Partners in UK offshore wind

MONA OFFSHORE WIND PROJECT

Outline Arboriculture Method Statement

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Image of an offshore wind farm

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Prepared for:

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Contents

Appendices

Glossary

Term	Meaning
Arboricultural Consultant	Person who has, through relevant education, training and experience, gained recognised qualifications and expertise in the field of trees in relation to construction and has professional accreditations with the Arboricultural Association and/or the Institute of Chartered Foresters.
Arboricultural Impact Assessment (AIA)	Study, undertaken by an arboriculturist, to identify, evaluate and possibly mitigate the extent of direct and indirect impacts on existing trees that may arise as a result of the implementation of any site layout proposal.
Arboricultural Method Statement (AMS)	Methodology for the implementation of any aspect of development that has the potential to result in the loss of or damage to a tree. Note The AMS is likely to include details of an on-site tree protection monitoring regime.
Competent person	Person who has training and experience relevant to the matter being addressed and an understanding of the requirements of the particular task being approached • Note 1- A competent person understands the hazards and the methods to be implemented to eliminate or reduce the risks that can arise. For example, when on site, a competent person is able to recognise at all times whether it is safe to proceed. • Note 2 A competent person is able to advise on the best means by which the recommendations of this British Standard may be implemented.
Condition	Assessment based on a visual and professional view giving consideration to many factors such as tree health, structural integrity and suitability of its position.
Root Protection Area (RPA)	Layout design tool indicating the area surrounding a tree that contains sufficient rooting volume to ensure the survival of the tree, shown in plan form as a circle in m^2, and as a linear radius in m.
Tree protection plan	Scale drawing prepared by an arboriculturist showing the finalised layout proposals, tree retention and tree and landscape protection measures detailed within the AMS, which can be shown graphically. Outline tree protection plans are provided within Appendix C of the Tree Survey and AIA of the Environmental Statement (Document Reference F7.6.6.
Tree Retention Plan	A Development Consent Order (DCO) plan setting out the measures to be put in place to ensure the safety and long term viability of retained trees. This will include site-specific protection measures to be adhered to by the Principle Contractor(s) onsite in addition to the physical protection of trees during the construction phase

Acronyms

Acronym	Description
AIA	Arboricultural Impact Assessment
AMS	Arboriculture Method Statement
CEZ	Construction Exclusion Zones (where relating to trees and woodlands)
DCO	Development Consent Order
EIA	Environmental Impact Assessment
OLEMP	Outline Landscape & Ecology Management Plan
RPA	Root Protection Area

1 Outline Arboriculture Method Statement

1.1 Introduction

1.1.1.1 This Outline Arboriculture Method Statement (AMS) sets out the key management measures that will be implemented in relation to trees during the construction phase of the Mona Offshore Wind Project. The onshore elements comprise the:

- Landfall
- Onshore Cable Corridor
- Onshore Substation
- 400kV Grid Connection Cable Corridor.

1.1.1.2 In addition to these elements, the Outline Code of Construction Practice (CoCP) (Document Reference J26 F02) considers the temporary construction compounds, storage areas, accesses and mitigation areas required to support the construction of the Mona Offshore Wind Project.

1.1.1.3 The relevant planning authority for the landfall and the western section of the Onshore Cable Corridor (i.e. west of Bodelwyddan) is Conwy County Borough Council; the relevant planning authority for the eastern section of the Onshore Cable Corridor, the Onshore Substation and the 400kV Grid Connection Cable Corridor is Denbighshire County Council.

1.2 Purpose of the Outline Arboriculture Method Statement

1.2.1.1 The draft Development Consent Order (DCO) (Document Reference C1) includes a requirement for the preparation of a final CoCP. The final CoCP will be supported by a series of management plans including an Arboriculture Method Statement (as part of the final CoCP), which must be submitted to and approved by the relevant planning authority prior to the commencement of onshore works.

1.2.1.2 The purpose of this Outline AMS is to set out the measures that will be implemented for the protection and removal of trees during the construction of the onshore and intertidal elements of the Mona Offshore Wind Project to reduce impacts to trees (as far as possible).

