



# **ARBORICULTURAL REPORT & Impact Assessment** to BS 5837:2012 at:

***Station Road,  
Darton,  
Barnsley,  
South Yorkshire  
S75 5HW***

Prepared for:  
***White Agus Partnership***

Date: *March 2022*

Reference: *AWA4271*



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# 1. Introduction

## 1.1 Instructions and Brief

- 1.1.1 We were instructed by White Agus Partnership to visit the site and prepare our findings in a report.
- 1.1.2 The report is required in accordance with BS 5837:2012 *Trees in relation to design, demolition and construction – Recommendations*, to provide detailed, independent, arboricultural advice on the trees present, in the context of potential development.

## 1.2 Survey Details

- 1.2.1 The survey took place during October 2019.
- 1.2.2 The trees were surveyed visually from the ground using “Visual Tree Assessment” techniques and in accordance with the guiding principles of British Standard 5837:2012.
- 1.2.3 Any additional off-site trees that could impact a new development design have been included in the tree survey parameters.
- 1.2.4 The tree positions were plotted on an Ordnance Survey map base-layer using enhanced GPS technology (1-2m accuracy) and laser distance measurer.
- 1.2.5 This report has been prepared by Mr Adam Winson, Chartered Arboriculturist, MSc, BSc (Hons), MICFor, MArborA, Principle and Director of AWA Tree Consultants Ltd. The tree survey data collection was carried out by Mr James Brown, BSc (Hons) Arboriculture, MArborA, PTI (Lantra), Arboriculturist at AWA Tree Consultants Ltd.
- 1.2.6 Full qualifications and experience are included within **Appendix 1**. Explanatory details regarding the survey methodology are included within **Appendix 2**. A full explanation of the tree data can be found at **Appendix 3**. Full details of all the trees surveyed are found in **Appendix 4**. For tree locations refer to the Tree Constraints Plan at **Appendix 5** and for detail of the impacts of the new development refer to the Tree Impacts Plan at **Appendix 6**.

## 2. The Site

### 2.1 Location and Description

2.1.1 The site is located on Station Road in Darton, a village in the Metropolitan Borough of Barnsley, South Yorkshire. Station Road borders the north eastern boundary, with a railway line bordering its south western boundary.

2.1.2 The approximate area of the survey is highlighted in the (2019 Google Earth) image below:



## 3. The Trees

### 3.1 Legal

- 3.1.1 The following advice is for guidance purposes only. Some trees are protected by legislation, and it is essential that the legal status of trees is established prior to carrying out works to them. Unauthorised work to protected trees could lead to prosecution, resulting in enforcement action such as fines or a criminal record. Tree Preservation Orders, Conservation Areas, Planning Conditions, Felling Licences or Restrictive Covenants legally protect many trees in the UK.
- 3.1.2 An online search was undertaken with Barnsley Metropolitan Borough Council on the 29<sup>th</sup> of March 2022 to check if trees at the site are protected by a Tree Preservation Order or are within a Conservation Area. As of this date no trees at the site are protected by a Tree Preservation Order or are within a Conservation Area.
- 3.1.3 Due to the large potential penalties for illegally carrying out work to protected trees, before authorising any tree works a further check should be made with the Local Planning Authority to confirm if any trees are covered by a Tree Preservation Order or are within a Conservation Area. If either applies, then statutory permission is required before any works can take place (unless such work is approved as part of full planning permission).
- 3.1.4 Trees provide a wide range of habitats for many species, some of which are legally protected such as bats, nesting birds, badgers and dormice. It must be ensured that this legislation is not contravened.
- 3.1.5 When appointing a tree surgeon, only properly qualified and experienced companies should be used, who have adequate Public Liability and Employer's Liability Insurance.
- 3.1.6 All tree work should be carried out according to British Standard 3998:2010 Tree Work - Recommendations.

