

Arboricultural Impact Assessment (AIA)

September 2021

Unit 4
Brown Street
Littleborough
OL12 6LZ

U R B A N
G R E E N

QUALITY MANAGEMENT

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1. Executive Summary

- 1.1.1. Urban Green has been instructed by The Casey Group to carry out an Arboricultural Survey to British Standard 5837:2012 guidelines at Unit 4, Brown Street, Littleborough and produce our findings in a report.
- 1.1.2. It is proposed to demolish the existing buildings and develop the site into residential housing alongside landscape improvements such as parking and soft landscaping. Full details of the proposed site layout can be seen on the plans included in Appendix 4.
- 1.1.3. The proposed development requires the removal of a single tree (T8) this tree is located within the site boundary. It is recommended that this tree loss is mitigated for by replacement tree planting and the production of a robust soft landscaping scheme.
- 1.1.4. T8 is the only tree to be removed which comes under a TPO (Ref TPO NO.270.2006).
- 1.1.5. Before any tree works are carried out trees should first be assessed for their suitability for protected species by a suitably qualified and experienced ecologist.
- 1.1.6. Tree protection fencing, and ground protection will need to be installed at the alignment shown on the Tree Protection Plan in Appendix 4 before any construction activity takes place.
- 1.1.7. Information regarding the layout of new utilities and drainage and final site levels should be submitted to the Arboricultural Consultant so that the impact of these on the retained trees can be assessed.

2. Introduction

2.1. Instructions and references

- 2.1.1. We have been instructed by The Casey Group to carry out a Arboricultural Impact Assessment (AIA) in accordance with BS 5837:2012 Trees in relation to design, demolition and construction – Recommendations at the site location and produce our findings in a report to be submitted with a detailed planning application.
- 2.1.2. All trees, regardless of their statutory status, are a material consideration in a planning application. BS 5837 recognises the potential conflict between trees and development. The standard sets out to assist those concerned with trees in relation to construction and aid with decision making. This is achieved by providing impartial and balanced information on trees and their potential impacts.
- 2.1.3. Due to the nature of the site, it was decided that the survey methodology would include broadly grouping trees that share very similar characteristics. This method is in line with point 4.4.2.3 of BS 5837:2012 that states ‘Trees forming groups...should be identified and considered as groups where the arboriculturist determines that this is appropriate... It may be appropriate to assess the quality and value of trees as a whole, rather than individuals.’
- 2.1.4. The site is located in the area shown in Figure 1. The OS Grid Reference is SD 93536 16399.



Figure 1 – Site Location Plan

2.2. Scope

- 2.2.1. The AIA takes into account any potential impacts on existing trees including the effect of any tree loss required to implement the design and recommendation for the establishment of new trees.
- 2.2.2. The AIA will also assess any potentially damaging activities proposed in the vicinity of retained trees and the effect that the retained trees may have on the development such as potential nuisance caused by excessive leaf/fruit litter, lighting levels and potential damage to structures.

2.3. Documents provided

- 2.3.1. A scaled plan has been provided with tree positions already plotted. Any extra trees found on site that were not included on the original plan have been plotted according to measurements taken on site and/or using aerial photography.
- 2.3.2. Tree locations which have been estimated are illustrated on the Tree Protection Plan in Appendix 4. The exact locations of these trees must be verified, and any discrepancies discussed with the Arboricultural Consultant before starting works on site.
- 2.3.3. A plan outlining the development proposals has been overlaid with the Tree Constraints Plan in order to assess the potential impacts.

2.4. Limitations

- 2.4.1. The report is based upon a visual inspection. The consultant shall not be responsible for events that happen after the date of the report due to factors that were not apparent at the time, and the acceptance of this report constitutes an agreement with the guidelines and the terms listed in this report.
- 2.4.2. The consultant accepts no liability in respect of the trees unless the recommendations of this report are carried out under his supervision.
- 2.4.3. Assessing the potential influence of trees upon load bearing soils, beneath existing and proposed structures resulting from water abstraction by trees or rehydration of shrinkable soils was not included in the contract brief and is therefore not considered in the report. The consultant cannot be held responsible for damage arising from such action.
- 2.4.4. Trees are living organisms whose health, condition and structure can change over time. The contents of this report are valid for a period of one year from the date of the report.
- 2.4.5. Potentially hazardous trees are highlighted, and appropriate recommendations are made. However, this report is not a substitute for a full tree risk assessment or management plan which are specifically designed to minimise risk and liability associated with responsibility for trees.

3. Legislation

3.1. Tree protection status

- 3.1.1. A Tree Preservation Order (TPO) is an order made by a Local Authority to protect specific trees, groups of trees or woodlands in the interests of amenity. A TPO prohibits the cutting down, topping, lopping, uprooting and wilful damage or destruction of trees without the Local Authority's written consent.
- 3.1.2. We have been informed by Rochdale Borough Council that there is a TPO enforced upon this site TPO ref (NO. 270, 2006).
- 3.1.3. All trees surveyed except T1, G2 G3, H4, T23, G24 and T25 are within the group TPO.
- 3.1.4. We have also been informed that there is a conservation area that runs along the north-western and north site boundary, none of the vegetation surveyed comes under this conservation area.
- 3.1.5. It is recommended that the Local Authority is consulted before any tree works are undertaken, as new TPOs may have been created since the time of enquiry, and heavy fines exist for unauthorised works to protected trees.
- 3.1.6. All works to trees covered by a TPO require permission from the Local Authority, including any pruning. However, this does not include trees that are dead or have become dangerous. The removal of dead branches is also excluded from a TPO. Although the above exceptions exist, it is advisable to give the Local Authority five days' notice in writing of any intended removal. Permission is not needed where tree work is required to implement an approved planning application.
- 3.1.7. In a Conservation Area, all trees greater than 75mm in diameter at 1.5m above ground level are protected. Where tree work is required in a Conservation Area, a Section 211 notice of intent must be submitted the Local Planning Authority who have six weeks to decide to either make a TPO or allow the work to proceed.
- 3.1.8. The proposed work can proceed after six weeks as it is presumed that the Local Authority consents if they have not responded in that time.
- 3.1.9. It is an offence to remove more than 5m³ of timber in any one calendar quarter without having first obtained a felling licence from the Forestry Commission. It must be noted, however, that this excludes sites where planning permission has already been granted.

3.2. Wildlife

- 3.2.1. Prior to the commencement of any tree works, the trees should be assessed for the presence of protected species, some of which are subject to the *Wildlife and Countryside Act 1981* (as amended) and the *Conservation of Habitats and Species Regulations 2017*.
- 3.2.2. Urban Green have been appointed to complete a Preliminary Ecological Appraisal of the site (UG1240_ECO_PEA). The objectives of the assessment are to identify habitats on site and determine the suitability for any 'protected and/or notable' species, with consideration of any potential impacts on nearby designated sites.

- 3.2.3. If tree works are carried out during the bird nesting season (March to August inclusive), trees would need to be inspected by a qualified ecologist within the 24-hour period prior to the commencement works.

