



# AllAboutTrees

Arboricultural & Ecological Consultancy  
Chartered Arboriculturalists & Environmentalists

## Arboricultural Method Statement

For Trees On

Land At Church Lane,

Whitburn - Revision E




For

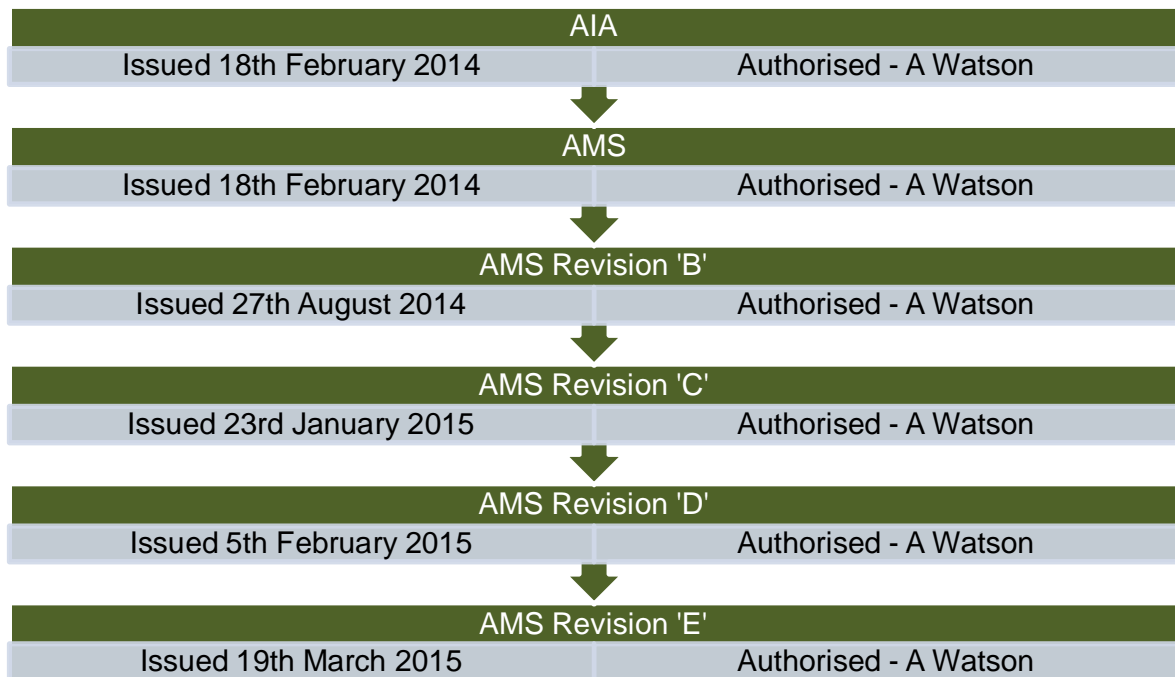
Fitz Architects Ltd



# Document Verification



Document Title	<ul style="list-style-type: none"><li>• Arboricultural Method Statement For Trees On Land At Church Lane, Whitburn - Revision E</li><li>• For Fitz Architects Ltd</li></ul>
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## 1. Introduction

1.1 We are instructed by Fitz Architects Ltd to provide an updated Arboricultural Method Statement (AMS) regarding the protection and management of the significant trees located within a specified area adjacent to Church Lane, Whitburn. This report is revision 'E'.

1.2 This method statement is a reference document produced to ensure best practice in the management of the trees during the demolition and construction phases of the development and brings together all of the relevant information including the recommendations set out in British standard 5837:2012 – Trees in relation to design, demolition and construction. The method statement must be read in conjunction with our updated Arboricultural Impact Assessment (revision E) dated 19<sup>th</sup> March 2015.

1.3 The method statement forms part of the specification and schedule of works to be issued to the contractor and may form part of the contract documentation.

1.4 This document should be kept on file at the site office and be available for inspection by relevant parties.

## 2. Protected Status Of Trees

2.1 Trees may be legally protected, this may either be in the form of a Tree Preservation Order (TPO) or that the trees are located within a Conservation area. In addition some tree felling may require a felling licence from the Forestry Commission.

2.2 Potentially large penalties may be enforced for illegally carrying out works on protected trees. It is recommended that checks are made before any works are undertaken and no work should commence until permission has been granted. Please note that there are a number of exemptions from the requirement to obtain a felling licence including land on which full planning permission has been granted by the local authority, however this exemption does not cover land where only outline planning permission has been granted, or on land which has been allocated for residential development within local authority urban and local development plans.

2.3 There are restrictions protecting the trees on the site. The site is located within a Conservation Area and 6 weeks' notice must be supplied to the Local Planning Authority for any proposed tree work not otherwise approved by any existing relevant planning permission. Furthermore, there are two Tree Preservation Orders (TPO) which protect the trees. A breakdown is provided in the below table. The quality of the maps supplied with the TPO are not of sufficient detail to accurately identify a number of

the trees. Consequently, some of the cells in the below table have multiple references.

Species	AAT Reference	TPO No. 154 2007	TPO No. 22 1981	TPO 317
Sycamore	30	28	A2	-
Sycamore	31	-	A2	-
Sycamore	32	30	A2	-
Sycamore	39	31	A2	-
Sycamore	40	34	A2	-
Sycamore	43	33	A2	-
Sycamore	44	35	A2	-
Sycamore	47	36	A2	-
Sycamore	48	-	A2	-
Sycamore	50	-	-	5
Sycamore	59	-	-	2
Sycamore	66	-	24	-
Sycamore	68	-	23	-
Sycamore	70	-	20/21	-
Sycamore	71	-	20/21	-
Sycamore	72	-	20/21	-
Sycamore	73	-	17/18	-
Sycamore	74	-	16	-

### 3. Site Operations Prior To Any Construction Works

#### 3.1 Tree Works

3.1.1 The first arboricultural works on site will be the removal of all the conflicting trees (52-54, 57 & 63-65 and group 1) which are identified on the Tree Protection Plan (TPP) by the broken black ring surrounding the tree centre and referred to in appendix 1 of this report.

3.1.2 The stumps may either be ground out using a stump grinding machine or removed as part of the ground excavation works.

3.1.3 Facilitative pruning will be required to allow unimpeded access into the site and to ensure an acceptable clearance distance is established between any retained trees and built structures, footpaths, roads or services.

Trees that require facilitative pruning are:

- Group 7

3.1.4 Details of any further arboricultural works are included within Appendix 1 of this report. The tree works should wherever possible be carried out in accordance with BS3998:2010 Recommendations for tree work.

*See section 5 for Arboricultural supervision schedule.*

## **3.2 Protective Barrier Erection**

3.2.1 The protective barriers are to be erected prior to the commencement of site works including demolition, soil stripping or movement, bringing onto site of materials, supplies or machinery. Tree works can be undertaken prior to the erection of the barriers.