1.2.1.3 This is an outline document based on the design set out in Volume 1, Chapter 3: Project Description of the Environmental Statement and includes measures that have been identified as part of the EIA process.

1.2.1.4 The Outline AMS should be read in conjunction with the Outline CoCP (Document Reference: J26 F02) and its supporting appendices. In addition, the following documents provide further information:

- Volume 7, Annex 6.6: Tree Survey and Arboricultural Impact Assessment (AIA) of the Environmental Statement
- Volume 3, Chapter 6: Landscape and visual resources of the Environmental Statement
- Volume 3, Chapter 3: Onshore ecology of the Environmental Statement.

1.3 Scope of the Outline Arboriculture Method Statement

1.3.1.1 The scope of this Outline Arboriculture Method Statement applies to the onshore site preparation works and construction activities of the Mona Offshore Wind Project located landward of MLWS. The Plan does not apply to activities associated with offshore works (i.e. seaward of MLWS).

1.3.1.2 Onshore site preparation works will be undertaken prior to the commencement of construction. These works will be undertaken in line with this Outline Arboriculture Method Statement as certified through the DCO.

1.3.1.3 The final Arboriculture Method Statement(s) will be in ~~general~~ accordance with the principles established in the Outline Arboriculture Method Statement and will be agreed with the relevant authority prior to commencing construction of the relevant stage of the onshore and intertidal works (above MLWS). For the purpose of this document the term 'construction' includes all related construction and restoration activities as authorised by the DCO within the Order Limits.

1.4 Final Arboriculture Method Statement

1.4.1.1 The final Arboriculture Method Statement will be prepared and agreed prior to start of construction. The method statement will contain the following:

- A detailed schedule and plan (tree removal and protection plan) of all trees and hedges to be removed, including maximum lengths of hedges to be removed.
- Locations and specification of tree protection fencing
- Locations and specification of ground protection (if required)
- Location and installation method of haul road
- Location of launch and reception pits, construction compound for directional drilling
- Timing of operations and schedule of arboricultural supervision and key sign-off milestones.

1.5 Tree survey and site access

1.5.1.1 The surveys were carried out in accordance with the requirements set out in BS 5837:2012 Trees in Relation to Design, Demolition and Construction – Recommendations (BSI Publication, 2012). The methodology and results of the survey are presented within Volume 7, Annex 6.6: Tree Survey and AIA of the Environmental Statement.

1.5.1.2 Due to access constraints, some areas within the Mona Onshore Development Area were not subject to ~~a~~the tree ~~survey~~surveys in 2023 & 2024. The areas not subject to survey are labelled on the tree survey plans (Document Reference F7.6.6, Appendix B). Tree and woodland positions in these areas have been reviewed using aerial mapping only. ~~Surveys of the remaining area were completed in July 2024.~~

1.5.1.3 Any trees within the O~~o~~rder limits that could not be surveyed either in 2023 or 2024, will be surveyed during detail design and prior to any works commencing. Any required protection for these currently un-surveyed areas will be detailed within the final Arboriculture Method Statement.

1.6 Roles and Responsibilities

1.6.1 Overview

1.6.1.1 The key roles and associated responsibilities with regard to this Outline Arboriculture Method Statement are set out below. The Construction (Design and Management) Regulations 2015 also identify the legal duties, responsibilities and obligations of all the major roles within the construction team.

1.6.1.2 The responsibilities of each role will be refined as necessary in the final Arboriculture Method Statement.

1.6.2 Applicant

1.6.2.1 The Applicant will be responsible for the following:

- Ensuring the Arboriculture Method Statement is implemented effectively
- Giving necessary direction to contractors (for example, setting contractual obligations)
- Reviewing, revising and refining the Arboriculture Method Statement (where necessary) in conjunction with the Principal Contractor.

1.6.3 Principal Contractor

1.6.3.1 The Principal Contractor will be appointed by the Applicant and has the overall responsibility for:

- Updating and delivering the final Arboriculture Method Statement on ~~behal~~behalf of the Applicant
- Ensuring all procedures in the Arboriculture Method Statement are followed
- Ensuring all contractors are suitably qualified and experienced in implementing the measure within the Arboriculture Method Statement
- Maintaining records relevant to the Arboriculture Method Statement.

