

Landmark Trees Ltd

Tel: 020 7851 4544

BS5837 Tree Constraints Survey Schedule

Site: 41 Frogna, London NW3 6YD

Date: 24/07/12 & 25/11/14

Surveyor(s): James Bell & Adam Hollis

Ref: AKN/41F/AIA

Tree No.	English Name	Height	Crown Spread	Ground Clearance	Age Class	Stem Diameter	Protection Multiplier	Protection Radius	Growth Vitality	Structural Condition	Landscape Contribution	B.S. Cat	Sub Cat	Useful Life	Observations
1	Plane, London	18	8898	5	Mature	920	12	11.0	Normal	Good	Medium	A	1	>40	Entry wounds on trunk
2	Chestnut, Sweet	8	4554	3	Early Mature	358	12	4.3	Normal	Fair	Low	C	2	20-40	Twin stem with swelling SD=320 & 160; arches over entrance
2a	Holly	5	2	0	Early Mature	171	12	2.1	Normal	Good	Low	C	2	10-20	Multi stem 6 Av SD=70
3	Plum, Myrobalan	4	3022	1.3	Mature	194	12	2.3	Moderate	Fair	Low	C	2	10-20	Twin stem Suppressed by nearby tree SD=110 & 160
4	Plum, Purple	8	3133	0.5	Mature	248	12	3.0	Moderate	Fair	Low	C	2	10-20	Twin stem SD=170 & 180
5	Sycamore	15	7555	3	Early Mature	420	12	5.0	Normal	Good	Medium	B	1	>40	Flush cut pruning wound at base; good clearance over adjoining property to N
6	Plum, Cultivated	4	2121	1.7	Semi-mature	90	12	1.1	Normal	Fair	Low	C	2	10-20	
7	Apple, Cultivated	6	2.5	1.8	Semi-mature	130	12	1.6	Normal	Good	Low	C	2	20-40	
8	Plane, London	20	?	3	Mature	1200e	12	14.4	Normal	Good	Medium	B	1	>40	Slightly sparser upper crown Pollard (Old) Hint of bottle butt-possible early decay at trunk base; cut back off adjoining property to N=little northern crown remains
9	Plane, London	20	?	3	Mature	1400e	12	16.8	Normal	Good	Medium	B	1	>40	Pollard (Old) Hint of bottle butt-possible early decay at trunk base; base 125cm from garage

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10	Chestnut, Horse	16	7566	2	Early Mature	590	12	7.1	Normal	Good	Medium	B	1,2	20-40	Slightly sparse upper crown Early flux/lesions on trunk
12	Holly	8	3	0	Early Mature	230	12	2.8	Normal	Good	Low	C	2	20-40	
13	False Acacia	17	8447	2	Early Mature	400	12	4.8	Normal	Fair	Low	C	2	20-40	Leaning (slightly) to NW
14	Maple, Norway	20	9566	1.5	Mature	583	12	7.0	Normal	Fair	Medium	C/b	1	20-40	Twin stem Weak unions SD=370 & 450
15	Beech, Copper	22	8898	0.5	Mature	820	12	9.8	Normal	Good	Medium	A	1	>40	Entry wounds on trunk Minor deadwood 4/5m clearance over drive
19	Oak, Holm	7	3	0	Semi-mature	211	12	2.5	Normal	Good	Low	C	1	>40	Multi stem 3 SD=140,130 & 90e
21	Elder	3	1.5	1	Young	60	12	0.7	Normal	Fair	Low	C	2	10-20	Irrelevant
22	Elder	4	2223	1.8	Semi-mature	171	12	2.1	Normal	Fair	Low	C	2	10-20	Multi stem 6 Av SD = 70
23	Elder	7	3	2.5	Mature	220	12	2.6	Moderate	Fair	Low	C	1	10-20	Ivy smothered Multi stem - 6 Av SD =90
24	Pyracantha	5	?	1.8	Early Mature	166	12	2.0	Normal	Fair	Low	C	1	10-20	Multi stem - 11 Av SD=50