3.2.2 The barriers must be erected in the position indicated on the Tree Protection Plan (TPP) by the dark blue line and be constructed as per the following specification.

3.2.3 The barriers should be considered essential and should not be removed or altered without prior recommendation by an Arboriculturalist and approval of the local planning authority.

3.2.4 The barrier should consist of a vertical and horizontal framework of scaffold tubing which is adequately braced to resist impacts. The vertical scaffold tubes need to be placed at a distance not exceeding 3m apart and driven securely into the ground for a minimum depth of 0.6m. Care should be taken when locating the vertical poles to avoid underground services and, in the case of the bracing poles, also to avoid any structural roots. The weldmesh or Heras panels need to be a minimum 2.0m tall and are securely attached to the scaffold framework with wire or scaffold clamps. The wire or scaffold clamps should be secured on the inside of the barrier to avoid easy dismantling. Panels on rubber or concrete feet are not resistant to impact and should not be used.

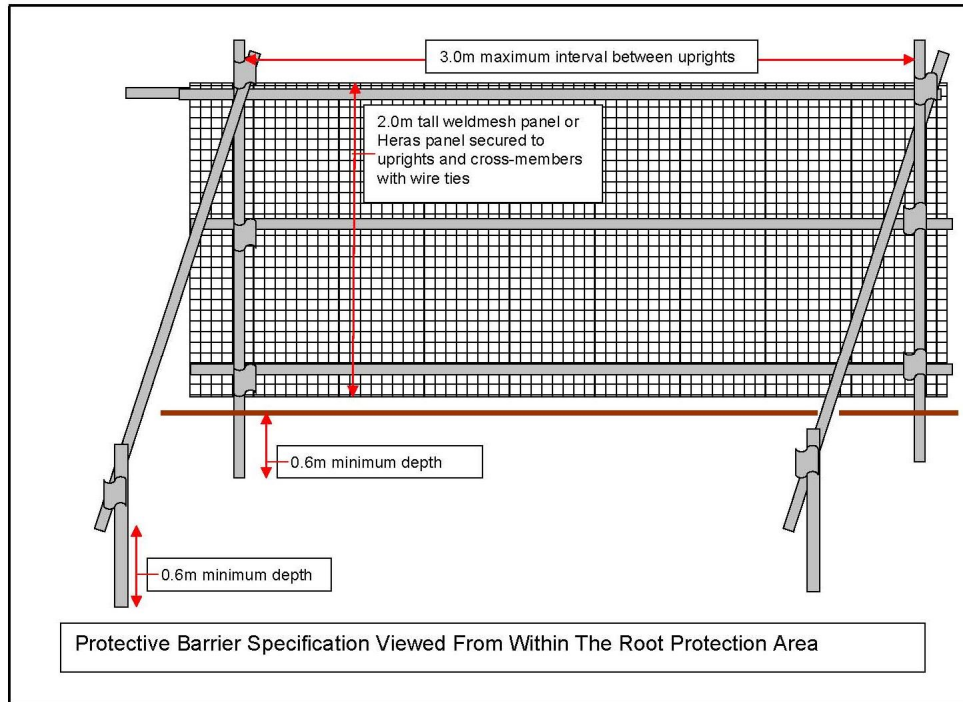


Figure 1- Protective barrier diagram



Figure 2- Actual barrier erected on site

3.2.5 No fixing shall be made to any tree and all possible care must be taken to prevent damage to tree roots when locating the posts.

3.2.6 All types of barriers must be firmly attached to prevent movement by site personnel or vehicles and all weather signs with the wording "Construction exclusion zone- keep out" should be attached.

### **3.3 Ground Protection Areas & Erection Of Scaffolding Within The Trees Root Protection Areas**

3.3.1 As discussed in the accompanying AIA, the extent of group protection required will depend upon the timing of operations. Group 5 will require ground protection regardless. Trees 32, 39-40, 43-44, 47, 66-72, 74, group 3 and group 7 may require ground protection if the existing surfacing cannot be retained until the end of the project.

3.3.2 To prevent damage occurring to the trees, the following technique should be observed. The areas requiring this protection are marked in hatched orange on the tree protection plan.

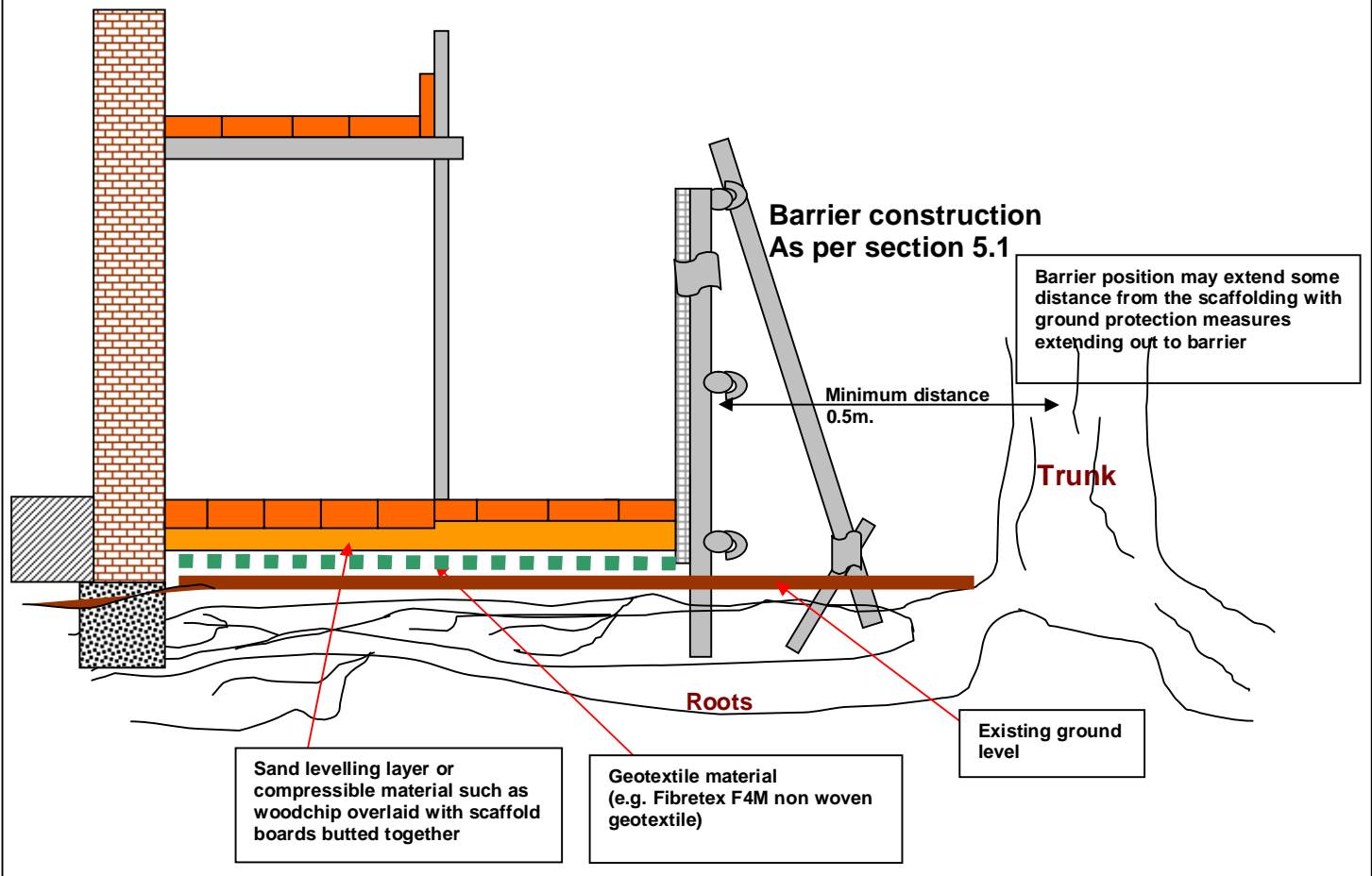
3.3.3 The following diagrams visualise the layout requirements. By sufficiently protecting the rootplate of the tree, the access or scaffolding and associated working area can be placed within the root protection area. There is no limitation as to the size of the ground protection area, but we would advise that it is at least 0.5m from the trunk of any tree.