4. Arboricultural Impact Assessment (AIA)

4.1. Summary of the development

- 4.1.1. It is proposed to demolish the existing buildings and develop the site into residential housing alongside parking and soft landscaping. Full details of the proposed site layout can be seen on the plans included in Appendix 4.

4.2. Tree constraints

- 4.2.1. BS 5837:2012 recognises that conflicting requirements of the planning system for development means that trees are only one factor which need to be taken into consideration. Although there may be certain specimens that can pose significant constraints to development due to their importance, it is essential that inappropriate tree retention is avoided.
- 4.2.2. Trees can be adversely affected on development sites if their protection is not factored into the wider project management of onsite operations. We have transposed the tree survey plan over plans detailing current proposals in order to assess the impact on surveyed trees.
- 4.2.3. It is essential that roots are protected from construction works including physical damage from excavation and changes in soil structure from compaction and changes in ground levels.

4.3. Root Protection Areas (RPAs) explained

- 4.3.1. The RPA is an area of ground around the base of a retained tree, which is calculated in relation to the stem diameter, where disturbance should be kept to a minimum and avoided if at all possible.
- 4.3.2. The majority of tree roots grow within the upper 600mm of the soil profile where most nutrients are available as the result of the decomposition of organic matter close to the surface. Rooting conditions become less favourable at depth as the soil density increases, creating anaerobic conditions.

4.4. Surveyed Trees

- 4.4.1. The survey assessed seventeen individual trees, five groups and one hedge, the quality and value of which are summarised below.
- 4.4.2. Six trees/groups were assessed as `Moderate Quality` retention category B and seventeen trees/groups/hedges were assessed as `Low Quality` retention category C
- 4.4.3. All of the surveyed trees are either within or on the boundaries of the application site. Except G3, H4, T23, H24 and T25.

4.5. Impacts of development

- 4.5.1. One 'Moderate Quality' B category tree T8 requires removal to facilitate this development.
- 4.5.2. The loss of this tree will have little, localised impacts on public views, this tree loss will be mitigated by the retention of the boundary vegetation surrounding the site.
- 4.5.3. All other trees can be retained, in accordance with BS5837:2012.
- 4.5.4. Ground protection is required on the RPA of T1 and T9 to allow for the construction of the building while protecting the roots from compaction.
- 4.5.5. Cellular confinement is required within the root protection area of T9. This will need to be an above ground system to avoid damage to roots. There is existing hard surface within the RPA currently, so care needs to be taken when removing the existing surface and replacing with the new as described above. See section 4.10.
- 4.5.6. Trees in G3, H4, T23, H24 and T25 are on third party land and have grown up behind metal storage containers, it is therefore considered they will be protected by the site hoarding.

4.6. Tree surgery works

- 4.6.1. Tree works that are recommended within the Tree Works Schedule (Appendix 4) are works required to facilitate development and also include details or remedial works. Tree works stated in the Tree Data Schedule (Appendix 1) are of a general maintenance nature and can be carried out at any time as per recommendations.
- 4.6.2. Tree works required to facilitate the development will be carried out prior to the commencement of any onsite operations. This should allow sufficient space for approved construction to be carried out.
- 4.6.3. Any unforeseen tree works that become apparent during the construction process will require written consent from the Local Authority Tree Officer.

4.7. Protective fencing

- 4.7.1. Temporary protective fencing will need to be installed at the alignment indicated on the Tree Protection Plan in Appendix 4, prior to the commencement of any construction activities on site including the delivery of materials and site facilities.
- 4.7.2. Any fencing that is damaged so that it is no longer able to protect retained trees must be replaced/repared immediately with appropriate fencing.
- 4.7.3. The required specification for protective fencing is illustrated in the Tree Protection Plan (Insert 1).
- 4.7.4. The 'in-ground' system involves driving vertical scaffold poles approximately 0.6m into the ground onto which are affixed horizontal scaffold poles and bracing struts. 2m high anti-climb weldmesh panels are then wired to the scaffold framework. The vertical scaffold poles should be at a maximum of 3m apart.

- 4.7.5. No fixing shall be made to any tree and all possible precautions shall be taken to prevent damage to the tree roots when locating uprights.
- 4.7.6. A 600mm x 300mm warning sign reading “TREE PROTECTION AREA KEEP OUT” shall be fixed to every 10m of protective fencing, as illustrated on the Tree Protection Plan (Insert 2).

4.8. Temporary tree guard – T1

- 4.8.1. Where space is limited, it is sometimes necessary to construct a temporary tree guard to physically protect the main stem of the tree.
- 4.8.2. This should be made by joining together 4 X 25mm exterior grade pieces of plywood to 47mm X 47mm treated timber posts to create a box shaped frame which is attached to the ground or adjacent structures. No fixings are to be made to the tree and suitable ground protection should be employed within the RPA of the tree.

4.9. Ground protection for pedestrians or light vehicles

- 4.9.1. The primary method of ground protection is the installation of a compressible layer (e.g. woodchip) over a geotextile fabric with side butting scaffold boards.
- 4.9.2. Ground protection measures whilst working the RPA must be capable of supporting the expected loads and avoid compaction of the soil.
- 4.9.3. The boarding will be left in place until the construction works are finished.
- 4.9.4. Scaffolding may first be erected with the uprights on spreader boards and the ground protection installed around the uprights.

4.10. Demolition and removal of surfaces in the RPA

- 4.10.1. During demolition, the following restrictions will apply:
- Where direct damage by falling masonry is likely, the tree should be protected by exterior grade plywood sheets constructed around the main stem.
 - The main body of any mechanical excavator will operate outside the RPA.
 - Masonry will be pulled away from trees where possible.
 - When breaking masonry, a fine water spray will be used to minimise dust particles.
 - Excessive dust particles on trees will be removed each day by spraying with water.
 - Hard surfaces should be kept in place for as long as possible during construction works in order to prevent soil compaction in the RPA.
 - During surface removal, the following restrictions will apply:
 - Only hand operated tools will be used to lift existing surfaces and sub-base. No mechanical excavators are to be used.
 - No excavation below the existing sub-base will occur.
 - All surface removal within the RPA will be supervised by the Arboricultural Consultant or the Local Authority Tree Officer.

4.11. Temporary site cabins

- 4.11.1. All storage facilities and deliveries will make use of existing hard surfaces to avoid unnecessary compaction within RPAs. The locations will be agreed in writing with the LPA prior to delivery and will remain in the agreed locations unless approved by the LPA.
- 4.11.2. If storage facilities require siting within RPAs, every effort will be made to ensure that any damage to aerial parts of retained trees is avoided and that appropriate footings are used to avoid root damage or compaction of the soil.

4.12. Utilities

- 4.12.1. At the time of writing Urban Green have not been made aware of any new utilities or service runs that will be associated with the development. Information regarding the layout of new utilities and drainage and final site levels should be submitted to the Arboricultural Consultant so that the impact of these on the retained trees can be assessed.