1.6.4 Arboricultural Consultant

1.6.4.1 An Arboricultural Consultant will be responsible for ensuring that all retained trees and Root Protection Areas (RPAs) are satisfactorily protected during construction. This will be secured via the CoCP (Document Reference J26 F02).

1.7 Methodology

1.7.1 Overview

~~1.7.1.1 The methodology presented in this section will be used to identify when and where trees will need to be protected to limit construction impacts and provides detailed instructions on how to set up this protection.~~

~~1.7.1.2~~ This methodology ~~is broken down into two parts:~~

~~1.7.1.3~~1.7.1.1 ~~**General guidance:** This section details~~details the generic site wide methods that shall be adopted to ensure tree health is considered and maintained throughout construction. ~~This will be secured within the CoCP (Document Reference J26 F02).~~

~~1. **Tree protection protocol:** This section details how to use the 'tree working protocol'. This is a structured methodology that will be followed in order to identify specific locations on site where tree protection is needed and will show how this protection will be erected.~~

~~1.7.1.4~~1.7.1.2 Alongside the above mitigation methodologies, there will also be additional tree and habitat planting to reduce the impacts of the Mona Offshore Wind Project. Refer to the Outline Landscape and Ecological Management Plan (Outline LEMP) for further details (Document Reference J22 F02).

1.7.2 General guidance

Construction Exclusion Zones (CEZ)

~~1.7.2.1 If required prior to the commencement of works in the vicinity of trees, the need for tree protection exclusion zone is to be assessed using the methodology below.~~

~~1.7.2.2~~1.7.2.1 Tree protection zone de-marks an area of construction exclusion, with its positions determined using the RPAs of recorded trees.

~~1.7.2.3~~1.7.2.2 Once the tree protection demarcation (often defined by protective fencing) is in place, it must remain in situ throughout the course of the construction phase until the works in each area are completed.

~~1.7.2.4 Copies of the 'tree working protocol' shall be placed in the site office for reference by all site staff.~~

Requirements within the CEZ

~~1.7.2.5~~1.7.2.3 Within the CEZ there should be:

- No mechanical excavation / scraping whatsoever.
- No excavation by any other means without arboricultural supervision.
- No lowering of level for any purpose.
- No storage of plant, equipment, or material.
- No pedestrian, vehicular or plant access.
- No handling, discharge or spillage of any chemical substance included cement washings.

Further restrictions outside the CEZ

~~1.7.2.6~~1.7.2.4 Even when outside of the CEZ, no materials that may contaminate the soil such as concrete mixings, diesel oil and vehicle washings shall be discharged within close proximity of the stem of any tree.

1.7.3 Tree protection fencing

1.7.3.1 All required tree protection demarcation shall be defined as shown on the final tree protection plans. As set out previously, these would be provided within the final ~~Arboricultual~~Arboriculture Method Statement to be developed post-consent and prior to the commencement of construction of the Mona Offshore Wind Project. Outline tree protection fencing is provided within Appendix C of the Tree Survey and Arboricultural

Impact Assessment of the Environmental Statement (Document Reference F7.6.6). Tree protection fence details can be found in Appendix A.

1.7.3.2 The demarcation line shown is the minimum required and the length of the fence shall be extended or adjusted on site as agreed with the Arboricultural Consultant to ensure satisfactory protection of all retained trees and RPAs.

1.7.3.3 Once the protective demarcation (often defined by a barrier, subject to detailed design) is in place it must remain in situ where works are being undertaken in the vicinity of trees, other than to facilitate agreed tree removal or to complete landscape works such planting or seeding.

1.7.3.4 Where necessary, tree protection fencing may be temporarily re-aligned in order to facilitate tree removal. Fencing is to be re-instated immediately following removal in a manner that encompasses the remaining trees and their respective RPAs.

1.7.3.5 During tree removal, no wheeled or tracked machinery is to enter the area previously encompassed by tree protective fencing as shown in the final tree protection plans.

1.7.3.6 Signs detailing the purpose of the protective barrier shall be attached to the barriers, where deemed required. Such signs should be weatherproof and shall be substantially in the form of the specimen provided in Appendix A. Signs must be replaced as necessary should they be removed or become illegible.