### 3.2 Tree Survey Results

- 3.2.1 The tree survey revealed 13 items of woody vegetation, comprised of 11 individual trees and 2 tree groups.
- 3.2.2 Of the surveyed trees: 1 tree is retention category 'U' and 12 trees or groups are retention category 'C' (explanatory details regarding the retention categories are included within Appendix 3).

- 3.2.3 The only trees within site boundaries are the early mature Cherry T6 and Elder T10. The Cherry T6 is a prominent tree in relatively good overall condition which provides moderate amenity value to the site. The Elder T10 is in poor condition with extensive bark damage and dieback and deadwood in its crown and is recommended for removal regardless of development at the site.
- 3.2.4 Trees T1 to T5, G7, G8, T9, T11, T12 and T13 form the north eastern edge of an adjacent group of semi to early mature trees situated on railway banking bordering the site's south western boundary. The trees were inaccessible and so were only given cursory inspections, with measurements estimated and condition values indicative only. Collectively the trees form a distinct landscape feature and provide screening between the site and the adjacent railway line. However, the trees are all lower individual value. The crowns of trees T4, G7, G8, T9, T12 and T13 overhang into the site.
- 3.2.5 The tree Root Protection Area (RPA) detailed on the Tree Constraints Plan at Appendix 5, has been used as a layout design tool, to inform on the area around a tree where the protection of the roots and soil structure is treated as a priority.
- 3.2.6 Some lower value tree, hedge and shrub groups do not have RPAs detailed on tree plans. The detailed extent and spread of the low value groups, in conjunction with the tree schedule, is sufficient to assess the associated potential constraints.
- 3.2.7 The RPA for each tree has been plotted as a polygon centred on the base of the stem. Due to the presence of roads, structures, topography (and past tree management) the RPA is likely to be a simplified representation of the tree roots actual morphology and disposition. However, detailed modifications to the shape of the RPA would largely be based on conjecture and so have been avoided.

## 4. Arboricultural Impact Assessment

### 4.1 Proposed New Development

4.1.1 It is proposed to build a new residential development with associated access, parking, landscaping and facilities. The development proposals have been provided by my client and inform this arboricultural impact assessment and the Tree Impacts Plan at Appendix 6.

### 4.2 Direct Impacts

4.2.1 From assessing the new development proposals, no trees require removal to facilitate the proposed development, with all trees able to be retained and protected throughout the proposed development.

4.2.2 Adjacent Ash T4, Cherry T6 and Ash T9 will require pruning works to facilitate the development, reducing and lifting their northern and eastern crown as required to provide 2m clearance from the proposed new residential properties, not pruning beyond the site boundary.

4.2.3 Ash T4 and T9 likely have limited future prospects regardless of the proposed new development at the site due to the fungal disease Ash Dieback; a more suitable long term management option would likely be to remove the trees, however, as the trees are adjacent and not under site ownership, the tree owner's permission would be required to remove the trees.

4.2.4 Elder T10 is recommended for removal regardless of development at the site due to its poor condition.

### 4.3 Indirect Impacts

4.3.1 The tree Root Protection Area (RPA) detailed on the Tree Plans at Appendix 5 and 6, has been used as a layout design tool, to inform on the area around a tree where the protection of the roots and soil structure is treated as a priority.

4.3.2 No significant negative indirect impacts have been identified to the retained trees at the site.

4.3.3 Where new boundary fencing is to be installed within the RPAs of retained trees and tree groups the encroachment into the trees' RPAs should not significantly adversely impact on the health or future condition of the trees, provided posts and panels type footings are used as opposed to strip footings, with the holes for the posts dug by hand, avoiding significant tree roots where possible.

#### **4.4 Protection of the Retained Trees**

- 4.4.1 The retained trees may require protection by fencing in accordance with BS 5837: 2012, during the development phase.
- 4.4.2 An associated Arboricultural Method Statement, detailing protective fencing specifications and construction methods close to the retained trees has been provided.