4.13. Recommendations

- 4.13.1. All operations that could affect trees on and adjacent to the site must be considered as part of the project management of the Proposed Development. It is therefore recommended that an Arboricultural Consultant is appointed as part of the design and management team to advise on pre-development issues and supervise on-site operations.
- 4.13.2. The Arboricultural Consultant may also have an advisory role in the preparation of site including tree surgery works and the protection of trees during demolition processes.
- 4.13.3. The Arboricultural Consultant shall be responsible for inspecting all protective fencing prior to the commencement of all onsite activity.

Appendix 1 - Tree Data Schedule

The following pages contain information gathered during the site survey. The reader should refer to Appendices 2 and 3 in order to correctly interpret the tree data.

Reference T= Tree G = Group H = Hedge W = Woodland	Age & Species	Height (m)	Crown Ht (m)	DBH (mm)	Crown Spread (m) N W E S	Notes	Recommendations		Physiological Condition	Life Expectancy (yrs)	RPA Radius
							Priority	Inspect Freq (yrs)	Structural Condition	Retention Category	(m)
T1	Mature Cherry Prunus sp	8	6	500	3 3 3	1: Bifurcate at 1m. 2: Minor bark wounds. 3: Outside of site so possibly third party. 4: Wounds from removed branches. 5: Crown touching utility lines.	Prune back from utility lines.		Good	20-40 B	6.00
							n/a	3	Good		
G2	Early-Mature Mixed Species	av 11	av 3	av 350	3 3 3 each	1: Two mature silver birch, one young sycamore and one cherry. 2: Unable to get access to view trees or survey. 3: Wounds and decay in trunks and stems of silver birch.	Arrange access and re-inspect.		Good	10-20 C	4.20
							High	1	Fair		
G3	Semi-Mature Leyland Cypress x Cupressocyparis leylandii	av 3	av 0.1	av 100	1 1 1 each	1: Young cypress trees on third party and behind storage. containers. 2: Access prevented detailed inspection.	No action required.		Good	20-40 C	1.20
							n/a	3	Fair		
H4	Semi-Mature Leyland Cypress x Cupressocyparis leylandii	av 3	0.1	100	0.5 0.5 0.5	1: Maintained as a hedge, all topped. 2: Third party trees behind fence.	No action required.		Good	40+ C	1.20
							n/a	3	Good		
T5	Semi-Mature Lawson Cypress Chamaecyparis lawsoniana	3	1	150	1.5 1.5 1.5	1: Multi stemmed at base. 2: Slight stem leak in main stem.	No action required.		Good	20-40 C	1.80
							n/a	3	Fair		
T6	Semi-Mature Sycamore Acer pseudoplatanus	5	1	220	2 2 2	1: Trifurcate at 1.5m.	No action required.		Fair	20-40 C	2.64
							n/a	3	Fair		

Reference T = Tree G = Group H = Hedge W = Woodland	Age & Species	Height (m)	Crown Ht (m)	DBH (mm)	Crown Spread (m) N W E S	Notes	Recommendations		Physiological Condition	Life Expectancy (yrs)	RPA Radius
							Priority	Inspect Freq (yrs)	Structural Condition	Retention Category	(m)
T7	Semi-Mature Lawson Cypress Chamaecyparis lawsoniana	4	0.1	220	1 1 1	1: Multi stemmed at base.	No action required.		Good	40+	2.64
							n/a	3	Fair	C	
T8	Early-Mature Sycamore Acer pseudoplatanus	12	1.5	400	0.5 5 5	1: Multi stemmed at 2m. 2: Canopy growing with t10.	No action required.		Good	40+	4.80
							n/a	3	Good	B	
T9	Mature Sycamore Acer pseudoplatanus	14	1.5	680	5 5 1.5	1: Multi stemmed at 2.5m.	No action required.		Good	40+	8.16
							n/a	3	Good	B	
T10	Semi-Mature Spruce Picea sp	7	0.5	300	1.5 0.5 1.5	1: Suppressed tree.	No action required.		Good	20-40	3.60
							n/a	3	Good	C	
T11	Semi-Mature Ash Fraxinus excelsior	15	0.5	350	3 3 3	1: Growing on top of falling stone wall. 2: Second tree already failed.	Monitor.		Fair	20-40	4.20
							Moderate	1	Fair	C	
T12	Semi-Mature Alder (common) Alnus glutinosa	10	1	160	2 2 2	1: Brambles at base.	No action required.		Good	20-40	1.92
							n/a	3	Good	C	

Reference T= Tree G = Group H = Hedge W = Woodland	Age & Species	Height (m)	Crown Ht (m)	DBH (mm)	Crown Spread (m) N W E S	Notes	Recommendations		Physiological Condition	Life Expectancy (yrs)	RPA Radius	
							Priority	Inspect Freq (yrs)	Structural Condition	Retention Category	(m)	
G13	Young Willow Salix sp	av 6	2	av 100	av 2 2 2 each	1: Two young self set trees.	No action required.		Good	40+	C	1.20
	n/a		3	Good								
G14	Semi-Mature Sycamore Acer pseudoplatanus	av 12	av 3	av 250	av 2.5 2.5 2.5 each	1: Row of trees along footpath. 2: Bark wounds and minor deadwood. 3: Limited access prevents a detailed inspection.	No action required.		Good	40+	B	3.00
	n/a		3	Good								
T15	Over-Mature Willow Salix sp	10	1	620	3 3 3	1: 2 stems failed but still alive. 2: Decay in stems. 3: Dead branches.	Monitor.		Fair	10-20	C	7.44
	Moderate		1	Poor								
T16	Semi-Mature Norway Maple Acer platanoides	9	2	180	4 2 2	1: Multi streamed at base. 2: Growing on to of crumbling verge. 3: Roots exposed in soil.	Monitor.		Good	10-20	C	2.16
	Moderate		1	Fair								
T17	Mature Ash Fraxinus excelsior	14	2.5	420	6 3 5	1: Large exposed roots to north.	No action required.		Good	40+	B	5.04
	n/a		3	Good								
T18	Semi-Mature Willow Salix sp	7	0.5	300	1.5 2 2	1: Minor deadwood.	No action required.		Good	20-40	C	3.60
	n/a		3	Good								