1.7.4 Installation of onshore export cables

1.7.4.1 Where practicable, the onshore export cables will be installed outside of RPAs, but where this is not possible, trenchless installation will be the preferred option. Both BS5837:2012 and NJUG Volume 4 offer guidance on cable installation.

1.7.4.2 If this option is not feasible, any excavation will be carried out by hand in accordance with the guidelines set out in NJUG Volume 4 – Guidelines for the Planning, Installation and Maintenance of Utility Apparatus in Proximity to Trees.

1.7.4.3 Where the proposed cable route passes through Gwrych Castle Wood, Trenchless techniques such as Horizontal Directional Drilling (HDD) will be utilised in order to route the cable below the trees, avoiding their roots, and eliminating any potential impact on the trees.

1.7.5 Ancient Woodlands/ Veteran Trees

1.7.5.1 Where Ancient Woodlands/ Veteran Trees have been identified, both within and outside the ~~o~~Order limits, an appropriate buffer has been determined and shown within Appendix C of the Tree Survey and Arboricultural Impact Assessment of the Environmental Statement (Document Reference F7.6.6), along with appropriate Tree Protection Fencing w~~W~~here necessary. Tree protection fence details can be found in Appendix A.

1.7.5.2 These buffer zones will be shown on the final tree protection plans. As set out previously, these would be provided within the final Arboriculture Method Statement to be developed post-consent and prior to the commencement of construction of the Mona Offshore Wind Project.

1.7.5.3 Any trees within the O~~o~~rder limits that could not be surveyed either in 2023 or 2024, will be surveyed during detail design and prior to any works commencing, including the identifying of any potential Veteran Trees within these areas. Any required protection for these currently un-surveyed areas will be detailed within the final

Arboriculture Method Statement. Should any Veteran Trees be identified during the survey, the buffer zones will be calculated in accordance with guidance from Natural England and Forestry Commission (2022) Ancient woodland, ancient trees and veteran trees: advice for making planning decisions.

1.7.5.4 Unless otherwise specified within the final Arboriculture Method Statement, no works will be carried out within the Ancient Woodlands/ Veteran Tree Buffer zones.

1.7.5.5 As mentioned above, where the proposed cable route passes through Gwrych Castle Ancient Woodland, Trenchless techniques such as ~~Horizontal Directional Drilling (~~HDD~~)~~ will be utilised in order to route the cable below the trees, avoiding their roots, and eliminating any potential impact on the trees. The entry and exit pits of the trenchless crossing will be located at least 20m from the edge of the woodland to ensure there on no impacts to the roots of trees.

1.7.5.6 Where a new access track is proposed within the Buffer Zones of T389 and T401, this impact has been assessed and the works deemed acceptable. This is because the impacted part of the buffer zone is within a ploughed field, making the chance of root involvement in this area extremely low.

1.7.5.7 These works will, however, be carried out under an arboricultural watching brief to ensure that if any roots that are discovered, they are delt with in an appropriate manor.

~~1.7.5~~1.7.6 Pruning and tree removal works

Overview

~~1.7.5.1~~1.7.6.1 Trees will be removed at the Onshore Substation (including the ash woodland) to create the substation platform and accesses. Trees may also be removed along the Onshore Cable Corridor (where they cannot be avoided by micro siting the cable route or haul road. The number and location of the trees to be removed will be identified in the final tree plans that will accompany the final Arboriculture Method Statement.

~~1.7.5.2~~1.7.6.2 Onshore site preparation works will be undertaken prior to the commencement of construction. These works will be undertaken in line with this Outline Arboriculture Method Statement, and the methodologies described below, as certified through the DCO.

Standard of work

~~1.7.5.3~~1.7.6.3 The tree work required in order to facilitate the Mona Offshore Wind Project will adhere to the following standards.

- All tree works shall be carried out in accordance with BS3998:2010 and latest arboricultural best practice.
- All tree work shall be carried out by suitably qualified, competent and insured arboricultural contractors in accordance with Arboricultural Association Standard Conditions of Contract and Specifications for Tree Works (2008) Edition and BS 3998:2010 Tree Work.

