Gloucestershire County Council’s Local Plan. There are no active quarries present within the CSEC site. No Mineral Local Plan Allocations (preferred areas of mineral extraction) were identified within the CSEC site or within 1 km(**CD B26**).
- 6.23 Artificial ground is mapped in a small part of the northern CSEC redline boundary and is thought to be associated with the construction of the Postlip Mills. A visual inspection did not record any visual or olfactory evidence of made ground. However, it is considered likely that some localities will encounter made ground during excavations near the main road and paper mill (**CD B26**).

- 6.24 Most of the southern CSEC site is within a Mineral Safeguarding Area, with the Jurassic Limestone deemed a primary mineral resource. No Mineral Local Plan Allocations (preferred areas of mineral extraction) were identified within the CSEC site (**CD B25**).
- 6.25 A BritPit was identified approximately 10m north of the southern CSEC site, with the main commodity extracted via surface workings from limestone of the Birdlip Limestone Formation. Review of aerial and LiDAR imagery identified evidence of a circular ground feature which encroaches into the southern CSEC itself. During the site walkover, Wood Farm BritPit was identified visually and was found to be circular, with a slight ground depression, and limited vegetation. Based upon the site walkover information and information provided within the Geophysical Report it appears that the BritPit encroaches into the southern CSEC itself (**CD B39**). The presence of this BritPit along with its condition stability and composition of backfill material will need to be considered during detailed design. There is no artificial ground mapped within the CSEC site, however there is the potential for deposits being present within the northern part of southern CSEC. There are no active quarries located within 1 km of the CSEC site (**CD B25**).
- 6.26 There are landslide deposits located within the western edge of A40 bellmouth planning application boundary, with nearby artificial deposits approximately 60 m south of the boundary. The landslide deposits are predominantly related to the Whitby Mudstone Formations (**CD B25**).
- 6.27 For both CSECs, the planning application boundaries are not within a Coal Authority Reporting Area, a Coal Authority Development High Risk Area, an Abandoned Mines Catalogue area or within a historical metalliferous mining area. Therefore, risks from coal mining and metalliferous activities are not anticipated within the CSEC sites. No active mines or quarrying operations were noted within the CSEC sites (**CD B25**).

Archaeology and Heritage

- 6.28 The Archaeological Statement (**CD B17**) identifies that the Grade II listed 18th-century gates, gate piers and railings at the entrance to the drive of Postlip Hall lie approximately 460m to the north-west of the proposed northern CSEC. As noted above, the listed buildings at Postlip Hall itself include the Grade I listed mainly 17th-century country house, and the Grade II listed coach house, stables, shelter and gate piers and walls near the house. This group of buildings is located from approximately 870m to the west of the proposed CSEC. The B4632 bellmouth lies to the east of the Grade II listed pair of 18th-century gates at the entrance to the drive to Postlip Hall.
- 6.29 The southern CSEC lies 600m south of the Scheduled Monument bowl barrow (north-west of Wood Farm) and approximately 1.2km west-south-west of the Grade II listed buildings at Whalley Farm, which date from the 17th and 18th centuries. Neolithic to Bronze Age worked flints have previously been found in the field to the west of the proposed CSEC. A Roman settlement site was discovered during clearing of 'Whittington Wood' (now known as 'Arle Grove'), to the north of Whittington. The earthwork remains of a 19th-century quarry are visible on the north of Ham Road, which was further delineated by the geophysical survey.
- 6.30 The easternmost extent of the A40 bellmouth planning application boundary lies adjacent to the designated Scheduled Monument of Whittington Moated site. The Grade II* listed Church of St Bartholomew lies immediately east of the manor house, and the churchyard cross in the churchyard is also a Scheduled Monument and Grade II listed building. A group of five Grade II listed tomb monuments also lay in the churchyard. The site of Waltham Roman Villa and a likely Iron Age settlement are located to the north of the A40 bellmouth planning application boundary.

- 6.31 Between September 2024 and February 2025, Cotswold Archaeology carried out an archaeological evaluation of areas proposed for Permitted Development. A total of 212 trenches were excavated. Archaeological features were identified within distinct parts of the site, generally correlating closely to the results of preceding geophysical surveys. The evaluation identified two main areas of activity, in the northern and south-eastern parts of the Project, with the recovered artefactual assemblage suggesting dating of between the Late Iron Age and Early Roman periods, respectively. The remaining areas of the Project were found to be largely devoid of archaeology, with only a few, mostly undated and isolated features, and some evidence of modern stone quarrying recorded.

Transport

- 6.32 The proposed construction routes are the shortest available routes between the northern and southern site accesses and the Strategic Road Network; to the north, the B4632 – High Street/Deep Street – B4075 – A435 – A46 – M5, and to the south, the primary route: A40 – A436 – A417 – M5, and the secondary route: A40 – A429 – A424 – A44 – A46 – M5. Fifteen PROWs have been identified as affected by construction of the Project. These are listed in the Transport Statement (**CD B23**). Sensitive receptors along the proposed construction routes are listed in the Transport Statement (**CD B23**) and include open space/recreational areas, places of worship and schools, however, the majority of the construction routes are major connector roads already carrying a high volume of traffic.

7. ENVIRONMENTAL EFFECTS OF THE PROJECT

Construction phase effects

- 7.1 Construction activities have the potential to affect ecological receptors without mitigation in place, including protected sites, such as Cleve Common SSSI, Breakheart Plantation Local Wildlife Site and Colgate Farm, Dowdesdell conservation road verge, and protected species, including badger, bats, breeding birds and reptiles. The Ecological Impact Assessments (**CD B18, CD B19**) conclude that with mitigation measures in place, the works will result in no significant negative residual effects. Mitigation measures include pollution control measures (as outlined in the Outline CEMP (**CD B13**)), implementation of the Landscape and Ecological Management Plans (LEMPs) (**CD B14, CD B15**), a replanting and landscape strategy, pre-construction surveys and vegetation clearance under ecological supervision. Landscape and visual effects are covered in the evidence of Ms Rebecca Greatrix.
- 7.2 In relation to the northern CSEC, of the 25 arboricultural features within the study area (i.e. the planning application boundaries plus a buffer area of 15m), one tree group, one hedgerow and one woodland block are located within, or immediately adjacent to the proposed works and will require full or partial removal to facilitate the Project. In relation to the southern CSEC, of the 40 arboricultural features within the study area, a total of six individual trees, three hedgerows and one woodland group are located within, or immediately adjacent to the works and will require full or partial removal. The remainder will be retained, and protected during the works where required, and a net gain in biodiversity will be delivered. Although national and local policy states that 10% Biodiversity Net Gain (BNG) is required, the Cotswold Nature Recovery Plan states that 20% BNG should be achieved within the Cotswold National Landscape. NGET has therefore committed to achieve 20% BNG for the CSECs.
- 7.3 For the project as a whole, of the 805 arboricultural features in the study area, a total of 25 individual trees are identified as requiring removal. These are mainly low quality trees (24 individual trees) and one moderate quality individual tree. A total of 37 groups of trees are identified to be either fully or partially removed and a total of 10 woodland groups are identified to be partially removed.

- 7.4 A total of 28 hedgerows have been identified to be either fully or partially removed. The affected hedgerows are mainly semi to early mature vegetation. Of the six mature hedgerows affected, only one will be permanently affected by the works. The arboricultural team has worked closely with the engineering team to minimise vegetation loss as much as possible across the Project. The removal of the vegetation identified is unavoidable due to its location within the footprint of the Project. In order to offset the impact to visual public amenity associated with trees and hedgerows, a replacement strategy is proposed.
- 7.5 Activities such as excavation, ground works, cutting, construction and storage of materials, have the potential to result in fugitive dust emissions throughout the construction phase. Vehicle movements both on-site and on the local road network also have the potential to result in the re-suspension of dust from highway surfaces. The potential for impacts at sensitive locations depends significantly on local meteorology during the undertaking of dust generating activities, with the most significant effects likely to occur during dry and windy conditions. The potential for dust impacts also depends significantly on the distance between the dust generating activity and receptor location. Risk was predicted based on a worst-case scenario of works being undertaken at the edge of the site boundary, therefore, actual risk is likely to be lower than that predicted during the majority of the construction phase. The construction dust assessments (**CD B31, CD B32**) concluded that at the receptors identified nearby, there is a low² risk of dust soiling and impacts on human health as a result of earthworks and trackout, and a negligible risk of dust effects due to construction. A medium risk of dust effects to ecological receptors was identified. It was concluded that with the proposed mitigation measures implemented (as identified in the construction dust assessments and the Outline CEMP (**CD B13**), the residual effect from all dust generating activities is predicted to be not significant.
- 7.6 For the northern CSEC planning application, the noisiest construction activities are calculated to be associated with construction of the temporary access road. For daytime works, potentially significant effects may occur within 128 m of the works, however, the closest noise sensitive receptors are Corndean Cottages 170 m away. For the southern CSEC planning application, the noisiest construction activities are calculated to be associated with construction of the CSEC itself. For daytime works, potentially significant effects may occur within 125 m of the works, however, the closest noise sensitive receptor is Wood Farm 440 m away. No significant adverse effects are therefore predicted for any construction activities associated with the CSECs.
- 7.7 The ALC grade of the land within the northern CSEC site comprises predominantly Grade 3b land. Grade 3a land was identified in the areas used to support access for the CSEC and do not comprise a permanent loss of land. The total area of Grade 3a (BMV) land required temporarily is 0.7 ha and the total area of Grade 3b land which would be permanently lost is 3.1 ha. The agricultural landholdings are used for arable production and grazing with minimal associated infrastructure. The requirements for access to two landholdings for farming activities is infrequent and as such the sensitivity is considered to be low. One land holding requires reasonably frequent access to the land therefore the resulting sensitivity is considered to be moderate. The construction of the northern CSEC would result in a permanent land take of 1.8ha from one landholding. The rest of the land within the northern CSEC site is only required temporarily as such the magnitude of impact is considered to be minor based on the area required and that there would not be any severance impacts. This would result in an overall slight impact for one landholding and neutral or slight impact for two landholdings which are all considered not significant.
- 7.8 The ALC grade of the land within the southern CSEC site comprises Grade 3b across the entirety of the site which comprises a total of 1.9 ha of agricultural land. The permanent land

² Defined using the dust risk categories high, medium, low and negligible in line with the IAQM guidance.

loss is entirely non-BMV land. As two landholdings are used for sheep grazing there is limited associated infrastructure and access requirements are infrequent; therefore, the sensitivity is low. One landholding is used for both grazing and arable cropping and also has minimal associated infrastructure. However, there is a private water supply located within the site boundary. As such, the severance of this from the rest of the landholding will be investigated to ensure there is no long-term loss of this facility, in discussion with the landowner. The sensitivity of this landholding is therefore considered to be moderate. The Project would result in permanent land take of 3.3ha from one landholding. The rest of the land within the CSEC site boundary is only required temporarily; as such the magnitude of impact is considered to be minor based on the extent of land take and the replacement of the private water supply such that there are no permanent severance impacts. The overall impact on agricultural landholdings is slight and this is considered to be not significant.

- 7.9 The potential impacts of the Project on surface and groundwater receptors in the context of the baseline water environment was assessed. Following consideration of embedded design measures and implementation of good practice measures for both the construction and operational phases, the assessment determined that construction of the Project would result in no adverse impacts to the baseline water environment.

- 7.10 In relation to flood risk, the turning area at the CSECs and the permanent access/bellmouths are the only works that would result in a permanent increase in impermeable land area. Any new permanent land take at the CSECs would be drained in accordance with the planning policy requirements/local Sustainable Urban Drainage Systems (SuDS) guidance of the Lead Local Flood Authority. All other sources of flooding assessed (fluvial, surface water and groundwater) are considered to pose a low risk to the Project. It is considered that, subject to the implementation of appropriate surface water management measures, the flood risk to the Project would be acceptable and the Project would not increase third party flood risk, thus satisfying the Exception Test in line with the NPPF requirement.

- 7.11 There were found to be no significant impacts to mineral resources within the planning application boundaries. Due to the CSEC sites being in a Mineral Consultation Area and a primary mineral resource area, approval from the local planning authority on the mineral resources assessment was required as part of the planning application process. The potential for made ground to be encountered during excavations within the northern CSEC site boundary was identified and the Wood Farm BritPit was identified to encroach within the southern CSEC site boundary. No ground investigation data exists for this area and therefore, the potential constraints provided by this feature, such as ground stability around the pit as well as the type of backfill material, will be considered during detailed design.

- 7.12 In relation to construction phase impacts on archaeology, further evaluation trenches have been undertaken following preparation of the Archaeological Statement, to further inform the likely impacts of the Project and the pre-commencement or construction phase mitigation measures required, for agreement with Gloucestershire County Council Archaeology Service and Historic England. The highest risk areas that will need strip, map and record³ or an archaeological watching brief are to be identified. Construction phase impacts on built heritage will be temporary, related to visual impacts, and would not be considered likely to have a significant impact on built heritage assets.