3.3.4 A summary of the requirements for the erection of the scaffolding and working area are detailed below.

- Protective barriers should be erected onto a framework of scaffolding (as per the barrier drawing in section 3.2 to comply with the recommendations of BS 5837).
- The barrier is erected prior to the commencement of work at a suitable distance from the building to allow for the erection of the main scaffolding.
- A porous geotextile fabric should be laid onto the undisturbed ground surface and a layer of sand or compressible material such as woodchip applied to level the area.
- Boards should be laid onto the sand to protect the rootplate. Scaffold boards are usually adequate for pedestrian loads
- The boarding must remain until building works are completed.



**Erection of scaffolding within the root protection area of the tree to BS 5837  
(not to scale)**

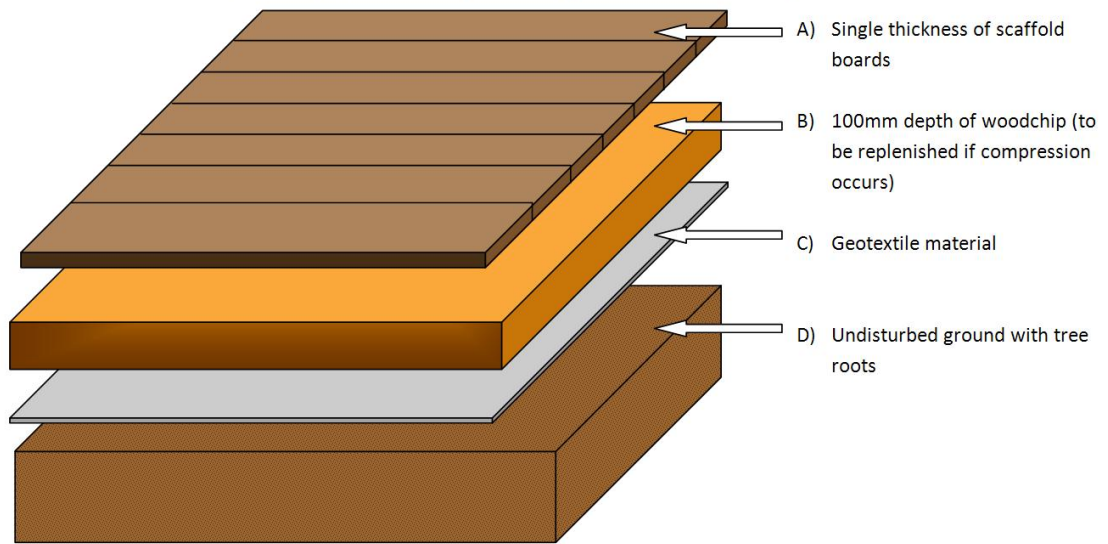


3.3.5 As the building rises, additional scaffolding is erected within the area protected by the boards. The use of supplementary timber sole plates is advised.

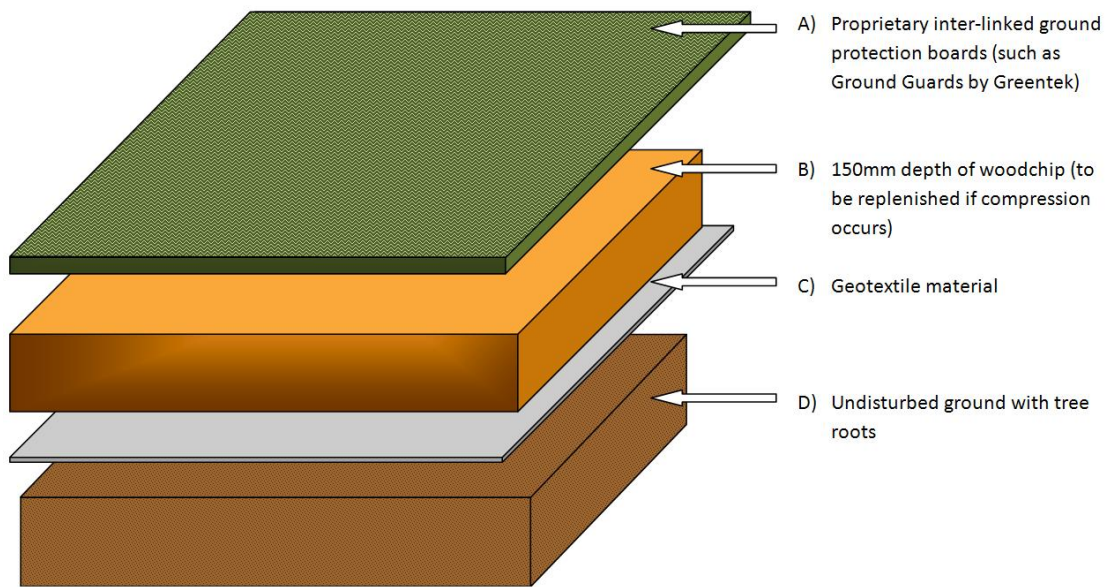
3.3.6 Temporary ground protection should be tailored to the likely load it will be subjected to. The following diagrams indicate the acceptable techniques for:

- Pedestrian
- Plant and vehicle access up to 2 tons gross weight
- Plant and vehicle access up exceeding 2 tons gross weight

Ground Protection Suitable For Pedestrian Movement Only



Ground Protection Suitable For Pedestrian Operated Plant Up To A Gross Weight of 2t



3.3.7 If the likely loading is to exceed 2t gross weight it will be necessary to produce an engineered solution with arboricultural advice to accommodate the likely load safely. One such example is shown below. In some cases it may be necessary to install a temporary road using a 3D cellular confinement system (such as Cellweb by Geosynthetics Ltd).

