Tamla Trees
consulting arborists

Tree Hazard Evaluation

For Kinleigh Folkard & Hayward

Property:

Ashworth Mansions, London W9 1LN

Managing Agents: Kinleigh Folkard & Hayward

Job Reference: 02337R

Consultant: Keiron Hart (BSc Hons, C.Env, F.Arbor.A, MICFor, MEWI)

Survey Date: 24th June 2015

Report Date: 2nd July 2015

Scope of Report

To carry out a detailed tree inspection of trees within the communal grounds and assess condition, risk and hazard. To identify appropriate tree works. To identify the recommended year for re-inspection based on tree condition and land use.

Note

Trees are living organisms and any assessment of the biological and mechanical condition is only correct on the date of assessment. Every effort has been made to give the maximum longevity to our recommendations. However, circumstances can change rapidly due to factors such as extreme weather events and rapid fungal infection.

Tamla Trees
consulting arborists

Contents

1. The Law

In its simplest terms the duty is to do what is reasonable and not be negligent. An overview of some statutory and case law is shown below:

Statutory Law

The following statute law is relevant to the risk of damage and injury posed by trees:
Health & Safety at Work Act 1974 s.2 & 3
Occupiers Liability Acts (1957 & 1984)
Management of Health and Safety at Work Regulations 1999

Case Law

The 'Acts' above are supported by case law establishing interpretation for future cases:
Noble -v- Harrison 1926
Donoghue v Stevenson 1932
Chapman v Barking & Dagenham London Borough Council 1997
Poll v Bartholomew 2006

Guidance issued by the Health & Safety Executive recognises that responsibilities differ relative to available resources and tree numbers managed. Therefore the duty of care placed on larger landowners differs from those of an individual homeowner.

Further information is available and 2 of the main publications are HSE SIM Management of Risk from Falling Trees and the National Tree Safety Group publication Common Sense Risk Management of Trees.

2. Visual Tree Assessment

Our inspection took the form of Visual Tree Assessment (VTA). This refers to the process used for identifying the condition of the inspected tree. The tree was inspected in a methodical manner. The inspection seeks to identify the presence of visual symptoms. These help the inspector identify whether remedial works are required to abate or manage identified defects. The inspection focuses on the ***mechanical*** and ***biological*** condition of each tree.

The overall condition of each tree is inspected from a distance approximately equivalent to the height of the tree (where space permits). This seeks to identify the overall condition of the tree, canopy shape, presence of leans, previous branch failure etc.

The area around the base of the tree is then inspected to identify whether ground disturbance has occurred. This could be in the form of mechanical damage to roots, or identifying evidence that the root system has been weakened. In the event fungi are present these will be noted. An inspection of the stem and branches of tree is then undertaken from ground level. This seeks to identify decay pockets, stem cracks, reactive growth of wood, further decay fungi, bark condition and many other factors associated with VTA.

In addition an assessment is made of the suitability of the tree to its location, for example, no defect may be present but branches may be obscuring security lighting.

Only once this assessment is made will any appropriate tree works and the relevant re-inspection year prescribed, based on factors such as target area, tree age, species etc.

3. Underlying Soil

Soil is an important factor in tree growth. For example clay soils are more able to become waterlogged, which may affect the tree/ root interface. Free draining sandy soils and chalks tend to encourage deeper rooting. :

	Soil Description
	London Clay Formation - Clay, Silt And Sand. Sedimentary Bedrock formed approximately 34 to 56 million years ago in the Palaeogene Period. Local environment previously dominated by deep seas.

Soil data courtesy of British Geological Society

4. Site Overview

Ashworth Mansions is a Boehmer and Gibbs designed residential block completed in 1900. It is brick built and of traditional construction.

It fronts Elgin Avenue where the treescape is characterised by mature London Planes which are generally under cyclical crown reduction management. No trees line the road to the rear (north) of the building.

Within the communal garden area there are well established trees and shrubs of varying ages. All appear planted and with the exception of the Silver Birch trees appear to be ornamentals chosen for their amenity value.