- 7.13 The main traffic and transport related environmental effects would occur during the peak construction period in 2028. The assessment of the future 2028 baseline and traffic generated

³ A systematic technique used by archaeologists to analyse and record archaeological finds. The topsoil is stripped to expose the features, the features are mapped and then recorded with details of the find (including photos and drawings as required). This allows decisions to be made regarding which features should be excavated.

during construction identified that for the majority of roads, under a worst-case scenario, the increase in traffic on those roads that form the proposed construction routes would be below the 30% and 10% increase thresholds at which effects on highway links are to be assessed as recommended by best practice guidance. For those below the threshold, the level of traffic generation during the construction of the Project would not have a material impact on the road network and the effects are considered unlikely to be significant. The predicted increase for 12-hour Heavy Goods Vehicle flows (between 07:00-19:00 hours) was found to exceed the threshold for sensitive roads on the B4075, the A44 and A424. The increase in traffic will be limited for the duration of the construction phase and was assessed to be a maximum of a 1.1% increase in total traffic from the baseline traffic on the B4075, a 3.3% increase from baseline on the A44 and a 5.2 % increase from baseline on the A424. Furthermore, appropriate control measures are proposed to reduce adverse effects from traffic associated with the Project, as such, the assessment determined that the predicted effects associated with construction traffic on the assessed links are unlikely to be significant.

Operational phase effects

- 7.14 Due to the nature of the Project, the Ecological Impact Assessments (**CD B18, CD B19**) identified no impacts on ecological protected sites during operation. Impacts during operation on protected species were assessed to be neutral and non-significant with mitigation measures in place, including native tree, scrub, hedgerow and neutral grassland planting. Landscape and visual effects are covered in the evidence of Ms Rebecca Greatrix.

- 7.15 Operational traffic would be limited to normal NGET personnel attendance and infrequent maintenance visits and is not anticipated to alter from current levels. For this reason, operational traffic assessment was scoped out of the appraisal of transport and traffic effects (**CD B23**). On this basis, operational vehicle emission impacts are also not considered significant (**CD B31** and **B32**). Operational noise was also scoped out based on the low noise levels generated by the operational CSECs and the distance to noise sensitive receptors; significant noise impacts are therefore not expected.

- 7.16 As noted above, the construction of the northern CSEC would result in a permanent land take of 1.8ha from one landholding. The rest of the land within the northern CSEC planning application boundary is only required temporarily, as such the magnitude of impact is considered to be minor based on the area required and that there would not be any severance impacts. This would result in an overall slight impact for one landholding. The construction of the southern CSEC would result in a permanent loss total of 1.9 ha of non-BMV agricultural land. There is a private water supply located within the site boundary. As such, the severance of this from the rest of the landholding will be investigated to ensure there is no long-term loss of this facility, in discussion with the landowner. The Project would result in permanent land take of 3.3ha from one landholding in relation to the southern CSEC planning application boundary. The rest of the land within the site boundary is only required temporarily; as such the magnitude of impact is considered to be minor based on the extent of land take and the replacement of the private water supply such that there are no permanent severance impacts. The overall impact on agricultural landholdings is slight and this is considered to be not significant.

- 7.17 The Project will lead to notable heritage benefits to a number of heritage assets in the area, due to the removal of the current pylons and overhead lines. No adverse effects upon the heritage significance of any designated heritage assets from the planning application proposals were identified in the Archaeological Statement (**CD B17**). A single minor adverse effect upon the significance of a heritage asset which may be considered a 'non-designated heritage asset' (Upper Mill paper mill) has been identified, from the construction of the CSEC compound

south-east of the mill (given the later development of buildings at the mill site, their low topographic situation, and the surrounding mature trees, this effect is reported as no more than very limited). The removal of the existing pylons and overhead lines to the south of Upper Mill would comprise a heritage benefit, which is considered to likely balance against the minor adverse effect of the compound.

- 7.18 No operational impacts in relation to water resources, flood risk, mining or minerals are anticipated.

8. ENVIRONMENTAL MITIGATION AND MANAGEMENT MEASURES

- 8.1 Detailed mitigation measures for construction phase impacts are outlined under the sub-headings below, as included in the Outline CEMP (**CD B13**) and/or topic-specific reports. Information on landscape and visual mitigation measures is included in the evidence of Ms Rebecca Greatrix.
- 8.2 Mitigation has been considered throughout the design process and has been embedded into the Project design. The aim has been to minimise the construction and operational impacts of the Project through careful routeing and siting and replacement planting.
- 8.3 The alignment of the cable route minimises effects on ecology and existing vegetation where possible, avoiding many areas of woodland and minimising breaks in existing field boundary hedgerows, whilst also minimising the number of PRoW crossings. At Breakheart Plantation, the alignment of the route has been modified to minimise the corridor width as far as practicable to minimise tree loss and avoid a straight route through the woodland to minimise wider visual impacts and impacts to bats. The curved alignment favours bat foraging and minimises wind effects through the woodland. The Project team have also sought to avoid the highest value compartments of the woodland and locate the route away from veteran and ancient trees, whilst routeing the cable in areas where trees have been found with signs of ash dieback. The corridor has also been narrowed as far as possible where crossing woodland to the west of Warren Farm to minimise tree loss and ecology impacts, and has been located at one of the narrowest points of the open access land and common land between Cleeve Common and West Down.

Ecology and biodiversity

- 8.4 Mitigation for the temporary and permanent loss of habitat across the Site will be addressed through the LEMP and the BNG process. The BNG strategy will improve habitat condition and provide additional habitat resource for protected / notable fauna. The results of the BNG metric and associated habitat creation, enhancement and design are reported within the BNG reports and LEMPs (**CD B14, CD B15, CD B37, CD B38**).
- 8.5 Control measures incorporated within the CEMP, including (but not limited to) pollution prevention, dust suppression and minimising light and noise pollution will mitigate for the potential impacts to Cleeve Common SSSI during the construction stage.
- 8.6 Areas of high value woodland within Breakheart Plantation Local Wildlife Site have been avoided at the design stage following the mitigation hierarchy, however, some woodland will be lost. The area underneath the existing overhead line within the Local Wildlife Site will be replanted with appropriate native tree/scrub species and the area above the underground cable will be replanted with native scrub and hedgerow vegetation with shallow root systems so as to not interfere with the cable below.

- 8.7 Affected badger setts will be closed under licence from Natural England in advance of construction work. Prior to the commencement of construction, an update survey will be undertaken.
- 8.8 The presence of otter will be mitigated using standard best practice and pollution control measures to prevent pollution of watercourses. Prior to the commencement of construction, an update survey will be undertaken to ensure the otter status remains the same.
- 8.9 Through habitat replacement and enhancement, there will be no net loss of suitable hazel dormouse habitat. The presence of dormouse will be mitigated using standard best practice and pollution control measures and an ecological clerk of works will be present during vegetation removal. A Natural England dormouse licence will be sought.
- 8.10 Although habitats on Site are predominantly sub optimal for reptiles, dominated by agricultural fields, areas of better quality habitat will undergo a phased cut approach to vegetation removal, supported by a fingertip search during spring/summer when reptiles are active. Suitable reptile hibernacula on Site such as stone walls will be dismantled by hand during spring/summer and reinstalled as close to their original state as possible post construction ensuring they remain suitable for hibernacula and refugia.
- 8.11 Roman snails are present within the local area but were not recorded on Site. An ECoW will be present during vegetation removal.
- 8.12 As mentioned above, GCN requirements are confirmed under a District Level Licence. GCN are present in ponds within 250m of the permitted developments works. Works within 250m of these ponds will be undertaken under precautionary working methods and an ECoW will be present to supervise vegetation clearance of suitable habitat.
- 8.13 Further details of mitigation measures in relation to ecology and biodiversity are included within the Ecological Impact Assessments, the accompanying survey reports and the LEMPs (**CD B18, CD B19, CD B14, CD B15, CD B22, CD B24**).

Arboriculture

- 8.14 Control measures to be applied during the construction phase of the Project in relation to arboriculture are as follows:
 - 8.14.1 Tree removals on site will be limited to those listed in the Arboriculture Impact Assessments and marked by red hatching in the Tree Impacts and Protection Plans (appended to the Arboricultural Impact Assessments (**CD B29**) (**CD B30**)). All individual trees, groups and hedgerows listed for removal will be removed prior to the commencement of construction or excavation works on site.
 - 8.14.2 All tree works, including pruning will be carried out by a suitably qualified arboricultural contractor and conducted in accordance with BS 3998: 2010: Tree Work – Recommendations.
 - 8.14.3 Site operations involving plant with booms, jibs and counterweights will be planned in advance to prevent contact with retained trees. All operations involving such plant in close proximity to trees will be conducted under the supervision of a banksman to ensure that adequate clearance from the retained trees is maintained.
 - 8.14.4 Adequate allowance for the planning and implementation of site compounds and storage areas and the routing of services for the Project will be made to avoid

encroachment with the Root Protection Area (RPA) of, or prevent direct contact with, all retained trees on site.

- 8.14.5 A copy of the Arboricultural Impact Assessment, including the preliminary tree protection measures and the Tree Impacts and Protection Plan will be made available to the site managers and proposed arboricultural contractor to ensure site works comply with methodologies and specifications provided.
- 8.14.6 It will be necessary to conduct pre works ecology checks for nesting birds prior to the felling of any trees. An ecological consultant will be consulted to ensure correct procedures are followed.
- 8.14.7 All works will take place with a minimum standoff of 0.5m from the stems of trees. Access roads which encroach into the RPAs of trees would be constructed using a no-dig construction technique and would comprise timber edging boards and a porous substrate (self-bound gravel or similar). Works would be limited to hand-held tools/ equipment only or preferably compressed air tool including air pic and vacuum excavation in order to achieve required depths. Ground protection will be required where pedestrians, machinery and/ or vehicles are working within the RPAs. This would be capable of supporting any traffic entering or using the site without being distorted or causing compaction of underlying soil. Ground protection would remain in-situ throughout the duration of the proposed works and only be removed upon completion.
- 8.14.8 All earthworks will remain a minimum of 1.5m from the edge of the retained trees and groups of trees RPAs and the veteran buffer zone as defined by Tree Protection Fencelines shown in the Tree Impacts and Protection Plans.
- 8.14.9 A tree replacement strategy will be confirmed at detailed design for the trees to be removed, taking into consideration the landscape character, local treescape and biodiversity features of the immediate and adjoining areas. To ensure that appropriate and sustainable planting is achieved, advice will be sought from an ecologist and arboriculturist.
- 8.14.10 All hedgerow to be removed under Permitted Development works will be reinstated once the proposed works have been completed. All new tree planting would be in accordance with British Standard 8545: Trees: From Nursery to Independence in the Landscape – Recommendations (2014).

Dust

- 8.15 The following construction phase mitigation measures will mitigate and/or minimise potential dust impacts:
 - 8.15.1 Develop and implement a Communication Plan that includes:
 - 8.15.1.1 Community engagement before work commences on site.
 - 8.15.1.2 Displays the name and contact details of person(s) accountable for air quality and dust issues on the Site boundary.
 - 8.15.1.3 Displays the head or regional office contact information.

- 8.15.2 Develop and implement a Dust Management Plan which may include measures to control other emissions, approved by the relevant Local Authority. The level of detail will depend on the risk and should include as a minimum the highly recommended measures in the Construction Dust Assessments. The desirable measures should be included as appropriate for the site.
- 8.15.3 Record all dust and air quality complaints, identify cause(s), take appropriate measures to reduce emissions in a timely manner, and record the measures taken.
- 8.15.4 Make the complaints log available to the Local Authority when asked.
- 8.15.5 Record any exceptional incidents that cause dust and/or air emissions, either on- or off-site, and the action taken to resolve the situation in the log book.
- 8.15.6 Undertake regular on-site and off-site inspection, where receptors (including roads) are nearby, to monitor dust, record inspection results, and make the log available to the Local Authority when asked. This should include regular dust soiling checks of surfaces such as street furniture, cars and window sills within 100m of site boundary, with cleaning to be provided if necessary.
- 8.15.7 Carry out regular site inspections to monitor compliance with the Dust Management Plan, record inspection results, and create an inspection log available to the local authority when asked.
- 8.15.8 Increase the frequency of site inspections by the person accountable for air quality and dust issues on site when activities with a high potential to produce dust are being carried out and during prolonged dry or windy conditions.
- 8.15.9 Agree dust deposition, dust flux, or real-time PM10⁴ continuous monitoring locations with the relevant Local Authority. Where possible, commence baseline monitoring at least three months before work commences on site or, if it a large site, before work on a phase commences. Further guidance is provided by the IAQM on monitoring during demolition, earthworks and construction.
- 8.15.10 Plan site layout so that machinery and dust causing activities are located away from receptors, as far as is possible.
- 8.15.11 Enclose specific operations where there is a high potential for dust production, where possible.
- 8.15.12 Avoid site runoff of water or mud.
- 8.15.13 Keep site fencing, barriers and scaffolding clean using wet methods.
- 8.15.14 Remove materials that have a potential to produce dust from site as soon as possible, unless being re-used on site.
- 8.15.15 Consider seeding stockpiles and bunds to prevent wind whipping.
- 8.15.16 Ensure all vehicles switch off engines when stationary - no idling vehicles.