## 5. Signature

I trust this report provides all the required information.

Signed



.....  
**Adam Winson**, Chartered Arboriculturist, MSc, BSc (Hons), MICFor, ACIEEM

**30<sup>th</sup> March 2022**

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Chartered Foresters  
Registered Consultant

# Appendices

- Appendix 1: Authors Qualifications and Experience**
- Appendix 2: Survey Methodology and Limitations of Report**
- Appendix 3: Explanation of Tree Descriptions**
- Appendix 4: Tree Data**
- Appendix 5: Tree Constraints Plan**
- Appendix 6: Tree Impacts Plan**

## Appendix 1: Authors Qualifications & Experience

### **Mr Adam Winson Chartered Arboriculturist, MSc, BSc (Hons), MICFor, MArborA, ACIEM, QTRA Registered**

Adam is the company Director and Principle Consultant. He has a mix of the highest-level academic qualifications and relevant work experience. He has worked within the tree care profession for over 20 years and was awarded an MSc in Arboriculture and Urban Forestry, with distinction. Adam is a Chartered Arboriculturist and a Registered Consultant with the Institute of Chartered Foresters, a Professional Member of the Arboricultural Association and has original research published by the UK Forestry Commission. His work ranges from individual expert tree inspections to managing trees on major multimillion pound housing developments and infrastructure projects. His work often involves trees with preservation orders or litigation, and he has appeared as a tree expert, at planning appeal hearings up to the Crown Court.

### **Mr James Brown BSc (Hons) Arboriculture, MArborA, PTI (Lantra)**

James has a BSc (Hons) in Arboriculture, attaining first class honours, as well as being awarded the Institute of Chartered Forester's Student award. He is a Professional Member of the Arboricultural Association and an Associate of the Institute of Chartered Foresters. James joined AWA in 2016, after previously working in Europe's largest tree nursery and has experience of Local Authority tree officer work. His main work consists of tree surveys for development projects and preparing Tree Protection Schemes to BS 5837:2012.

### **Dr Felicity Stout Ph.D, MA, BA (Hons), Cert Ed (Forestry), TechArborA, PTI (Lantra)**

Felicity has worked in the tree care profession for the last 10 years. She has a Certificate in Higher Education in Forestry, with a focus on Urban Forestry. She has practical arboricultural contractor experience and is a qualified and experienced Social Forestry practitioner. Felicity has a PhD in History, with a particular interest in the history of woodland and tree management and has published in The Arboricultural Journal on this subject.

### **Mr Tom Readman FdSc Arboriculture, Cert Arb L3, TechArborA, Valid Tree Risk-Benefit Validator**

Tom joined AWA from his previous role as a tree risk surveyor with Harrogate Borough Council, where he undertook tree risk surveys at a range of sites and prescribed suitable works. Tom also has extensive previous experience as a climbing arborist. Tom achieved a Distinction in the Foundation Degree in Arboriculture, while working at AWA, and has previously achieved Distinction Star, and was recognised as the student of the year, in the Extended Diploma in Forestry and Arboriculture. Tom's work focuses on tree risk surveys and accurate tree data collection for development projects to BS 5837:2012

### **Mr James Godfrey BA (Hons), Cert Arb L3, Level 4 Forestry and Arboriculture, TechArborA**

James has extensive arboricultural experience working as a team leader within the public and private sector. By achieving a Distinction Star in the Extended Diploma in Forestry and Arboriculture, James was able to use his knowledge to inform and carry out appropriate maintenance that ensured the long-term wellbeing of trees across the UK. During his time at Darlington Borough Council, James provided on-site assessment and the management of the remedial works required to ensure safe and suitable retention of trees that provide a multitude of benefits to the urban environment. Currently, James is completing a Foundation Degree in Arboriculture and Tree Management, while working at AWA.