Suitable For Wheeled Or Tracked Construction Traffic Exceeding 2t Gross Weight



- 1) 50mm X 50mm X 500mm timber stakes
- 2) 200mm x 50mm timber rails
- 3) Geotextile membrane
- 4) Base layer of Ground Guards by Greentek
- 5) Wood chippings or other compressible material
- 6) Interlinked Ground Guard plates

### 3.4 Location Of Site Compound & Storage Areas

3.4.1 The contractor's site compound, storage & parking areas must be located outside of the root protection areas (RPAs) of the retained trees.

3.4.2 All site storage areas, especially cement mixing and washing points for plant and vehicles must also be situated outside of the root protection areas (RPA). Where there is a possible risk of polluted water runoff heavy duty plastic sheeting and sand bags must be used to contain spillages and contamination.

## 4. Construction Methodology

### 4.1 Porous Surfacing

4.1.1 As discussed in the accompanying AIA, the use of a 3D cellular confinement system is not considered necessary. However the use of a porous final surface is encouraged.

4.1.2 Final surfacing options include;

- **Block paving or paving slabs** – The use of porous blocks such as 80mm Piora by Marshalls are particularly tree friendly and allow natural rainfall to reach the rooting area.
- **In-situ concrete** – in-situ concrete forms an impermeable surface though can be made permeable with by forming drainage holes (diameter 50mm) at regular intervals (between 300-600mm) and backfilling the resultant holes with no fines gravel or aggregate
- **Porous tarmac and resin bonded gravels** – many different products exist, some of which are permeable and some are not. Product specification must be consulted.
- **Loose Gravel**
- **Gravel infilled blocks** - Lay Turfpave sub-surface paving system and infill with gravel.

### 4.2 Service Runs

4.2.1 It is assumed that the existing service runs will be exploited where possible, but if new works are required it is important that they comply with the National Joint Utilities Group (NJUG) 'Guidelines for the planning, installation, and maintenance of utility services in proximity to trees' and BS 5837:2012. The excavation of open trenches by machine will be unacceptable within the protective zone of any of the retained trees.

4.2.2 Wherever possible, services should be routed outside of any retained trees RPA. When this is not possible apparatus should be routed together in a common duct and any inspection chambers sited outside the RPA.

4.2.3 Acceptable techniques for the laying of services in order of preference are:

- **Trenchless-** by use of thrust boring or similar techniques. The pit excavations for starting and receiving the machinery should be located outside of the root protection area. To avoid root damage, the mole should run at a depth of at least 600mm.

Use of external lubricants on the mole other than water (eg oil or bentonite) should be avoided.

Trenchless Solutions For Installation Of Underground Services					
Method	Accuracy (MM)	Bore diameter (MM) <sup>(A)</sup>	Maximum subterranean length (M)	Applications	Not suitable for
Microtunnelling	<20	100 to 300	40	Gravity-fall pipes, deep apparatus, watercourse/roadway under crossings	Low-cost projects due to relative expense
Surface-launched directional drilling	≈100	25 to 1200	150	Pressure pipes, cables including fibre optic	Gravity fall pipes, e.g. drains and sewers <sup>(B)</sup>
Pipe ramming	≈150	150 to 2000	70	Any large-bore pipes and ducts	Rocky and other heavily obstructed soils
Impact moling <sup>(C)</sup>	≈50 <sup>(D)</sup>	30 to 180 <sup>(E)</sup>	40	Gas, water and cable connections, e.g. from street to property	Any application that requires accuracy over distances in excess of 5m.

- (A) Dependant upon strata encountered
- (B) Pit-launched directional drilling can be used for gravity fall pipes up to 20m in subterranean length
- (C) Impact moling (also known as thrust-bore) generally requires soft, cohesive soils.
- (D) Substantial inverse relationship between accuracy and distance
- (E) Figures given relate to single pass: up to 300mm bore achievable with multiple passes

4.2.4 If trenchless insertion is not feasible the alternatives are detailed below in order of preference.

- **Broken trench-** by using hand dug trench sections together with trenchless techniques. It should be limited to practical access and installation around or below the roots. The trench must be dug by hand (see following comments re continuous trenching) and only be long enough to allow access for linking to the next section. The open sections should be kept as short as possible.
- **Continuous trench-** the trench is excavated by hand and retains as many roots as possible. The surface layer is removed carefully and hand digging of the trench takes place. No roots over 2.5cm diameter or clumps of smaller roots (including fibrous) should be severed. The bark surrounding the roots must be maintained. Cutting of roots over 2.5cm diameter should not be attempted without the advice of a qualified Arboriculturalist.

If roots have to be cut, a sharp tool (defined as spade, narrow spade, fork, breaker bar, secateurs, handsaw, post hole shoveller, hand trowel) should be used.

## **Backfilling**

4.2.5 Reinstatement of street works must comply with the code of practice New Roads and Streetworks Act 1991 (Specification for the reinstatement of openings in highways), but where tree roots are involved backfilling should be carefully carried out to avoid direct damage to retained roots and excessive compaction of the soil around them.

4.2.6 The backfill should incorporate an inert granular material mixed with top soil or sharp sand (not builder's sand) around the retained roots. This will allow a measure of compaction for resurfacing whilst creating an aerated zone around the roots.

4.2.7 Roots and in particular fine roots, are vulnerable to desiccation on exposure to air. The roots are at greatest risk when there are rapid fluctuations in the air temperature around them (especially winter diurnal temperatures). It is vitally important that the roots are covered with sacking whilst the trench is open. The sacking should be removed once the trench is backfilled.

## 5. Proposed Arboricultural Supervision

5.1 The following programme of supervision is proposed to assist in the preservation and protection of the retained trees during all aspects of the proposed development.

5.2 The supervision arrangements must be sufficiently flexible to allow for the supervision of all sensitive works as they occur. The Arboricultural Consultant's initial role is to liaise with the developer and the council to ensure that the appropriate protective measures are in place before any works commence on site and once the site is active monitor compliance with the Arboricultural conditions and advise on any tree problems that may arise.