Reference T = Tree G = Group H = Hedge W = Woodland	Age & Species	Height (m)	Crown Ht (m)	DBH (mm)	Crown Spread (m) N W E S	Notes	Recommendations		Physiological Condition	Life Expectancy (yrs)	RPA Radius
							Priority	Inspect Freq (yrs)	Structural Condition	Retention Category	(m)
T19	Semi-Mature Ash Fraxinus excelsior	6	1	230	1 2.5 2.5	1: Twin stemmed at base.	No action required.		Good	20-40	2.76
							n/a	3	Good	C	
G20	Semi-Mature Ash Fraxinus excelsior	av 8	av 2	av 230	av 2.5 2.5 2.5 each	1: Group of 2. 2: Ivy on upper stem. 3: Merged canopies as stem adjacent as one canopy.	No action required.		Good	40+	2.76
							n/a	3	Good	C	
T21	Mature Goat Willow Salix caprea	7	2	420	5 5 5	1: Multi stemmed at base. 2: Ivy on stems. 3: Wounds with some decay.	No action required.		Good	20-40	5.04
							n/a	3	Fair	C	
T22	Mature Goat Willow Salix caprea	11	1.5	450	5 5 5	1: Third party tree. 2: Co-dominate stemmed st base.	No action required.		Good	40+	5.40
							n/a	3	Good	C	
G23	Mature Leyland Cypress x Cupressocyparis leylandii	av 18	0	av 400	av 4 4 each	1: Third party. 2: Appears to be in acceptable condition at present.	No action required.		Good	40+	4.80
							n/a	3	Good	B	
G24	Mature Goat Willow Salix caprea	av 11	av 1.5	av 450	av 5 5 each	1: Third party tree. 2: Co-dominate stemmed st base.	No action required.		Good	40+	5.40
							n/a	3	Good	B	

Appendix 2 - Tree Schedule Definition of Terms

Tree Referencing	Individual Trees T (+number) Grouped Trees G (+number) Hedgerows H (+number) Woodlands W(+number)
Age Category	Young Usually <15 years Semi-mature Significant growth expected, approximately one third of life expectancy complete Early-Mature Full height achieved with further significant growth possible, up to two thirds of life expectancy complete Mature Full height has been achieved with possible spreading of the canopy, usually past two thirds of overall life expectancy Veteran Usually a tree of significant age with characteristics that give additional cultural, landscape and conservation benefits, Over-mature A tree declining due to age as indicated by deterioration in the health and condition of its crown and trunk.
Species	Botanical Name conforming to the International Code of Nomenclature for algae, fungi, and plants (ICN). For universal plant recognition. Common Name commonly used names usually on a local and national scale.
Tree Height	The vertical distance between the base of the tree (where soil and buttress meet) and the tip of the highest branch on the tree.
Crown Height	Measured from ground level to the height at which the main crown begins.
Stem Diameter (DBH)	Stem diameter is measured at 1.5 m above ground level
Crown	Measurements taken from all four cardinal points in metres.
Notes	Notes are made to inform of any possible defects, peculiarities or points of interest that may relate to the trees position, physiology, safety and possible effects on developments.
Recommendations	Recommendations are made in accordance to good arboricultural practice. Recommendations are made regardless to the end usage of the site.
Priority Scale	Priority is given dependant on the perceived threat and the likelihood of failure given to a possible hazard. The priority of work is given regardless of the end usage of the site. Urgent To be carried out as soon as possible. Very High To be carried out within 1 month. High To be carried out within 3 months. Moderate To be carried out within 1 year. Low To be carried out within 3 years.
Physiological Condition:	Good Usually healthy with no symptoms of poor health or disease. Fair Exhibiting signs of poor health or minor disease infections that are not considered to be hazardous. Poor Disease present in considerable quantities or with very poor physiological vigour. Very Poor Tree is in a moribund state in extremely poor condition, usually with little chance of recovery.
Structural Condition:	Good A tree with no significant structural defects. Fair Minor defects may have been observed but are not considered to be immediately hazardous. Poor Significant defects found. Tree requires monitoring or remedial works. Very Poor Major defects that require immediate remedial work or the removal of the tree.
Life Expectancy:	The estimated number of years before the tree may require removal should no unexpected mechanical or environmental impacts occur to the tree.
Retention Category:	Please refer to Tree retention categorisation table on the next page.

Appendix 3 - Tree Retention Category

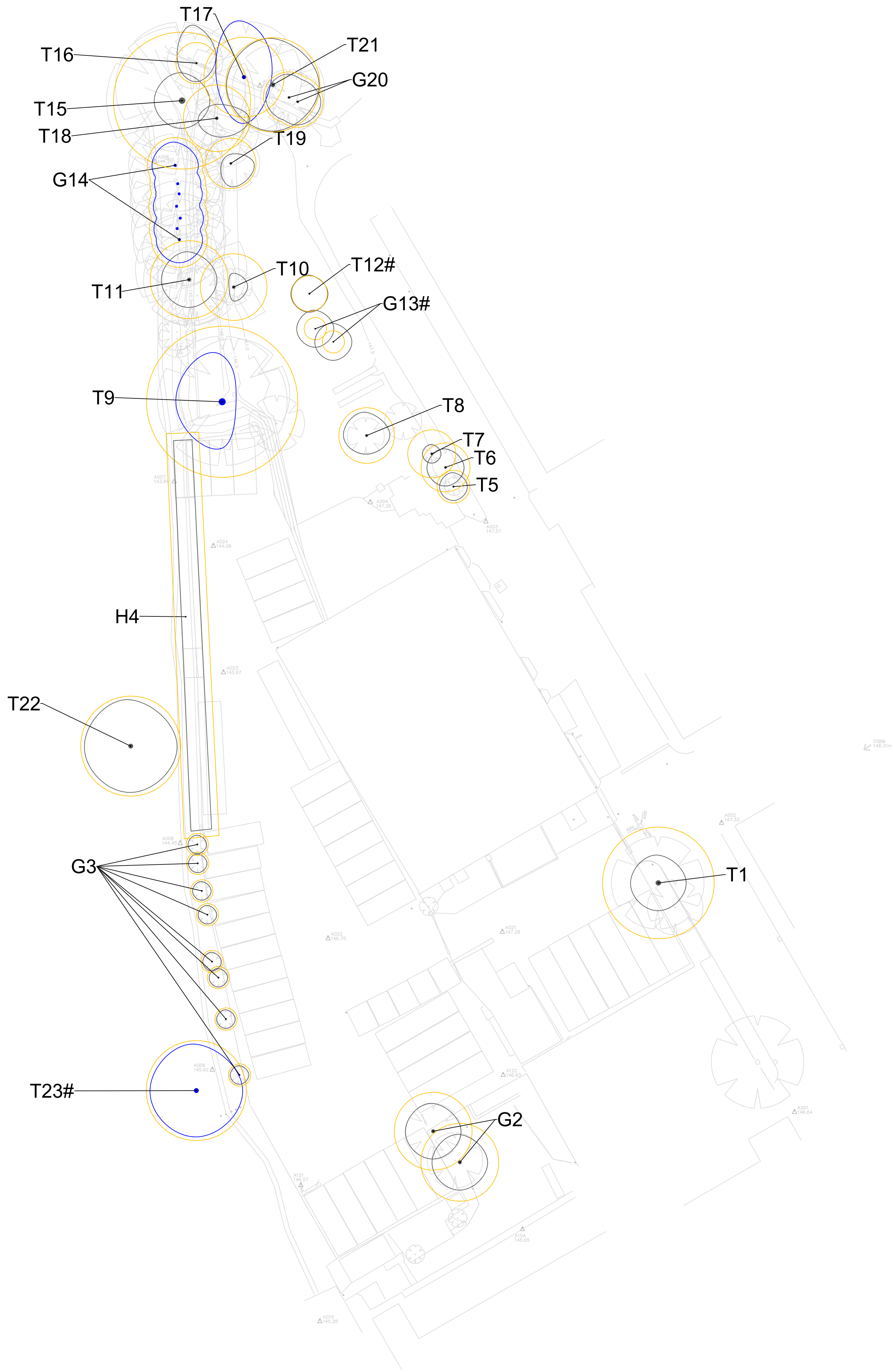
The following table provides an explanation of retention categories used.		
Trees to be removed		Colour on Plan
Category U Includes trees of very low quality that offer little or no amenity value.	Trees that are in such a condition that they should be removed as a matter of good arboricultural practice regardless of given proposals.	RED
Trees to be considered for retention		
Category A Trees of a high quality, with an estimated life of expectancy of at least 40 years	Trees that are excellent examples of their species, usually mature, especially if rare or unusual including veteran trees. Category A trees are likely to enhance a development and should be retained wherever possible.	GREEN
Category B Trees of moderate quality with an estimated remaining life expectancy of at least 20 years.	Trees that are good examples of their species. B category trees are usually mature or younger trees with the potential to reach A category in the future. Although the retention of these trees is desirable, some losses may be acceptable.	BLUE
Category C Trees of low quality with an estimated remaining life expectancy of at least 10 years, or young trees with a stem diameter below 150 mm.	Unremarkable trees of very limited merit or such impaired condition that they do not qualify in higher categories.	GREY
NOTE: Trees that are viewed as borderline and do not fit neatly into either of the categories are given a plus or minus rating (+/-) in the tree data schedule. Therefore, C+ would denote a tree being borderline C/B although C is deemed to be the most appropriate category. Similarly, B- would denote a tree being borderline B/C with B seen as the most appropriate category.		