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Tree No.	English Name	Height	Crown Spread	Ground Clearance	Age Class	Stem Diameter	Protection Multiplier	Protection Radius	Growth Vitality	Structural Condition	Landscape Contribution	B.S. Cat	Sub Cat	Useful Life	Observations
25	Chestnut, Horse	7	2242	2.5	Semi-mature	230	12	2.8	Moderate	Fair	Low	C	1	10-20	Twin stem Ivy smothered SD=190 & 130; leaf/shoot disorders
26	Beech, Common	27	7774	2	Mature	810	12	9.7	Normal	Good	High	A	1	>40	Tight forks at 1.7m Suppressed by nearby tree
27	Lime, Common	20	3	2.5	Early Mature	560	12	6.7	Moderate	Poor	Low	C	1	10-20	Decay at trunk base
28	Chestnut, Horse	18	5	4	Mature	650e	12	7.8	Normal	Fair?	Medium	B	1	20-40	Ivy clad Offsite
29	Lime, Common	16	4	2	Early Mature	370e	12	4.4	Normal	Fair?	Low	C	2	20-40	Suckering from base Offsite
30	Ash, Common	8	1.5	2	Young	110	12	1.3	Normal	Good	Low	C	1	>40	
31	Lime, Common	8	1.5	2	Young	100	12	1.2	Normal	Good	Low	C	1	>40	
34	Yew, Common	7	3	2	Semi-mature	250e	12	3.0	Normal	Fair?	Low	C	1	>40	Offsite
35	Lime, Common	27	7677	3	Mature	790	12	9.5	Normal	Good	High	B	1	>40	Flush cut pruning wounds at 8m
36	Lime, Common	17	3	2	Early Mature	470e	12	5.6	Normal	Fair?	Medium	B	2	20-40	Offsite

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37	Lime, Common	17	5333	2	Early Mature	470e	12	5.6	Normal	Fair?	Medium	B	2	20-40	Offsite
38	Beech, Common	12	5647	4	Early Mature	500e	12	6.0	Normal	Good	Medium	B	1	20-40	Offsite
39	Yew, Common	7	2.5	0	Early Mature	400e	12	4.8	Normal	Fair?	Low	C	1	>40	Offsite
40	Cherry, Wild (Gean)	8	2221	2	Semi-mature	160	12	1.9	Normal	Good	Low	C	1	T	
41	Sycamore	18	6678	3	Mature	470	12	5.6	Normal	Good	Medium	B	1	20-40	Suckering from base - 9 up to a SD of 22cm
42	Willow, Sallow	11	4533	2	Mature	373	12	4.5	Normal	Good	Medium	C	1	20-40	Multi stem 4 130,160,210 & 230

APPENDIX 2

RECOMMENDED TREE WORKS

Notes for Guidance:

Husbandry 1 - Urgent (ASAP), 2 - Standard (within 6 months), 3 - Non-urgent (2-3 years)

- CB - Cut Back to boundary/clear from structure.
- CL# - Crown Lift to given height in meters.
- CT#% - Crown Thinning by identified %.
- CCL - Crown Clean (remove deadwood/crossing and hazardous branches and stubs).
- CR#% - Crown Reduce by given maximum % (of outermost branch & twig length)
- DWD - Remove deadwood.
- Fell - Fell to ground level.
- FInv - Further Investigation (generally with decay detection equipment).
- Pol - Pollard or re-pollard.
- Mon - Check / monitor progress of defect(s) at next consultant inspection which should be <18 months in frequented areas and <3 years in areas of more occasional use. Where clients retain their own ground staff, we recommend an annual in- house inspection and where practical, in the aftermath of extreme weather events.
- Svr Ivy / Clr Bs - Sever ivy / clear base and re-inspect base / stem for concealed defects.