The site is generally level front to rear although there are localised changes in levels within the internal communal area.

5. Statutory Protected Status

Conservation Area Status	
Is the site located within a Conservation Area	Yes
Notes: All trees larger than 7.5cm diameter at 1.5m above ground level are subject to regulations within a Conservation Area. Exemptions apply for trees which are dead and dangerous but clarification before any tree works is advised. A notification is required in many circumstances.	
Tree Preservation Order Status	
Are inspected trees subject to a TPO?	Unknown
Type of TPO	~~Area~~
	~~Individual~~
	~~Group~~
	~~Woodland~~
TPO Reference	-
Date TPO Made	-
Notes: (i) The type and details of any TPO determine which trees are 'protected'. Exemptions apply for trees which are dead and dangerous but clarification before any tree works is advised. An application may be required before undertaking works. (ii) At the time of writing Westminster Council have not yet responded to our statutory search. (iii) the conservation area status is as advised by the client.	

6. Inspection Observations

The number of trees present and lack of real health and safety issues is such that commentary on each tree is not contained within this section of the report. Readers are directed to the survey schedule for individual information on each tree. Some of the more significant issues/ trees are highlighted below:

T2 (Copper Beech)

This is a mature specimen and as is usual for the species it has a number of included unions evident on the main stem. These are generally considered weak areas but this does not mean they will ultimately fail. The tree appears to have been pruned back from the adjacent building and possibly the subject of other light pruning in the past. As a species Beech do not tolerate significant crown reduction or thinning works. Generally it is advised to keep pruning to a minimum for this species. 2 main fungi are associated with Beech. *Ganoderma* spp which causes a perennial fruiting bracket (of which none were visible) and *Meripilus giganteus* which generally appears at the base of an infected tree between July-September. Both fungi are generally obvious by virtue of their size and in the event either should appear we should be contacted for further advice.

T3 & T13 (Silver Maple)

These 2 trees have both been significantly reduced in the past (>20 years previously) and the canopies have fully regrown. They have then been subject to further crown reduction works limited to the outer 2-3m of the canopies. The original reduction works has introduced a long standing weakness on each tree but subject to the outer canopy reduction (to reduce leverage on the lower weakness as the previous pruning will have introduced some decay) being continued on a cyclical basis the trees should pose no significant health and safety concerns. As a species Silver Maple is tolerant of pruning.

T8 (Judas Tree)

This tree is nearly dead and will not recover. It would be exempt from the need to make a formal application to the council before it is removed but 5 days' notice under Regulation 14 (1) C of the Town & Country Planning Act should be given prior to its removal.

T16 (Laburnum)

This tree is dead. It would be exempt from the need to make a formal application to the council before it is removed but 5 days' notice under Regulation 14 (1) C of the Town & Country Planning Act should be given prior to its removal.

T17 – T33 (London Plane)

These trees are an amenity feature planted at the time the building was constructed. They are visually prominent to Elgin Avenue. They have a long history of being managed as pollards. As a species London Plane is very tolerant of such pruning work. Most of the trees have small pockets of decay on the main stem associated with a history of pruning works. In places this decay is well established but given the cyclical repeat pruning undertaken (which reduces the wind resistance presented by each tree and therefore leverage on the weak pruning areas) we would envisage few issues with the associated decay.

In terms of risk management it will be noted that varying re-inspection timeframes are detailed within the survey data. Within the communal area the majority of trees are considered 'low' risk. That assessment is based on a combination of the tree size, age and species characteristics. In places larger trees, or those with pruning history are elevated to 'medium' risk. The London Plane trees along Elgin Avenue are high risk by virtue of being located adjacent to a public footpath and having decay evident. An annual inspection is therefore advised. It is generally sufficient for someone with working knowledge of the trees (such as someone in charge of grounds maintenance) to make such periodic checks. We (or another suitably qualified arboricultural firm) should undertake a full resurvey every 5 years (maximum).

Whilst the trees remain the occupants/ agents should remain vigilant for any signs of decline from the tree such as loss of foliage in summer months or increased shedding of branches. Whilst this approach will not completely remove risks (as a mechanical defect or decay fungi would still not be visible) it is generally proportionate to the risk from tree failure.