### **Mr David Miller BA (Hons), PGCE education, Dip Arboriculture Level 4**

David joined AWA after having managed his own tree care team for 8 years and gained a wealth of experience in the tree care industry. Prior to this David spent 10 years working in secondary mainstream and special education. David has also travelled worldwide, mainly trekking and running. His main work at AWA consists of tree surveys for development projects and preparing Tree Protection Schemes to BS 5837:2012.

## Appendix 2: Survey Methodology and Limitations of Report

The survey was undertaken in accordance with British Standard 5837:2012 *Trees in relation to design, demolition and construction – Recommendations*. The trees were assessed objectively and without reference to any proposed site layout. The trees were surveyed from the ground using 'Visual Tree Assessment' (VTA) methodology. VTA is appropriate and is endorsed by industry guidance. It is used by arboriculturists to evaluate the structural integrity of a tree, relying on observation of trees biomechanical and physiological features. Measurements are obtained using a diameter tape, clinometer, laser distometer and loggers tape. Where this is not practical measurements are estimated. Tree groups have been identified in instances as defined in BS 5837:2012. Shrubs and insignificant trees may have been omitted from the survey.

This report represents a BS 5837:2012 tree survey and should not be accepted as a detailed tree safety inspection report; however, tree related hazards are recorded and commented upon where observed, yet no guarantee can be given as to the absolute safety or otherwise of any individual tree. All recommended tree work must be to BS 3998:2010 - '*Tree Work: Recommendations*'.

The findings and recommendations contained within this report are valid for a period of twelve months from the date of survey. The author shall not be responsible for events which happen after this time due to factors which were not apparent at the time, and the acceptance of this report constitutes an agreement with these guidelines and terms.

## Appendix 3: Explanation of Tree Descriptions

**HEIGHT** of the tree is measured from the stem base in metres. Where the ground has a significant slope the higher ground is selected.

**CROWN HEIGHT** is an indication of the average height at which the crown begins.

**STEM DIAMETER** is measured at 1.5 metres above (higher) ground level. Where the tree is multi-stemmed at this point; the diameter is measured close to ground level or else a combined stem diameter is calculated.

**CROWN SPREAD** is measured from the centre of the stem base to the tips of the branches in all four cardinal points.

**AGE CLASS** of the tree is described as young, semi-mature, early-mature, mature, or over-mature.

**PHYSIOLOGICAL CONDITION** is classed as good, fair, poor, or dead. This is an indication of the health of the tree and takes into account vigour, presence of disease and dieback.

**STRUCTURAL CONDITION** is classed as good, fair or poor. This is an indication of the structural integrity of the tree and takes into account significant wounds, decay and quality of branch junctions.

**LIFE EXPECTANCY** is classed as; less than 10 years, 10-20 years, 20-40 years, or more than 40 years. This is an indication of the number of years before removal of the tree is likely to be required.

### Retention Categories

**A (marked in green on Appendix 5) = retention most desirable.** These trees are of very high quality and value with a good life expectancy.

**B (marked in blue on Appendix 5) = retention desirable.** These trees are of good quality and value with a significant life expectancy.

**C (marked in grey on Appendix 5) = trees which could be retained.** These trees are of low or average quality and value, and are in adequate condition to remain until new planting could be established.