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Site: 41 Frognal, London NW3 6YD

Date: 24/12/2012 & 25/11/14

Recommended Tree Works

Hide irrelevant

Show All Trees

Surveyor(s): James Bell & Adam Hollis

Ref:AKN/41F/AIA

Tree No.	English Name	Height	Stem Diameter	Crown Spread	Recommended Works	Comments/ Reasons
15	Beech, Copper	22	820	8898	CCL	Entry wounds on trunk Minor deadwood 4/5m clearance over drive Advisable for good arboricultural practice
27	Lime, Common	20	560	3	FInv POL 6m option	Decay at trunk base Advisable for good arboricultural practice

APPENDIX 3

RECOMMENDED TREE WORKS TO FACILITATE DEVELOPMENT (See Table 1)

Notes for Guidance:

- RP - Pre-emptive root pruning of foundation encroachments under arboricultural supervision.
- CB - Cut Back to boundary/clear from structure.
- CL# - Crown Lift to given height in meters.
- CT#% - Crown Thinning by identified %.
- CCL - Crown Clean (remove deadwood/crossing and hazardous branches and stubs).
- CR#% - Crown Reduce by given maximum % (of outermost branch & twig length)
- DWD - Remove deadwood.
- Fell - Fell to ground level.
- FInv - Further Investigation (generally with decay detection equipment).
- Pol - Pollard or re-pollard.
- Mon - Check / monitor progress of defect(s) at next consultant inspection which should be <18 months in frequented areas and <3 years in areas of more occasional use. Where clients retain their own ground staff, we recommend an annual in- house inspection and where practical, in the aftermath of extreme weather events.
- Svr Ivy / Clr Bs - Sever ivy / clear base and re-inspect base / stem for concealed defects.

