

Arboricultural Impact Assessment

Prepared for:

Lagan Homes

Proposed site:

Woodtown, Ballycullen, Dublin 16.

Project Title:

Residential Development

Prepared by:

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Table of Contents

Executive Summary	4
2.0 Introduction	5
2.1 Instructions	5
2.2 Methodology.....	6
3.0 Initial Tree Survey Overview	7
3.1 The Site	7
4.0 The Trees.....	8
5.0 Statutory and Non-Statutory Designations.....	11
6.0 The Proposed Development	12
7.0 Analysis of the Proposal in Respect of Trees.....	14
8.0 Discussion & Conclusion.....	16
9.0 Recommendations.....	17
Appendix A: Tree Survey	18
Appendix A-Tree Schedule.....	Error! Bookmark not defined.
Appendix B: Arboricultural Method Statement.....	43

Executive Summary

1.0 This arboricultural report has been commissioned by of Lagan Homes on behalf of to provide information to assist with the planning process in relation to a proposed development at the above location.

This report includes:

- an assessment of the trees, their quality and value in accordance with BS 5837:2012 - Trees in relation to design, demolition and construction;
- the site context and observations on the trees;
- local planning policies relevant to the consideration of trees on the site;
- the impact of the proposed development upon the tree population in and around the site;
- methods of reducing impacts on trees; and
- measures to be taken to protect trees during the proposed works.



2.0 Introduction

2.1 Instructions

Arbor-Care Ltd (Professional Consulting Tree Service) was retained to undertake an on-site tree survey of all trees that could be potentially be impacted by the proposed development within the site extents (Figure 1), the findings of the report will be used to inform design of development works and support a planning application for same. The survey was undertaken on the 2nd of July 2024.

The objective of the impact assessment was to identify the areas that contained trees, groups of trees, and to ensure where possible that these areas would be retained and to identify the trees that are to be removed to facilitate the development.

The survey concentrated on the matures within the boundaries of the site.

The below impact assessment report is based on the British standard *BS 5837:2012 Trees in relation to design, demolition and construction recommendations*, this standard gives recommendations and guidance on the principles to be applied to achieve a satisfactory juxtaposition of trees, including shrubs, hedges and hedgerows, with structures. It sets out to assist those concerned with trees in relation to construction to form balanced judgements. This impact assessment report will be accompanied by an inventory of trees and hedgerows on site and a tree protection plan.

The Arboricultural Impact Assessment and a tree protection plan was prepared for the site identifying trees that may be impacted on by the proposed development based on the proposed design.



2.2 Methodology

An initial tree survey and visual condition assessment was on the 2nd of July 2024. The purpose of this report and in accordance with *BS 5837: 2012 Trees in relation to design, demolition and construction. Recommendations* only trees with diameters of 75mm or greater were surveyed.

Also in accordance with section 4.4.2.3 of the British standard document where trees formed obvious groups these were assessed and recorded as groups. All trees were individually tagged with a metal disc. This was placed on the northern side of the tree where practical. Where trees could not be tagged these were given a virtual number for example T1.

Section 4.4.2.3 of BS 5837: 2012 states:

Trees growing as groups or woodland should be identified and assessed as such where the arboriculturist determines that this is appropriate. However, an assessment of individuals within any group should still be undertaken if there is a need to differentiate between them, e.g. in order to highlight significant variation in attributes (including physiological or structural condition).

NOTE: The term "group" is intended to identify trees that form cohesive arboricultural features either aerodynamically (e.g. trees that provide companion shelter), visually (e.g. avenues or screens) or culturally, including for biodiversity (e.g. parkland or wood pasture), in respect of each of the three subcategories.

The survey concentrated primarily on the significant trees located within the development area and has been based on the topographical survey plan provided.

The objective of this survey was to gather information regarding the trees within or adjacent to the development area and the impact the proposed scheme may have on the trees. **Please refer to Appendix A for the tree inventory.**

Significant trees can be equated as those trees whose visual importance to the surrounding area are sufficient to justify special efforts to protect/preserve and whose loss would have an irremediable adverse impact on the local environment. Significance can also be placed depending on the trees age,

another variable to imply significance can be the aesthetic merit of the tree based on its unusual size, intrinsic physical features or outstanding appearance or occurring in a unique location or context, and thus provides a special contribution as a landmark or landscape feature.

All above parts of the trees were visually examined. Tree diameters (DBH) were estimated at 1.5 meter above grade as per standard arboricultural practice. Tree height was measured with the use of a clinometer (Where practical). A generalised system was employed to describe the overall health of the trees. The system uses a three tier rating scale with the following descriptors:

Specimen condition 3-tier rating system

- Poor- 1-30%
- Fair- 31-60%
- Good- 61-100%

3.0 Initial Tree Survey Overview

3.1 The Site

The site is 25.72 acres and is loosely rectangular, longest about its east-west axis. The site is sloping, descending to the north. The site exhibited no signs of drainage issues at the time of review.

The site is broadly open and supports little vegetation of note, other than within a central woodland belt and adjoining its eastern extent which contains significant mature trees of arboricultural and ecological value.

Figure 1 Site location, development area in red



4.0 The Trees.

The overall site is broadly open and devoid of vegetation. The site does however support one notable woodland belt towards its centre and adjoins another belt at its eastern end.

Elsewhere on the site, the remaining vegetation tend to be poor and minimal retention merit, including a vestigial hedge on the northern boundary, west of the dividing woodland belt, several thicket beds on the northern boundary east of the dividing belt and a similar thicket area and element of defunct hedge at the site's south-westernmost corner.

Central Woodland Belt

The alignment of trees located centrally on the site and running in broadly north – south Orientation comprises a broad and mixed belt on a wide, causeway -like strip of land defined from the adjoining fields by substantial ditch and embankment features along both the east and western edges. Much of the material with which this survey deals arises from the inner edges of the ditch though a small proportion arises in a more dispersed fashion throughout the broader corridor.

These species make up and within the broader alignment area, the noting of species including oak, beech and hornbeam strongly suggest deliberate intent and planting. This appears to relate to the somewhat larger and accordingly older trees with an arguably larger proportion of younger material typically comprising ash, Sycamore

and wych Elm that appears more likely to be natural in arising and not having been planted.

Along both eastern and western edges of the woodland strip note is made of substantial thicket development typically comprising Blackthorn and Bramble. This arises from both sides of the dividing ditch embankment structure however, in respect of the inner embankment located to the east and west of the woodland causeway, enough evidence exists to suggest an intent to create a Hawthorne hedge. This hedge line is now wholly discontinuous and fragmented, but enough specimens remain to see it is a substantive part of the broader thicket. At present, continuity of this thicket in conjunction with other species including Elder and Holly is now dominated by Blackthorn and Bramble that appears to comprise more than 85% of the population make-up. As such, the management of such thicket would be difficult at best however, the context within which it might be retained could be considered and, if the bias was towards ecological/conservation and then its retention as it is may be tolerable.

Eastern Tree Belt

The wooded area to the east of the site comprises another causeway defined by two ditches from adjoining fields with raised embankments along the inner causeway edge. The trees within this area arise from both embankments (to east and to west) however in respect of proximity to the site, it is only the westernmost edge that adjoins the proposed site boundary.

The causeway area exhibits evidence of previous vehicular access with remnants of a cinder/asphalt/bit macadam trackway running approximately north south.