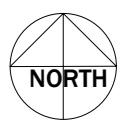
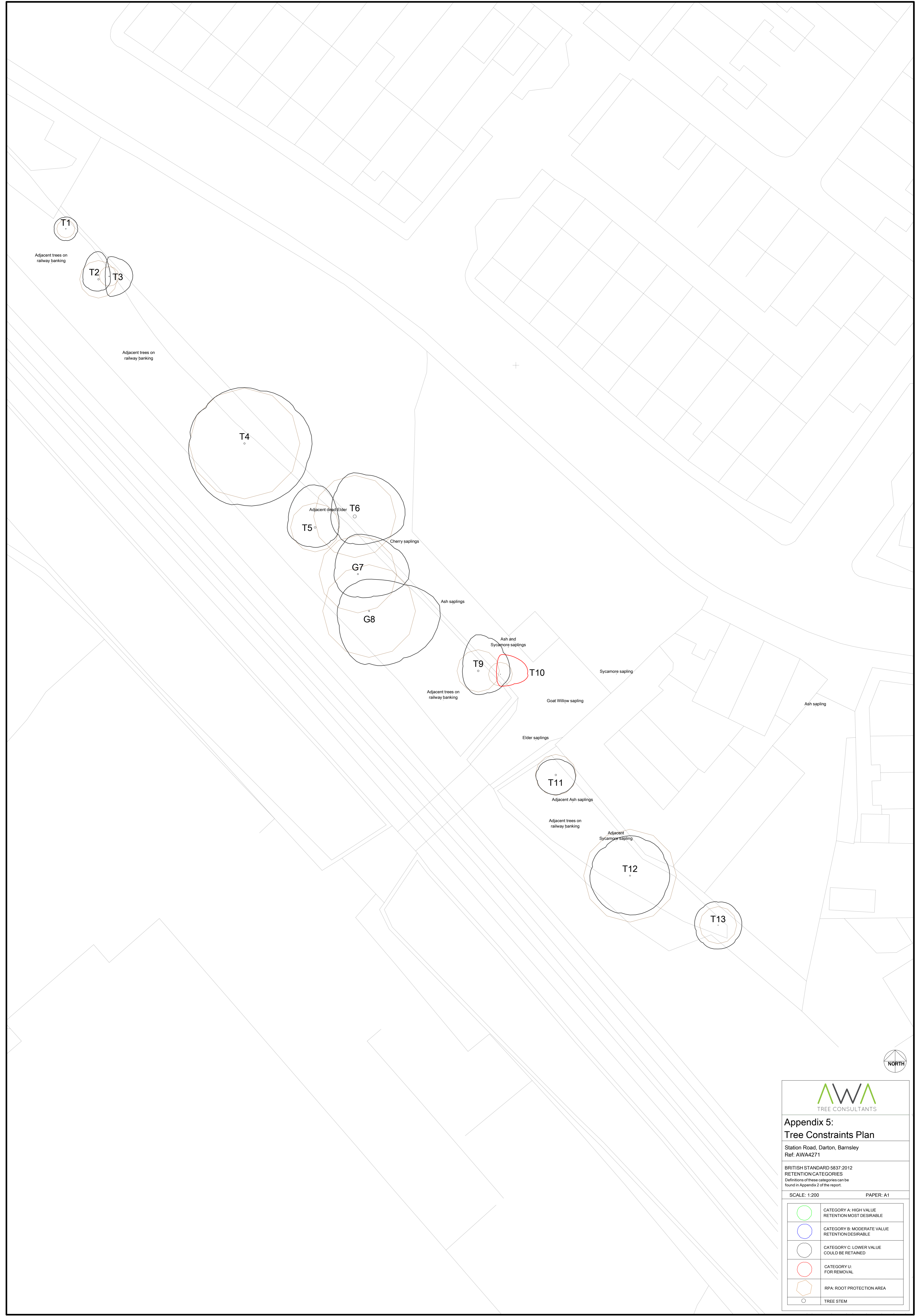
**U (marked in red on Appendix 5) = trees unsuitable for retention.** These trees are in such a condition that any existing value would be lost within 10 years.