~~1.7.5.4~~1.7.6.4 All green and woody waste generated by the tree works shall be dealt with in an environmentally sustainable manner.

~~1.7.5.5~~1.7.6.5 Prior to the commencement of any tree works, an appropriate risk assessment shall be produced to describe the measures required to fulfil the statutory safety

obligations. It shall aim to identify and prioritise the necessary control measures and precautions.

~~1.7.5.6~~1.7.6.6 When a branch is removed at its point of attachment, injury of the wood and bark of the parent stem or branch above the cut shall be avoided. If a branch collar is visible, the final cut shall be just outside it and care shall be taken to avoid tearing retained wood and bark when the cut is made. Preliminary cuts shall be made, if necessary, so as to remove weight, before a final cut is made. Care shall be taken to prevent falling branches from harming other parts of the tree (including its roots), its surroundings, people or property. Heavy branches shall be removed in sections and, where necessary, shall be lowered with ropes.

~~1.7.5.7~~1.7.6.7 It is possible that roots of retained trees may extend further than their RPAs. Where roots are encountered by mechanical plant then those smaller than 25 mm diameter may be pruned back using a sharp and clean cutting tool such as secateurs or handsaws. If roots larger than 25 mm are encountered within excavations, care will be taken to minimise any damage. Roots would only be cut having first consulted the appointed Arboricultural Consultant, as the roots maybe essential to the tree's health and stability.

~~1.7.5.8~~1.7.6.8 Micro-siting of the Onshore Cable Corridor will be used where possible to minimise the number of trees to be removed.

~~1.7.5.9~~1.7.6.9 Following the works, it is recommended that the trees are monitored to ensure their ongoing vitality and health. These inspections shall be completed by the Arboricultural Consultant.

Induction of site personnel

~~1.7.5.10~~1.7.6.10 Site contractors will sign the specific site briefing sheet to confirm they have understood the scope and importance of tree protection measures.

Timing of works

~~1.7.5.11~~1.7.6.11 Tree works would be completed before commencement of any construction works in the vicinity of RPAs within the Mona Onshore Development Area.

~~1.7.5.12~~1.7.6.12 All works shall ideally be timed to have regard to the phenological cycles of protected species that are associated with trees; notably birds and bats (refer to the Outline CoCP (Document Reference J26 F02) and Outline LEMP (Document Reference J22)).

~~1.7.5.13~~1.7.6.13 Nesting birds are protected by law and any removal / tree works should not be carried out during the bird nesting season (March-August inclusive). Should any vegetation or trees require removal during this period, then an ecological inspection would be required to check that no nesting birds are present. Should checks reveal nesting birds the vegetation must remain until September or until an ecologist has certified that the fledglings have left the nest. A visual inspection for bats shall also be carried on mature/ivy clad trees prior to commencing operations.

~~1.7.6~~1.7.7 Dust management

~~1.7.6.1~~1.7.7.1 During particularly hot, dry weather conditions, the dust created from construction activities (primarily from vehicles traversing unbound surfaces) can cause indirect damage to trees by reducing transpiration through the leaves and their ability to photosynthesise.

~~1.7.6.2~~1.7.7.2 Where it is deemed that an unsustainable quantity of construction generated dust has settled on the tree canopies, a water hose shall be used to water down and remove all dust from leaves within the canopy. This would be monitored by the Arboricultural Consultant who would determine when the water hose should be used. The dust management plan (Document Reference J26.2 F02) forms part of the Outline CoCP.

~~1.7.7~~1.7.8 Soil compaction and remediation measures

~~1.7.7.1~~1.7.8.1 Every reasonable measure shall be taken to ensure that the soil within the RPAs is not compacted (refer to the Soil Management Plan (Document Reference J26.8 F02) which forms part of the Outline CoCP). If, however, any incidence of compaction does occur within the vicinity of trees then it shall be reported to the appointed project Arboricultural Consultant to review the appropriate remediation measures to be taken.

~~1.7.7.2~~1.7.8.2 Dependant on the level of compaction certain remediation measures may be undertaken, such as:

- The introduction of well composted wood mulch to the compacted area to encourage the reintroduction of organic matter into the soil sub-base and improve soil structure.
- Sub-soil aeration using compressed air.