At the time of review, the ditch dividing the site lands from the raised embankment supported running water travelling in a south to north direction suggesting historical continuity and the likely constraint to natural root development in a westerly direction. Accordingly, it is highly likely that these trees are for the most part,

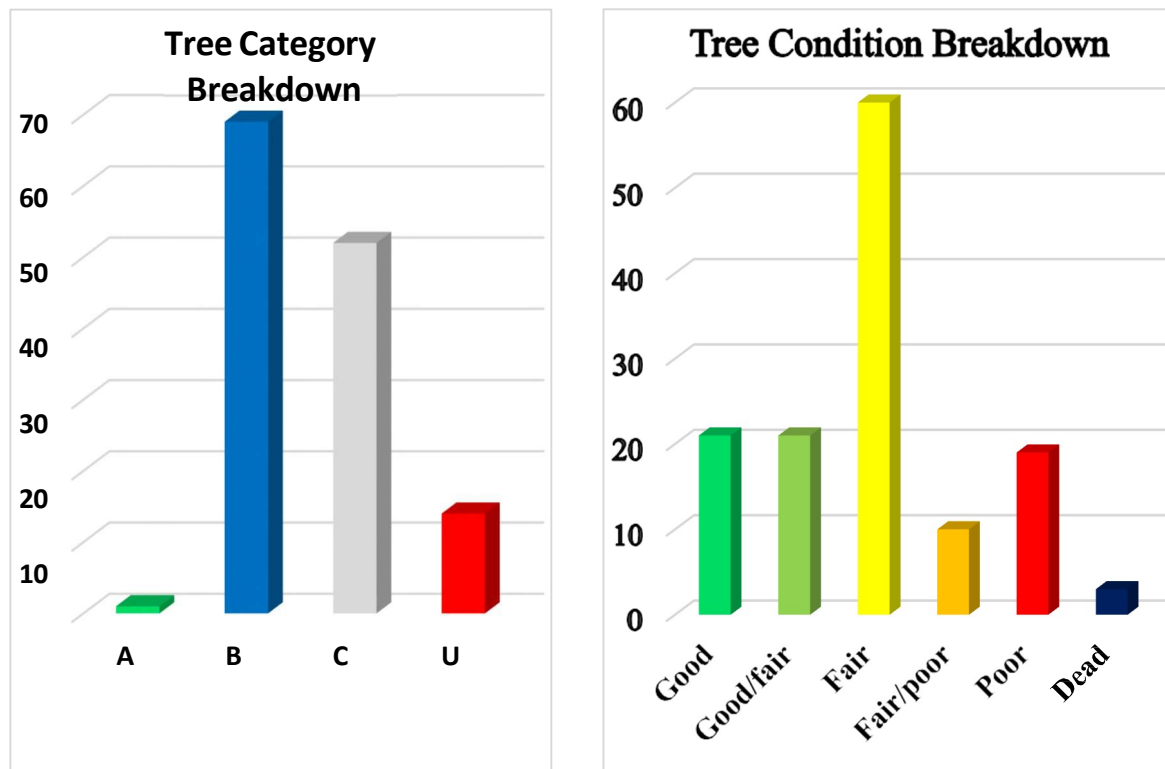
physiologically detached from the development site area.

Broader Site

The entire southern boundary is devoid of any notable vegetation, being best defined by a post and rail fence. The only exception to this relates to the extreme western end of the boundary that supports a short remnant of dilapidated hedge and some scrub thicket.

On the northern boundary to the west of the dividing, we note that the western zone is devoid of vegetation however, between Ash (A) And continuing in an easterly direction towards the primary tree belt there is the remnant of an original hedgerow presumed once to been defined by a Hawthorne hedge. This hedge is now substantially dilapidated, being overrun by Blackthorn and Bramble and is of dubious retention merit.

The below graph displays the tree category and condition breakdown on the site



5.0 Statutory and Non-Statutory Designations

The National Planning Framework (NPF)

The National Planning Framework (NPF) seeks to ensure that new development is sustainable and underlines the importance of Green Infrastructure, of which trees form an integral part. This encompasses recognition of the importance of trees in relation to the management of air, soil and water quality along with other associated ecosystem services and climate change adaptation. The NPF also seeks to achieve the protection and enhancement of landscapes and a net gain in biodiversity.

South Dublin County Development Plan 2022-2028

I have reviewed the above Plan and there are no tree preservation orders on the site. However 10.2.10 *Green infrastructure* of the Development Plan states the following ;

‘Trees and landscaping are important for climate amelioration and maintaining a healthy environment. Wooded areas have a carbon absorption rate that is approximately three times that of areas covered in grassland. Trees absorb carbon as they grow, and woods and forests provide long-term carbon reduction benefits. Planting in urban areas, at the source of many atmospheric pollutants, can filter out those pollutants, reduce water run-off, improve water quality, reduce noise and provide shading to help reduce urban heat island effects. The planting of trees is one of the most cost-effective methods of carbon capture and storage. Trees and the retention of mature trees can be an asset to a new development. They provide a strong sense of character and place, as well as providing a ready-made landscape. Retaining trees is always desirable, though many trees are lost each year in the course of development. Some are removed due to their condition or because they are directly in the way of development. However, many are lost due to unsuitable protection during the construction phase..’

Policy E11: Green Infrastructure

Implement the Council's Green Infrastructure Strategy as an essential element of building resilience to climate change whilst ensuring healthy placemaking and delivering on the compact growth approach, in accordance with National and Regional Policy and the National Climate Action Plan.

E11 Objective 1:

To ensure the implementation of policy and objectives on tree planting, protection of trees on site and development management standards in relation to new development as set out in the Green Infrastructure, Heritage and Implementation Chapters of this plan.



Section 12.2.2 *Green Infrastructure and Development Management* of the Development Plan requires that all planning applications demonstrate how they contribute to the protection or enhancement of Green Infrastructure in the County through the provision of green infrastructure elements as part of the application submission.

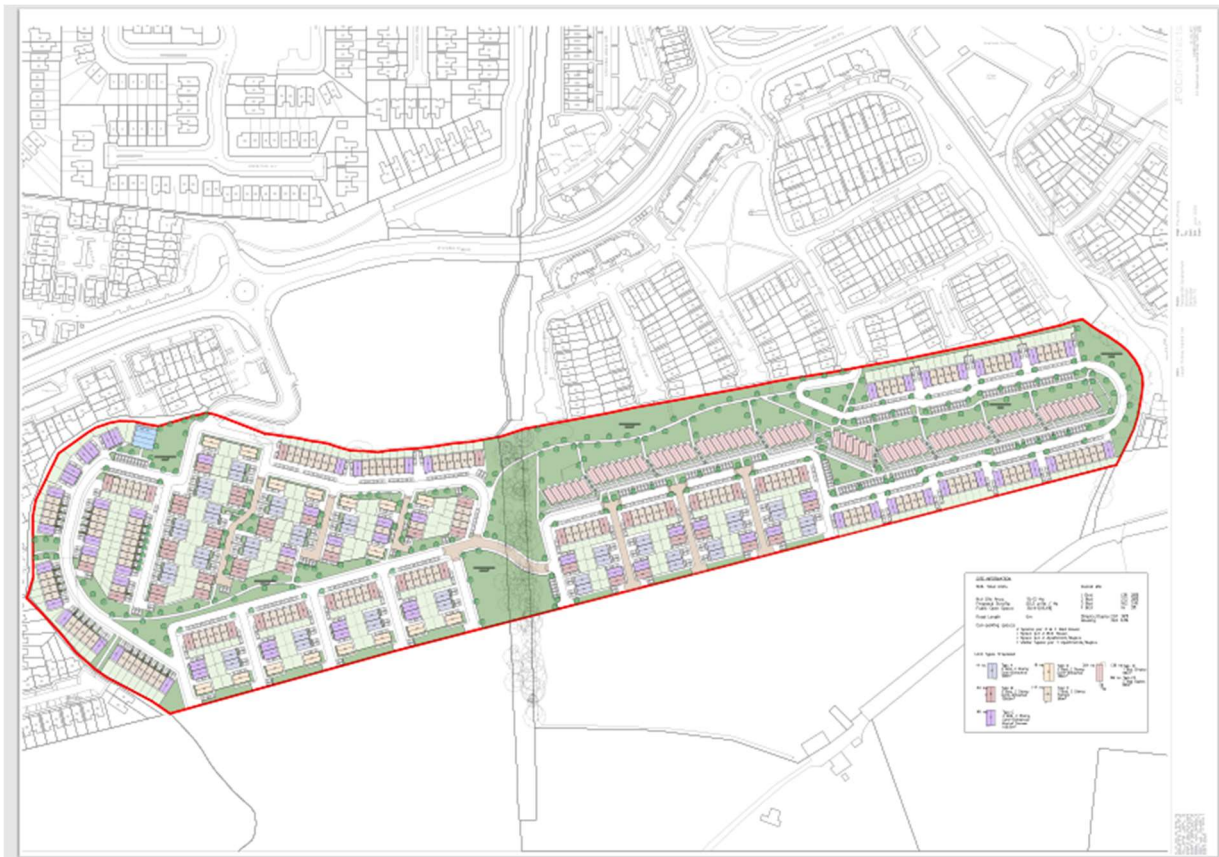
The retention of existing trees is therefore an important consideration in any development proposal and is supported by policies and objectives in the Development Plan.

6.0 The Proposed Development

Short Planning Description:

PLANNING PERMISSION FOR**TO BE INSERTED**

Figure 2: Proposed Development



Arboricultural Impact Assessment

7.0 Analysis of the Proposal in Respect of Trees

This impact assessment sets out the likely principal direct and indirect impacts of the proposed development on the trees on or immediately adjacent to the site and suitable mitigation measures to allow for the successful retention of significant trees or to compensate for trees to be removed, where appropriate.