⁴ Particulate matter with a diameter of less than 10 micrometres.

- 8.15.17 Avoid the use of diesel or petrol powered generators and use mains electricity or battery powered equipment where practicable.
- 8.15.18 Impose and signpost a maximum-speed-limit of 15mph on haul roads and work areas (if long haul routes are required, these speeds may be increased with suitable additional control measures provided, subject to the approval of the nominated undertaker and with the agreement of the Local Authority, where appropriate).
- 8.15.19 Review and update when required the Construction Logistics Plan to manage the sustainable delivery of goods and materials.
- 8.15.20 Implement a Travel Plan that supports and encourages sustainable travel (public transport, cycling, walking, and car-sharing).
- 8.15.21 Only use cutting, grinding or sawing equipment fitted or in conjunction with suitable dust suppression techniques such as water sprays or local extraction, e.g. suitable local exhaust ventilation systems, when necessary.
- 8.15.22 Ensure an adequate water supply on the site for effective dust/particulate matter suppression/mitigation, using non-potable water where possible and appropriate.
- 8.15.23 Use enclosed chutes and conveyors and covered skips.
- 8.15.24 Minimise drop heights from conveyors, loading shovels, hoppers and other loading or handling equipment and use fine water sprays on such equipment wherever appropriate.
- 8.15.25 Ensure equipment is readily available on site to clean any dry spillages and clean up spillages as soon as reasonably practicable after the event using wet cleaning methods.
- 8.15.26 Avoid bonfires and burning of waste materials.
- 8.15.27 Re-vegetate earthworks and exposed areas/soil stockpiles to stabilise surfaces as soon as practicable.
- 8.15.28 Use Hessian, mulches or tackifiers where it is not possible to re-vegetate or cover with topsoil, as soon as practicable.
- 8.15.29 Only remove the cover in small areas during work and not all at once.
- 8.15.30 Avoid scabbling (roughening of concrete surfaces) if possible;
- 8.15.31 Ensure sand and other fine aggregates are stored in bunded areas and are not allowed to dry out, unless this is required for a particular process, in which case ensure that appropriate additional control measures are in place.
- 8.15.32 Use water-assisted dust sweeper(s) on the access and local roads, to remove, as necessary, any material tracked out of the site. This may require the sweeper being continuously in use.
- 8.15.33 Avoid dry sweeping of large areas.

- 8.15.34 Ensure vehicles entering and leaving sites are covered to prevent escape of materials during transport.
- 8.15.35 Record all inspections of haul routes and any subsequent action in a site log book.
- 8.15.36 Implement a wheel washing system (with rumble grids to dislodge accumulated dust and mud prior to leaving the site where reasonably practicable).
- 8.15.37 Ensure there is an adequate area of hard surfaced road between vehicle washing facilities and the site exit, wherever site size and layout permits.

Noise and vibration

8.16 The following construction phase mitigation measures would mitigate and/or minimise potential noise and vibration impacts, and I would expect them (or similar) to be included in the CEMP as ultimately approved. These measures comprise requirements that:

- 8.16.1 The Contractor will implement Best Practicable Means (BPM) as per the recommendations set out in BS5228 (Code of practice for noise and vibration control on construction and open sites) and current guidelines set down by the Health and Safety Executive.
- 8.16.2 The Contractor will comply with the noise regulations or restrictions imposed by the relevant Local Authority. The Contractor will apply to the relevant Local Authority for prior consent under Section 61 of the Control of Pollution Act for noisy activities where required.
- 8.16.3 The Contractor will implement all noise control measures required to meet any noise limits agreed with the relevant Local Authority.
- 8.16.4 The Contractor will bring to the site only plant conforming to relevant national or international standards, directives and recommendations on noise and vibration emissions.
- 8.16.5 All generators and compressors used on the site will be 'sound reduced' models fitted with acoustic linings and all ancillary pneumatic percussive tools shall be fitted with mufflers or silencers will be kept in good repair and condition.
- 8.16.6 Operations will be stopped whenever unreasonable noise or disturbance results from faulty equipment. Faults to equipment will be remedied by the Contractor immediately or the equipment will be replaced.
- 8.16.7 All powered equipment in intermittent use will be shut down in the intervening periods between works or throttled down to a minimum required.
- 8.16.8 For all construction activities the following construction noise limits as set out in Section E5 of BS 5228 will apply (subject to any alternate agreement in terms of a Section 61 Consent):
 - 8.16.8.1 65 dB for daytime;
 - 8.16.8.2 55 dB for evening and weekends (Saturday after 1pm and Sunday);
and

8.16.8.3 45 dB for night-time.

8.16.9 The Contractor will undertake sound level readings in the event of receipt of complaints regarding noise and/or vibration.

8.16.10 The Contractor will ensure that audible warning systems, e.g. vehicle reversing sirens, are switched to a setting, which is compatible with Health and Safety Executive requirements.

Ground conditions and contaminated land

8.17 The following construction phase mitigation measures would mitigate and/or minimise potential ground conditions and contaminated land impacts:

8.17.1 During the removal of vegetation, stripping of topsoil, excavation, earthworks and construction a watching brief protocol will be adopted where required, with site workers remaining vigilant to visual or olfactory signs of contamination.

8.17.2 A contamination discovery strategy plan to be produced and implemented if unexpected contamination discovered on site.

8.17.3 Within the construction site compound, specific areas will be designated for the storage of chemicals, waste oils and fuel and refuelling activities. These areas will be bunded and placed on hardstanding to prevent downward migration of contaminants. Any transfer of fuel or other potentially contaminated liquids will only take place within a designated fuel transfer area. Drip trays will be provided to reduce the risk of spillages. These areas will be designed with appropriate drainage to ensure any spillages can be isolated.

8.17.4 During the construction phase, localised contamination may occur within the compound areas through spillages / leakages of fuel and therefore a repeat baseline survey will be undertaken once the construction has finished and the compound dismantled to demonstrate the area has been returned to its previous state. If contamination has occurred during the lifetime of the compounds, remediation will be undertaken to return the land to its previous land quality state.

8.17.5 To reduce the risk to surface water, excavated materials will be appropriately segregated and stored to ensure that water runoff from stockpiles does not enter the water environment via drains and nearby watercourses. If necessary, stockpiles will be covered. Pollution prevention best practice protocols will be adopted to ensure contamination does not enter surface water.

8.17.6 A Site Waste Management Plan (SWMP) and a Materials Management Plan (MMP) (forming part of the CEMP following the protocols within the CL:AIRE Definition of Waste: Development Industry Code of Practice) will be implemented to ensure that excavated materials are re-used appropriately, sustainably and remain legitimately outside the waste hierarchy.

8.17.7 During the construction phase, construction / site workers could be exposed via ingestion, inhalation or dermal contact with soil and any contamination present. To mitigate risks from contaminated soils / materials all site workers will be made aware of the findings of the intrusive investigations and the hazards associated with handling potentially contaminated materials via the CEMP. All works will be

conducted in accordance with relevant Health and Safety Executive (HSE) publications Construction (Design and Management) (CDM 2015) Regulations.

- 8.17.8 Suitable Personal Protective Equipment (PPE) including Respiratory Protective Equipment (RPE) (if necessary) will be available to all site workers. Appropriate site hygiene protocols will be adopted during the construction phase.
- 8.18 Made ground may be encountered during excavations within the northern CSEC site boundary. Workers are to be briefed and are to be vigilant upon excavating within this area. Any visual or olfactory contamination should be recorded, segregated, appropriately sampled and stockpiled. An appropriate geoenvironmental consultant is then to be notified and if necessary works stopped in that location.
- 8.19 Based upon current information, the Wood Farm BritPit encroaches within the southern CSEC site boundary. No ground investigation data exists for this area and therefore, the potential development constraints provided by this feature such as ground stability around the pit as well as the type of backfill material will need to be considered during detailed design and mitigation measures confirmed for construction where required.

Site waste

- 8.20 A SWMP for the Project will be prepared by the Main Contractor which will forecast the type and quantity of waste that will be produced on site and set out how waste might be managed so that it is reused, recycled, or disposed of appropriately. The SWMP is a live document and will be updated during the duration of the Project by the client and the Main Contractor to record the movements of waste, how it will be managed and to encourage better waste management practices. As part of the final SWMP, the Main Contractor will monitor waste arisings and management practices. Auditing and measurement will enable more effective management of waste through the setting of performance targets for recycling and segregation and monitoring subcontractors on all the sites.
- 8.21 A log will be maintained of all materials that come on to site, and details will be obtained from the waste disposal company of the exact amount of waste materials removed from site. Details will also be provided outlining the recovery/disposal actions for the specific waste streams
- 8.22 Waste receptacles will be monitored by the contractor to ensure that contamination has not occurred, results will be recorded.
- 8.23 The Main Contractor will continually review the type of surplus materials being produced and the SWMP will seek to identify opportunities to implement the waste minimisation methodology and avoid waste to landfill. It will outline how to manage demolition/construction wastes generated at the worksites, so far as reasonably practicable, in accordance with the national waste hierarchy and within the relevant regulatory controls and cost restraints.
- 8.24 The SWMP will ensure opportunities are maximised for reuse on site as the preferred option for dealing with waste arising from the site.
- 8.25 Waste minimisation methods will be utilised. Any 'waste' materials generated will be re-used or recycled where possible. Reuse will occur within the project where possible, but beneficial reuse of materials on other projects will also be considered.
- 8.26 The following waste will be segregated;

- 8.26.1 Hazardous (any waste which contains high levels of chemicals, identified in testing process); and
- 8.26.2 General uncontaminated construction and demolition waste.
- 8.27 The following measures will be taken to avoid disposal of materials:
 - 8.27.1 Storage in an appropriately dedicated areas to prevent spoilage, damage and contamination;
 - 8.27.2 Training of the construction team on the importance of correct ordering of materials so as to avoid excess materials;
 - 8.27.3 Review of packaging requirements where possible to avoid, reduce and reuse; and
 - 8.27.4 Offsite manufacturing.
- 8.28 All waste carriers, landfill and transfer stations will have certification/permits checked prior to any waste movement to ensure compliance with legislation. Skips will be checked prior to leaving site to ensure there is no cross contamination of waste.
- 8.29 The site will use the hauliers' waste-transfer notes and complete the form to ensure that the following details are correctly completed and present on the ticket:
 - 8.29.1 Full written description of the waste;
 - 8.29.2 Six figure European Waste Catalogue code;
 - 8.29.3 Name and Address of the holder (producer) of the waste;
 - 8.29.4 Name and Address of the Waste Carrier, including their carriers or exemption number;
 - 8.29.5 Name and Address of the disposal point (Landfill or Transfer Station). Plus, their applicable Waste Management Licence or exemption number;
 - 8.29.6 Quantity of waste and whether loose/in a container, and if so what kind of container;
 - 8.29.7 Date, time and place of transfer;
 - 8.29.8 Standard Industrial Classification code of the waste producer;
 - 8.29.9 Declaration to waste management hierarchy; and
 - 8.29.10 Signed by producer and carrier.
- 8.30 A copy of the Duty of Care waste transfer note will be kept on site or within the filing system for two years as the Environment Agency can ask to view completed Waste Transfer Notes at any time during that period. Periodically, the Main Contractor may visit a waste transfer facility to ensure compliance with the 'Duty of Care', this will also include following waste transfer vehicles to their final point of disposal to monitor compliance.

- 8.31 The disposal of hazardous waste shall only be undertaken by an approved contractor. Movements of hazardous waste are subject to a 'consignment note' under the Duty of care which will be supplied by the waste disposal company. Copies of the consignment note must be retained on site or within the filing system for 3 years. Any supporting documentation recording the hazardous properties of the waste and the associated control measures must be attached to the consignment note i.e. material data sheet, Control of Substances Hazardous to Health (COSHH) assessments, lab test results etc.

Heritage/Archaeology

- 8.31.1 The requirements of the Archaeological Statement (**CD B17**) will be incorporated into the final CEMP. Archaeological evaluation trenching has been undertaken to fully inform the potential impacts and mitigation measures required for the Project. The results of the evaluation will inform conditions for pre-commencement or construction phase mitigation measures for agreement with Gloucestershire County Council Archaeology Service and Historic England. The highest risk areas that will need strip, map and record or an archaeological watching brief are to be identified prior to construction start.
- 8.31.2 The Contractor will minimise archaeological and heritage impacts during construction in accordance with relevant legislation and guidance and as advised by the relevant authorities and statutory undertakers.
- 8.31.3 In all instances where archaeological remains are identified, the creation of a permanent record will be required, including public dissemination of the results prior to their removal.
- 8.31.4 Where practicable, elements within the landscape will be maintained/protected such as vegetation, dry stone walls and hedgerows (including reinstating hedgerows at historic field boundaries, fences and walls).