Subsidence Risk (Trees)

London Clay Formation - Clay, Silt And Sand. Sedimentary Bedrock formed approximately 34 to 56 million years ago in the Palaeogene Period. Local environment previously dominated by deep seas.

Subsidence from vegetation and trees occurs when the vegetation dries the underlying soil and if this contains clay it can shrink in size and the building subsides. The soil then rehydrates during the wet winter months giving classic cyclical movement profiles. The BGS data indicates the underlying soil to be clay. Such soil is characterised by its high shrinkage potential and as such there is a considered risk of soil shrinkage damage occurring. This form of damage is separate to that of light structures which can happen on any soil (as this form of direct damage is due to the physical expansion of the trees roots, not its action on drying the soil below foundation level).

The fact that the underlying soil is clay theoretically means there is a risk of tree related subsidence. It must be noted that this is for guidance only as only localised site investigations can confirm the exact soil type underlying the foundations. Please note that this risk is no different than for any other similar property with similar tree cover on a clay soil. The presence of a risk does not mean subsidence will occur.

Indirect damage (clay shrinkage subsidence) is a complex process and its risk of occurring relies on the evaluation of a number of factors. We would suggest that you notify your potential insurer/ lender as appropriate if damage occurs.

Foundation depth, soil characteristics, climate, tree species and tree to house distance are all factors which require consideration if an accurate assessment of risk is to be determined.

We have no information on foundation depths or confirmed soil characteristics (other than those available from the BGS) at the time of writing nor are we aware of any previous clay shrinkage related damage to the property.

In the future, any connection between clay shrinkage damage to the property and the trees will require the clear identification of shrinkable clay soils below the foundations. The presence of live roots below the foundations would also need to be substantiated as well as a pattern of movement

consistent with subsidence (that is downward movement/ crack opening during the dry summer months, followed by crack closure/ upward movement in the winter/ spring).

Whilst there is a risk this is no different than throughout the areas of London on such a clay soil with mature trees nearby. At the sizes and distances present on site only complete removal of trees would remove the risk. Such an approach is disproportionate to the 'real' risk the trees pose. In addition, given the confirmed Conservation Area permission would be required from Westminster Council prior to tree works and it is our experience that applications to remove trees on the basis of perceived risk of property damage are not viewed favourably by local authorities.

In the event of tree works it is our advice that all works should be carried out by qualified, trained and fully insured operators in accordance with BS 3998: 'Recommendations for Tree Works'. Please note if the intention is to complete tree work between the 1st March & the 31st July (inclusive) a due diligence check for nesting birds must be completed before work starts in order to comply with the Wildlife & Countryside Act 1981. This check should be recorded in the Site Specific Risk Assessment. If active nests are found work should not take place until the young have fledged. Further information is available here:

If required tree surgeons can be sourced here.

7. Photographs

T17 – T33 (London Plane) and Ashworth Mansions (Front)