Appendix 4 - Site Plans

The site plans referred to in the report follow this page which include the following:

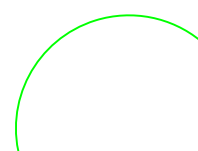
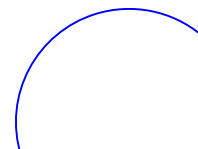
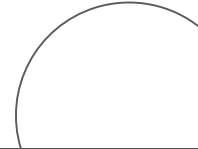
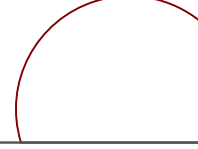
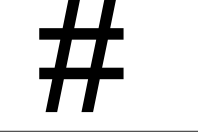
- Tree Constraints Plan
- Tree Removal Plan
- Tree Works Schedule
- Tree Protection Plan
- Tree Protection Inserts

Although included plans are usually to scale, they are only intended to indicate positions of surveyed trees and dimensions should not be taken from these drawings.

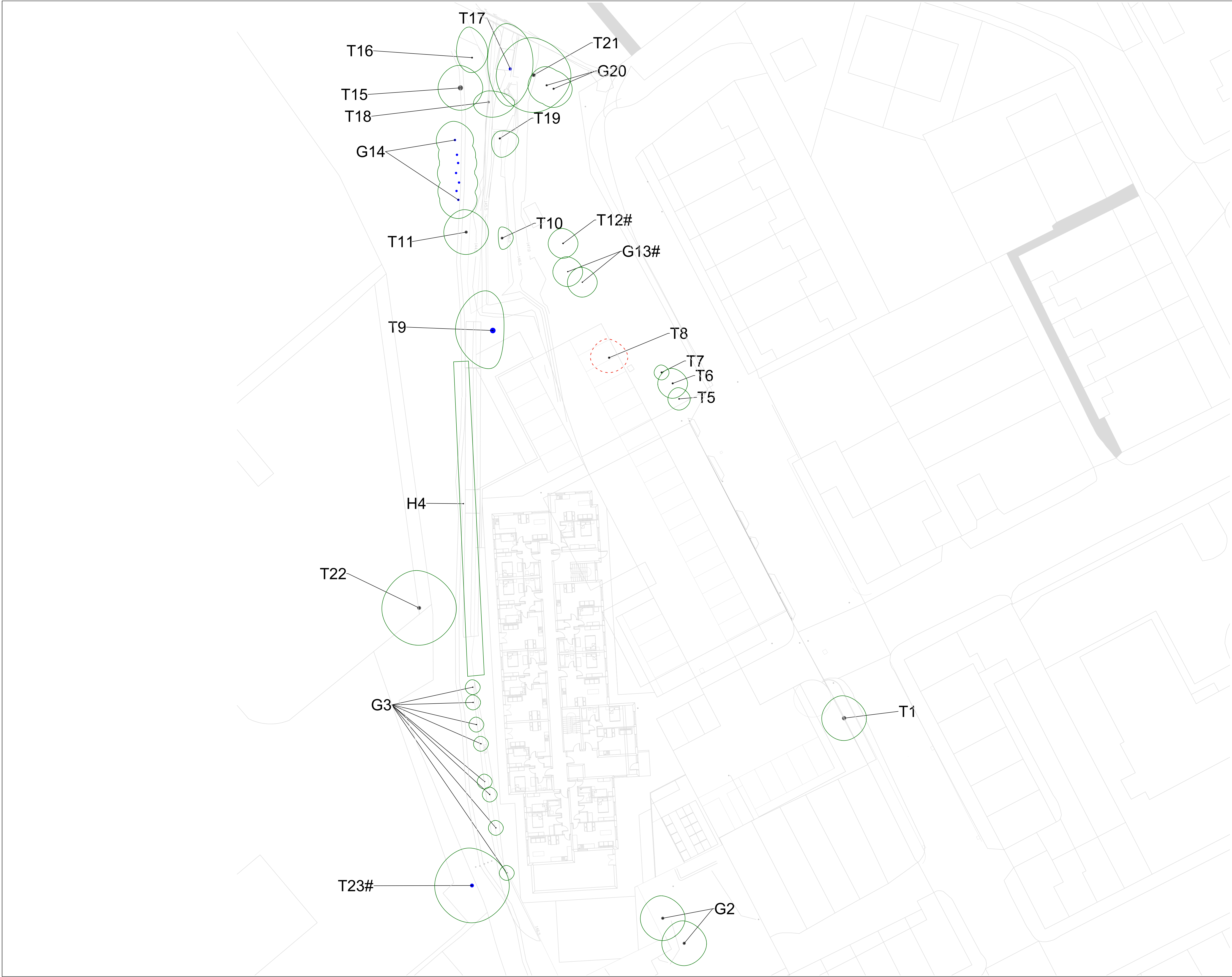


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Notes:-

-  Category A tree, group or hedge
-  Category B tree, group or hedge
-  Category C tree, group or hedge
-  Category U tree, group or hedge
-  Root Protection Area (RPA)
-  Position estimated on site