A brief summary of trees to be removed, related to the Proposed Scheme are detailed within the table below

Table 1: Schedule of trees to be removed to accommodate the design (To be read in conjunction with Appendix 1 and the Tree Protection Plan.

Tree number	Species	Age Class	Tree category
A	Ash	M	U
B	Elm	M	U
25	Oak	Em	B2
26	Oak	Em	B2
27	Oak	Em	B2
28	Oak	Em	B2
29	Oak	Em	C2
30	Ash	M	B2
31	Oak	M	B2
35	Oak	M	B2

Ten trees will be removed to facilitate the development. Of the trees to be removed to accommodate the proposed design, these consist of 0 no. category A trees, 7 no. category B and 1 no. category C trees and 2 no. category U trees.

In accordance with *BS 5837: 2012 Trees in relation to design, demolition and construction. Recommendations.*, Category B signifies those trees of a “moderate value and in such a condition as to be able to make a substantial contribution (A minimum life expectancy of 20 yrs is suggested).” Category C signifies those trees/hedgerows of “a low quality and value that are currently in an adequate condition to remain until new planting could be established (a minimum life expectancy of 10yrs is suggested).” Category U. This category signifies those trees that are in such a condition that any existing value would be lost within 10 years and which should, in the current context, be removed for reasons of sound arboricultural management.

7.1 In the context of the overall development works the following points are also noted:

- **Arboricultural works** –within the woodland there are examples of dead trees, these do form an important ecological habitat . They may be considered for removal in the interest of health and safety
- Following the completion of the development, a **tree condition assessment** maybe be required out on all retained trees for health and safety purposes.
- **Tree protection measures** - All retained trees can be successfully protected during the proposed development by using robust fencing which complies with the recommendations outlined within BS5837:2012.
- No materials or equipment other than those required to install tree protection will be delivered to the site until all fencing is in place.
- For details of the tree protection measures required during construction, please refer to the Tree Protection Plan.
- **Compound area** – The proposed site compound has not been designed; there is sufficient space available throughout the site to avoid any unnecessary impacts to

retained trees, provided the tree protection measures as detailed within this report are carried out.

- **Site access.** The site will be accessed from existing site entrance.
- **Daylight and sunlight levels** - Shading by trees have not been assessed in relation to this proposal.
- **Drainage and services** – All new service runs should be located outside the RPAs of retained trees to avoid impacting their condition. If it is found necessary to locate services within tree RPAs, it is recommended that these works are carried out under arboricultural supervision. Methods of work should follow the recommendations in the NJUG guidance. BS5837 (2012) recommends the NJUG guidance as a normative reference to be used in these circumstances.
- **Boundary treatments** – Please refer to the landscape plan for further information.
- **Landscape operations** - Landscaping operations will typically take place at the end of the construction period. These works will normally require the removal of protective fencing to facilitate access for works. There is a risk that plant and machinery may damage soil structure where tree roots are growing. These risks can be managed by maintaining good professional standards of work and working to a method statement. The principle of avoiding soil disturbance or changes in levels within the RPAs of retained trees should be followed unless arboricultural advice has been sought.

8.0 Discussion & Conclusion

General Change

- 8.1 My assessment is that loss of trees is low and will have no negative impacts on the character and appearance of the immediate surrounding landscape;

Proposal in relation to local planning policy

- 8.2 The proposed development complies with local planning policy as it relates to trees. A tree survey has been carried out in accordance with best practice

Conclusion

- 8.4 The proposal has been assessed in accordance with BS5837:2012 and special working methods have been recommended to minimise tree impacts.
- 8.5 Retained trees have been assessed and can be successfully protected during development by following the information provided within this report and adhering to industry best practice.
- 8.6 Provided the recommendations and methods of work, as outlined within this report, are adhered to, the proposed development can be successfully carried out without having a negative impact on the character or appearance of the surrounding landscape.
- 9.0 Recommendations
- 9.1 The proposal should be carried out in accordance with the recommendations outlined within this report.
- 9.2 The positioning of tree protective barriers should be installed as detailed within the Tree Protection Plan.

Appendix A: Tree Survey

Key abbreviations used in the survey

Ref No	Specific identification number given to each tree or group. T=Tree/H=Hedge/G=Group/W=Woodland/S=Shrub.	
Tag No.	Tree marked with individual tree tag of this reference number on site.	
Species	Common name followed by botanical name shown in <i>italics</i>	
RPA	Root Protection Area (As defined by BS5837)	
Stem diameter	Diameter of main stem, measured in millimetres at 1.5 m above ground level. (MS = Multi-stem tree measured in accordance with BS5837 Annexe C)	Av / Average: indicates an average representative measured dimension for the group or feature
Spread	The width and breadth of the crown. Estimated on the four compass points in metres.	
Crown clearance	The estimated height (in metres) above ground level of the lowest significant branch attachments.	
#	Estimated dimensions	
*	Indicates estimated position of tree (not indicated on topographical survey).	
P	Privately owned tree (e.g. tree not located in the public highway or adjacent public land).	
Category	Categorisation of the quality and benefits of trees on Site as per Table 1 and 2 of BS5837:2012. 1=Arboricultural quality/value 2=Landscape quality/value 3=Cultural quality/value (including conservation)	
	A=High quality/value 40yrs+ (light green). B=Moderate quality/value 20yrs+ (mid blue) C=Low quality/value min 10yrs/stem diameter less than 150mm (grey). U=Unsuitable for retention (dark red).	
Life stage	Young (Y): Newly planted tree 0-10 years. Semi-Mature (SM): Tree in the first third of its normal life expectancy for the species (significant potential for future growth in size). Early Mature (EM): Tree in the second third of its normal life expectancy for the species (some potential for future growth in size) Mature (M): Tree in the final third of its normal life expectancy for the species (having typically reached its approximate ultimate size). Over Mature (OM): Tree beyond the normal life expectancy for the species. Veteran (V): Tree which is of interest biologically, aesthetically or culturally because of its condition, size or age.	
Structural condition	Good: No significant structural defects Fair: Structural defects which can be resolved via remedial works. Poor: Structural defects which cannot be resolved via remedial works. Dead: Dead.	
Physiological condition	Good: Normal vitality including leaf size, bud growth, density of crown and wound wood development. Fair: Lower than normal vitality, reduced bud development, reduced crown density, reduced response to wounds. Poor: Low vitality, low development and distribution of buds, discoloured leaves, low crown density, little extension growth for the species. Dead: Dead Fair/Good = Indicates an intermediate condition Fair – Good = Indicates a range of conditions (e.g. within a group)	
Preliminary management recommendations	Works identified during the tree survey as part of sound arboricultural management, based on the current context of the Site (where relevant reference has been made to tree management based on the potential future context of the site).	

Works to facilitate
the development

Tree works identified as necessary to facilitate the Proposed Development following
a desk top analysis of the proposals in relation to tree constraints.



Appendix 1 – Tree Data Table

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev.	Cat
Isolated Trees																
A	Ash (<i>Fraxinus excelsior</i>)	M	F/P	16.00	2.00	7.50	8.00	6.50	7.50	1	1038	12.45	A mature ash that is in advanced decline due to ash die-back	Remove	No impact	U
B	Wych Elm (<i>Ulmus glabra</i>)	E/M	F	9.00	0.00	5.00	5.00	5.00	5.00	1	420	5.04	This tree is dead	Remove	No impact	U
C	Oak (<i>Quercus robur</i>)	M	G/F	16.00	2.50	4.50	4.50	5.00	4.50	1	993	11.92	Compact and upright exhibiting evidence of prior intervention, management, and pruning. Vigour and vitality appear good. Tree arises from position wholly within confines of adjoining property.	No works required	No impact	B1-2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev.	Cat
Central Woodland Belt																
D	Sycamore (<i>Acer pseudoplatanus</i>)	E/M	G/F	12.00	4.00	4.50	4.50	4.50	4.50	1	411	4.93	Young and vigorous but heavily divided at 2.50 m.	No works required	No impact	B2
E	Oak (<i>Quercus robur</i>)	S/M	G	11.00	2.50	4.00	2.50	3.50	3.00	1	347	4.16	Distorted but maintaining good vigour. Supports some lower crown deadwood.	No works required	No impact	B2
F	Beech (<i>Fagus sylvatica</i>)	S/M	G	11.00	2.00	3.00	3.00	4.00	3.00	1	328	3.93	Young and vigorous though slightly distorted.	No works required	No impact	B2
G	Oak (<i>Quercus robur</i>)	S/M	G	12.00	3.00	3.50	4.50	4.00	3.00	1	344	4.13	Young and vigorous though supporting some large crown deadwood.	No works required	No impact	B2
H	Ash (<i>Fraxinus excelsior</i>)	E/M	F	13.00	2.00	5.00	7.00	5.00	5.00	2	611	7.33	A large specimen heavily divided from near ground level. Supports minor imbalance to east.	No works required	No impact	B2
1	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	9.00	1.50	2.50	2.00	2.00	2.00	1	376	4.51	Young and vigorous but distorted and of a form suggestive of early life collapse. Remains vigorous and is worthy of retention as part of woodland group.	No works required	No impact	C2
2	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	P	8.00	3.50	3.00	3.00	2.00	1.50	1	223	2.67	Decapitated as result of failure resulting from crown dieback in relation to grey squirrel feeding. Small stature presents limited threat though sustainability is minimal.	No works required	No impact	C2
3	Ash (<i>Fraxinus excelsior</i>)	E/M	F	19.00	3.00	7.00	6.50	4.00	2.50	1	592	7.10	One-sided and unbalanced to east because of position on woodland edge. Divided nature may predispose tree to failure in later life.	No works required	No impact	C2