Water and flood risk

- 8.32 The following construction phase mitigation measures would mitigate and/or minimise potential impacts to water resources and flood risk during construction:
- 8.32.1 Measures to safeguard the water quality of waterbodies within the study area:
- 8.32.1.1 Construction machinery will be refuelled within bunded areas with sealed drainage systems, away from waterbodies; and
- 8.32.1.2 Wastewater generated from the construction compounds will be disposed of via appropriate means, for example, to foul sewer or pumped out and removed from site by tanker.
- 8.32.2 An emergency spillage response plan will document measures to be implemented to prevent pollutant infiltrating into the soils beneath the site and reaching the surface and groundwater receptors.
- 8.32.3 Appropriate equipment (e.g absorption mats) will be made easily accessible on site to deal with accidental spillages and the plan would provide a full list of protocols and communication channels with the Environment Agency in the event of an accidental pollution incident.

- 8.32.4 At the construction compounds, materials will be stored in accordance with best practice and the compounds would have suitable surface water drainage provision. This will prevent pollution of the water environment.
- 8.32.5 Where the temporary access route crosses watercourses on site, namely the River Isbourne and one of its tributaries, existing crossing routes will be utilised where practicable to reduce effects.
- 8.32.6 Works within the floodplains of the watercourses at the Project location will be avoided where possible. The floodplains of the watercourses follow the watercourse channels closely, rarely extending more than 65m from the watercourse itself. Topsoil and excavated material will be stored outside the floodplain of the watercourses at the Project (demarked by Flood Zone 3).
- 8.32.7 As part of pre-construction works, a record of existing land drainage will be compiled and, subject to landowner/occupier agreement, new drains will be established to help prevent damage to soil structure, maintain work areas in a dry condition and to enable current drainage systems to continue to operate through the construction period.
- 8.32.8 Following installation of the cable, topsoil and excavated material will be reinstated to ensure no detriment to the existing land drainage regime.
- 8.32.9 Any Flood Risk Activity Permits, and/or Ordinary Watercourse Consents will be secured prior to the commencement of the construction period.
- 8.32.10 Construction compounds will have suitable surface water drainage provision.
- 8.32.11 During construction there is the potential for the topsoil and subsoil storage areas to affect existing land drainage regimes. This could result in temporary increases in the risk of flooding from surface water during construction. The following measures are therefore proposed to manage this risk:
- 8.32.11.1 As part of the pre-construction works, the location and condition of existing land drainage will be established, and a record of condition compiled. Where necessary, and subject to agreement with the landowner/occupier, new or restored field drains will:
- (a) Enable farmers' current drainage system to continue working throughout the period of construction.
 - (b) Help prevent damage to the soil structure.
 - (c) Aid recovery after completion of the construction activity.
 - (d) Maintain the site work areas as dry as practicable.
- 8.32.11.2 The design of these drainage schemes will be agreed by NGET, the contractor, and the landowners/occupiers. Permanent records of the land drainage locations will be produced. Following installation of the cable topsoil, excavated material will be reinstated to ensure no detriment to the existing land drainage regime.

- 8.32.11.3 Where the cable route crosses surface water flow routes, crossing methods will aim to maintain the flow regime. Methods used will be outlined in a method statement and will be included in the final CEMP to be prepared by the contractor.
- 8.32.12 The construction of the turning areas at the CSECs will be the only works that would result in a permanent increase in impermeable land take. Any new land take resulting in the addition of impermeable surface will be drained in accordance with the planning policy requirements/local Sustainable Drainage Systems (SuDS) guidance of the LLFA (Gloucestershire County Council).
- 8.32.13 Where the temporary access route crosses watercourses on site, namely the River Isbourne and one of its tributaries, existing crossing routes are proposed to be used. Were this not practicable, provision of new temporary crossings designed to convey flows under both flood and low flow conditions would avoid any adverse impact on baseline flood risk and the hydromorphology of the watercourses. Works would be undertaken in accordance with a Flood Risk Activity Permit from the Environment Agency (River Isbourne) and Ordinary Watercourse Consent from the LLFA (River Isbourne tributary). These require that the works would cause no detriment to the flow regimes of watercourses and no increase in flood risk either upstream or downstream. Therefore, undertaking the works in accordance with the permit/consent would ensure no increase in flood risk.

Soils and reinstatement

- 8.33 Measures for land restoration and reinstatement following construction are outlined below. Measures in relation to replanting and aftercare are provided in the evidence of Ms Rebecca Greatrix.
- 8.33.1 A detailed Soil Management Plan (SMP) for the Project will be produced pre-construction once the Project design has been finalised. The SMP, which will form part of the final CEMP, will detail the soil characteristics across the construction footprint (based on the ALC report) and detail how the soil resources will be stripped, stockpiled, and re-used. The SMP will be linked to the Site Waste Management Plan (SWMP).
- 8.33.2 The SMP will be supported by the ALC survey undertaken in November and December 2023, providing baseline information on the soil resources present and the grade of agricultural land. The policy and guidance to be followed and used for developing the SMP in relation to the Project is as follows:
- 8.33.2.1 Safeguarding our Soils: A Strategy for England (Defra, 2009);
 - 8.33.2.2 Construction Code of Practice for the Sustainable Use of Soils on Construction Sites (Defra, 2009);
 - 8.33.2.3 Good Practice Guide for Handling Soils (Ministry of Agriculture Fisheries and Food, 2000);
 - 8.33.2.4 Institute of Quarrying Good Practice Guide for Handling Soils in Mineral Workings (2022);
 - 8.33.2.5 BS 3882 Specification for topsoil (British Standards Institution, 2015); and

- 8.33.2.6 BS 8601 Specification for subsoil and requirements for use (British Standards Institution, 2013).
- 8.33.3 The implementation and responsibility of soil management measures will be outlined in the detailed SMP.
- 8.33.4 The development of the SMP will be based on the soil descriptions as presented in the ALC Assessment Report. This provides descriptions of the soil physical characteristics. This survey information will be used to develop a detailed calculation of soil volumes to be stripped, re-used on site, or exported off site. Information on soil volumes will be presented in the SMP. Should stripped soil resources be taken off site the full testing suite as required by BS 3882:2015 will be undertaken for topsoil and BS 8601:2013 for subsoil resources. The full results of the testing will be included as an appendix to the SMP.
- 8.33.5 The handling, storage and re-use of all soils will be undertaken in line with the best practice below:
- 8.33.5.1 Pre-construction planning will ensure that the Site Manager or appointed individual are provided with training by the Soil Scientist on (but not limited to): soil types in the site, understanding constraints on soil handling due to weather and soil conditions, soil field plasticity testing, and approaches to soil handling.
 - 8.33.5.2 Toolbox talks will be used to inform all those working on the Site of the requirements for soil handling and soil protection measures outlined in the SMP.
 - 8.33.5.3 Soils will be sufficiently protected from being trafficked by plant or other site vehicles by setting out clearly demarcated access routes.
 - 8.33.5.4 Prior to soil stripping commencing any existing vegetation will be cleared with arisings removed to ensure the soil is free from significant quantities of foreign matter or other materials which would make the soils unsuitable for their intended re-use.
 - 8.33.5.5 Soil handling will be determined based on soil moisture content and soils will be tested for plasticity prior to stripping by the Soil Scientist or trained appointed individual. Where practicable, soil will be handled in appropriate weather conditions as required by the Construction Code of Practice for the Sustainable Use of Soils on Construction Sites (Defra, 2009). Soil handling will be avoided when soil moisture content is above the lower plastic limit to minimise compaction of wet soils.
 - 8.33.5.6 If sustained heavy rainfall occurs any topsoil stripping operations must be suspended and not restarted until the ground meets the moisture criteria to allow the restarting of soil handling operations;
 - 8.33.5.7 Soil will be stripped using a hydraulic excavator or tracked dozer. The methodology used will be in line with the Construction Code of Practice for the Sustainable Use of Soils on Construction Sites (Defra, 2009), Good Practice Guide for Handling Soils (Ministry of Agriculture, Fisheries and Food, 2000) and the Institute of Quarrying

(2023) guidance. The exact approach will be detailed in the SMP once full construction details are available.

- 8.33.5.8 Stripped topsoil and subsoil resources will be stored separately in stockpiles which are clearly labelled to prevent cross contamination and located in appropriate locations to avoid flooding the area, watercourses, and topographic depressions. Any potential contaminated soil will be stored on an impermeable surface and covered to reduce leachate generation and potential migration to surface waters.
- 8.33.5.9 Soils will be stockpiled within the maximum height stated in SMP to avoid compaction and anaerobic conditions.
- 8.33.5.10 Industry standard measures will be put in place to control pollution, including silt-laden runoff or dust, for example through the use of coverings or through seeding where stockpiles will be in place for longer than 3 months.
- 8.33.5.11 Measures contained in relevant Defra and Environment Agency best practice guidance documents on the control and removal of invasive weed species will be implemented on stockpiles where appropriate.
- 8.33.5.12 Soil will be reinstated to an appropriate condition relevant to its preconstruction condition. This will be achieved by primarily reinstating the full soil profile in the correct sequence of horizons, and in a state where good soil profile drainage and plant root development are achieved.
- 8.33.5.13 Where soils stripped during the construction phase will not be reinstated, they will be removed off-site in accordance with measures which would be set out in a detailed SWMP. The SMP will include details of the volumes of topsoil and subsoil which will be generated and how the soil will be re-used or disposed of.
- 8.33.5.14 The SMP will set out the aftercare period and the requirements of likely management interventions required. Monitoring, including regular checks by the Soil Scientist during construction and during the aftercare period, will be undertaken (which will cease once the required soil condition has been established and the reinstatement signed off).

Transport

- 8.34 The Construction Traffic Management Plan (CTMP) and PRow Management Strategy will be developed by the Main Contractor. Control measures to be applied during the construction phase of the Project are as follows:
 - 8.34.1 A traffic marshal will be appointed to control access to and from each site where required and ensure drivers have been through the site induction process.
 - 8.34.2 Appropriate security fencing will be established around the sites including compounds, works areas and areas used for the storage of plant and machinery and hazardous substances. These will be subject to regular inspection.

- 8.34.3 Where necessary, Closed Circuit Television (CCTV) will be installed within construction areas. Remote cameras will be installed at compounds for security purposes when items of value are left, with permanent CCTV being installed at the primary compounds.
- 8.34.4 Access to working areas will be restricted to approved personnel only, with the Site Supervisor to monitor and manage traffic and site visitors.
- 8.34.5 Security gates will be used to ensure that only authorised personnel and deliveries can enter and will remain closed at all other times on access to the CDM work area (gates within the site may remain open).
- 8.34.6 Personnel requiring access to the site for reasons other than carrying out physical construction work will be treated as a site visitor. All visitors will be granted access by appointment only and must in all cases be authorised by a senior manager at each site and be required to attend a site induction session to maintain health and safety.
- 8.34.7 All visitors, except for authorised collection or delivery drivers, shall always be the responsibility of the permanent pass holder whilst on site and must sign in at security.
- 8.34.8 Visitors must always use the pedestrian walkways and access gates provided for safe and easy access to site office.
- 8.34.9 Compounds will be segregated into non-PPE and PPE areas. Personnel will not be allowed access into PPE areas without the appropriate equipment as per construction standards.
- 8.34.10 Safe pedestrian access routes between car parking locations, access points, work areas, site offices and welfare facilities will be provided. Where pedestrian and vehicle routes interact, appropriate crossing points and segregation will be provided.
- 8.34.11 A booking system (Delivery Management System) will be used to ensure deliveries to the sites will be spread across the whole day where possible.
- 8.34.12 Dedicated members of staff will travel on the construction routes and monitor Light Goods Vehicle (LGV) and Heavy Goods Vehicle (HGV) traffic using the routes associated with the Project. Staff will be trained to conduct this monitoring process, collect and collate data.
- 8.34.13 Delivery vehicle dwell times will be kept to a minimum; vehicle engines will also be turned off to reduce noise pollution. Appropriate traffic management including clear and visible construction works signage will be implemented and used when/where required; this will be submitted by the Contractor prior to commencement, as requested. Banksman will also be in position as and when required.
- 8.34.14 Trained personnel (traffic marshal) will be in place at key locations when necessary.
- 8.34.15 All vehicles used in the construction of the Project will be to Euro standard V class or better.