REV.	DATE	DESCRIPTION	DRAWN	CHKD
URBAN GREEN A: Ground Floor, The Tower, Deva City Office Park, Trinity Way, Manchester M3 7BF T: +44 (0) 161 312 3131 weareurbangreen.co.uk				
Client:			THE CASEY GROUP Ltd	
Project:			UNIT 4, BROWN STREET, LITTLEBOROUGH	
Title:			TREE CONSTRAINTS PLAN	
Issue:			PLANNING	
Drawn:	RH	Checked:	EA	Approved: AB
Project:	UG1240	Scale @ A1:	1:250	Date: 05/10/21
Dwg No:	UG_1240_ARB_TCP_01	Revision:	00	



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Notes:-

Category A tree, group or hedge

Category B tree, group or hedge

Category C tree, group or hedge

Category U tree, group or hedge

Retained tree

Removed tree

Extents of pruning

#

Position estimated on site

REV.	DATE	DESCRIPTION	DRAWN	CHK'D	
U R B A N G R E E N A: Ground Floor, The Tower, Deva City Office Park, Trinity Way, Manchester M3 7BF T: +44 (0) 161 312 3131 weareurbangreen.co.uk					
Client: THE CASEY GROUP Ltd					
Project: UNIT 4, BROWN STREET, LITTLEBOROUGH					
Title: TREE REMOVAL PLAN					
Issue: PLANNING					
Drawn:	RH	Checked:	EA	Approved:	AB
Project:	UG1240	Scale @ A1:	1:250	Date:	05/10/21
Dwg No:	UG_1240_ARB_TPP_01			Revision:	00

Tree Works Schedule

Tree Number	Species	Works Required	Reason
T8	Sycamore	Removal	To facilitate development

REV.

DATE

DESCRIPTION

DRAWN

CHK'D

U R B A N
G R E E N

A: Ground Floor, The Tower,
Deva City Office Park, Trinity Way,
Manchester M3 7BF

T: +44 (0) 161 312 3131

weareurbangreen.co.uk

Client:

THE CASEY
GROUP Ltd

Project:

UNIT 4, BROWN STREET,
LITTLEBOROUGH

Title:

TREE WORKS SCHEDULE

Issue:

PLANNING

Drawn:

RH

Checked:

EA

Approved:

AB

Project:

UG1240

Scale @ A1:

NTS

Date:

05/10/21

Dwg No:

UG_1240_ARB_TWS_01

Revision:

00



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Notes:-

Category A tree, group or hedge

Category B tree, group or hedge

Category C tree, group or hedge

Category U tree, group or hedge

Retained tree

Root Protection Area (RPA)

#

Position estimated on site

Protective fencing (See Insert 1 & Insert 2)

Boundary Treatment

Arboricultural Supervised Excavation

Construction Exclusion Zone (CEZ)

Cellular Confinement System

Ground protection (See Insert 3)

X01	xx/xx/xx	XXXXXXXXX-		XX	XX
REV.	DATE	DESCRIPTION		DRAWN	CHK'D

URBAN GREEN

A: Ground Floor, The Tower,
Deva City Office Park, Trinity Way,
Manchester M3 7BF

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Client:

THE CASEY GROUP Ltd

Project:

UNIT 4, BROWN STREET,
LITTLEBOROUGH

Title:

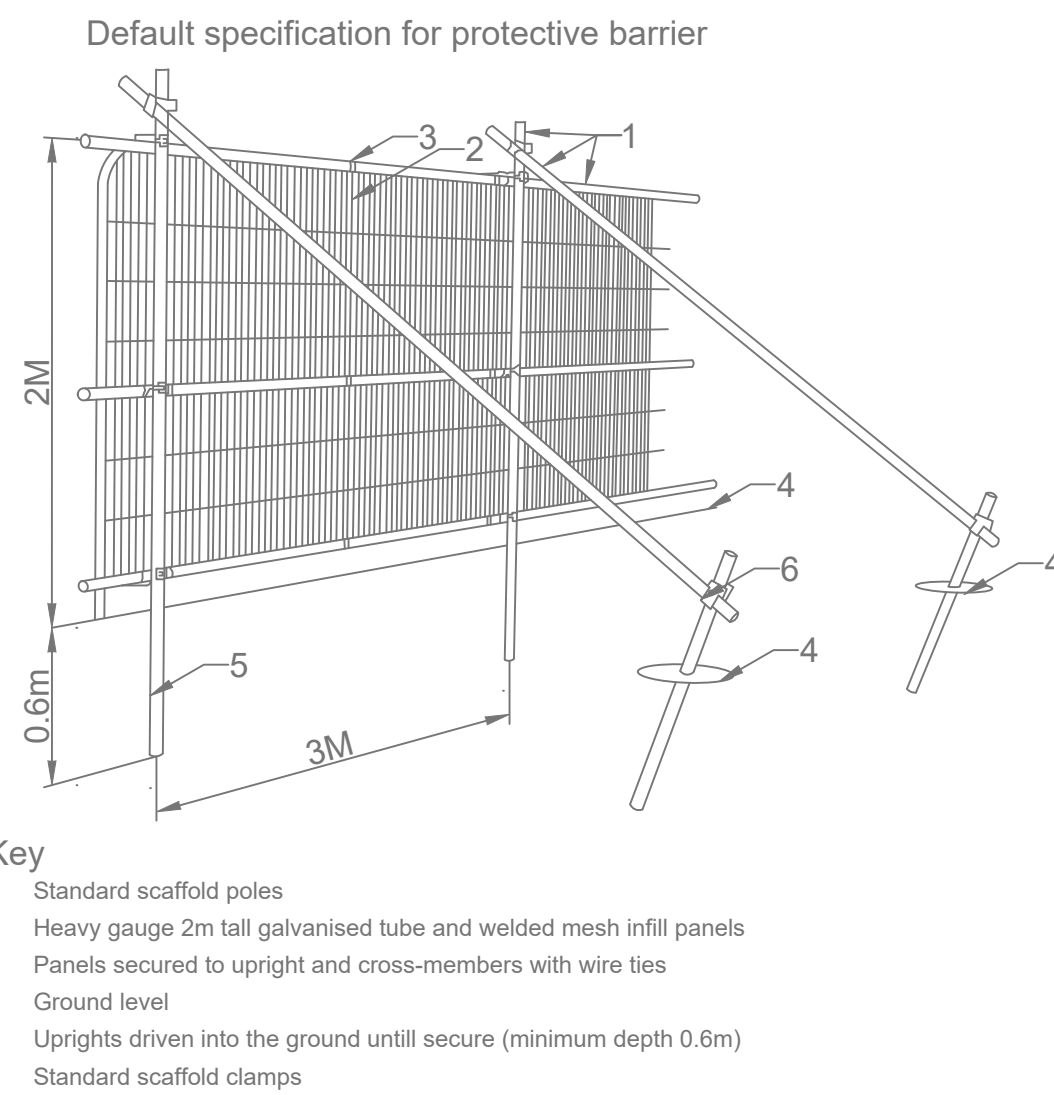
TREE PROTECTION PLAN

Issue:

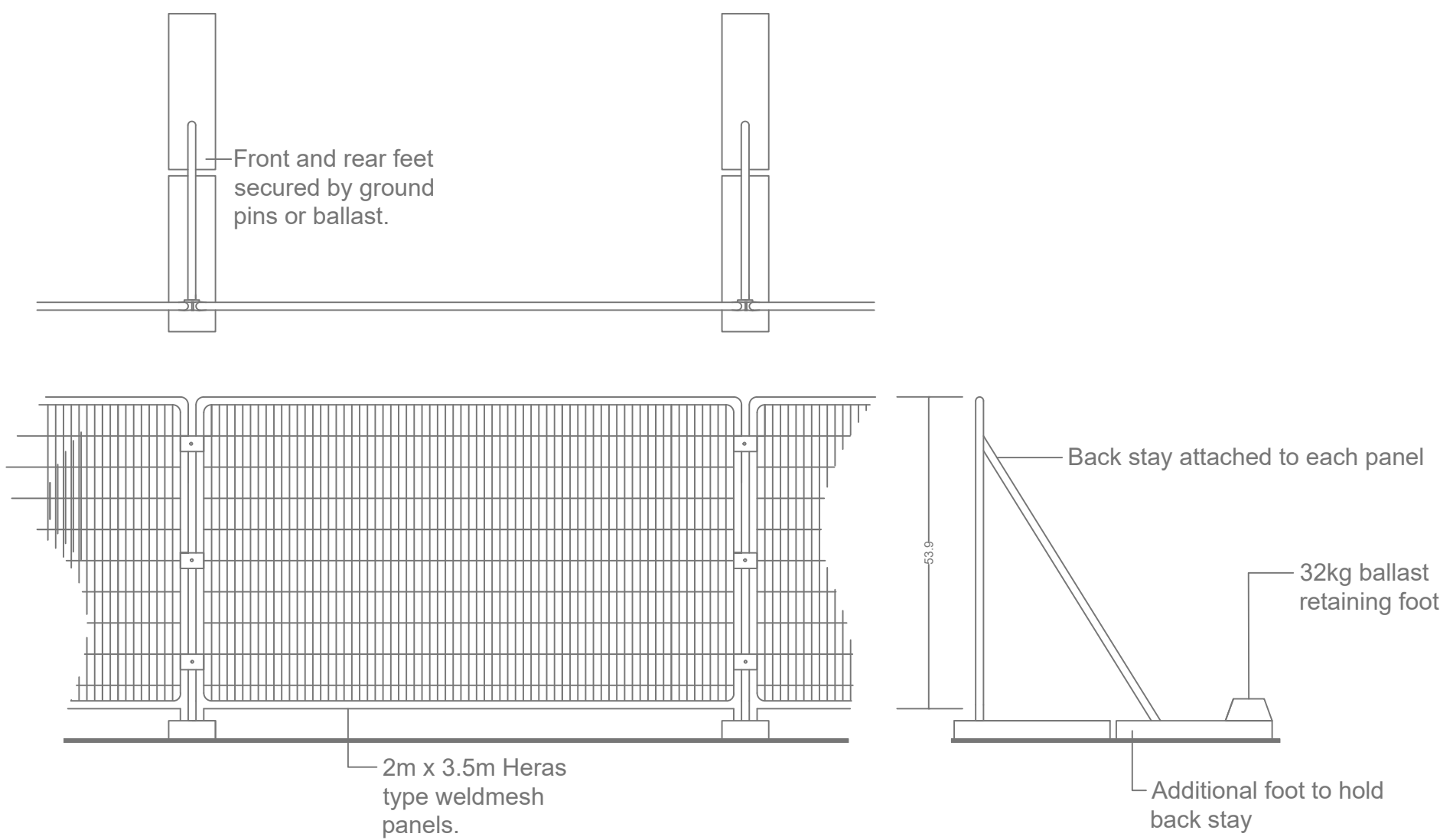
PLANNING

Drawn: RH	Checked: EA	Approved: AB
Project: UG1240	Scale @ A1: 1:250	Date: 05/10/21
Dwg No: UG_1240_ARB_TPP_01	Revision: 00	

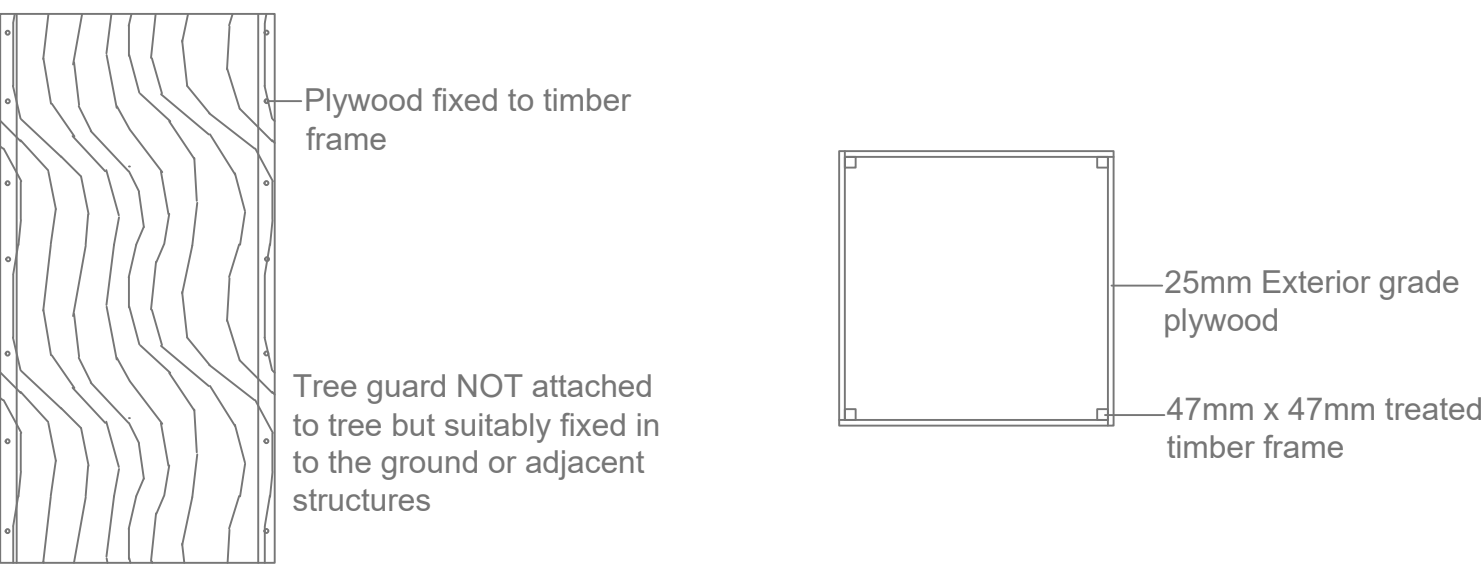
Insert 1: Tree protective fencing specification