4	Oak (<i>Quercus robur</i>)	E/M	G	14.00	3.00	5.50	4.00	5.50	6.00	1	570	6.84	Slightly unbalanced as result of growth suppression but is broadly good vigour and vitality.	No works required	No impact	B2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
5	Silver Birch (<i>Betula pendula</i>)	O/M	P	13.00	2.50	4.00	4.50	3.50	5.50	1	548	6.57	Distorted and in a state of collapse as result of decay brought on by Piptoporus infection.	Consider for removal	No impact	U
6	Sycamore (<i>Acer pseudoplatanus</i>)	E/M	G/F	12.00	3.00	3.00	5.50	5.00	5.00	1	484	5.81	Distorted as result of growth competition but of good general vigour.	No works required	No impact	B2
7	Oak (<i>Quercus robur</i>)	E/M	G	17.00	2.50	5.00	4.50	4.50	5.50	1	525	6.30	Of good vigour and vitality though slightly suppressed by near neighbours.	No works required	No impact	B2
8	Ash (<i>Fraxinus excelsior</i>)	E/M	F	15.00	4.00	6.00	6.00	2.50	4.00	3	548	6.57	Distorted and unbalanced to north east. Triple-stemmed scenario from ground level raises concern regarding mechanical integrity impossible predisposition towards failure.	No works required	No impact	C2
9	Oak (<i>Quercus robur</i>)	S/M	G/F	12.00	3.00	2.50	3.00	3.00	4.50	1	573	6.88	Vigorous but slightly distorted as result of proximity of neighbours.	No works required	No impact	B2
10	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	9.00	0.50	3.00	4.00	2.00	3.50	3	430	5.16	Multi-stemmed from near ground level and distorted. A poor-quality specimen that retains good vigour and vitality. Would be worthy of retention as part of woodland group.	No works required	No impact	C2
11	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	G/F	13.00	3.00	4.50	2.00	2.50	4.00	1	258	3.09	Suppressed and drawn-up but maintaining good vigour.	No works required	No impact	B2
12	Ash (<i>Fraxinus excelsior</i>)	E/M	G/F	15.00	5.00	4.00	5.50	3.00	4.00	1	357	4.28	Drawn-up and slightly unbalanced to east but east but of good vigour.	No works required	No impact	B2

13	Ash (<i>Fraxinus excelsior</i>)	E/M	G/F	17.00	3.00	4.00	6.00	4.00	2.00	1	392	4.70	One-sided and unbalanced to east but maintaining good vigour and vitality.	No works required	No impact	B2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev.	Cat
14	Beech (<i>Fagus sylvatica</i>)	S/M	F	9.00	1.00	3.00	2.50	3.00	4.50	1	258	3.09	Heavily divided from low level with distorted stem. Is maintaining good vigour and vitality.	No works required	No impact	C2
15	Ash (<i>Fraxinus excelsior</i>)	E/M	F	17.00	2.50	3.00	5.50	5.50	3.00	1	420	5.04	Heavily unbalanced to south-east as result of position on woodland edge but appears be maintaining good vigour and vitality.	No works required	No impact	B2
16	Oak (<i>Quercus robur</i>)	E/M	G	15.00	2.50	5.00	5.00	5.00	5.50	1	474	5.69	Young and vigorous.	No works required	No impact	B2
17	Ash (<i>Fraxinus excelsior</i>)	E/M	F	13.00	2.50	5.00	5.00	0.00	0.00	1	357	4.28	Unbalanced to north-east as result of proximity to near neighbours. General vigour and vitality remain good.	No works required	No impact	C2
18	Ash (<i>Fraxinus excelsior</i>)	E/M	F	16.00	5.00	5.00	5.00	2.00	1.00	1	430	5.16	Of distorted form suggesting possible early life damage. Remains vigorous at present.	No works required	No impact	C2
19	Beech (<i>Fagus sylvatica</i>)	E/M	G	14.00	2.50	4.50	4.00	4.50	4.00	1	401	4.81	Young and vigorous. General quality is good.	No works required	No impact	A2
20	Sycamore (<i>Acer pseudoplatanus</i>)	E/M		13.00	3.00	4.00	5.00	3.50	4.50	1	379	4.55	Distorted and exhibiting evidence of cavity development near ground level suggesting early life loss of secondary stem. Remains vigorous at present though sustainability will be limited.	No works required	No impact	C2

21	Oak (<i>Quercus robur</i>)	E/M		13.00	4.50	3.50	5.00	5.00	5.00	5.00	1	420	5.04	Slightly distorted as result of proximity to near neighbours but of good form and vigour. Crown supports minimal deadwood.	No works required	No impact	B2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
22	Ash (<i>Fraxinus excelsior</i>)	M	F/P	15.00	1.00	7.00	7.00	6.00	7.00	3	910	10.92	A large specimen supported on divergent stems raising concerns regarding mechanical integrity. Twiggy decline and deadwood development extending throughout crown suggesting limited longevity.	No works required	No impact	C2
23	Beech (<i>Fagus sylvatica</i>)	E/M	G/F	13.00	2.50	4.50	5.00	4.00	4.50	1	392	4.70	Slightly distorted but maintaining good vigour and vitality.	No works required	No impact	B2
24	Oak (<i>Quercus robur</i>)	S/M	G	13.00	2.50	3.50	2.00	2.00	3.50	1	379	4.55	Tall and narrow because of suppression.	No works required	No impact	B2
25	Oak (<i>Quercus robur</i>)	E/M	G	16.00	5.00	2.00	4.00	2.00	3.50	1	398	4.77	Tall and narrow because of suppression but is maintaining good vigour and vitality.	Remove	Remove to facilitate the access road	B2
26	Oak (<i>Quercus robur</i>)	E/M	G/F	13.00	2.50	3.00	6.50	5.00	6.00	1	433	5.19	Heavily suppressed and has developed a fanlike crown profile extending in an east west fashion. Vigour and vitality remain good and trees eminently suitable for retention as part of a broader group.	Remove	Remove to facilitate the access road	B2
27	Oak (<i>Quercus robur</i>)	E/M	G/F	16.00	2.00	4.00	2.50	1.00	5.00	1	407	4.89	Typically unbalanced to west as result of suppression but is maintaining reasonable vigour and vitality.	Remove	Remove to facilitate the access road	B2
28	Oak (<i>Quercus robur</i>)	E/M	G/F	16.00	2.50	4.00	5.50	4.50	4.50	2	538	6.46	Suppressed as result of proximity to near neighbours and appears to have undergone pruning in respect of proximity to overhead power cables. General vigour and vitality are good.	Remove	Remove to facilitate the access road	B2