T1 Goat Willow

T2 Beech – showing included union at crown break

T3 Silver Maple – showing V unions and areas of previous pruning

T5 Hornbeam

T5 Hornbeam shwoing bacterial activity at base

T8 Judase Tree – nearly dead

T16 Laburnum - Dead

Example decay on main stems of London Plane trees

Example decay on London Plane

T32 London Plane – lower stem lesions

Appendix 1 – Tree Survey Plan

In the UK the prevailing wind direction is from the South West

T Tree
TG Tree Group

Job Reference: 02337R

Date: July 2015

Site Location:
Ashworth Mansions,
London W9 1LN

Note: Other site trees not shown and outside scope of instruction

E: info@tamlatrees.com
M: 07845 249 396
O: 01252 811 233
W: www.tamlatrees.com

Tamla Trees
consulting arborists

Appendix 2 – Tree Survey Data

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T1	Willow (Goat)	8	Mature	No significant recent management	No Gross Defect Noted	Lower branches previously removed. Evidence of Ganoderma spp developing at crown break and also at 1.2m	Low (2020)	No works	NA
T2	Beech (Copper)	15	Mature	No significant recent management	No Gross Defect Noted	Minimal previous pruning history. As a species it does not tolerate severe pruning. Included Union at crown break. Vigilance for *Meripilus giganteus* always advised with mature examples of this species.	Medium (2018)	No works	NA
T3	Maple (Silver)	12.5	Mature	Subject to previous pruning	No Gross Defect Noted	This tree has been topped at 6m previously and the canopy has fully regrown. There is a genuine risk of sections of regrowth breaking out. The buildings do shelters the tree but cyclical reduction work should manage this structural defect. This appears in place with further reduction points high in the main canopy.	Medium (2018)	Crown reduce by 2-3m and repeat at 5 year intervals	12 months
T4	Birch (Silver)	14.5	Mature	No significant recent management	No Gross Defect Noted	Surveyed as 1 tree but possibly 2 separate trees. High canopy due to previous crown lifting. Suppressed by T3 and T5.	Low (2020)	No works	NA

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T5	Hornbeam (Fastigiate)	11.5	Mature	No significant recent management	No Gross Defect Noted	Good form for species. Minor bacterial canker at base with some necrotic bark but minimal evidence of decay.	Low (2020)	No works	NA
T6	Plum (Purple)	6.8	Mature	No significant recent management	No Gross Defect Noted	Canker wood/ graft growth at 2m but appears in good health.	Low (2020)	No works	NA
T7	Cherry	4.5	Mature	No significant recent management	No Gross Defect Noted	Some thinning of canopy evident and could be in slow decline. Small tree away from target areas.	Low (2020)	No works	NA
T8	Judas Tree	6.8	Mature	No significant recent management	Gross Defect Noted	In significant decline with minimal foliage.	NA - tree to be felled	Remove and Replace	12 months
T9	Plum (Purple)	6.8	Mature	No significant recent management	No Gross Defect Noted	Canker wood/ graft growth at 2m but appears in good health.	Low (2020)	No works	NA
T10	Cherry	4.6	Mature	No significant recent management	No Gross Defect Noted	Domed canopy. Minimal deadwood. V Union at canopy break.	Low (2020)	No works	NA
T11	Plum (Purple)	6.6	Mature	No significant recent management	No Gross Defect Noted	Canker wood/ graft growth at 2m but appears in good health.	Low (2020))	No works	NA
T12	Birch (Silver)	13	Mature	No significant recent management	No Gross Defect Noted	2 stems from close to ground level. Minor crown lifting previously undertaken. Species is not tolerant of significant pruning.	Medium (2018)	No works	NA
T13	Maple (Silver)	12.5	Mature	Subject to previous pruning	No Gross Defect Noted	This tree has been topped at 6m previously and the canopy has fully regrown. There is a genuine risk of	Medium (2018)	Crown reduce by 2-3m and repeat at 5	12 months

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
						sections of regrowth breaking out. The buildings do shelters the tree but cyclical reduction work should manage this structural defect. This appears in place with further reduction points high in the main canopy. Large surface roots visible tracking to down pipe/ drainage.		year intervals	
T14	Cherry	4.6	Mature	No significant recent management	No Gross Defect Noted	Minor dead wood which is not unusual for species.	Low (2020)	No works	NA
T15	Magnolia	5.3	Mature	No significant recent management	No Gross Defect Noted	Multi stemmed from ground level.	Low (2020)	No works	NA
T16	Laburnum	3.4	Early-mature	No significant recent management	Gross Defect Noted	Dead	NA - tree to be felled	Remove and Replace	12 months
T17	Plane (London)	5.8	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued.	High (2016)	No works	NA
T18	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Some dead bark on main stem. Aucuba at base hindered full basal	High (2016)	No works	NA

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
						inspection.			
T19	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Stem swelling at 2m indicative of decay. Aucuba at base hindered full basal inspection.	High (2016)	No works	NA
T20	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T21	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T22	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T23	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T24	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T25	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T26	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T27	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to	High (2016)	No works	NA