Tree ID	Tree Species		Maturity	Measurements				Crown (m)				Tree Condition						Value		Management		
	Common Name	Latin Name		Height (m)	Stems	Stem Diameter (mm)	Estimated	Ave Height	N	E	S	W	Roots	Stem	Crown	Comments	Physiological	Structural	Life Expectancy	Amenity	Category	Works
T1	Ash	<i>Fraxinus excelsior</i>	Young	6	2	70, 60	Yes	2	1.5	1.5	1.5	1.5	Limited access around base	Twin stemmed at base. Vertical	Normal	Situated on adjacent railway banking. No access.	Good	Good	20 to 40 yrs	Low	C	No works required
T2	Ash	<i>Fraxinus excelsior</i>	Young	7	2	120, 150	Yes	1	3.5	1.5	1.5	2	Limited access around base. Soil erosion. Exposed roots	Twin stemmed at base. Vertical. Tight unions	Normal	Situated on adjacent railway banking. No access.	Good	Fair	20 to 40 yrs	Low	C	No works required
T3	Ash	<i>Fraxinus excelsior</i>	Young	7	1	100	Yes	1	2.5	3	2.5	0.5	Limited access around base	Single stemmed. Slight lean east	Normal	Situated on adjacent railway banking. No access.	Good	Fair	20 to 40 yrs	Low	C	No works required
T4	Ash	<i>Fraxinus excelsior</i>	Semi-mature	16	8	200	Yes	1.5	7	8.5	8	7	Limited access around base	Multiple stemmed at base. Vertical. Tight unions	Minor deadwood. Overhanging site	Situated on adjacent railway banking. No access. Crown overhangs into site.	Good	Fair	>40 yrs	Moderate	C	Pruning works required to facilitate development - Reduce and lift northern and eastern crown as required to provide 2m clearance from proposed new residential property - Do not prune beyond site boundary

Tree ID	Tree Species		Maturity	Measurements				Crown (m)				Tree Condition						Value		Management		
	Common Name	Latin Name		Height (m)	Stems	Stem Diameter (mm)	Estimated	Ave Height	N	E	S	W	Roots	Stem	Crown	Comments	Physiological	Structural	Life Expectancy	Amenity	Category	Works
T5	Apple	<i>Malus sp.</i>	Early-mature	8	1	250	Yes	2.5	5.5	3	2.5	3.5	Limited access around base	Single stemmed. Vertical. Ivy covered. Tight unions. Stubs	Minor dieback. Moderate deadwood	Situated on adjacent railway banking. No access. Very Ivy covered.	Fair	Fair	20 to 40 yrs	Moderate	C	No works required
T6	Cherry	<i>Prunus sp.</i>	Early-mature	12	1	420	No	1.5	5.5	6.5	3.5	3	No visual defects	Single stemmed. Significant lean east. Stubs	Old pruning wounds. Minor deadwood	Previous minor reduction works to crown. Two co-dominant stems at 3m.	Good	Fair	>40 yrs	Moderate	C	Pruning works required to facilitate development - Reduce and lift northern and eastern crown as required to provide 2m clearance from proposed new residential property - Do not prune beyond site boundary
G7	Ash	<i>Fraxinus excelsior</i>	Semi-mature	15	7	150	Yes	1	5	6.5	3	3	Limited access around base	Multiple stemmed at base. Vertical. Slight lean. Stubs. Bark damage. Tight unions. Ivy covered	Moderate dieback. Minor deadwood. Overhanging site	Situated on adjacent railway banking. No access. Two trees forming one crown. Crown overhangs into site.	Fair	Fair	20 to 40 yrs	Moderate	C	No works required
G8	Ash	<i>Fraxinus excelsior</i>	Semi-mature	16	10+	150	Yes	1	4	9	7	4	Limited access around base	Multiple stemmed at base. Vertical. Bark damage. Stubs. Tight unions	Minor dieback. Minor deadwood. Overhanging site	Situated on adjacent railway banking. No access. Several trees forming one crown. Crown overhangs into site.	Fair	Fair	20 to 40 yrs	Moderate	C	No works required