29	Oak (<i>Quercus robur</i>)	E/M	F	11.00	2.00	4.50	2.50	2.50	4.50	1	420	5.04	Previously decapitated and is now one-sided as result of cutting in respect of proximity to a position beneath power cables. Tree will not prove sustainable over time.	Remove	Remove to facilitate the access road	C2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
30	Ash (<i>Fraxinus excelsior</i>)	S/M	F	10.00	4.50	1.00	3.00	1.00	1.00	1	283	3.40	Drawn-up and of spindly form. Worthy of retention as part of woodland group.	Remove	Remove to facilitate the access road	B2
31	Oak (<i>Quercus robur</i>)	S/M	G	12.00	2.50	1.50	3.50	3.00	2.50	1	341	4.09	Narrow and drawn-up but maintaining good vigour and vitality.	Remove	Remove to facilitate the access road	B2
32	Oak (<i>Quercus robur</i>)	S/M	P	12.00	3.00	1.00	3.50	3.00	3.00	1	344	4.13	Previous stem damage has resulted in bark necrosis on southern side of lower stem that will undermine sustainability.	No works required	No impact	C2
33	Oak (<i>Quercus robur</i>)	S/M	F	12.00	3.00	2.00	3.50	3.00	3.00	1	344	4.13	Distorted but maintaining reasonable vigour and vitality.	No works required	No impact	C2
34	Oak (<i>Quercus robur</i>)	E/M	F	13.00	3.00	4.50	3.50	2.50	2.50	1	436	5.23	Supports minor imbalance to north but appears be maintaining good vigour and vitality.	No works required	No impact	B2
35	Oak (<i>Quercus robur</i>)	E/M	F	13.00	1.00	2.50	4.50	3.00	3.00	1	357	4.28	Tall and drawn-up. Ground disturbance is notable in positions north of stem.	Remove	Remove to facilitate the access road	B2
36	Oak (<i>Quercus robur</i>)	E/M	P	13.00	4.00	4.50	5.00	1.50	1.00	1	401	4.81	Is directly adjoin by an area notable ground disturbance and stem has sustained notable vandal damage resulting in stem splitting. Tree is at risk of imminent failure.	Remove	Remove to facilitate the access road	U

37	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	P	9.00	2.50	2.00	2.00	2.50	4.00	1	369	4.43	Completely dead	Remove.	N/A	U
38	Ash (<i>Fraxinus excelsior</i>)	E/M	P	11.00	3.00	5.00	4.00	1.50	5.00	2	411	4.93	In a state of decline with substantial deadwood development and twiggy dieback throughout canopy. Is of dubious sustainability.	Consider for removal	No impact	C2
39	Oak (<i>Quercus robur</i>)	S/M	F	12.00	3.00	1.00	3.50	2.50	3.50	1	353	4.24	Suppressed and distorted, exposed as result of corridor created for overhead ESB lines.	No works required	No impact	B2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
40	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	9.00	2.00	1.00	1.00	2.50	2.50	2	306	3.67	Distorted and twin stemmed. Of low quality but worthy of retention as part of woodland group.	No works required	No impact	C2
41	Ash (<i>Fraxinus excelsior</i>)	E/M	F	13.00	4.00	4.50	6.50	4.00	0.00	3	592	7.10	Triple stemmed from near ground level and typically unbalanced to east as result of position on woodland edge.	No works required	No impact	C2
42	Oak (<i>Quercus robur</i>)	S/M	G	12.00	7.00	2.00	2.00	2.50	2.50	1	322	3.86	Drawn-up and of narrow crown. Of good vigour.	No works required	No impact	B2
43	Beech (<i>Fagus sylvatica</i>)	S/M	P	7.50	2.00	2.50	1.50	2.00	4.50	1	283	3.40	Unbalanced and has sustained notable bark damage about lower stem.	No works required	No impact	C2
44	Ash (<i>Fraxinus excelsior</i>)	E/M	F/P	14.00	3.00	1.50	4.50	2.00	5.00	2	433	5.19	Heavily divided with the eastern stem exhibiting evidence of decline and deterioration. Is of dubious sustainability.	No works required	No impact	C2
45	Beech (<i>Fagus sylvatica</i>)	S/M	F	13.00	5.00	2.50	2.50	2.00	1.50	1	290	3.48	Drawn-up and of narrow crown form. General vigour is good.	No works required	No impact	B2
46	Ash (<i>Fraxinus excelsior</i>)	E/M	F	14.00	5.50	3.00	5.50	4.00	0.00	1	341	4.09	No works required	No works required	No impact	C2

47	Beech (<i>Fagus sylvatica</i>)	S/M	F/P	7.00	2.00	3.00	3.50	2.00	0.00	1	337	4.05	No works required	No impact	S	C2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
48	Wych Elm (<i>Ulmus glabra</i>)	E/M	F	12.00	1.50	5.00	6.50	3.00	0.00	1	379	4.55	Wholly one-sided and unbalanced to east. Is currently of good vigour but is likely to be affected by Dutch Elm disease that is prevalent within Dublin area.	No works required	No impact	C2
49	Beech (<i>Fagus sylvatica</i>)	S/M	F	13.00	2.50	3.50	2.50	2.50	3.00	1	341	4.09	Remains vigorous but supports notable bark wound on lower stem.	No works required	No impact	C2
50	Oak (<i>Quercus robur</i>)	S/M	F	12.00	2.50	4.50	5.00	4.50	2.50	2	465	5.58	Sharply divided from ground level with the overall imbalance to east. General vigour and vitality remain good at present.	No works required	No impact	C2
51	Oak (<i>Quercus robur</i>)	S/M	F	9.00	4.00	1.50	1.00	2.50	3.50	1	229	2.75	Distorted and suppressed but maintaining reasonable vigour and vitality.	No works required	No impact	B2
52	Beech (<i>Fagus sylvatica</i>)	S/M	F	11.00	1.50	3.50	4.50	2.00	1.50	1	328	3.93	Slightly one-sided and unbalanced to east because of suppression.	No works required	No impact	B2
53	Oak (<i>Quercus robur</i>)	E/M	F/P	15.00	3.00	5.00	6.00	4.50	6.00	1	598	7.18	Originally triple stemmed, stem has failed from base position resulting in development of cavity. Remaining tree appears vigorous.	No works required	No impact	C2

54	Oak (<i>Quercus robur</i>)	S/M	G/F	11.00	3.00	4.00	3.50	2.00	2.00	1	293	3.51	Suppressed but maintaining good vigour and vitality.	No works required	No impact	B2
55	Oak (<i>Quercus robur</i>)	S/M	D	10.00	5.00	3.00	3.00	2.50	1.50	1	334	4.01	Completely dead and in need of removal.	Remove based on condition	No impact	U
56	Oak (<i>Quercus robur</i>)	S/M	P	10.00	2.50	4.50	4.00	2.00	3.00	1	322	3.86	Suppressed and distorted, unbalanced to north. Remains vigorous may prove suitable for retention as part of broader woodland group.	No works required	No impact	C2
57	Oak (<i>Quercus robur</i>)	S/M	G	10.00	3.00	3.50	3.50	2.00	4.00	1	353	4.24	Young and still vigorous.	No works required	No impact	B2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact on the dev	Cat
58	Oak (<i>Quercus robur</i>)	S/M	P	9.00	2.00	2.00	2.00	1.00	1.50	1	229	2.75	Has sustained chronic damage to stem and is at risk of failure.	Remove based on the condition	No impact	U
59	Oak (<i>Quercus robur</i>)	E/M	G/F	14.00	7.00	5.00	4.50	4.50	4.50	1	363	4.35	Young and vigorous comprising primary stem and to adjoining Two satellite stems.	No works required	No impact	B2
60	Oak (<i>Quercus robur</i>)	S/M	P	12.00	2.50	2.00	4.50	2.00	1.00	1	204	2.44	Principal stem is damaged, and tree arises from area of notable ground excavation and disturbance with visible root damage. Small stature peers present limited threat.	No works required	No impact	C2
61	Oak (<i>Quercus robur</i>)	S/M	F	12.00	5.00	2.00	3.50	2.00	2.00	1	226	2.71	Drawn-up and somewhat spindly but appears be maintaining good vigour and vitality.	No works required	No impact	B2

62	Beech (<i>Fagus sylvatica</i>)	S/M	G/F	13.00	2.50	3.50	5.00	2.50	2.50	1	401	4.81	Distorted with minor imbalance to east as result of proximity to near neighbours. General vigour is good.	No works required	No impact	B2
63	Beech (<i>Fagus sylvatica</i>)	S/M	F	10.00	1.50	3.50	4.00	2.00	1.50	1	216	2.60	Suppressed distorted but maintaining good vigour.	No works required	No impact	B2
64	Ash (<i>Fraxinus excelsior</i>)	E/M	G/F	16.00	6.00	2.00	5.50	4.00	3.00	1	366	4.39	Drawn-up with canopy restricted to higher levels only.	No works required	No impact	B2
65	Ash (<i>Fraxinus excelsior</i>)	E/M	G/F	16.00	5.00	3.00	5.00	2.50	3.00	1	357	4.28	Suppressed with canopy limited to higher levels only.	No works required	No impact	B2
66	Beech (<i>Fagus sylvatica</i>)	S/M	P	7.00	3.00	0.00	1.00	3.00	3.50	1	175	2.10	Distorted and affected by bark necrosis and decay.	Consider for removal	No impact	U
67	Beech (<i>Fagus sylvatica</i>)	M	P	17.00	2.00	4.50	5.00	5.00	5.00	1	407	4.89	Affected by extensive bark necrosis and early decay. Unsuitable for retention.	Consider for removal	No impact	U