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
						brick built boundary wall.			
T28	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T29	Plane (London)	6	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T30	Plane (London)	6.5	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA
T31	Plane (London)	6.5	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall.	High (2016)	No works	NA

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T32	Plane (London)	6.5	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall. Lesions on lower stem.	High (2016)	No works	NA
T33	Plane (London)	6.5	Mature	Managed as high pollard	No Gross Defect Noted	Subject to regular reduction work to remove 100% of canopy. Decay pockets evident. Regular reduction reduces strains on these defects and should be continued. Close to brick built boundary wall. Ivy establishing.	High (2016)	No works	NA

Appendix 3 – Tree Surgery Advised

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T3	Maple (Silver)	12.5	Mature	Subject to previous pruning	No Gross Defect Noted	This tree has been topped at 6m previously and the canopy has fully regrown. There is a genuine risk of sections of regrowth breaking out. The buildings do shelters the tree but cyclical reduction work should manage this structural defect. This appears in place with further reduction points high in the main canopy.	Medium (2018)	Crown reduce by 2-3m and repeat at 5 year intervals	12 months
T8	Judas Tree	6.8	Mature	No significant recent management	Gross Defect Noted	In significant decline with minimal foliage.	NA - tree to be felled	Remove and Replace	12 months
T13	Maple (Silver)	12.5	Mature	Subject to previous pruning	No Gross Defect Noted	This tree has been topped at 6m previously and the canopy has fully regrown. There is a genuine risk of sections of regrowth breaking out. The buildings do shelters the tree but cyclical reduction work should manage this structural defect. This appears in place with further reduction points high in the main canopy. Large surface roots visible tracking to down pipe/ drainage.	Medium (2018)	Crown reduce by 2-3m and repeat at 5 year intervals	12 months

Tree No.	Species	Height (m)	Age Class	Past Management	Defects	General Comments	Risk Target & Year of Next Inspection	Tree Works	Work Priority
T16	Laburnum	3.4	Early-mature	No significant recent management	Gross Defect Noted	Dead	NA - tree to be felled	Remove and Replace	12 months

Appendix 4 - Limitations

Trees should be re-inspected as per the recommendations in this report.

The recommended re-inspections will seek to evaluate the effectiveness of management proposals and to re-evaluate the condition of the tree stock to meet your duty of care to ensure, insofar as is reasonably practicable, that people and property are not exposed to unreasonable levels of risk.

Trees should be inspected by a suitably qualified arboriculturalist after severe weather, localised ground works or other factors that may affect tree health and structural integrity, to assess their condition and evaluate the need for any remedial action. This report makes no recommendations to the risk of property damage by way of subsidence.

Any events that require a detailed inspection to assess tree condition should be carried out by a qualified arboriculturalist. We recommend NVQ Level 5 qualified or above.

Recommendations for tree management have been based on current Arboricultural Best Practice as set out by the Arboricultural profession and all relevant publications.

The presence of Tree Preservation Orders (TPO) or Conservation Area status must be determined prior to any tree works being implemented, failure to do so can result in fines in excess of £20,000.

A legal Duty of Care requires that all works specified in this report should be performed by qualified, arboricultural contractors who have been competency tested to determine their suitability for such works in line with Health & Safety Executive Guidelines. Additionally all works should be carried out according to British Standard 3998 (2010) Recommendations for Tree Work.

Appendix 5 – Surveyor Profile

This survey and report was completed by Keiron Hart (BSc Hons, C.Env, F.Arbor.A, MICFor, MEWI).

Keiron has been inspecting trees for over 15 years. He has extensive experience in hazard tree evaluation. He undertakes individual inspections through to project managing large scale tree hazard surveys. He is a Chartered Environmentalist, Chartered Forester, Fellow of the Arboricultural Association, vetted Member of the Expert Witness Institute and Registered Consultant with the Arboricultural Association.

He undertakes regular legal work providing information and evidence in cases of tree failure.

CEnv Chartered Environmentalist

Arboricultural Association ® REGISTERED CONSULTANT

EWI Individual Member