Action	Programming	Extent of supervision	Nature of supervision
Pre-commencement meeting with site manager & Council tree officer	Before any site activity commences	Meeting on site  Review any updates to the proposal  Confirm extent of tree works and protective barrier position.	Site meeting & letter or email confirming results of meeting distributed to relevant parties.
Tree works meeting with tree works contractor	Prior to commencement of tree works	Meeting on site to confirm tree works specification and method of working	Site meeting & letter or email confirming results of meeting distributed to relevant parties.
Tree works undertaken  Finalising tree protection barrier installation and other tree protection measures	Before any plant enters site or demolition/construction work commences.	Confirm position of the protective barriers and any other tree protection measures have been installed and comply with the Tree Protection Plan (TPP)  Provide photographs indicating completed tree protection	Site meeting & letter or email confirming results of meeting distributed to relevant parties.
Installation of services within root protection areas	Prior to installation of surfacing or services & during installation of surfaces and services	Meeting with contractor prior to installation and during installation of surfacing and services to ensure compliance with AIA	Site meeting & letter or email confirming results of meeting distributed to relevant parties.
Removal of protective barriers and other tree protection measures	Once construction activities have finished	Meeting with contractor for briefing before removal commences	Site meeting & letter or email confirming results of meeting distributed to relevant parties.

### 5.3 Site Management

5.3.1 It is the developer's responsibility to ensure that the details of the Arboricultural method statement and any agreed amendments are known and understood by all relevant site personnel. Copies of the agreed documents must be kept on site at all times and the site manager or other appropriate person must brief all personnel who could impact the trees on the specific tree protection requirements.

5.3.2 This should form part of the site induction procedure and be written into the appropriate site management documents.

For and on behalf of  
AllAboutTrees Ltd

Andrew Watson FLS MICFor CBiol MSB FARborA CEnv LCGI  
-Chartered Arboriculturalist & Registered Consultant



## Appendix 1

Tree No.	Species		Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
	Common Name	Latin Name		N	S	E	W														Height	Spread	
30	Sycamore	<i>Acer pseudoplatanus</i>	13.5	2	4	6.5	3	320	1	3.5	3.5 E	Middle aged	Fair	Fair	3.8	20-40	B - Moderate	Deadwood. Asymmetric crown spread; canopy distorted due to group pressure.	This tree will not be affected by the proposed development.  Crown clean to remove the deadwood.	None	22	20	B
31	Sycamore	<i>Acer pseudoplatanus</i>	13	0	0	0	0	370	1	0	0 N	Middle aged	Dead	Dead	4.4	<10	U - Unsuitable for retention	Dead tree. Basal decay. Extensive stem decay. Leaning towards building. Charcoal fungus present.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.  This tree has been recommended for removal given its compromised condition. This removal is not essential to facilitate the development and should only be undertaken by the relevant persons to	Low	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	<p>establish a higher level of arboricultural management. The TPP has been designed to allow retention during construction.</p> <p>It is however recommended this tree is removed in the interests of safety.</p>					
32	Sycamore <i>Acer pseudoplatanus</i>	14.5	3.5	6	5.5	5	573	2	2.5	2.5 SW	Mature	Fair	Fair	6.9	20-40	B - Moderate	<p>No major visible defects.</p> <p>Minor/small diameter deadwood retained in canopy.</p> <p>2x codominant stems from approximately 0.8m.</p>	<p>This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.</p> <p>Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.</p> <p>No tree works required at the present time.</p>	None	22	20	-
39	Sycamore <i>Acer pseudoplatanus</i>	13.5	1	3.5	3.5	2	330	1	2.5	2.5 E	Middle aged	Fair	Fair	4	10-20	C - Low	<p>Deadwood.</p> <p>Asymmetric crown spread; canopy distorted due to group pressure.</p>	<p>This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.</p>	None	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.7 for further details.  Crown clean to remove the deadwood.					
40	Sycamore <i>Acer pseudoplatanus</i>	17	3	6.5	5.5	5	640	1	6	5 NE	Mature	Fair	Fair	7.7	40+	A -High	No major visible defects.  Deadwood.  Broad spreading canopy.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.  Crown clean to remove the deadwood.	Low	22	20	A
43	Sycamore <i>Acer pseudoplatanus</i>	15.5	3	6.5	4	3.5	520	1	5	5 S	Mature	Fair	Poor	6.2	10-20	C - Low	Structurally poor.  Stem divides at 3.5m.  Water filled hollow with decay present at union.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.	Low	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.  Crown clean to remove the deadwood.  This tree has been recommended for removal given its compromised condition. This removal is not essential to facilitate the development and should only be undertaken by the relevant persons to establish a higher level of arboricultural management. The TPP has been designed to allow retention during construction.					
44	Sycamore <i>Acer pseudoplatanus</i>	8.5	0	7	2	2.5	370	1	3.5	5 SW	Middle aged	Fair	Poor	4.4	10-20	C - Low	Poor quality individual of low value.  Poor form and shape.  Structurally poor.  Hollow stem.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  Ground protection	Low	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																Heavily asymmetric.	<p>measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.</p> <p>Crown clean to remove the deadwood.</p> <p>This tree has been recommended for removal given its compromised condition. This removal is not essential to facilitate the development and should only be undertaken by the relevant persons to establish a higher level of arboricultural management. The TPP has been designed to allow retention during construction.</p>					
47	Sycamore <i>Acer pseudoplatanus</i>	15	3.5	6.5	3	4	480	1	5	5 SW	Mature	Fair	Poor	5.8	10-20	C - Low	<p>Decay cavity at approximately 5.0m on south; extent of decay unknown although slight reactive bulge evident.</p> <p>Number of bark wounds on lower stem.</p>	<p>This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.</p> <p>Ground protection measures required in</p>	Moderate	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	<p>the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.</p> <p>Crown clean to remove the deadwood.</p> <p>This tree has been recommended for removal given its compromised condition. This removal is not essential to facilitate the development and should only be undertaken by the relevant persons to establish a higher level of arboricultural management. The TPP has been designed to allow retention during construction.</p>					
48	Sycamore <i>Acer pseudoplatanus</i>	13	1	2	1.5	2.5	320	1	8.5	8.5 E	Middle aged	Poor	Poor	3.8	<10	U - Unsuitable for retention	<p>Poor quality individual of low value.</p> <p>Extensive stem decay.</p> <p>Deadwood.</p> <p>Structurally poor.</p>	<p>This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.</p> <p>Ground protection measures required in the area indicated by</p>	Low	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.  Crown clean to remove the deadwood.  This tree has been recommended for removal given its compromised condition. This removal is not essential to facilitate the development and should only be undertaken by the relevant persons to establish a higher level of arboricultural management. The TPP has been designed to allow retention during construction.					
49	Wild Cherry <i>Prunus avium</i>	6.5	1.5	2.5	3	2	140	1	2.5	2 SE	Middle aged	Poor	Fair	1.7	10-20	C - Low	Poor quality individual of low value.  Deadwood.  Crown distorted due to group pressure.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  Crown clean to remove the deadwood.	None	17	16	B
50	Sycamore	6	2	1.5	1.5	2	80	1	1.5	1.5	Young	Fair	Fair	1	20-40	C - Low	No major visible defects.	This tree is retainable	None	22	20	-