- 8.34.16 Appropriate loading/unloading and parking areas for construction vehicles will be designated to avoid the need for parking or waiting on the highway.
- 8.34.17 Upon arrival to each site compound, all deliveries will report to the coordinated delivery contact. This will be communicated to all suppliers and subcontractors at their site induction for all new drivers.
- 8.34.18 Whilst on-site, the delivery operation will be controlled by a trained traffic marshal, from the point of guiding a vehicle to its designated off-loading area to guiding the vehicle back onto the Local Road Network. Both the traffic marshal and drivers will follow relevant safety procedures and operate the same signalling systems.
- 8.34.19 Adequate parking will be provided to ensure that the safety and efficient operation of the public highway is not reduced. At no time will construction personnel, including contractors and suppliers, be authorised to park outside of the site boundaries, including on the public highway, unless prior permission has been granted by either the relevant landowner or the Local Highway Authority (LHA).
- 8.34.20 On-site parking will be managed to ensure safety of all personnel. Parking terms and regulations will be clearly displayed using signage displayed in the immediate vicinity of the parking provision.
- 8.34.21 Suitable space within the works site will be provided for all vehicles to park, unload and manoeuvre, therefore enabling all egressing vehicles to exit onto the access road in a forward-facing direction. Reversing onto any public highway will not be permitted.
- 8.34.22 A 'Near Miss' reporting system will be implemented for all highways incidents. The contractor will ensure that all accidents and near misses are recorded within this system and that drivers are instructed to report all issues recorded through the system. Any accidents or near misses involving vehicles travelling to / from the site will be recorded, investigated, and reported internally and to the client referring specific incidents to the LHA as deemed necessary.
- 8.34.23 The contractor will retain records of all incidents (e.g. speeding and driver hours) and submit to the relevant authorities upon request. If emerging issues are identified, the contractor and the LHA will initiate discussions with relevant stakeholders.
- 8.34.24 Each access point to the Local Road Network by any access road or track used by the Project will be inspected. These inspections shall take place before first use, regularly during use and following final use, to ensure that the surface of the highway altered for the Project remains in good repair and safe for the public traffic using the highway. Any repairs that are required to maintain the altered highway throughout the construction period will be carried out in a timely manner.
- 8.34.25 Regular inspections will be carried out in all locations where the works corridor passes over a public highway, private road, or PRow. These will be recorded, and remedial action will be taken to remove any dirt and debris resulting from construction operations. Any damage to the surface will be scheduled for repair at the earliest opportunity.
- 8.34.26 The haul road will be surveyed weekly to ensure its integrity is maintained and any remedial work completed as necessary.

- 8.34.27 When leaving the CDM construction site, all vehicles exiting the site either via the A40 or B4632 will be checked and cleaned if required prior to using the Local Road Network. If required, a road sweeper will be utilised to further ensure that the Local Road Network remains safe and clear of debris.
- 8.34.28 It is expected that all tippers importing or removing loose material will be covered if required and it is the responsibility of the Traffic Marshall to ensure vehicles do not leave site without the appropriate covers. Any vehicles arriving to site without appropriate covers will be reported immediately to ensure the supplier is informed and appropriate action taken.
- 8.34.29 Vehicles dedicated to the Project long term, i.e. staff cars, Site Supervisor commercial LGVs, will also be inducted and their registrations stored on record.
- 8.34.30 If the public have any issues with the vehicles travelling to/from Site, they will be able to report this to a free phone line, which will then be investigated.
- 8.34.31 Safe pedestrian access routes between car parking locations, access points, work areas, site offices and welfare facilities will be provided within the car park, laydown areas and compounds, where possible. Pedestrian access along the haul road will not generally be permitted, though all personnel will be afforded PPE and all construction vehicle drivers will be instructed to travel no more than 15 mph along the haul road. Where pedestrian and vehicle routes interact, appropriate crossing points and segregation will be provided.
- 8.34.32 Pedestrians accessing the construction compounds and other work areas are always required to wear the mandatory PPE.
- 8.34.33 There is no intention in providing a remote HGV holding area, therefore a vehicle call up procedure is not required.
- 8.34.34 Information packs will be provided to all contractors, which will form part of the contractual agreement between the contractors and NGET. The information pack may contain the details of the following CTMP requirements:
- 8.34.34.1 Site induction;
 - 8.34.34.2 HGV restrictions;
 - 8.34.34.3 Construction routes;
 - 8.34.34.4 Non-compliance guidance;
 - 8.34.34.5 Complaints procedure;
 - 8.34.34.6 CTMP protocols and indications required for all contractors including a code of good practice;
 - 8.34.34.7 Guidance on standard communication procedures between contractors and site; and
 - 8.34.34.8 CTMP contacts (emergency and non-emergency).

- 8.34.35 Information packs and communications details will be shared with relevant Local Planning Authorities (LPAs) and LHAs ahead of any construction works.
- 8.34.36 The construction personnel numbers are not expected to exceed one hundred personnel on-site at any one time. In addition, the remote work areas and varied work activities may make it impracticable for construction teams to commute to site other than in a van or LGV. Therefore, it is not considered necessary to produce a travel plan for the Project.
- 8.34.37 Notwithstanding the above, if deemed possible and appropriate, construction teams would be transported to the site from local accommodation or agreed pick-up points in personnel transport vans. These vans will only be parked on site within the defined working areas, and only while construction staff are on site during work hours. Outside of working hours there will be no parking of personnel vans on site.
- 8.34.38 Discussions will be held with the LHA to discuss potential mitigation for scheduled events which are anticipated to generate an increase in the typical daily traffic flows such as Gold Cup Week. Temporary measures may be necessary for the duration of the event(s).

The CEMP

- 8.35 The purpose of the Outline CEMP is to develop, maintain, implement, monitor and improve environmental control procedures in accordance with the relevant legal and regulatory requirements, contract specification and the relevant Contractor Business Management System complying with ISO 14001:2015. The Main Contractor will take on the responsibility of developing and implementing the requirements of this document.
- 8.36 The objectives of the CEMP are to:
 - 8.36.1 Provide a mechanism for ensuring the delivery of mitigation measures, to reduce environmental effects identified in the environmental assessment phase;
 - 8.36.2 Ensure compliance with legislation and identify where it will be necessary to obtain authorisation from relevant statutory bodies;
 - 8.36.3 Provide a framework for compliance auditing and inspection to ensure the agreed environmental aims are being met; and
 - 8.36.4 Ensure a prompt response to any non-compliance with legislative and planning conditions, including reporting, remediation and any additional mitigation measures required to prevent a recurrence.
- 8.37 The Outline CEMP will be updated to the final CEMP by the Main Contractor and will incorporate the requirements included within the planning conditions, any changes that are required to mitigation and/or control measures, once detailed design and construction methodology information is defined and will include all relevant licences. All contractors delivering the Project will be required to comply with the requirements of the CEMP as well as the prevailing environmental legislation.
- 8.38 The Outline CEMP references the consents, permits and licences that will be required during construction based on the information available to date. A Consents Register will be maintained by the Main Contractor which will document all existing consent conditions, record all new applications made and the status of the applications as well as any specific conditions associated

with the consents and licences once they are secured. The Main Contractor will programme time to obtain all required consents and licences. Any conditions included in consents/licences/permits will be documented and considered as part of the planning, design and construction process.

- 8.39 Specific environmental targets and objectives will be developed and agreed between the Client and the Main Contractor. These should include environmental, social and sustainability targets and key performance indicators (“**KPIs**”), such as targets for re-using and recycling waste on site. The final CEMP will include information on targets and objectives set for the project during construction.
- 8.40 The Main Contractor should set out in the final CEMP an audit plan for reviewing compliance with requirements of the final CEMP. The implementation of the CEMP should be audited at six-monthly intervals (as a minimum) during the construction period. Records of these audits should be documented and maintained throughout the duration of the project.
- 8.41 A regular report will be produced recording the monitoring results. The report will record monitoring results, highlight any exceedances above pre-determined trigger levels and record any actions that were taken. The report will also record any complaints that were received and how these were dealt with.
- 8.42 The Main Contractor will report its environmental performance internally regularly using a project reporting dashboard or similar summarising the required monitored aspects. In addition, regular project reviews will be scheduled with the Client.
- 8.43 Work areas will be inspected regularly by members of the site team and monthly during Health and Safety advisor visits. Completed inspections will be reviewed by the Construction Manager with follow-up actions addressed and checked during subsequent inspections.
- 8.44 During the works, required monitoring will be detailed in the final CEMP and include as a minimum:
 - 8.44.1 Routine inspections;
 - 8.44.2 Monitoring for noise and vibration;
 - 8.44.3 Dust monitoring on-site and off-site;
 - 8.44.4 Supervision for vegetation clearance;
 - 8.44.5 Water usage;
 - 8.44.6 Environmental incidents;
 - 8.44.7 Communication and complaints;
 - 8.44.8 Waste and excavated material arisings, reuse on site, disposal, materials recycled content;
 - 8.44.9 Project energy consumption;
 - 8.44.10 Sub-contractor and supplier location;
 - 8.44.11 Construction traffic; and

- 8.44.12 Biodiversity Net Gain.
- 8.45 Arrangements will be put in place to investigate and provide reports on any potential or actual significant pollution incidents, including, as appropriate:
- 8.45.1 A description of the pollution incident, including its location (and OS grid reference), the type and quantity of contaminant and the likely receptors;
 - 8.45.2 Contributory causes;
 - 8.45.3 Adverse effects;
 - 8.45.4 Measures implemented to mitigate adverse effects; and
 - 8.45.5 Any recommendations to reduce the risk of incidents occurring.
- 8.46 The implementation of the final CEMP will be audited during the construction period. The audit programme and review process will be documented within the final CEMP.
- 8.46.1 Control procedures required within the final CEMP will be recorded on a Non-Conformance Report. Corrective actions will be implemented to ensure that future non-conformance does not occur.
 - 8.46.2 Two registers will be set up in the final CEMP as follows:
 - 8.46.2.1 A Non-Conformance & Corrective Action Register (which forms part of the Quality Procedures and is not exclusively for environmental issues); and
 - 8.46.2.2 An Environmental Incidents Register.
- 8.47 Delivery of the CEMP will be undertaken utilising construction environmental management personnel and where required, supplemented by technical specialists (such as noise and vibration specialists and ecologists). The CEMP would be prepared based on NGET's and the contractor's Environmental Management System. Any specific requirements, such as management measures, or the need for additional strategies or plans detailed in the environmental assessments would be brought forward into the CEMP.
- 8.48 The final CEMP would be submitted to the relevant Local Planning Authorities for review and approval. Pre-application meetings would be held with the planning officers to provide background to the document (and other documents requiring approval). A programme of submission will also be provided so that time can be allocated for review. Upon review, the contractor would update the document based on LPAs' comments and resubmit the document. Once accepted, an approval letter would be provided by the LPAs.
- 8.49 The Main Contractor would integrate the requirements of the CEMP into the construction programme and allow time for elements such as pre-construction ecology surveys. The Main Contractor would implement the mitigation requirements prior to and during construction and undertake monitoring requirements as works progress. Any incidents or non-compliances would be investigated and reported as required. Regular inspections would be undertaken and actions issued for resolution. The final CEMP would be a live document and would be reviewed and updated regularly for the works being undertaken.

9. COMPLIANCE WITH ENVIRONMENTAL LEGISLATION AND POLICY

- 9.1 An overview of the environmental planning conditions attached to the CSEC planning permissions and how compliance will likely be sought to be achieved is outlined below. The Main Contractor, to be appointed by NGET, will be responsible for complying with the planning conditions, in line with NGET's contract requirements. The planning condition reference numbers are provided.

Northern CSEC

- 9.2 3) Prior to commencement of the development, details of a construction management plan shall be submitted to and approved in writing by the LPA. The approved plan shall be adhered to throughout the demolition/construction period, including the proposed escort by banksman of any large vehicles using the Northern Access Route.

9.2.1 The construction management plan will be prepared and submitted by the Main Contractor for agreement with the LPA. The requirement for a proposed escort will be included in the plan and implemented on site. Traffic-related mitigation will also be included in the CEMP and CTMP. Copies would be kept in the site office to ensure all contractors have it available to refer to during the works.

- 9.3 7) Prior to the commencement of any works on-site, a Construction and Ecological Management Plan (CEMP) shall be submitted to and approved in writing by the LPA. The CEMP is to follow recommendations to protect wildlife during the construction phase made within the submitted ecology reports. The CEMP should include detailed mitigation for ecological features, particularly retained woodland/hedgerow/trees.

9.3.1 A CEMP will be prepared and submitted by the Main Contractor for agreement with the LPA, including detailed mitigation for ecological features. The CEMP will also detail requirements for induction and training. All staff will undergo induction and training which will cover the key requirements of environmental mitigation, including ecology. Specific training related to ecological mitigation will also be undertaken and targeted to relevant staff. Inductions and training will be logged in site records. Copies would be kept in the site office to ensure all contractors have it available to refer to during the works.

- 9.4 8) Prior to commencement of any works on-site, a preconstruction survey for otters/holts, badgers/setts and trees with barn owl roost potential shall be submitted to and approved in writing by the LPA. If nesting barn owls, holts/new setts be found and/or the outlying setts become active, then appropriate mitigation and licensing should be undertaken, with a badger/otter/barn owl report submitted to the LPA for review.

9.4.1 Pre-construction ecology surveys for the species mentioned will be planned and programmed by the Main Contractor in advance of the works and will be submitted for approval from the LPA. Appropriate mitigation and licensing would be undertaken where required. Pre-construction surveys for other species, as considered necessary, would also be undertaken. The CEMP will detail pre-construction requirements to be undertaken including surveys and implementation of mitigation measures where required.