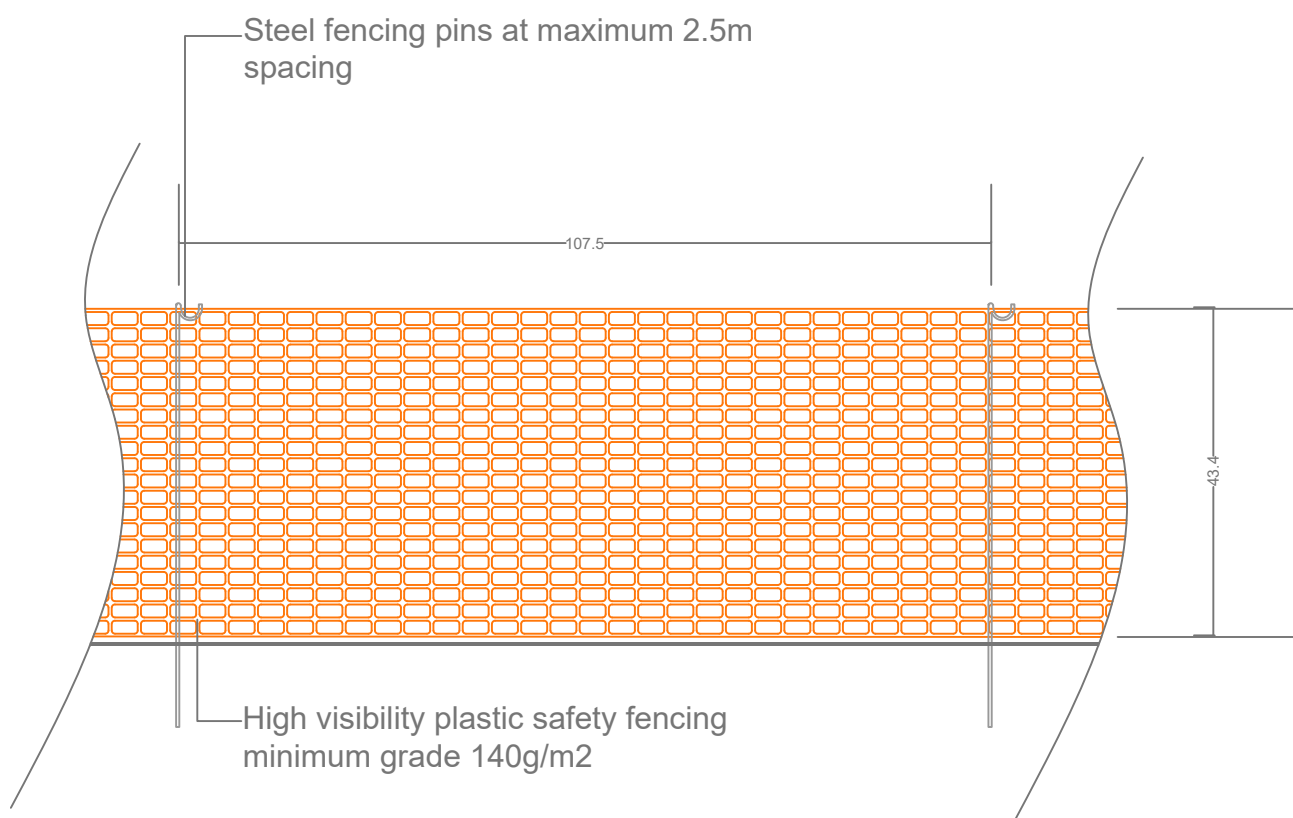
Back-stay support



Temporary tree guard specification



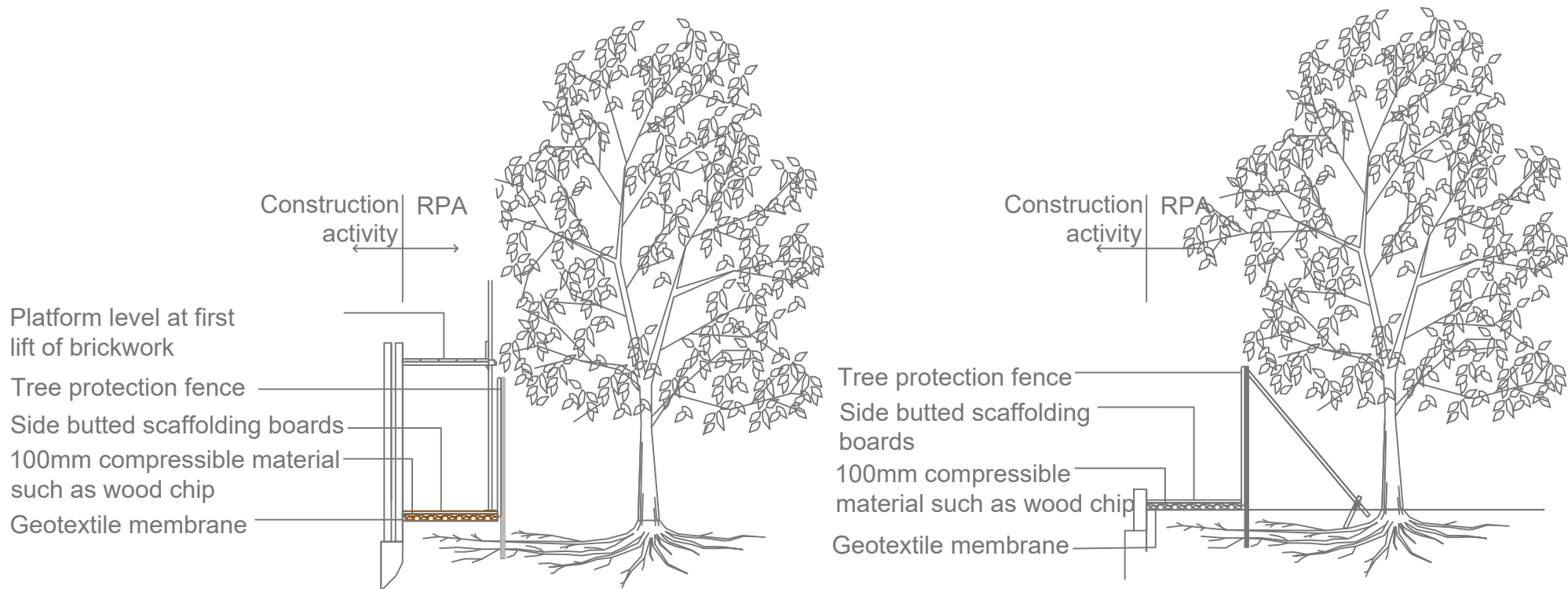
Barrier mesh specification



Insert 2: Tree protection notice

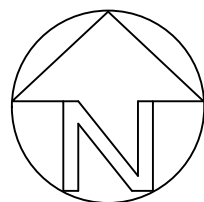


Insert 3: Ground protection specification



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Notes:-



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Client: THE CASEY GROUP Ltd				
Project: UNIT 4, BROWN STREET, LITTLEBOROUGH				
Title: TREE PROTECTION INDEX				
Issue: PLANNING				
Drawn: RH	Checked: EA	Approved: AB		
Project: UG1240	Scale @ A1: NTS	Date: 05/10/21		
Dwg No: UG_1240_ARB_TPI_01			Revision: 00	