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
	<i>Acer pseudoplatanus</i>								NE								and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.					
51	Sycamore <i>Acer pseudoplatanus</i>	11	2	4	3	3.5	419	5	1.5	1.5 E	Middle aged	Fair	Fair	5	20-40	C - Low	No major visible defects.  Multiple stems from ground level.  Possible regenerative growth from coppiced stool.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.	None	22	20	-
52	Wild Cherry <i>Prunus avium</i>	8.5	5.5	4.5	4	3.5	350	1	2	1.5 W	Mature	Fair	Poor	4.2	10-20	C - Low	Deadwood.  Low vitality indicated by poor shoot elongation.  Low bud/leaf density.  <i>Ganoderma spp.</i> brackets at base.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	17	16	A
53	Wild Cherry <i>Prunus avium</i>	7.5	5	4	6	2.5	400	1	1.5	1.5 E	Middle aged	Fair	Fair	4.8	20-40	B - Moderate	Deadwood.  Asymmetric crown spread; canopy distorted due to group pressure.  Areas of stem wounding.  Slight lean to south east.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	17	16	A



Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																Stub cuts.						
54	Wild Cherry <i>Prunus avium</i>	8.5	6.5	3	3.5	3	310	1	2	1.5 S	Middle aged	Fair	Fair	3.7	20-40	B - Moderate	Minor/small diameter deadwood retained in canopy. Crown distorted due to group pressure. Old nest in canopy.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	17	16	A
55	Sycamore <i>Acer pseudoplatanus</i>	10	2.5	2.5	5	1	240	1	4	3.5 E	Middle aged	Fair	Fair	2.9	40+	B - Moderate	No major visible defects. Stem divides above 1.5m. Crown distorted due to group pressure.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP. No tree works required at the present time.	None	22	20	-
56	Sycamore <i>Acer pseudoplatanus</i>	10	1.5	4	2.5	1.5	260	1	3	2.5 W	Middle aged	Fair	Fair	3.1	40+	B - Moderate	No major visible defects. Stem divides above 1.5m. Crown distorted due to group pressure.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP. No tree works required at the present time.	None	22	20	-
57	Sycamore <i>Acer pseudoplatanus</i>	12	2.5	2	1.5	1.5	170	1	3	3 NW	Middle aged	Fair	Poor	2	20-40	C - Low	Etiolated specimen.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	22	20	A
58	Sycamore <i>Acer</i>	12	4.5	3	1.5	1.5	270	3	2.5	2.5 NE	Middle aged	Fair	Fair	3.2	20-40	C - Low	Multiple stems from ground level.	This tree is retainable and will be adequately protected	None	22	20	-

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
	<i>pseudoplatanus</i>															Minor/small diameter deadwood retained in canopy.  Crown distorted due to group pressure.	by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.					
59	Sycamore <i>Acer pseudoplatanus</i>	10	0.5	4	2.5	2	160	1	1	1.5 SE	Middle aged	Fair	Fair	1.9	20-40	B - Moderate	No major visible defects.  Stem divides above 1.5m.  Crown distorted due to group pressure.  Abuts boundary wall.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.	None	22	20	-
60	Sycamore <i>Acer pseudoplatanus</i>	12	3	4	0.5	3	255	6	2	2 SE	Middle aged	Fair	Fair	3.1	10-20	C - Low	Multiple stems from ground level; the resulting fork unions are tight and are considered structurally compromised.  Crown distorted due to group pressure.  Bark stripped from two stems.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.	None	22	20	-
61	Yew <i>Taxus baccata Fastigiata</i>	5	2	2.5	2.5	2	330	1	1.5	0 N	Middle aged	Fair	Fair	4	40+	B - Moderate	Multiple stems below 1.5m.  Broken branches in crown.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  Remove broken/hanging	None	12	6	C

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	branches.					
62	Sycamore <i>Acer pseudoplatanus</i>	12	3	4.5	5.5	4	302	2	2.5	3 E	Middle aged	Fair	Fair	3.6	20-40	B - Moderate	No major visible defects. 2x codominant stems from ground level.	This tree is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP.  No tree works required at the present time.	None	22	20	-
63	Goat Willow <i>Salix caprea</i>	10	4	2.5	3.5	3.5	320	1	1.5	2 NE	Middle aged	Fair	Fair	3.8	10-20	C - Low	No major visible defects. Minor/small diameter deadwood retained in canopy.  1x sycamore and 1x elder abut at base.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	12	12	A
64	Apple <i>Malus</i>	5.5	1	4	2.5	4	240	1	2.5	1 E	Mature	Poor	Poor	2.9	10-20	C - Low	Poor quality individual of low value. Deadwood. Asymmetric crown spread; canopy distorted due to group pressure.  Abuts wall and oversailing entrance road.	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	10	8	A
65	Apple <i>Malus</i>	4	2.5	1.5	0	3	140	1	1.5	1 N	Middle aged	Poor	Poor	1.7	<10	U - Unsuitable for retention	Poor quality individual of low value. Extensive stem decay. Deadwood. Asymmetric crown spread; canopy distorted due to	This tree conflicts with the proposed design layout and will need to be removed to facilitate the development.	None	10	8	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																group pressure. Abuts wall and oversailing entrance road.						
66	Sycamore <i>Acer pseudoplatanus</i>	17	7	8.5	5	7.5	900	1	4	2.5 S	Mature	Fair	Fair	10.8	40+	A -High	Remote assessment with some dimensions estimated due to access constraints. Located in neighbouring property outside of the site boundary. Multiple stems above 1.5m. Deadwood. Number of small apertures. Collision damage on lowest southern branch oversailing access road.	This tree is retainable and is naturally protected by its position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. Crown clean to remove the deadwood. Remove lowest southern limb to allow unimpeded vehicular access.	Moderate	22	20	B
67	Lawson Cypress <i>Chamaecyparis lawsoniana</i>	6	2	2.5	2	3	220	1	1.5	1.5 S	Middle aged	Fair	Fair	2.6	20-40	B - Moderate	Remote assessment with some dimensions estimated due to access constraints. Located in neighbouring property outside of the site boundary. No major visible defects.	This tree is retainable and is naturally protected by its position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section	None	18	8	-

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	4.9 for further details. No tree works required at the present time.					
68	Sycamore <i>Acer pseudoplatanus</i>	15	5	6	7	1	500	1	4	5 SW	Middle aged	Fair	Fair	6	20-40	B - Moderate	Leans to the east. Minor/small diameter deadwood retained in canopy. Asymmetric crown spread; canopy distorted due to group pressure.	This tree is retainable and is naturally protected by its position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. No tree works required at the present time.	Low	22	20	-
69	Lawson Cypress <i>Chamaecyparis lawsoniana</i>	12.5	2.5	2	3	2	240	1	1.5	1.5 N	Middle aged	Fair	Fair	2.9	20-40	B - Moderate	Remote assessment with some dimensions estimated due to access constraints. Located in neighbouring property outside of the site boundary. No major visible defects. Growing into canopy of adjacent sycamore.	This tree is retainable and is naturally protected by its position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. No tree works required at the present time.	None	18	8	-