- 9.5 9) The development shall not be brought into use until a Landscape and Ecological Management Plan (LEMP) is submitted to and approved in writing by the Local Planning Authority.

- 9.5.1 The Preliminary LEMP submitted as part of the planning applications will be developed by the Main Contractor and submitted for agreement with the LPA prior to the development being brought into use.
- 9.6 10) Prior to the installation of any external lighting for the development, details of the lightings shall be submitted to and approved by the LPA. This lighting scheme shall show contour plans highlighting lux levels, specifically when spilling onto adjacent/important habitats for wildlife.
- 9.6.1 Details of lighting shall be prepared and submitted by the Main Contractor for agreement with the LPA in line with the requirements specified in this condition.
- 9.7 11) No development shall take place except in accordance with the terms and conditions of the Council's Organisational Licence (WML-OR138, or a 'Further Licence') and with the proposals detailed on plan "Land At Part Parcel 0006: Impact plan for great crested newt District Licensing (Version 2)", dated 5th February 2025.
- 9.7.1 The works will comply with the terms of the Organisational Licence (or Further Licence), Section 15 of the National Planning Policy Framework, Circular 06/2005 and the Natural Environment and Rural Communities Act 2006. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works. Compliance inspections and audits will be undertaken against licences and requirements, the frequency of which will be detailed within the CEMP.
- 9.8 12) No development shall take place unless and until a certificate from the Delivery Partner (as set out in the District Licence WML-OR138, or a 'Further Licence'), confirming that all necessary measures regarding great crested newt compensation have been appropriately dealt with, has been submitted to and approved by the planning authority and the authority has provided authorisation for the development to proceed under the district newt licence. The delivery partner certificate must be submitted to this planning authority for approval prior to the commencement of the development.
- 9.8.1 The Main Contractor will implement all necessary measures required by the GCN District Licence (or Further Licence) and submit the certificate for approval from the LPA prior to commencement of the works. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works. Staff working in high risk works areas will be briefed on the requirements of the GCN District Licence (or Further Licence).
- 9.9 13) No development hereby permitted shall take place except in accordance with Part 1 of the Great Crested Newt Mitigation Principles, as set out in the District Licence (WML-OR138, or a 'Further Licence').
- 9.9.1 The works will be undertaken in accordance with Part 1 of the GCN Mitigation Principles as set out in the District Licence (or a Further Licence), including the requirements specified in the condition. The Main Contractor will be responsible for undertaking the works in compliance with the condition and will programme works such that they comply with the periods stated within the licence. Works which will affect likely newt hibernacula will only be undertaken during the active period for amphibians. Capture methods will be used at suitable habitat features prior to the commencement of the development (i.e., hand/destructive/night searches), which may include the use of temporary amphibian fencing, to prevent newts moving onto the development site from adjacent suitable habitat, installed for the period of the development and removed upon completion of the development. Amphibian fencing and pitfall trapping will be undertaken at suitable

habitats and features, prior to commencement of the development. Staff will be briefed on the requirements of environmental controls, including that these should not be removed or tampered with. Where relevant, environmental control signage will be installed.

- 9.10 14) No below or above ground development shall commence until a detailed site waste management plan (SWMP) or equivalent has been submitted to and approved in writing by the LPA.

9.10.1 The Main Contractor will prepare and submit a detailed SWMP for agreement with the LPA, including the requirements listed in the condition. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works. The SWMP will follow the protocols within the CL:AIRE Definition of Waste: Development Industry Code of Practice) and will be implemented to ensure that excavated materials are re-used appropriately, sustainably and remain legitimately outside the waste hierarchy. Where soils stripped during the construction phase will not be reinstated, they will be removed off-site in accordance with measures which would be set out in the SWMP. All works will be conducted in accordance with relevant HSE publications Construction (Design and Management) (CDM 2015) Regulations. The requirements of the SWMP will be briefed in the site induction, and training for specific personnel will also be undertaken.

- 9.11 15) A 30-year Habitat Management and Monitoring Plan (HMMP) shall be submitted to, and approved in writing by, the LPA prior to any above ground works of the development hereby approved being undertaken. The plan shall be prepared in accordance with the Biodiversity Gain Plan.

9.11.1 A HMMP will be prepared and submitted by the Main Contractor for agreement with the LPA, in accordance with the BNG Assessment and the requirements of this condition. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works.

- 9.12 16) No development shall commence on site until a detailed design, maintenance and management strategy and timetable of implementation for a surface water drainage strategy has been submitted to and approved in writing by the LPA. The detail must demonstrate the technical feasibility/viability of the drainage system through the use of SuDS to manage the flood risk to the site and elsewhere and the measures taken to manage the water quality for the life time of the development. The scheme for the surface water drainage shall be carried out in accordance with the approved details before the development is first put in to use/occupied.

9.12.1 The Main Contractor will prepare and submit a detailed design, maintenance and management strategy and timetable of implementation for a surface water drainage strategy, for agreement with the LPA. This will comply with the requirements of this condition.

- 9.13 17) No development shall be brought in to use/occupied until a SuDS management and maintenance plan for the lifetime of the development which shall include the arrangements for adoption by any public authority or statutory undertaker or Management Company and any other arrangements to secure the operation of the scheme throughout its lifetime, has been submitted to and approved in writing by the LPA. The approved SUDS maintenance plan shall be implemented in full in accordance with the agreed terms and conditions.

- 9.13.1 The Main Contractor will prepare and submit a SuDS management and maintenance plan for agreement with the LPA. This will comply with the requirements of this condition.
- 9.14 18) The development shall not be brought into use until details of the size and species of planting have been submitted to and approved in writing by the LPA.
- 9.14.1 A comprehensive landscape scheme will be prepared and submitted by the Main Contractor for agreement with the LPA, including the details of size and species of planting, a phasing plan/timescales and taking into account the information in the planning application reports.
- 9.15 19) Prior to commencement of any development a Construction (and demolition) Environmental Management Plan (CEMP) shall be submitted to and approved in writing by the Local Planning Authority.
- 9.15.1 A CEMP will be prepared and submitted by the Main Contractor for agreement with the LPA, including the information listed in the condition. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works.
- 9.16 20) During the construction phase (including demolition and preparatory groundworks), no machinery shall be operated, no process shall be carried out and no deliveries shall be taken at or dispatched from the site outside the following times: Monday-Friday 8.00 am-6.00pm, Saturday 8.00 am-1.00 pm nor at any time on Sundays, Bank or Public Holidays, unless agreed in writing with the LPA.
- 9.16.1 The Main Contractor will comply with the requirements of this condition. If works are required outside of these hours, this will be agreed with the LPA in advance. Working hours will be stipulated within the CEMP and briefed in the site induction. Working hours will also be stipulated in procurement packs and specify that deliveries must be undertaken during the hours as stipulated by this condition, unless otherwise agreed with the LPA in advance.
- 9.17 21) No development including demolition, site clearance, materials delivery or erection of site buildings, shall start on the site until measures to protect trees/hedgerows on and adjacent to the site have been installed in accordance with details that have been submitted to and approved in writing by the LPA.
- 9.17.1 The Main Contractor will prepare and submit tree/hedgerow protection measures for agreement with the LPA prior to commencement of the works. The mitigation measures contained within the Arboricultural Impact Assessment submitted as part of the planning application will be updated in line with the detailed design as required. The works will be undertaken in line with the approved details and BS 5837: 2012. Environmental controls will be installed prior to construction including demolition, site clearance, materials delivery or erection of site buildings and this will be detailed within the CEMP.
- 9.18 22) Where excavations or surface treatments are proposed within the root protection areas (RPA) of retained trees and hedgerows, full details shall be submitted to and approved in writing by the LPA before any development starts. Details shall include the proposed locations of excavations and/or surface treatments, proposed methods & specifications of excavations and/or surface treatments and any post excavation remedial works. All excavations or surface treatments shall be carried out in accordance with the approved details.

- 9.18.1 The Main Contractor will prepare and submit details of excavations or surface treatments proposed within the RPA of retained trees and hedgerows for agreement with the LPA prior to commencement of the works. The information contained within the Arboricultural Impact Assessment submitted as part of the planning application will be updated in line with the detailed design as required. The works will be undertaken in line with the approved details and BS 5837: 2012.

Southern CSEC

- 9.19 3) A comprehensive landscape scheme to be approved in writing by the LPA, prior to the first use of the development.
- 9.19.1 A comprehensive landscape scheme will be prepared and submitted by the Main Contractor for agreement with the LPA, taking into account the information in the planning application reports.
- 9.20 4) The entire landscaping scheme is to be completed by the end of the first full planting season (1st October to 31st March the following year) following first use of the development.
- 9.20.1 This requirement will form part of the landscaping contract and will be planned and programmed by the Main Contractor.
- 9.21 5) Any trees or plants shown on the approved landscaping scheme to be planted or retained which die, are removed, are damaged or become diseased, or grassed areas which become eroded or damaged, within 5 years of the completion of the approved landscaping scheme, shall be replaced by the end of the next planting season.
- 9.21.1 The landscaping contract will include requirements for replacement planting in line with this condition.
- 9.22 6) No development shall take place (including demolition, ground works and vegetation clearance) until a Construction Environmental Management Plan – Biodiversity (CEMP-B) has been submitted to and approved in writing by the LPA.
- 9.22.1 This will be prepared and submitted by the Main Contractor for agreement with the LPA, taking into account the information in the planning application reports. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works and induction training undertaken for all staff.
- 9.23 7) A 30-year Habitat Management and Monitoring Plan (HMMP) is to be submitted to, and approved in writing by, the LPA prior to above ground works.
- 9.23.1 A HMMP will be prepared and submitted by the Main Contractor for agreement with the LPA. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works.
- 9.24 9) No development shall take place until the implementation of a programme of archaeological work has been secured in accordance with a written scheme of investigation which has been approved in writing by the LPA.
- 9.24.1 A programme of archaeological work with a written scheme of investigation will be prepared and submitted by the Main Contractor for agreement with the LPA, and the works planned and programmed before main construction starts.

- 9.25 10) No development shall take place except in accordance with the terms and conditions of the Council's Organisational Licence (WML-OR138, or a 'Further Licence') and with the proposals detailed on plan "Land To The South Of Ham Road: Impact plan for great crested newt District Licensing (Version 1)", dated 25th February 2025.
- 9.25.1 The works will comply with the terms of the Organisational Licence (or Further Licence), Section 15 of the National Planning Policy Framework, Circular 06/2005 and the Natural Environment and Rural Communities Act 2006. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works.
- 9.26 11) No development shall take place unless and until a certificate from the Delivery Partner (as set out in the District Licence WML-OR138, or a 'Further Licence'), confirming that all necessary measures regarding great crested newt compensation have been appropriately dealt with, has been approved by the LPA and the authority has provided authorisation for the development to proceed under the district newt licence.
- 9.26.1 The Main Contractor will implement all necessary measures required by the GCN District Licence (or Further Licence) and submit the certificate for approval from the LPA prior to commencement of the works. A copy would be kept in the site office to ensure all contractors have it available to refer to during the works.
- 9.27 Relevant environmental legislation will be complied with, including habitat protection, pollution control and waste management requirements. All contractors delivering the project will be required to comply with the requirements of the CEMP as well as the prevailing environmental legislation and authorisation will be obtained from the relevant statutory bodies where required.
- 9.28 The Construction Environmental Manager will be responsible for ensuring the project complies with all environmental legislation, consents, objectives, targets and other environmental commitments. The final CEMP, to be developed by the Main Contractor, will include the most up to date legal and other environmental obligations relevant to the construction activities on site. Specific environmental targets and objectives will be developed and agreed between NGET and the Main Contractor. The final CEMP will include information on targets and objectives set for the Project during construction.
- The CEMP would also detail emergency response procedures and management measures with respect to storage and handling of hazardous substances. It would also detail an inspection and monitoring regime where required, including regular site inspections to check environment controls and activities. Training in relation to the CEMP would be undertaken and would include the use of tool box talks and on-site spill response training where required.
- 9.29 Industry best practice and environmental standards including British Standards for noise and vibration control will be complied with, including BS5228 Code of practice for noise and vibration control on construction and open sites. Best practicable means (BPM) would be utilised at all times on site and monitoring would be undertaken to demonstrate compliance with established limits where agreed. BPM to be employed would include, for example, shutting down idling machinery when not in use and using plant which are 'sound reduced' models or fitted with acoustic linings, mufflers or silencers where required. Dust would be minimised as far as is practicable, including use of dust suppression techniques and re-vegetating exposed ground as soon as possible. At construction compounds, materials would be stored in accordance with best practice and the compounds would have suitable surface water drainage provision, preventing pollution of the water environment. Further information on

environmental protection and mitigation measures during construction is provided in the Outline CEMP (**CD B13**).