~~1.7.8~~1.7.9 CEZ fencing removal

~~1.7.8.1~~1.7.9.1 As set out in the Outline CoCP (Document Reference J26 F02), during the removal of the construction exclusion zone fencing, no wheeled or tracked machinery is to enter the area previously encompassed by tree protective fencing as shown in the final tree protection plans. Outline tree protection fencing is provided within Appendix C of the Tree Survey and Arboricultural Impact Assessment of the Environmental Statement (Document Reference F7.6.6).

Landscaping

~~1.7.8.2~~1.7.9.2 All landscaping works shall accord with the works detailed within the Outline LEMP (Document Reference J22 F02). No arboricultural impact is proposed due to these works.

Monitoring

~~1.7.8.3~~1.7.9.3 Following erection of the protective fencing and prior to commencement of the construction phase, an inspection of the site by the Arboricultural Consultant to confirm fencing has been installed in accordance with the final tree protection plans. Outline tree protection fencing is provided within Appendix C of the Tree Survey and Arboricultural Impact Assessment of the Environmental Statement (Document Reference F7.6.6).

Reporting

~~1.7.8.4~~1.7.9.4 Should any arboricultural issues become apparent during the works the Principal Contractor should immediately contact the Arboricultural Consultant for advice upon how to proceed.

~~1.7.9~~1.7.10 Tree protection protocol

~~1.7.9.1~~1.7.10.1 To ensure the protection of trees where needed, the following protocol will be followed:

Step 1: Is the tree working protocol needed?

~~1.7.9.2~~1.7.10.2 Is detailed tree survey information, and RPA data available? If yes, then employ tree and hedgerow protection methods as per the final tree and hedgerow protection plans. Outline tree protection fencing is provided within Appendix C of the Tree Survey and Arboricultural Impact Assessment of the Environmental Statement (Document Reference F7.6.6).

~~1.7.9.3~~1.7.10.3 If detailed tree survey information is not available, the tree protection protocol will be used any time works or works access is in reasonable, close proximity of any tree or hedge. In this situation, the tree and hedgerow protection methods will be informed by the Arboricultural Consultant.

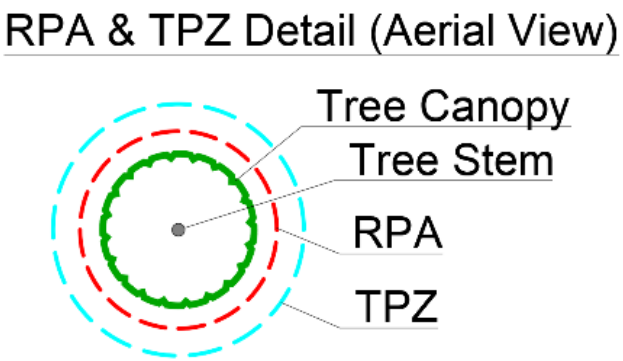
~~1.7.9.4~~1.7.10.4 If all works, including works access will take place more than 20 m from any trees or hedges, then the works can continue as planned with no additional arboricultural methodologies required.

Step 2: Identify RPA and tree proximity zones

~~1.7.9.5~~1.7.10.5 If works fall within the tree protection protocol (20 m), the RPA and tree proximity zones (TPZ) will be calculated as 12 x the diameter of the tree should be assigned to all trees within 20 m of works/ works access ~~Table 1.1~~Table 1.1 sets out RPA and TPZ values for trees up to 12 m high or 1 m tree diameter (not including veteran and / or ancient trees). Mature trees, particularly ancient and veteran trees can have a greater diameter than this, which should be reflected in the size of the RPA. Therefore, the cap on the RPA would be removed in order to be reflective of the size of each tree impacted. Detail would also be protected at various points along the roots as some areas are more sensitive than others.

Table 1.1: Root protection areas and tree proximity zones (non veteran/ancient trees).

Tree Size (Diameter @ 1.5 m)	RPA (Radius)	TPZ (Radius)
Hedges	3 m	8 m
Small Trees (<250 mm)	3 m	8 m
Medium Trees (251-500 mm)	6 m	11 m
Large Trees (501-750 mm)	9 m	14 m



Tree Size (Diameter @ 1.5 m)	RPA (Radius)	TPZ (Radius)
XL - Trees (>751 mm)	12 m	17 m

Figure 1.1: RPA and TPZ detail (aerial view).