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
																	present time.					
70	Sycamore <i>Acer pseudoplatanus</i>	12.5	4	4.5	2.5	5	450	1	2	3 SE	Middle aged	Fair	Fair	5.4	20-40	B - Moderate	<p>Remote assessment with some dimensions estimated due to access constraints.</p> <p>Located in neighbouring property outside of the site boundary.</p> <p>Torn stubs.</p> <p>Asymmetric crown spread; canopy distorted due to group pressure.</p>	<p>This tree is retainable and is naturally protected by its position behind the stone wall.</p> <p>Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.</p> <p>No tree works required at the present time.</p>	Low	22	20	-
71	Sycamore <i>Acer pseudoplatanus</i>	11	1	7	3	3	500	1	4	4 SW	Middle aged	Fair	Fair	6	20-40	B - Moderate	<p>Remote assessment with some dimensions estimated due to access constraints.</p> <p>Located in neighbouring property outside of the site boundary.</p> <p>Stem divides below 1.5m.</p> <p>Minor/small diameter deadwood retained in canopy.</p> <p>Asymmetric crown spread; canopy distorted due to group pressure.</p>	<p>This tree is retainable and is naturally protected by its position behind the stone wall.</p> <p>Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.</p> <p>No tree works required at the present time.</p>	Low	22	20	-
72	Sycamore <i>Acer</i>	16	6	7	6.5	5	650	1	3	4.5 SE	Mature	Fair	Fair	7.8	40+	A -High	<p>Remote assessment with some dimensions estimated due to access</p>	<p>This tree is retainable and is naturally protected by its</p>	Low	22	20	-

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
	<i>pseudoplatanus</i>															constraints. Located in neighbouring property outside of the site boundary. No major visible defects. Deadwood. Oversailing into study area.	position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. No tree works required at the present time.					
73	Sycamore <i>Acer pseudoplatanus</i>	14	5	6	7	7	400	1	4	3.5 SE	Middle aged	Fair	Fair	4.8	10-20	C - Low	Remote assessment with some dimensions estimated due to access constraints. Located in neighbouring property outside of the site boundary. Broken / hanging branches in crown. Deadwood. Crown distorted due to group pressure. Areas of stem decay in upper canopy.	This tree is retainable and is naturally protected by its position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. Crown clean to remove the deadwood. Remove broken/hanging branches.	Low	22	20	C
74	Sycamore <i>Acer</i>	17.5	8.5	7.5	7.5	6	750	1	3	2 S	Mature	Fair	Fair	9	40+	A -High	Remote assessment with some dimensions estimated due to access	This tree is retainable and is naturally protected by its	Low	22	20	A

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
	<i>pseudoplatanus</i>															constraints. Located in neighbouring property outside of the site boundary. Stem divides above 1.5m. Minor/small diameter deadwood retained in canopy. In conflict with boundary wall.	position behind the stone wall. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. Relocate boundary wall to remove conflict.					
<b>Tree Groups</b>																						
1	Bramble, Buddleja, Sycamore <i>Rubus fruticosus, Buddleja spp., Acer pseudoplatanus</i>	4	-	-	-	-	100	1	-	-	Young	Fair	Fair	1.2	10-20	C - Low	Self set plants occupying disturbed ground in location of demolished building. Dominated by bramble with low numbers of Buddleja and sycamore. Low quality group of little value.	This group conflicts with the proposed design and will need to be removed to facilitate the development.	None	22	20	A
2	Elder <i>Sambucus nigra</i>	6	-	-	-	-	250	1	-	-	Middle aged	Fair	Fair	3	10-20	C - Low	Scattered elder understorey to mature trees. Combination of young healthy individuals of older declining trees.	This group is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP. No tree works required at the present time.	None	10	8	-
3	Sycamore	18	-	-	-	-	900	1	-	-	Matur	Fair	Fair	10.8	40+	A -High	Remote assessment with	This group is	Moderat	22	20	-



Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
	Beech <i>Acer pseudoplatanus, Fagus sylvatica</i>									e						some dimensions estimated due to access constraints.  Mature individuals growing around garden in adjacent property.  Some edge individuals oversailing into study area.	retainable and is naturally protected by its position behind the stone wall.  Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details.  No tree works required at the present time.	e				
5	Sycamore Ash Wych Elm <i>Acer pseudoplatanus, Fraxinus excelsior, Ulmus glabra</i>	17	-	-	-	-	750	1	-	-	Mature	Fair	Fair	9	40+	A -High  Mature trees growing in grounds of adjacent property.  Tree management is in place.  Number of poor quality individuals in group.  Dominated by sycamore with isolated examples of other species.	A significant portion of this group will not be affected by the proposed development.  Those sections adjacent to the site are naturally protected by the position of the stone wall.  Ground protection measures, in accordance with section 5.2 of this document, required in the area indicated by the orange hatching.  Continue with current maintenance	Low	23	18	-	

Tree No.	Species Common Name <i>Latin Name</i>	Height (M)	Crown Spread (M)				Trunk Dia (MM)	No. Of Stems	Height Of Lower Canopy (M)	First Sign Branch (M) (Position)	Age	Physiological Condition	Structural Condition	Root Prot Area Radii (M)	Estimated Remaining Contribution (Years)	Tree Quality Assessment	Comments	Maintenance	Bat Roost Potential	Ultimate Size For Species (M)		Priority
			N	S	E	W														Height	Spread	
6	Aspen <i>Populus tremula</i>	21	-	-	-	-	650	1	-	-	Mature	Fair	Fair	7.8	40+	A -High	Cluster of three aspen in neighbouring park. Oversailing into site. Negligible amounts of deadwood retained in canopy.	programme. This group is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP. No tree works required at the present time.	Low	25	20	-
7	Sycamore Cherry Plum Cherry Laurel Goat Willow Swedish Whitebeam Elder  <i>Acer pseudoplatanus,</i> <i>Prunus cerasifera,</i> <i>Prunus laurocerasus,</i> <i>Salix caprea,</i> <i>Sorbus intermedia,</i> <i>Sambucus nigra</i>	10	-	-	-	-	350	1	-	-	Middle aged	Fair	Fair	4.2	20-40	B - Moderate	No major visible defects. Variety of planted individuals in adjacent park. Some oversailing into the study area.	This group is retainable and will be adequately protected by the position of the protective barrier as indicated by the blue line on the TPP. Ground protection measures required in the area indicated by the orange hatching if surfacing removed at start of project. Please see section 4.9 for further details. Reduce and crown lift oversailing individuals to provide adequate clearance over the access road.	None	22	20	A