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev.	Cat
68	Oak (<i>Quercus robur</i>)	E/M	F	17.00	3.00	4.50	6.50	3.00	2.50	1	579	6.95	Is typically one-sided and unbalanced to east as result of position woodland edge. Much of crown is enveloped by ivy cover preventing detailed visual inspection though visible canopy elements appear vigorous.	No works required	No impact	B2
69	Oak (<i>Quercus robur</i>)	S/M	D	7.50	6.50	2.00	0.50	0.00	0.50	1	261	3.13	Completely dead.	Consider for removal	No impact	U
70	Oak (<i>Quercus robur</i>)	S/M	P	14.00	3.00	3.50	1.50	2.50	4.00	1	357	4.28	Entire eastern side of principal stem has been affected by fire damage and bark necrosis. Tree is unsustainable.	Consider for removal	No impact	U

71	Ash (<i>Fraxinus excelsior</i>)	S/M	P	10.00	0.00	3.00	3.00	1.00	3.00	2	366	4.39	Twin stemmed distorted and unbalanced from ground level. Is of inferior quality but presents minimal threat. Possibly suitable for retention as part of broader woodland group.	No works required	No impact	C2
72	Oak (<i>Quercus robur</i>)	E/M	F	14.00	3.00	5.00	5.00	2.50	3.00	1	366	4.39	Supports minor imbalance to north east but is of good vigour and vitality.	No works required	No impact	B2
73	Oak (<i>Quercus robur</i>)	E/M	G	15.00	3.00	6.50	5.50	5.00	5.00	1	465	5.58	Young and vigorous.	No works required	No impact	B2
74	Oak (<i>Quercus robur</i>)	E/M	G	14.00	4.00	5.00	4.50	4.50	5.00	1	407	4.89	Of good vigour and vitality.	No works required	No impact	B2
75	Oak (<i>Quercus robur</i>)	E/M	G	16.00	1.50	5.50	7.00	6.00	4.50	1	579	6.95	Supports overall growth imbalance to east as result of position on woodland edge. Vigour and vitality are good. Ivy is attaining notable levels on principal stem.	No works required	No impact	B2
76	Beech (<i>Fagus sylvatica</i>)	E/M	G/F	15.00	1.50	6.00	4.00	6.00	7.00	1	548	6.57	Tree supports pronounced imbalance to west but appears be maintaining good vigour and vitality.	No works required	No impact	B2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
77	Oak (<i>Quercus robur</i>)	S/M	F	9.00	2.50	2.50	2.50	1.50	1.00	1	290	3.48	Drawn-up and slightly suppressed but maintaining good vigour and vitality.	No works required	No impact	B2
78	Ash (<i>Fraxinus excelsior</i>)	E/M	F/P	12.00	6.00	4.50	3.00	2.00	2.50	1	325	3.90	Vigour and vitality are variable with some large deadwood within crown.	No works required	No impact	C2
79	Hawthorn (<i>Crataegus monogyna</i>)	M	F	8.00	4.00	3.00	2.50	2.00	3.00	1	204	2.44	Distorted and suppressed but maintaining good vigour and vitality.	No works required	No impact	B2
80	Beech (<i>Fagus sylvatica</i>)	E/M	F	15.00	1.50	5.00	7.00	4.00	3.00	1	548	6.57	Unbalanced to east as result of position on edge of woodland. Is multi-stem from low level but appears be maintaining good vigour and vitality.	No works required	No impact	B2
81	Oak (<i>Quercus robur</i>)	E/M	G	13.00	2.50	6.00	4.50	5.00	6.00	1	748	8.98	Once larger specimen appears to have sustained chronic failure of basal stems with high expectation of substantial basal decay.	No works required	No impact	C2
82	Ash (<i>Fraxinus excelsior</i>)	E/M	G/F	15.00	2.50	7.00	6.50	3.00	4.50	1	471	5.65	Primary stem supports notable imbalance to east. General vigour and vitality appear fair though crown support some large deadwood.	No works required	No impact	B2
83	Ash (<i>Fraxinus excelsior</i>)	E/M	F/P	12.00	3.00	4.00	5.00	2.50	3.00	1	433	5.19	A multi-stemmed group of low quality. Suitable for retention only as part of broader woodland thicket.	No works required	No impact	C2
84	Oak (<i>Quercus robur</i>)	E/M	G	15.00	5.00	5.00	5.50	5.50	4.00	1	407	4.89	Young and vigorous.	No works required	No impact	B2
85	Oak (<i>Quercus robur</i>)	S/M	F	15.00	3.00	4.00	2.00	2.00	3.00	1	267	3.21	Drawn-up and suppressed as result of position adjoining dominant ash.	No works required	No impact	C2
86	Beech (<i>Fagus sylvatica</i>)	E/M	F	17.00	2.00	5.00	5.00	5.00	5.00	1	748	8.98	Large specimen heavily divided from 1.00 m. General vigour and vitality remains good.	No works required	No impact	B2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	No impact on dev	Cat
87	Ash Group (<i>Fraxinus excelsior</i>)	E/M	F	15.00	0.00	5.50	6.00	5.00	2.00	4	780	9.36	Vigour and vitality are notably reduced with crown supporting extensive deadwood and evidence of dieback.	No works required	No impact	C2
88	Ash (<i>Fraxinus excelsior</i>)	E/M	F	14.00	3.00	4.50	4.00	4.00	5.00	2	592	7.10	Vigour and vitality are variable throughout crown with some stack heading and dieback apparent raising concerns regarding sustainability. Tree is also noted to be widely affected by canker damage.	No works required	No impact	C2
89	Ash (<i>Fraxinus excelsior</i>)	E/M	F	15.00	3.00	2.50	2.50	1.00	4.00	2	407	4.89	Heavily divided from low level raising concerns regarding mechanical integrity impossible predisposition towards damage. General vigour and vitality appear reasonable at present. Tree should be regarded as part of group including numbers 89 – 92	No works required	No impact	C2
90	Ash (<i>Fraxinus excelsior</i>)	E/M	F	15.00	5.00	2.00	4.50	1.00	1.00	2	401	4.81	Drawn-up but heavily divided from near ground level raising concerns regarding mechanical integrity in later life. Tree should be regarded as part of group including numbers 89 – 92	No works required	No impact	C2
91	Ash (<i>Fraxinus excelsior</i>)	E/M	F	15.00	6.00	5.00	7.00	4.00	2.00	1	344	4.13	Heavily unbalanced and north east. Vigour and vitality are fair though crown deadwood is noted. Tree should be regarded as part of group including numbers 89 – 92	No works required	No impact	C2

92	Ash (<i>Fraxinus excelsior</i>)	E/M	F	14.00	5.00	6.50	4.00	0.00	5.50	1	376	4.51	Heavily unbalanced to south raising concerns regarding stability. Tree should be regarded as part of group including numbers 89 – 92.	No works required	No impact	C2
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No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of dev	Cat
93	Ash (<i>Fraxinus excelsior</i>)	M	F	17.00	5.00	5.00	7.00	5.50	5.50	3	844	10.12	Triple stemmed from near ground level. Exhibiting evidence of early decline that suggests a limited longevity and sustainability.	No works required	No impact	C2
94	Ash (<i>Fraxinus excelsior</i>)	E/M	F	12.00	4.50	4.00	5.00	4.00	4.00	1	344	4.13	Heavily distorted but maintaining reasonable vigour and vitality. Principal stem is obscure by dense ivy cover.	No works required	No impact	C2
95	Beech (<i>Fagus sylvatica</i>)	E/M	G/F	16.00	1.50	4.50	4.50	4.00	4.50	1	493	5.92	Relatively young and still vigorous notwithstanding position arising from what appears to be disturbed ground.	No works required	No impact	B2
96	Ash (<i>Fraxinus excelsior</i>)	E/M	F/P	14.00	5.00	0.00	1.00	5.00	3.00	1	344	4.13	Originally twin stemmed with secondary stem stump at 1.50 m to south east now subject to decay. Tree is of limited sustainability.	No works required	No impact	C2
97	Ash (<i>Fraxinus excelsior</i>)	E/M	F	13.00	2.50	3.00	2.00	3.00	5.00	1	369	4.43	Distorted as result of proximity to near neighbours but apparently maintaining reasonable vigour and vitality.	No works required	No impact	C2
98	Sycamore (<i>Acer pseudoplatanus</i>)	M	F	16.00	2.50	1.00	5.50	5.00	3.50	1	579	6.95	Typically unbalanced to south-east as result of proximity to near neighbours. Vigour and vitality remain good.	No works required	No impact	B2