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Tel: 0207 851 4544

Site: 41 Frogna1, London NW3 6YD

Date: 24/12/2012 & 25/11/14

Recommended Tree Works To Facilitate Development

Hide irrelevant

Show All Trees

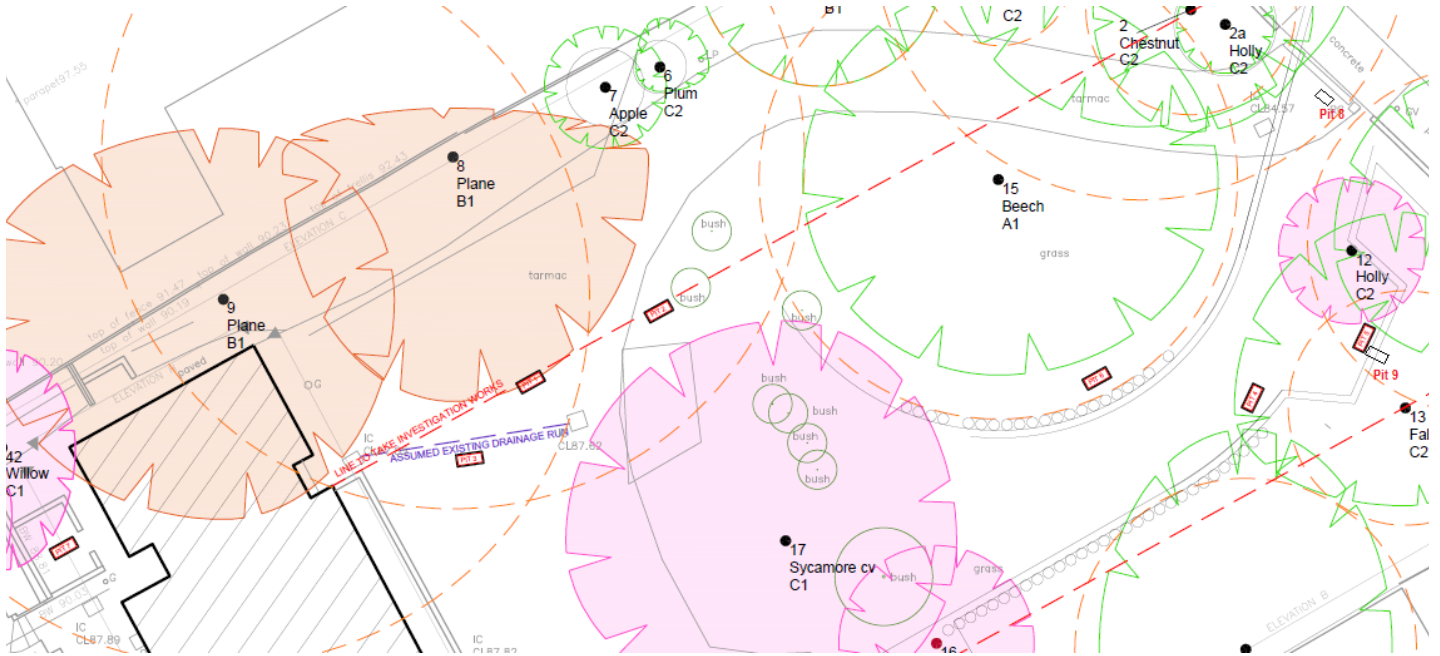
Surveyor(s): James Bell & Adam Hollis

Ref:AKN/41F/AIA

Tree No.	English Name	Height	Stem Diameter	Crown Spread	Recommended Works	Comments/ Reasons
9	Plane, London	20	1400e	7/9/7/ 10	CL5-6m	Pollard (Old) Hint of bottle butt-possible early decay at trunk base; base 125cm from garage To facilitate development
42	Willow, Sallow	11	373	4533	Fell	Multi stem 4 130,160,210 & 230 To facilitate development

APPENDIX 4

ROOT EXCAVATION REPORT BY ARBORAERATION 01/07/14 & 02/07/2014



Plan A3.1 Location of Trial Pits (Note: Trial pit plan based on previous proposals)

Root Excavation Report

41 Frognal

London

NW3 6AD

Undertaken by

David Abbott, Arboraeration

1st and 2nd of July 2014

Introduction

Site Address: 41 Frognal, London, NW3 6AD

Nine trial pits were excavated by David Abbott from ArborAeration on the 1st and 2nd of July 2014. Pits were excavated using an air spade and manual digging tools.

Reason for trial pits

Trial pits were excavated to determine the extent of a rooting area belonging to a number of protected trees growing within and on the boundary of the property.

Nine pits were excavated in total, Two were located on the front driveway, Six within the front lawn and One in the rear garden.

Trial Pit Results

Trial Pit 1	Within driveway in front of T8 100cm long, 40cm wide, 70cm deep No Roots found
Trial Pit 2	To the east of TP1, on the edge of the lawn 100cm long, 40cm wide 1 large 50mm root
Trial Pit 3	Within driveway behind drainage line 100cm long, 40cm wide, 70cm deep No Roots found
Trial Pit 4	In the lawn in front of T13 and T14 100cm Long, 40cm Wide 1 x 25mm root 1 x 20mm root Some <15mm roots
Trial Pit 5	In the lawn between T13 and T2 100cm long, 40cm wide 1 x 25mm root A number of 15-20mm roots
Trial Pit 6	In the lawn between T14 and T15 100cm long, 40cm wide, 70cm deep No Roots found
Trial Pit 7	In the rear of the property 100cm long, 40cm wide, 70cm deep No Roots found
Trial Pit 8	In the lawn, between T2, T10 and the road 100cm long, 40cm wide 1 x 50mm root
Trial Pit 9	In the lawn, 90° to TP5 100cm long, 40cm wide 1 x 25mm root 2 x 20mm roots

Further Information

All roots unearthed were wrapped with damp hessian upon leaving to help prevent desiccation.