Tree ID	Tree Species		Maturity	Measurements				Crown (m)				Tree Condition				Value		Management				
	Common Name	Latin Name		Height (m)	Stems	Stem Diameter (mm)	Estimated	Ave Height	N	E	S	W	Roots	Stem	Crown	Comments	Physiological	Structural	Life Expectancy	Amenity	Category	Works
T9	Ash	<i>Fraxinus excelsior</i>	Semi-mature	10	3	100, 150, 120	Yes	2	4.5	4	3	2	Limited access around base	Multiple stemmed at base. Slight lean east. Stubs	Minor dieback. Minor deadwood. Overhanging site	Situated on adjacent railway banking. No access. Crown overhangs into site.	Fair	Fair	10 to 20 yrs	Low	C	Pruning works required to facilitate development - Reduce and lift northern and eastern crown as required to provide 2m clearance from proposed new residential property - Do not prune beyond site boundary
T10	Elder	<i>Sambucus nigra</i>	Semi-mature	5	6	50	No	0.5	2.5	3.5	1.5	0.5	No visual defects	Multiple stemmed at base. Significant lean east. Stubs. Bark damage. Minor cavities. Minor decay	Moderate dieback. Minor deadwood. Snapped/ hanging branches	Extensive bark damage to main stems and deadwood in crown	Poor	Poor	<10 yrs	Low	U	Removal recommended regardless of development
T11	Ash	<i>Fraxinus excelsior</i>	Semi-mature	10	4	150, 120, 70, 50	Yes	2	2	2.5	2.5	2.5	Limited access around base	Multiple stemmed at base. Vertical. Old pruning wounds. Stubs. Bark damage. Minor cavities. Minor decay	Previously topped with regrowth forming crown	Situated on adjacent railway banking. Limited access. Regrowth from stump topped at 1m.	Fair	Poor	10 to 20 yrs	Low	C	No works required
T12	Ash	<i>Fraxinus excelsior</i>	Semi-mature	12	10+	150	Yes	3.5	5	5	5	5	Limited access around base. Soil erosion. Exposed roots	Multiple stemmed at base. Stubs. Old pruning wounds	Minor dieback. Minor deadwood. Overhanging site	Situated on adjacent railway banking. Limited access. Crown overhangs into site.	Fair	Fair	10 to 20 yrs	Low	C	No works required

Tree Species		Measurements						Crown (m)				Tree Condition						Value		Management		
Tree ID	Common Name	Latin Name	Maturity	Height (m)	Stems	Stem Diameter (mm)	Estimated	Ave Height	N	E	S	W	Roots	Stem	Crown	Comments	Physiological	Structural	Life Expectancy	Amenity	Category	Works
T13	Willow	<i>Salix caprea</i>	Semi-mature	10	10+	60	Yes	1.5	3	3	3	3	Limited access around base	Multiple stemmed at base. Vertical	Minor dieback. Minor deadwood. Overhanging site	Situated on adjacent railway banking. Limited access. Crown overhangs into site.	Fair	Fair	10 to 20 yrs	Low	C	No works required