# Appendix 2(1)

## Glossary of Terms

- 1 Reference number:** An individual identifying number
- 2 Species:** Species identification is based on visual field observations and lists the common name. In some cases the botanical name will be used where there is no common alternative. On in-depth surveys the botanical name only may be used
- 3 Height:** Height is estimated to the nearest metre. On computerised surveys this may be within a range of heights. When measured height is required, a clinometer is used to measure to the nearest metre
- 4 Diameter:** Trunk diameter measured at 1.5 metres from ground level to the nearest centimetre. In some surveys this is indicated as a range
- 5 Spread:** Measurement of canopy from the trunk to the nearest metre in four directions, North, South, East, and West in metres
- 6 Lower crown Clearance:** Height in metres of crown clearance above adjacent ground level
- 7 Age:** Either an estimate (or statement if accurately known) of the age of the tree, classified as:  
**Y** = Young tree, established tree usually up to one third of expected ultimate height & spread  
**MA** = middle aged, usually between one third and two thirds of ultimate height & spread  
**M** = Mature, more or less at full height but still increasing in girth & spread  
**OM** = Over mature, grown to full size and becoming senescent,  
**V** = Veteran tree, individuals surviving beyond the typical age range for the species
- 8 Physiological Condition:** Good = Healthy tree with good vitality,  
Fair = Moderate health and vitality normal or slightly less for species and age  
Poor = Poor shape or form - signs of decline in crown, may have structural weakness.  
Dead = dead or dying tree
- 9 Structural Condition:** Good = No visible structural defects  
Fair = Only minor structural defects  
Poor = Defects which may need to be rectified or regularly monitored  
Remove = Severe defects which may result in imminent failure or collapse
- 10 Management Recommendations:** General comments on the condition of the tree or group and any action required. potential for wildlife habitats
- 11 Estimated Remaining Contribution:** Safe Useful Life Expectancy (SULE): in some cases the age ranges are modified  
Short: 0 – 10years                      Medium: 10– 20 Years  
Intermediate: 20-40                      Long: 40 + years
- 12 Tree Quality:** Assessment of tree quality see following cascade chart for details
- 13 Priority:** A - Works to achieve an acceptable level of safety or required to facilitate the development  
B - Works to achieve higher levels of arboricultural management.  
C - To improve the aesthetic appearance.
- 12 Ultimate Size:** Taken from Arboriculture Research Note 8490ARB or NHBC Standards Chapter 4.2 as appropriate The Normal Ultimate Height in an Urban Situation in metres.  
Ultimate spread of the Crown in metres.
- 13 Root Protection Area:** The distance at which the protective barrier should be erected measured in radii from the centre of the trunk in metres.

- 14 Pruning:** Pruning shall be defined as the removal of living or dead parts of a plant by the Contractor. Such parts may be soft growth, twigs, branches, limbs or sections of the tree trunk. The cut material may vary from small to large in size.
- 15 Crown Cleaning:** Cleaning out is defined as the removal of dead, dying or diseased branchwood, broken branches or stubs left from previous tree surgery operations (see also 16 Deadwooding) together with all unwanted objects, which may include ivy (if specified) and/or other climbing plants, nails, redundant cable bracing, rope swings, tree houses and windblown rubbish from the tree, and any such debris from any cavities within the tree.
- 16 Deadwood Removal:** Dead-wooding shall be defined as the removal of all dead and dying branches and limbs from the tree.
- 17 Crown Lifting:** Crown lifting shall be defined as the removal of all soft growth and branches or parts thereof which are below or which extend below the height specified in the tender documents. It is recognised that the resultant canopy base might not be one single level but might be stepped to allow for different clearances, for example where a tree overhangs both the footway and the road where different height clearances are required.
- 18 Crown Reduction:** Crown reduction shall be defined as the reduction of the complete outline dimension of the canopy, from the tips of limbs and branches to the main trunk, by pruning growth to an acceptable branch, twig or but to leave a flowing silhouette.

## Appendix 2(11) Cascade Chart For Assessing Tree Quality

Category and definition  Trees to be considered for retention	Criteria – Subcategories			Identification on plan
	1. Mainly arboricultural values	2. Mainly landscape values	3. Mainly cultural values, including conservation	
<p><b><u>Category High = A</u></b></p> <p>Trees of high quality with an estimated remaining life expectancy of at least 40 years</p>	Trees that are particularly good examples of their species, especially, if rare or unusual, or those that are essential components of groups, or of formal or semi-formal arboricultural features (e.g. the dominant and/or principal trees within an avenue)	Trees, groups or woodlands of particular visual importance as arboricultural and/or landscape features	Trees, groups or woodlands of significant conservation historical, commemorative or other value (e.g. veteran trees or wood – pasture)	Green
<p><b><u>Category Moderate = B</u></b></p> <p>Trees of moderate quality with an estimated remaining life expectancy of at least 20 years</p>	Trees that might be included in category A, but are downgraded because of impaired condition (e.g. presence of significant though remediable defects including unsympathetic past management and storm damage), such that they are unlikely to be suitable for retention for beyond 40 years; or trees lacking the special quality necessary to merit the category A designation	Trees present in numbers, usually growing as groups or woodlands, such that they attract a higher collective rating than they might as individuals; or trees occurring as collectives but situated so as to make little visual contribution to the wider locality	Trees with material conservation or other cultural value	Blue
<p><b><u>Category Low = C</u></b></p> <p>Trees of low quality with an estimated remaining life expectancy of at least 10 years; or young trees with a stem diameter below 150mm</p>	Unremarkable trees of very limited merit or such impaired condition that they do not qualify in higher categories	Trees present in groups or woodlands, but without this conferring on them significantly greater collective landscape value, and/ or trees offering low or only temporary/transient landscape benefits	Trees with no material conservation or other cultural benefits	Yellow
<p><b><u>Category = U Trees unsuitable for retention</u></b></p> <p>Those of such a condition that they cannot realistically be retained as living trees in the context of the current land use for longer than 10 years</p>	<p>NOTE Whilst C category trees will usually not be retained where they would impose a significant constraint on development, young trees with a stem diameter of less than 150mm should be considered for relocation</p> <ul style="list-style-type: none"> <li>• Trees that have a serious, irremediable, structural defect, such that their early loss is expected due to collapse, including those that will become unviable after removal of other U category trees (i.e. where, for whatever reason, the loss of companion shelter cannot be mitigated by pruning)</li> <li>• Trees that are dead or are showing signs of significant, immediate and irreversible overall decline</li> <li>• Trees infected with pathogens of significance to the health and/or safety of other trees nearby (e.g. Dutch elm disease) or very low quality trees suppressing adjacent trees of better quality</li> <li>• Habitat reinstatement may be appropriate (e.g. U category trees used as a bat roost- installation of bat box in nearby tree)</li> </ul>			Red





# AllAboutTrees

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