Eastern Woodland Belt

99	Oak (<i>Quercus robur</i>)	M	D	14.00	5.00	5.00	5.00	3.50	4.50	1	844	10.12	Completely dead and in need of removal.	Consider for removal	No impact	U
100	Beech (<i>Fagus sylvatica</i>)	S/M	F/P	9.00	0.50	3.00	4.00	4.50	4.00	5	398	4.77	Multi-stemmed from ground level and of poor mechanical form. Comprises bank top planting of relatively young trees.	No works required	No impact	C2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of dev	Cat
101	Beech (<i>Fagus sylvatica</i>)	S/M	P	7.50	0.50	4.50	2.00	3.00	5.00	2	462	5.54	Distorted and arising from bank edge. Is affected by Ganoderma and may be subject to collapse in short term future.	No works required	No impact	U
102	Beech (<i>Fagus sylvatica</i>)	E/M	F	13.00	1.25	3.50	4.50	2.50	3.50	1	398	4.77	Part of bank top planting. Remains vigorous but is slightly suppressed.	No works required	No impact	B2
103	Oak (<i>Quercus robur</i>)	S/M	F	8.00	1.50	4.50	2.00	3.00	5.00	1	376	4.51	Heavily distorted but maintaining reasonable vigour.	No works required	No impact	C2
104	Oak (<i>Quercus robur</i>)	M	F	18.00	2.50	8.00	9.00	5.50	7.50	1	866	10.39	Large specimen with minor imbalance to north. Dense Ivy cover obscures the middle-crown. Tree has sustained localised crown damage.	No works required	No impact	B2
106	Oak (<i>Quercus robur</i>)	S/M	F	7.50	2.00	4.50	0.00	4.00	5.00	1	344	4.13	Heavily one-sided and unbalanced to north-west. Remains vigorous. Arises from bank side position.	No works required	No impact	B2
107	Oak (<i>Quercus robur</i>)	S/M	G	10.00	2.25	3.50	1.00	2.00	4.00	1	261	3.13	One-sided as result of suppression but maintaining good vigour and vitality.	No works required	No impact	B2

109	Oak (<i>Quercus robur</i>)	M	F	15.00	2.00	8.00	9.00	7.00	8.00	1	780	9.36	Squat and spreading. Vigour and vitality appear less than that expected for tree of this age raising some concern regarding possible onset of decline. Ivy-covered is limited but developing.	No works required	No impact	B2
110	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	8.50	2.00	3.00	2.50	1.50	3.00	1	229	2.75	Multi-stemmed from ground level but remains vigorous.	No works required	No impact	B2
111	Oak (<i>Quercus robur</i>)	S/M	F	12.00	4.00	1.00	3.00	4.50	1.00	1	220	2.64	Tall and drawn-up excepting imbalance to east.	No works required	No impact	B2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	impact of dev	Cat
112	Ash (<i>Fraxinus excelsior</i>)	S/M	F	9.00	2.00	4.50	1.00	1.00	3.00	11	226	2.71	Drawn-up and unbalanced to west.	No works required	No impact	B2
113	Beech (<i>Fagus sylvatica</i>)	S/M	F	8.00	1.50	3.00	4.50	4.00	2.00	1	207	2.48	Suppressed distorted but maintaining good vigour and vitality.	No works required	No impact	B2
114	Oak (<i>Quercus robur</i>)	E/M	F	13.00	3.00	5.00	5.00	5.00	4.50	1	331	3.97	Young and vigorous though suppressed as result of proximity to near neighbours.	No works required	No impact	B2
115	Ash (<i>Fraxinus excelsior</i>)	S/M	F	11.00	2.50	4.00	3.00	1.50	4.00	2	357	4.28	Twin stemmed from near ground level. Remains vigorous.	No works required	No impact	C2
116	Sycamore (<i>Acer pseudoplatanus</i>)	M	G	9.00	2.50	3.00	3.00	3.50	3.00	1	207	2.48	Young and vigorous, possibly naturally arising.	No works required	No impact	B2
117	Beech (<i>Fagus sylvatica</i>)	S/M	F	7.50	0.00	3.00	5.00	5.00	5.00	1	347	4.16	Squat and distorted, heavily divided by 1.00 m. Remains vigorous and small stature presents limited threat.	No works required	No impact	C2

118	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	9.00	1.25	3.00	3.50	4.00	4.00	1	366	4.39	Young and vigorous, likely to be naturally arising.	No works required	No impact	B2
119	Beech (<i>Fagus sylvatica</i>)	M	G	12.00	0.00	3.00	4.50	3.50	4.50	1	385	4.62	Young and still vigorous, arising from bank side position.	No works required	No impact	B2
120	Beech (<i>Fagus sylvatica</i>)	S/M	P	7.00	0.00	2.50	4.00	2.50	3.00	1	248	2.98	Comprises two proximate stems of distorted form. Small stature presents no threat at present.	No works required	No impact	C2
121	Oak (<i>Quercus robur</i>)	E/M	F/P	12.00	2.25	3.00	5.50	5.50	5.00	1	474	5.69	Of reduced vigour with evidence of substantial and widespread deadwood development possibly indicative of decline onset.	No works required	No impact	C2

No.	Species	Age	Con	Ht	CH	N	E	S	W	Stm	Dia	RPA	Structural Condition	PMR	Impact of the dev	Cat
122	Oak (<i>Quercus robur</i>)	M	G/F	15.00	2.50	5.50	7.00	6.00	6.50	1	611	7.33	Broad and open crown specimen of reasonable vigour. Crown supports notable deadwood.	No works required	No impact	B2
123	Oak (<i>Quercus robur</i>)	E/M	F	10.00	2.00	4.00	6.00	5.00	6.00	1	560	6.72	Squat and spreading with evidence of lower stem damage and decay on eastern face.	No works required	No impact	C2
124	Beech (<i>Fagus sylvatica</i>)	E/M	G	14.00	2.00	5.00	6.50	6.00	6.00	1	576	6.91	Relatively young and still vigorous. Arises from eroded bank top position.	No works required	No impact	B2
125	Beech (<i>Fagus sylvatica</i>)	M	G/F	18.00	2.00	6.00	8.00	6.50	6.00	1	783	9.40	Broadly vigorous though crown is divided with compression fork at 4.00 m	No works required	No impact	B2
126	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	F	9.00	0.00	4.00	2.50	3.00	5.00	2	430	5.16	Suckering specimen coming from embankment edge and beneath canopy of 125. Remains vigorous.	No works required	No impact	C2
127	Sycamore (<i>Acer pseudoplatanus</i>)	S/M	P	8.00	0.00	2.50	4.00	4.00	3.50	4	376	4.51	Suckering group arising from disturbed and eroding embankment. Higher crown shows signs of decline onset. Unsuitable for retention.	Consider for removal	No impact	U
128	Monterey Cypress Group (<i>Cupressus macrocarpa</i>)	M	F	17.00	1.00	9.00	8.00	7.00	7.50	1	684	8.21	A close-knit group of four specimens with two southernmost specimens being dominant. Remains vigorous at present and asserts immense potential for continued growth over time. Concern exists in respect of species predisposition towards damage and ultimate sustainability.	No works required	No impact	C1-2

Appendix B: Arboricultural Method Statement

Introduction

This report has been prepared in accordance with British Standard 5837: Trees in relation to design, demolition and construction – Recommendations (2012) which provides a methodology for the assessment and protection of trees and other significant vegetation on development sites.

Sequence of Operations

- Carry out the proposed tree works.
- Installation of tree protection measures.
- Enabling works.
- Construction of proposal and the installation of drainage and services.
- Landscaping.

Alternative sequences can be discussed and agreed with the local authority and project manager if required.

Supervision

All key / critical activities that will affect trees during construction will be inspected and monitored by the approved arboricultural consultant if so requested by the local authority.