Photographic Evidence

Trial Pit 1



Trial Pit 2



Trial Pit 3



Trial Pit 4



Trial Pit 5



Trial Pit 6



Trial Pit 7



Trial Pit 8



Trial Pit 9



APPENDIX 5: TREE SELECTION FOR CONSTRICTED SITES

Table A5.1: Rosaceous Tree Species for Constricted Planting Sites

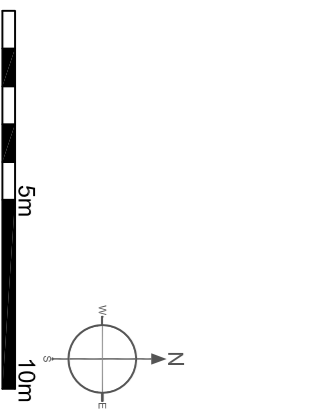
Common Name	Species	Selected Form
Hawthorn	<i>Crataegus monogyna</i>	Stricta
Cockspur	<i>Crataegus prunifolia</i>	Splendens
Cherry	<i>Prunus x hillieri</i>	Spire
Bird cherry	<i>Prunus padus</i>	Albertii
Rowan / Mountain ash	<i>Sorbus aucuparia</i>	Cardinal Royal
Rowan / Mountain ash	<i>Sorbus aucuparia</i>	Rossica Major
Rowan / Mountain ash	<i>Sorbus aucuparia</i>	Sheerwater Seedling
Swedish whitebeam	<i>Sorbus intermedia</i>	Brouwers
B. whitebeam	<i>Sorbus x thuringiaca</i>	Fastigiata

Table A5.2: Specimen Tree Species for Constricted Planting Sites

Common Name	Species	Selected Form
Chinese red bark birch	<i>Betula albosinensis</i>	Fascination
Swedish birch	<i>Betula pendula</i>	Dalecarlica
Hornbeam	<i>Carpinus betulus</i>	Fastigiata Frans Fontaine
Turkish Hazel	<i>Corylus colurna</i>	
Maidenhair tree	<i>Ginkgo biloba</i>	
Pride of India	<i>Koelreuteria paniculata</i>	Fastigiata
European larch	<i>Larix decidua</i>	Sheerwater Seedling
Tulip tree	<i>Liriodendron tulipifera</i>	Fastigiata

APPENDIX 6

TREE CONSTRAINTS PLAN



NOTE:
 This survey is of a preliminary nature. The trees were inspected from the ground only on the basis of the Visual Tree Assessment method. No samples were taken for analysis. No decay detection equipment was employed. The survey does not cover the arrangements that may be required in connection with the living or removal of underground services.
 Branch spread in metres is taken at the four cardinal points to derive an accurate representation of the crown.
 Root Protection Areas (RPA) are derived from stem diameter measured at 1.5 m independent ground level (taken on sloping ground on the upslope side of the tree bases).