~~1.7.9.6~~1.7.10.6 A tree's RPA is broadly defined in BS5837:2012, as a circle defining the minimum area around a tree that requires protection from works, which has a radius of roughly 12 times the diameter of a tree, measured at 1.5 m from ground level (presented in ~~Figure 1.1~~Figure 1.1). This calculation has been used in the creation of the table above.

~~1.7.9.7~~1.7.10.7 As measuring and calculating the RPA of each individual tree on site is impractical on a site this large, instead the above table will be used to allow for quick "at a glance" application of each tree's RPA.

~~1.7.9.8~~1.7.10.8 The TPZ is a circular area around the tree with a radius 5 m larger than that of the RPA. This is a buffer area used to identify whether or not works are in close proximity to the RPA of trees and therefore requiring further protection of the RPA.

~~1.7.9.9~~1.7.10.9 Where needed, the diameters of groups of similar trees can be averaged to give an average RPA and TPZ, however, any individual trees that have a big enough diameter to fall into a larger category should be picked out individually.

~~1.7.9.10~~1.7.10.10 Once calculated, the RPAs and TPZs should be marked out ether with flags or paint for easy identification.

Step 3: Follow the tree protection flowchart

~~1.7.9.11~~1.7.10.11 The flow chart in ~~Figure 1.2~~Figure1.2 should be used to identify the tree protection scenario that best fits the work in question.

Figure 1.2: Tree protection scenario flow chart.

Step 4: Apply chosen scenario protocol

~~1.7.9.12~~1.7.10.12 In the event where detailed tree protection details are not proposed within the final tree protection plans, then adopting the tree protection protocols options is proposed. (Outline tree protection fencing is provided within Appendix C of the Tree Survey and Arboricultural Impact Assessment of the Environmental Statement (Document Reference F7.6.6).

~~1.7.9.13~~1.7.10.13 Within a detailed Arboricultural Method Statement tree protection scenarios will be established, using appropriate tree protection techniques such as construction barriers, tree protection fence and/or visual barriers to define the demarcation zones.

~~1.7.9.14~~1.7.10.14 Once the tree protection protocol flowchart in ~~Figure 1.2~~Figure1.2 has been used to identify the correct tree protection scenario such tree protection scenarios will be clarified in the final Arboricultural Method Statement.

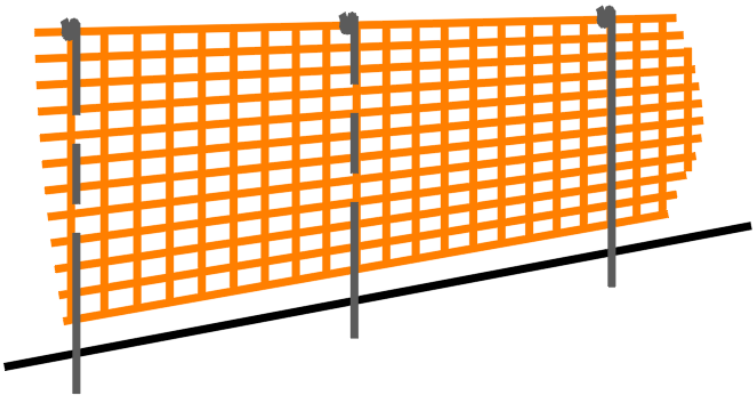
1.8 References

BSI Publication (2012) *BS5837: Trees in relation to design, demolition and construction – Recommendations*. Published by BSI Standards Limited 2012.

Appendix A: Tree Protection Fences

A.1 Example Tree Protection Visual Barrier

VISUAL TREE PROTECTION BARRIER
Secondary tree protection barrier
(Not to scale)



- To identify trees and vegetation not immediately adjacent to construction works.
- 1m high heavy duty hi-vis barrier mesh
- Erected and fitted to metal poles, timber stakes or railway pins driven into the ground at regular intervals

A.2 Example Construction Exclusion Zone (CEZ) Signage