10. RESPONSE TO OBJECTIONS

- 10.1 A total of 7 objections were initially made to the Order (**CD C5 to C11**), but 3 objections have since been withdrawn. NGET's Statement of Case (**CD C4**) and the evidence of Mr Dominic Rees outlines the relevant objections still remaining at the time of writing, NGET's response to them, and the status of negotiations.
- 10.2 I have summarised the objections below to the extent that they relate to my evidence and provided my response to them beneath the summary.

Mr Jonathan Morton Stanley and Corinium Construction Limited (**CD C7**)

- 10.3 The objection raises concerns about noise, pollution, vibration and construction traffic arising from the Project, requesting binding limitations and monitoring systems. Concerns are also raised about the standard and quality of works proposed by NGET. As explained in the evidence of Mr Juan Murray, the Outline CEMP submitted as part of the planning applications is an outline document, at the appropriate level of detail required at the planning application stage of the Project, which will be developed by the Main Contractor, once appointed by NGET, into a final (detailed) CEMP, once detailed design and construction methodology details are defined. The final CEMP is secured through the planning conditions and will be submitted to the relevant Local Planning Authority for approval. All construction activities will be carried out in strict accordance with the final CEMP which will detail the standard and quality of works to be undertaken. Compliance with the final CEMP will be monitored during construction. The comprehensive mitigation measures outlined in section 8 above will be implemented, including:
- 10.3.1 Strict adherence to construction noise limits set out in BS5228;
 - 10.3.2 Implementation of Best Practicable Means for noise and vibration control;
 - 10.3.3 Comprehensive dust management including monitoring and complaint response systems;
 - 10.3.4 Regular monitoring for noise, vibration, dust, and environmental incidents; and
 - 10.3.5 Community engagement and communication procedures.
- 10.4 The objection requests expert reports on noise, pollution and vibration impacts. Expert reports have been prepared and were submitted with the planning applications, including the Construction Dust Assessments (**CD B31, CD B32**) in line with the IAQM guidance on Land-Use Planning and Development Control: Planning for Air Quality v1.2 (2017) and Guidance on the Assessment of Dust from Demolition and Construction v2.2 (2024) and the Construction Noise Impact Assessments (**CD B20, CD B21**) in line with guidance in BS 5228:2009+A1:2014 Code of practice for noise and vibration control on construction and open sites – Part 1: Noise. (BS 5228-1).
- 10.5 For the southern CSEC planning application, the construction works are sufficiently distant from noise sensitive receptors that the daytime BS 5228-1 threshold values will not be exceeded. As mentioned in section 7 above, the noisiest construction activities are calculated to be associated with construction of the CSEC itself. For daytime works, potentially significant

effects may occur within 125 m of the works, however, the closest noise sensitive receptor is Wood Farm 440 m away. No significant adverse effects are therefore predicted for any construction activities associated with the CSEC. It has also been assumed for the purpose of the calculations, that all plant will be stationary and located on the activity boundary at the closest point to the noise sensitive receptors for a worst-case assessment, however, in reality, plant will be spread out across the CSEC site, meaning the impact would be less. The works will be temporary in nature and noise impacts will be temporary.

- 10.6 The remainder of the Project works will be temporary in nature, as such, noise impacts will be temporary. The final CEMP will include any additional suitable mitigation measures required once further details are defined in relation to the detailed design and construction methodology. To the extent that such measures referenced in the Statement of Case are considered necessary and proportionate based on the detailed design and site-specific conditions, they will be included in the CEMP. It is considered that not all of the measures proposed by the objector are necessary and proportionate based on the information available to date, however this will ultimately be a matter resolved by the LPA when they come to give final approval of the CEMP.
- 10.7 Vibration effects from the construction works were scoped out of the assessment. Potential sources of vibration from the works include construction traffic on access and haul roads, digging and drilling works. Vibration levels from these sources would be considered negligible at 30 m from the works⁵ and all site works are at least 70 m from vibration sensitive receptors, as such a vibration assessment was not required.
- 10.8 The Construction Dust Assessment for the southern CSEC (**CD B31**) concluded that at the receptors identified nearby, there is a low risk of dust soiling and impacts on human health as a result of earthworks and trackout, and a negligible risk of dust effects due to construction, in line with the IAQM guidance. It was concluded that with the proposed mitigation measures implemented (as mentioned above in section 8, and as identified in the Construction Dust Assessment and the Outline CEMP (**CD B13**), the residual effect from all dust generating activities is assessed to be not significant. Dust will be minimised as far as is practicable on site. As mentioned above, a Dust Management Plan will be developed, approved by the Local Planning Authority and implemented on site, including regular on-site and off-site inspection where receptors are nearby. The requirement for further measures will be confirmed once further details are defined in relation to the detailed design and construction methodology and will ultimately be a matter resolved by the LPA when they come to give final approval of the CEMP.
- 10.9 The Outline CEMP (**CD B13**) addresses dust, noise, vibration and pollution concerns through detailed mitigation measures and monitoring requirements where required that will be implemented through the final CEMP as a planning condition, as outlined above. The objectives of the CEMP are to provide a mechanism for ensuring the delivery of mitigation measures, to reduce environmental effects identified in the environmental assessment phase, ensure compliance with legislation and identify where it will be necessary to obtain authorisation from relevant statutory bodies, provide a framework for compliance auditing and inspection to ensure the agreed environmental aims are being met, and ensure a prompt response

⁵ Historic case studies of tunnelling vibration within BS 5228:2009+A1:2014 Code of practice for noise and vibration control on construction and open sites – Part 2: Vibration (BS 5228-2) (Reference 103 in Table D.6) show that vibration levels from auguring results in a peak particle velocity (PPV) of 0.02 mm/s at a distance of 30 meters. According to the criteria within BS 5228-2, a PPV value of 0.02 mm/s would have a negligible impact on residential receptors.

to any non-compliance with legislative and planning conditions, including reporting, remediation and any additional mitigation measures required. All contractors delivering the Project will be required to comply with the requirements of the CEMP and it will be a live document which is regularly updated.

- 10.10 The Statement of Case (**CD E1**) references a Soil Management Plan - as mentioned in section 8 above, a detailed Soil Management Plan for the Project will be produced pre-construction once the Project design has been finalised. The Soil Management Plan, which will form part of the final CEMP, will detail the soil characteristics across the construction footprint (based on the Agricultural Land Classification report) and detail how the soil resources will be stripped, stockpiled, and re-used. As mentioned in the evidence of Dave Rogerson, segregated storage of different soil types will be implemented on site, with topsoil and subsoil kept in separate bunds to prevent cross-contamination and enable proper land reinstatement. Following cable installation completion, the ground will be returned to its previous use, with haul roads removed, top soil returned and any post construction drainage installed. Section 8 above provides further details of soil management and reinstatement.
- 10.11 The Statement of Case also suggests other measures for implementation during construction. The Outline CEMP outlines the construction mitigation measures considered appropriate at the planning application stage, based on the design information available at the time. The details in the final CEMP will be developed by the Main Contractor, in liaison with NGET, and submitted to the relevant Local Planning Authority for approval before construction. Where additional measures are identified as required once detailed design and construction methodology information is defined, these would be included in the final CEMP. To the extent that such measures referenced in the Statement of Case are considered necessary and proportionate based on the detailed design and site-specific conditions, they will be included in the CEMP. It is considered that not all of the measures proposed by the objector are necessary and proportionate based on the information available to date, however this will ultimately be a matter resolved by the LPA when they come to give final approval of the CEMP.

RH Barnes and Sons (CD C9)

- 10.12 This objection raises concerns about noise, dust, pollution and vibration impacts from the haul road and construction activities, particularly effects on agricultural operations, holiday accommodation and commercial shoot businesses.
- 10.13 The environmental impacts will be managed through the comprehensive measures set out in the Outline CEMP, including:
- 10.13.1 Restricted working hours to minimise disruption;
 - 10.13.2 Speed limits on haul roads to reduce dust and noise;
 - 10.13.3 Regular monitoring and complaint response procedures;
 - 10.13.4 Dust suppression measures including road sweeping and wheel washing;
 - 10.13.5 Construction of haul road with appropriate surface materials where required; and
 - 10.13.6 Environmental monitoring by qualified specialists.
- 10.14 The objection requests specific mitigation measures including Tarmac surfacing of haul road sections, speed limits, working hours restrictions, dust spraying, mud clearance, expert monitoring, and tree screening. Many of these measures are incorporated within the OCEMP

mitigation requirements, and NGET has confirmed willingness to consider additional mitigation works where appropriate. This is covered in the evidence of Mr Amardeep Malhi.

- 10.15 The objection requests experts in noise, dust, pollution and vibration to provide analysis of the effect of the haul road upon Whalley Farm. The Outline CEMP outlines the construction mitigation measures considered appropriate for the Project, in order to adequately mitigate for construction impacts, based on the design information available at the time. The details in the final CEMP will be developed by the Main Contractor, in liaison with NGET, and submitted to the relevant Local Planning Authority for approval before construction. Where additional measures are identified as required once detailed design and construction methodology information is defined, these would be included in the final CEMP. To the extent that such measures referenced in this objection are considered necessary and proportionate based on the detailed design and site-specific conditions, they will be included in the CEMP.
- 10.16 The objection requests further information on land reinstatement. As mentioned in section 8 above, a detailed Soil Management Plan for the Project will be produced pre-construction once the Project design has been finalised. The Soil Management Plan, which will form part of the final CEMP, will detail the soil characteristics across the construction footprint and detail how the soil resources will be stripped, stockpiled, and re-used. The details will be developed by the Main Contractor, in liaison with NGET, and submitted to the relevant Local Planning Authority for approval as part of the CEMP. Where additional measures are identified as required once detailed design and construction methodology information is defined, these would be included in the final CEMP.
- 10.17 As mentioned in the evidence of Mr Dave Rogerson, segregated storage of different soil types will be implemented on site, with topsoil and subsoil kept in separate bunds to prevent cross-contamination and enable proper land reinstatement. Following cable installation completion, the ground will be returned to its previous use, with haul roads removed, top soil returned and any post construction drainage installed. Section 8 above provides further details of soil management and reinstatement.

Mr Ivan Drake and Mrs Ann Drake (CD C10)

- 10.18 This objection requests detailed information about construction methodology, access track specification, drainage plans, soil stabilization methods, and cable dimensions.
- 10.19 The technical specifications requested are detailed in the evidence of Dave Rogerson. From an environmental perspective, these matters are addressed through:
- 10.19.1 A detailed Soil Management Plan to be developed as part of the final CEMP;
- 10.19.2 Pre-construction drainage surveys and post-construction reinstatement measures;
- 10.19.3 Environmental monitoring during construction and aftercare periods; and
- 10.19.4 Soil handling procedures to prevent cross-contamination and enable proper reinstatement.

11. SUMMARY AND CONCLUSIONS

- 11.1 My name is Nicky Lear and I am employed by Arcadis Consulting (UK) Ltd. I am a Technical Director and a Chartered Environmentalist (CEnv) with over 21 years' experience in

Environmental Impact Assessment (EIA). I am a Full Member of the Institution of Environmental Sciences (MIEnvSc).

- 11.2 As the Arcadis Environment Lead on the Project, I am responsible for co-ordinating multi-disciplinary inputs from the Arcadis environmental specialist teams commissioned on the Project (ecology, arboriculture, air quality, soils, water resources and flood risk, mining and minerals and transport). Arcadis were instructed by National Grid Electricity Transmission plc (NGET) in January 2023 to provide ecology support to inform the cable route alignment. Following this, Arcadis' environmental specialists prepared the Ecological Impact Assessments, Biodiversity Net Gain Assessments, Arboricultural Impact Assessments, Construction Dust Assessments, Water Resources Assessments, Flood Risk Assessments, Transport Statement, Mining Risk and Minerals Impact Assessments and Agricultural Land Classification (ALC) and Landholding Assessment Reports for the Cable Sealing End Compound (CSEC) planning applications.
- 11.3 The purpose of the Project is to underground a section of 400kV overhead electricity transmission lines, to mitigate the visual impact of existing electricity infrastructure through part of the Cotswolds National Landscape. NGET has considered environmental impacts throughout development of the Project and has aimed to minimise construction and operational impacts through careful routeing and siting and replacement planting. Mitigation has been considered throughout the design process and has been embedded into the Project design.
- 11.4 The alignment of the cable route minimises effects on ecology and existing vegetation where possible, avoiding many areas of woodland and minimising breaks in existing field boundary hedgerows, whilst also minimising the number of Public Right of Way (PRoW) crossings. At Breakheart Plantation, the alignment of the route has been modified to minimise the corridor width as far as practicable to minimise tree loss and avoid a straight route through the woodland to minimise wider visual impacts and impacts to bats. The curved alignment favours bat foraging and minimises wind effects through the woodland. The Project team have also sought to avoid the highest value compartments of the woodland and locate the route away from veteran and ancient trees, whilst routeing the cable in areas where trees have been found with signs of ash dieback. The corridor has also been narrowed as far as possible where crossing woodland to the west of Warren Farm to minimise tree loss and ecology impacts, and has been located at one of the narrowest points of the open access land and common land between Cleeve Common and West Down.
- 11.5 Mitigation measures during construction are outlined in the Outline Construction Environmental Management Plan (CEMP), which will be developed by the Main Contractor once appointed by NGET into a final (detailed) CEMP. The final CEMP is secured through the planning conditions and will be submitted to the relevant Local Planning Authority for approval. All construction activities will be carried out in strict accordance with the detailed final CEMP which will detail the standard and quality of works to be undertaken. Compliance with the final CEMP will be monitored during construction.
- 11.6 Formal requests for an EIA screening opinion were made to Cotswold District Council and Tewkesbury Borough Council, under Regulation 6 (1) of the Town and Country Planning (Environmental Impact Assessment) Regulations 2017 (as amended). As some elements of the Project (such as the temporary line diversions) require consent under the Electricity Act 1989 a formal request for an EIA screening opinion under Regulation 10 (1) of The Electricity Works (Environmental Impact Assessment) (England and Wales) Regulations 2017 was made to the Secretary of State. It was concluded that the Project will not be likely to have significant environmental effects having regard to its nature, size and location and is therefore considered not to be EIA development requiring the submission of an Environmental Statement.