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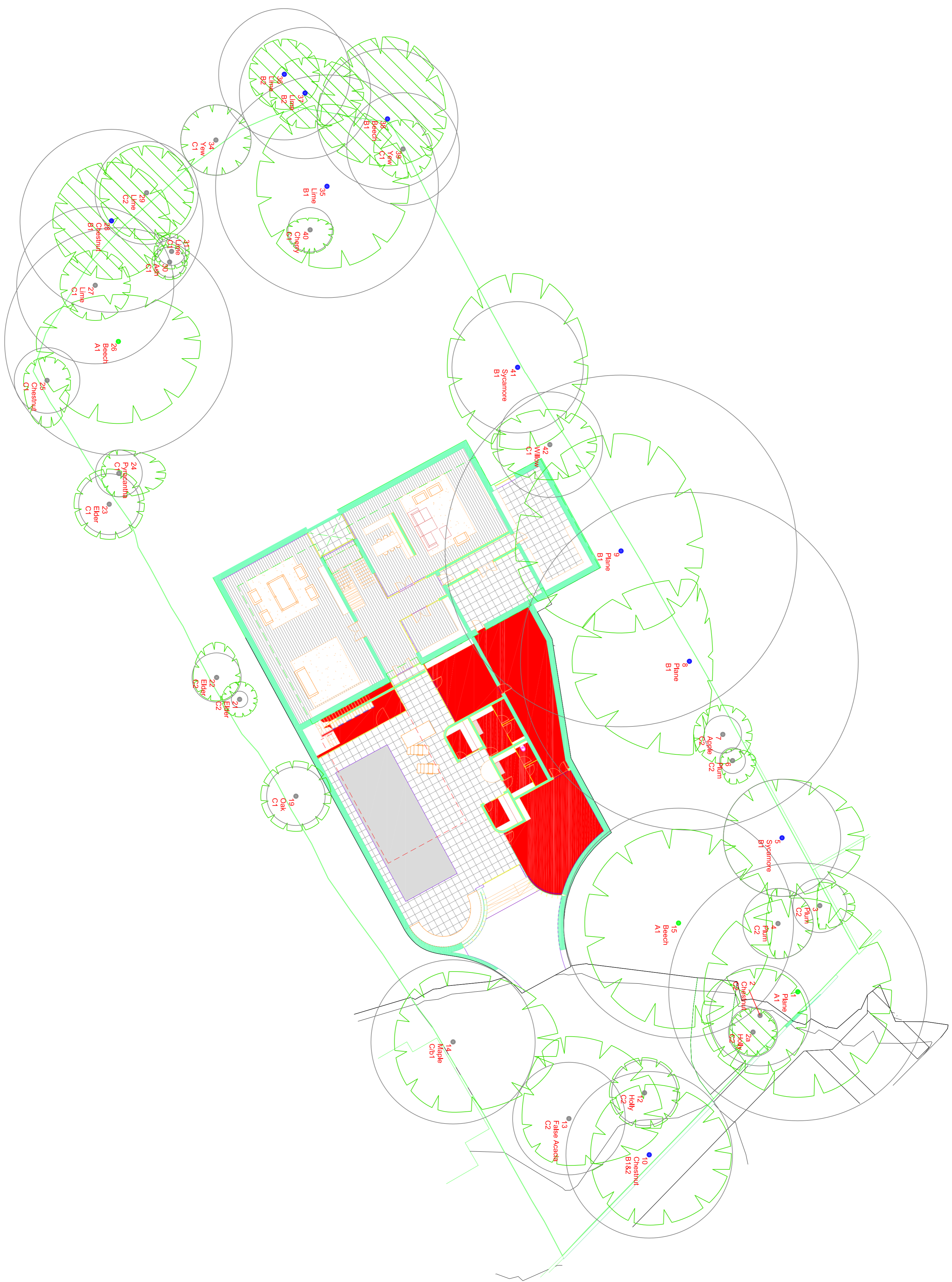
1:200 @ A1
 July 2012

<p>Key:</p> <ul style="list-style-type: none"> ● Category A High Quality ● Category B Moderate Quality ● Category C Low Quality ● Category U Trees Unsuitable for Retention 	<p>Category</p> <ul style="list-style-type: none"> ● Crown Spread ● Tree Number ● Species ● Category ● Tree Position (as shown on original survey)
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Drawing Title: Tree Constraints Plan
 Site: 41 Frogmal

APPENDIX 7

ARBORICULTURAL IMPACT ASSESSMENT PLAN



NOTE:
 This survey is of a preliminary nature. The trees were inspected from the ground only on the basis of the Visual Tree Assessment method. No samples were taken for the purpose of this survey. The survey was carried out on the basis of the Visual Tree Assessment method. No samples were taken for the arrangements that may be required in connection with the laying or removal of underground services.
 Branch spread in metres is taken at the four cardinal points to derive an accurate representation of the crown.
 Root Protection Areas (RPA) are derived from stem diameter measured at 1.5 m above adjacent ground level (taken on sloping ground on the upslope side of the tree base).

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Drawing Title: Arboricultural Impacts Assessment
 1:200 @ A1
 Dec 2014

Key:

● High Quality	Category A	● Crown Spread
● Moderate Quality	Category B	● Tree Number
● Low Quality	Category C	● Species
● Trees Unsuitable for Retention	Category U	● Tree Position (not shown on original survey)
		● Root Protection Area