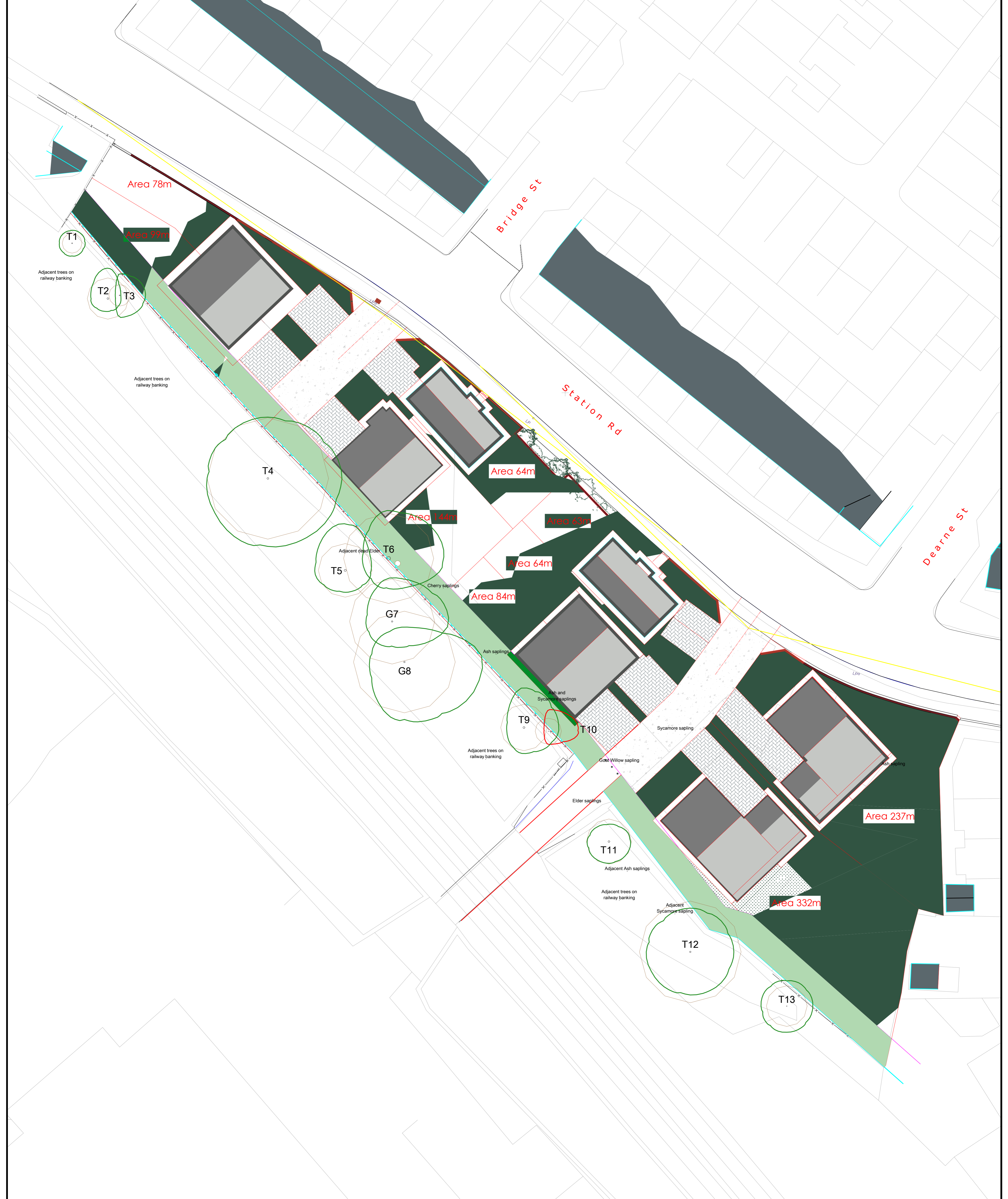
**Appendix 5:  
Tree Constraints Plan**

Station Road, Darton, Barnsley  
Ref: AWA4271

BRITISH STANDARD 5837:2012  
RETENTION CATEGORIES  
Definitions of these categories can be found in Appendix 2 of the report.

SCALE: 1:200 PAPER: A1

	CATEGORY A: HIGH VALUE RETENTION MOST DESIRABLE
	CATEGORY B: MODERATE VALUE RETENTION DESIRABLE
	CATEGORY C: LOWER VALUE COULD BE RETAINED
	CATEGORY U: FOR REMOVAL
	RPA: ROOT PROTECTION AREA
	TREE STEM



**AWA**  
TREE CONSULTANTS

**Appendix 6:**  
**Tree Impacts Plan**  
Station Road, Darton, Barnsley  
Ref: AWA4271

BRITISH STANDARD 5837:2012  
SCALE: 1:200 PAPER: A1

	TREE/ TREE GROUP/ HEDGE TO BE RETAINED
	TREE/ TREE GROUP/ HEDGE TO BE REMOVED
	RPA: ROOT PROTECTION AREA
	TREE STEM