- Pre-commencement meeting with site manager and local authority to confirm location of tree protection measures.
- Inspection of all tree works and tree protection measures prior to the commencement of works.
- Supervision during the excavation works within the RPAs of retained trees.
- Supervision during the installation of all services within tree RPAs.
- Supervision during any other works that may affect retained trees.
- Inspection upon completion.

Arboricultural Method Statement	
Scope	Methodology
Pre-commencement meeting	<p>Prior to the commencement of works, a meeting between the arboricultural consultant, local authority and the site manager will be held in order to discuss the tree protection measures and proposed works required in close proximity to trees. (if requested)</p> <p>Contact details of all parties will be circulated to ensure all team members are able to communicate correctly.</p> <p>The site manager will be responsible for the protection of all retained trees for the duration of the project. Whenever necessary, the site manager will engage the arboricultural consultant to ensure trees are adequately protected.</p> <p>The appointed arboricultural consultant will be available for verbal advice throughout site works.</p>
Tree Works	<p>Please refer to the Tree Work Schedule at Appendix A for a list of all proposed tree works. The location of trees to be removed are highlighted on the Tree Removals Plan</p> <p>It is the responsibility of the Site Manager to ensure all tree works have been approved by the local planning authority.</p> <p>All tree works will be carried out by a reputable arboricultural contractor in accordance with the recommendations given in BS 3998:2010 – Tree Work Recommendations.</p> <p>All tree works should be carried out in accordance with Section 40 of the Wildlife Act 1976 and Section 46 of the Wildlife (Amendment) Act 2000.</p> <p>It is the responsibility of the arboricultural contractor to ensure that no protected species are harmed whilst carrying out site clearance or tree surgery works.</p>
Tree Protection	<p>The position of protective fencing for construction is shown on the Tree Protection Plan.</p> <p>Protective fencing will be constructed and installed using fencing in accordance with BS5837:2012, please refer to the attached Tree Protection Plan for the specification. Alternatives to those shown must be agreed in advance by the client approved, arboricultural consultant.</p>

	<p>Any machinery / site operative within tree RPAs must operate on the appropriate ground protection at all times, this will include the installation and removal of ground protection.</p> <p>Ground protection measures must be installed in accordance with industry best practice guidance as stated within Section 6.2.3.3 of BS 5837:2012. They must be fit for purpose and capable of supporting any traffic entering or using the site without being distorted or causing compaction of underlying soil.</p> <p>No materials or equipment other than those required to erect protective fencing will be delivered to the site before the fencing is installed.</p> <p>Signs will be fixed to every third panel stating, <i>'Tree Protection Area Keep Out – Any incursion into the protected area must be with the agreement of the local authority or arboricultural consultant'</i>.</p> <p>The main contractor will inform the local authority and the arboricultural consultant that tree protection is in place before site clearance works commence.</p> <p>No alteration, removal or repositioning of the tree protection will take place during construction without the prior consent of the arboricultural consultant.</p>
Compound Area	<p>The proposed site compound area has not yet been designed; however, the considerations below must be followed:</p> <p>The site compound must be located outside the designated TPZs as highlighted on the Tree Protection Plan at Appendix B.</p> <p>No excavation works within tree RPAs are permitted to install temporary services for site cabins and facilities. Any temporary services within tree RPAs must be above ground and protected accordingly.</p> <p>No operating generators or toxic liquids will be stored within the RPAs of retained trees during construction.</p> <p>Overhanging tree canopies must be taken into consideration when transporting, installing and removing site cabins near tree crowns. A banksman will be present during this process to ensure that all operations are carried out in a controlled manner and no part of the cabin meets overhanging tree crowns.</p>

Installation of fencing within RPAs	<p>The installation of fencing within the RPAs of retained trees will be carried out using the following methodology:</p> <p>Post holes will be carefully positioned as far away from the stem of trees as possible (minimum 50 cm) to minimise contact with tree stems and significant tree roots.</p> <p>Holes will be manually excavated with the use of hand tools only and where roots greater than 25mm in diameter or large fibrous roots are present, the position of the hole will be slightly altered to avoid potential root damage.</p> <p>If the position of the hole cannot be altered, roots greater than 25mm in diameter or large fibrous roots will be protected with flexible plastic pipes and retained within the pit.</p> <p>In some cases, individual roots less than 25mm in diameter may be pruned, making a clean cut with a suitable sharp sterile tool (e.g. secateurs or hand saw).</p> <p>Once the required depth has been excavated, the hole will be lined using 1000-gauge polythene and filled with the appropriate concrete mix.</p>
Landscape Operations	<p>All landscape operations within the protected area will be carried out by hand, using hand tools only, unless otherwise agreed with by the arboricultural consultant.</p>
	<p>No dumping of spoil or rubbish, parking of vehicles or plant, storage of materials or temporary accommodation will be undertaken within the TPZs.</p> <p>All tree roots within the RPAs greater than 25mm diameter will be retained and worked around.</p> <p>Soil levels will not be increased or reduced within the RPAs of trees without prior agreement from the arboricultural consultant.</p>

<p>General Principles to Avoid Damage to Trees</p>	<p>All tree works will be carried out in accordance with the recommendations given in BS 3998 (2010).</p> <p>No fires will be permitted within 20m of the crown of any tree.</p> <p>No materials, vehicles, plant or personnel will be permitted into the tree protection zones at any time without the prior consent of the arboricultural consultant.</p> <p>Any liquid materials spilled on site will be immediately cleared up and removed from the site. If liquid fuel or cement products are spilled within 2m of the tree protection zone, the contractor will report the incident to the arboricultural consultant immediately.</p> <p>The contractor will report any damage to trees or shrubs, whether caused by construction activities or from any other cause, to the arboricultural consultant immediately.</p>
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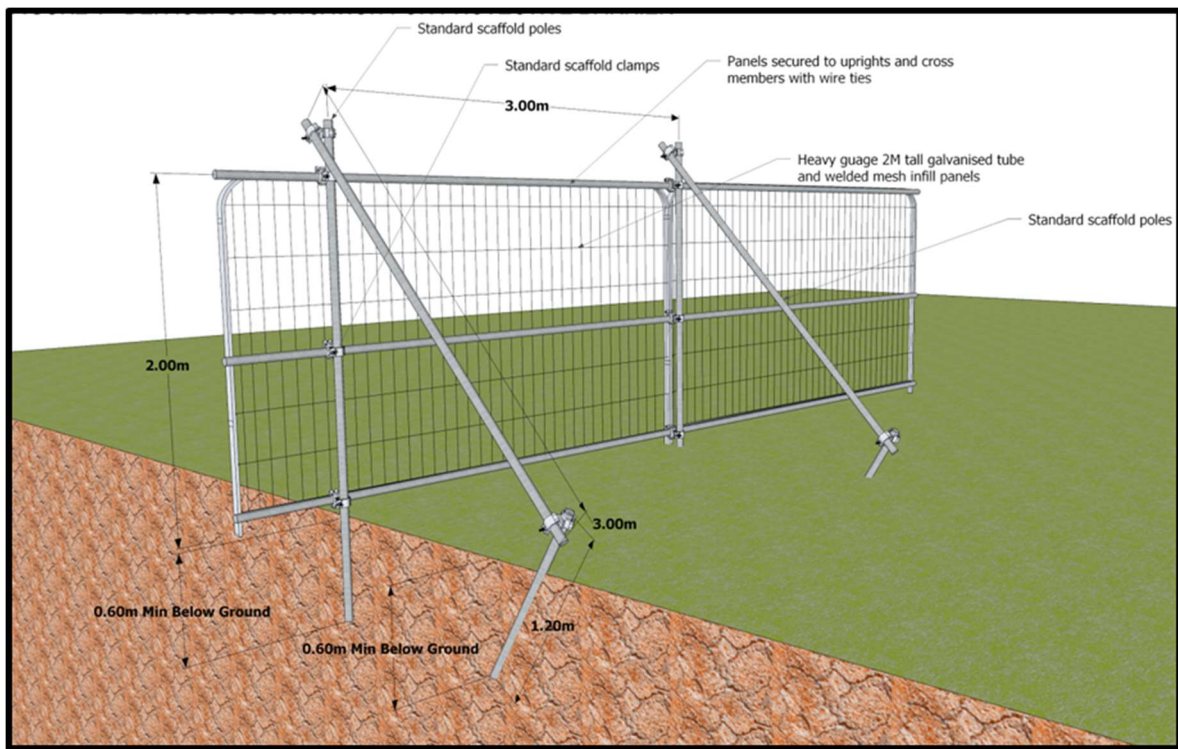


Figure 3 Default specification for tree protection barrier in accordance with BS5837:2012





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Yours in Conservation,

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