- 11.7 A number of environmental assessments were undertaken and submitted to Cotswold District Council and Tewkesbury Borough Council as part of the CSEC planning application submissions, in line with the relevant legislation, planning policy and best practice guidance, including Ecological Impact Assessments, Biodiversity Net Gain Assessments, Arboricultural Impact Assessments, Construction Dust Assessments, Construction Noise Impact Assessments, Water Resources Assessments, Flood Risk Assessments, a Transport Statement, an Archaeological Statement, Mining Risk and Minerals Impact Assessments and ALC and Landholding Assessments.
- 11.8 Construction activities have the potential to affect ecological receptors without mitigation in place, however, the Ecological Impact Assessments (**CD B18, CD B19**) conclude that with mitigation measures in place, the works will result in no significant negative residual effects. Mitigation measures include pollution control measures (as outlined in the Outline CEMP (**CD B13**)), implementation of the Landscape and Ecological Management Plans (LEMPs) (**CD B14, CD B15**), a replanting and landscape strategy, pre-construction surveys and vegetation clearance under ecological supervision. Landscape and visual effects are covered in the evidence of Ms Rebecca Greatrix.
- 11.9 The majority of vegetation will be retained and protected during the works where required. Of the vegetation that requires to be removed or partially removed to facilitate the Project, the majority has been identified as low quality. The arboricultural team has worked closely with the engineering team to minimise vegetation loss as much as possible across the Project. In order to offset the impact to visual public amenity associated with trees and hedgerows, a replacement strategy is proposed. A net gain in biodiversity will be delivered. Although national and local policy states that 10% Biodiversity Net Gain (BNG) is required, the Cotswold Nature Recovery Plan states that 20% BNG should be achieved within the Cotswold National Landscape. NGET has therefore committed to achieve 20% BNG for the CSECs.
- 11.10 Activities such as excavation, ground works, cutting, construction and storage of materials, have the potential to result in fugitive dust emissions throughout the construction phase. Vehicle movements both on-site and on the local road network also have the potential to result in the re-suspension of dust from highway surfaces. The potential for impacts at sensitive locations depends significantly on local meteorology during the undertaking of dust generating activities, with the most significant effects likely to occur during dry and windy conditions. The potential for dust impacts also depends significantly on the distance between the dust generating activity and receptor location. Risk was predicted based on a worst-case scenario of works being undertaken at the edge of the site boundary, therefore, actual risk is likely to be lower than that predicted during the majority of the construction phase. The construction dust assessments (**CD B31, CD B32**) concluded that with the proposed mitigation measures implemented (as identified in the construction dust assessments and the Outline CEMP (**CD B13**)), the residual effect from all dust generating activities is assessed to be not significant.
- 11.11 For the northern CSEC site, the noisiest construction activities are calculated to be associated with construction of the temporary access road. For daytime works, potentially significant effects may occur within 128 m of the works, however, the closest noise sensitive receptors are Corndean Cottages 170 m away. For the southern CSEC site, the noisiest construction activities are calculated to be associated with construction of the CSEC itself. For daytime works, potentially significant effects may occur within 125 m of the works, however, the closest noise sensitive receptor is Wood Farm 440 m away. No significant adverse effects are therefore predicted for any construction activities associated with the CSECs.
- 11.12 Vibration effects from the construction works were scoped out of the assessment. Potential sources of vibration from the works include construction traffic on access and haul roads,

digging and drilling works. Vibration levels from these sources would be considered negligible at 30 m from the works. All site works are at least 70 m from vibration sensitive receptors.

- 11.13 The ALC grade of the land within the northern CSEC planning application boundary comprises predominantly Grade 3b land. Grade 3a land was identified in the areas used to support access for the CSEC and do not comprise a permanent loss of land. The total area of Grade 3a (Best and Most Versatile (BMV)) land required temporarily is 0.7 ha and the total area of Grade 3b land which would be permanently lost is 3.1 ha. The agricultural landholdings are used for arable production and grazing with minimal associated infrastructure. The requirements for access to two landholdings for farming activities is infrequent and as such the sensitivity is considered to be low. One land holding requires reasonably frequent access to the land therefore the resulting sensitivity is considered to be moderate. The construction of the northern CSEC would result in a permanent land take of 1.8ha from one landholding. The rest of the land within the northern CSEC planning application boundary is only required temporarily as such the magnitude of impact is considered to be minor based on the area required and that there would not be any severance impacts. This would result in an overall slight impact for one landholding and neutral or slight impact for two landholdings which are all considered not significant.
- 11.14 The ALC grade of the land within the southern CSEC planning application boundary comprises Grade 3b across the entirety of the site which comprises a total of 1.9 ha of agricultural land. The permanent land loss is entirely non-BMV land. As two landholdings are used for sheep grazing there is limited associated infrastructure and access requirements are infrequent; therefore, the sensitivity is low. One landholding is used for both grazing and arable cropping and also has minimal associated infrastructure. However, there is a private water supply located within the site boundary. As such, the severance of this from the rest of the landholding will be investigated to ensure there is no long-term loss of this facility (in discussion with the landowner). The sensitivity of this landholding is therefore considered to be moderate. The Project would result in permanent land take of 3.3ha from one landholding. The rest of the land within the CSEC site boundary is only required temporarily; as such the magnitude of impact is considered to be minor based on the extent of land take and the replacement of the private water supply such that there are no permanent severance impacts. The overall impact on agricultural landholdings is slight and this is considered to be not significant.
- 11.15 The potential impacts of the Project on surface and groundwater receptors in the context of the baseline water environment was assessed. Following consideration of embedded design measures and implementation of good practice measures for both the construction and operational phases, the assessment determined that construction of the Project would result in no adverse impacts to the baseline water environment.
- 11.16 In relation to flood risk, the turning area at the CSECs and the permanent access/bellmouths are the only works that would result in a permanent increase in impermeable land area. Any new permanent land take at the CSECs would be drained in accordance with the planning policy requirements/local Sustainable Urban Drainage systems (SuDS) guidance of the Lead Local Flood Authority. All other sources of flooding assessed (fluvial, surface water and groundwater) are considered to pose a low risk to the Project. It is considered that, subject to the implementation of appropriate surface water management measures, the flood risk to the Project would be acceptable and the Project would not increase third party flood risk, thus satisfying the Exception Test in line with the National Planning Policy Framework requirement.
- 11.17 There were found to be no significant impacts to mineral resources within the planning application boundaries. Due to the CSEC sites being in a Mineral Consultation Area and a primary mineral resource area, approval from the Local Planning Authorities on the mineral resources assessment was required as part of the planning application process. The potential for

made ground to be encountered during excavations within the northern CSEC site was identified and the Wood Farm BritPit was identified to encroach within the southern CSEC site. No ground investigation data exists for this area and therefore, the potential constraints provided by this feature such as ground stability around the pit as well as the type of backfill material will be considered during detailed design.

- 11.18 In relation to construction phase impacts on archaeology, further evaluation trenches have been undertaken following preparation of the Archaeological Statement, to further inform the likely impacts of the Project and the pre-commencement or construction phase mitigation measures required, for agreement with Gloucestershire County Council Archaeology Service and Historic England. The highest risk areas that will need strip, map and record or an archaeological watching brief are to be identified. Construction phase impacts on built heritage will be temporary, related to visual impacts, and would not be considered likely to have a significant impact on built heritage assets.
- 11.19 The main traffic and transport related environmental effects would occur during the peak construction period in 2028. The assessment of the future 2028 baseline and traffic generated during construction identified that for the majority of roads, under a worst-case scenario, the increase in traffic on those roads that form the proposed construction routes would be below the thresholds at which effects on highway links are to be assessed as recommended by best practice guidance. For those below the threshold, the level of traffic generation during the construction of the Project would not have a material impact on the road network and the effects are considered unlikely to be significant. The predicted increase for 12-hour Heavy Goods Vehicle flows (between 07:00-19:00 hours) was found to exceed the threshold for sensitive roads on the B4075, the A44 and A424. The increase in traffic will be limited for the duration of the construction phase and was assessed to be a maximum of a 1.1% increase in total traffic from the baseline traffic on the B4075, a 3.3% increase from baseline on the A44 and a 5.2 % increase from baseline on the A424. Furthermore, appropriate control measures are proposed to reduce adverse effects from traffic associated with the Project, as such, the assessment determined that the predicted effects associated with construction traffic on the assessed links are unlikely to be significant.
- 11.20 In conclusion, the environmental assessment findings demonstrate that environmental effects can be appropriately managed through implementation of best practicable means, the mitigation measures identified and implementation of the final CEMP. The Project can therefore be delivered in compliance with environmental legislation and planning conditions whilst minimising environmental impacts.

12. WITNESS DECLARATION

- 12.1 I confirm that the evidence prepared for this Inquiry and contained within this statement of evidence are my true and professional opinions. I confirm that I have understood and complied with my duty to the Inquiry as an Expert Witness and have provided my evidence impartially and objectively. I confirm that I have no conflicts of interest.
- 12.2 I confirm that artificial intelligence has not been used to produce this statement of evidence.

A handwritten signature in black ink, appearing to be 'Nicky Lear', with a stylized 'N' and a long, sweeping underline.

NICKY LEAR

13 OCTOBER 2025

GLOSSARY OF TERMS

Term	Definition
"ALC"	Agricultural Land Classification
"AQMA"	Air Quality Management Area
"BPM"	Best Practicable Means
"BMV"	Best and Most Versatile Land (Grades 1, 2 and subgrade 3a under the Agricultural Land Classification system)
"BNG"	Biodiversity Net Gain
"BS"	British Standard
"CCTV"	Closed Circuit Television
"CDM 2015"	Construction (Design and Management) Regulations 2015
"CEMP"	Construction Environmental Management Plan
"CEnv"	Chartered Environmentalist
"CIRIA"	Construction Industry Research and information Association Report
"CSEC"	Cable Sealing End Compound
"CTMP"	Construction Traffic Management Plan
"ECow"	Ecological Clerk of Works
"EIA"	Environmental Impact Assessment
"FEED"	Front-End Engineering Design
"GCN"	Great Crested Newts
"HGV"	Heavy Goods Vehicle
"HMMP"	Habitat Management and Monitoring Plan
"HPIE"	Habitats of Principal Importance in England
"HSE"	Health and Safety Executive
"IAQM"	Institute of Air Quality Management
"IEMA"	Institute of Environmental Management and Assessment (now known as the Institute of Sustainability and Environmental Professionals (ISEP))
"KPI"	Key Performance Indicators
"LEMP"	Landscape and Ecological Management Plan
"LGV"	Light Goods Vehicle

Term	Definition
"LHA"	Local Highway Authority
"LPA"	Local Planning Authority
"LUC"	Land Use Consultants Ltd
"LVA"	Landscape and Visual Assessment
"MIEnvSc"	Member of the Institution of Environmental Sciences
"MMP"	Materials Management Plan
"MSA"	Mineral Safeguarding Area
"NGET"	National Grid Electricity Transmission Plc
"NPPF"	National Planning Policy Framework
"OCEMP"	Outline Construction Environmental Management Plan
"OS"	Ordnance Survey
"Planning Applications"	Applications for planning permission for the construction of the CSECs and provision of access tracks
"PPE"	Personal Protective Equipment
"PPG"	Planning Practice Guidance
"Project"	Cotswolds Visual Impact Provision Project
"PRoW"	Public Right of Way
"RPA"	Root Protection Area
"RPE"	Respiratory Protective Equipment
"SAC"	Special Area of Conservation
"Secretary of State"	Secretary of State for Energy, Security and Net Zero
"SMP"	Soil Management Plan
"SSSI"	Site of Special Scientific Interest
"SuDS"	Sustainable Urban Drainage System
"SWMP"	Site Waste Management Plan
"VIP"	Visual Impact Provision
"WFD"	Water Framework Directive