



ARBORICULTURAL METHOD STATEMENT

for

51 Longwood Avenue, Cowplain

-prepared on behalf of Mr & Mrs I Smith –

- October 2013-

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1.0 INTRODUCTION & CLIENTS BRIEF

- 1.1 My clients – **Mr & Mrs I Smith** - are wishing to demolish the existing garage on this site and construct a larger building in its place.
- 1.2 There are a number of trees in the rear garden which are fairly close to the new build location and will need to be accounted for and fully protected during the demolition/construction process.
- 1.3 I have been commissioned to consider the impact that development might have on these trees and prepare a report & plans to satisfy planning requirements.
- 1.4 My work is to be compiled in accordance with the Recommendations contained within BS5837:2012.

2.0 DOCUMENT DISCLOSURE STATEMENT

- 2.1 A copy of the following Planning Layout drawings as prepared by my clients architect – **R.J.N.Day** :
 - **Existing & Proposed Site Plan – 0313-11- 1:200 scale-July 2013 @ A3 paper size**
–has been provided to me for the purposes of my work and I rely totally on the accuracy of these drawings.

3.0 TREE SURVEY & ROOT PROTECTION SCHEDULES & IMPACT ASSESSMENT

3.1 I visited the site on **8th October 2013** and carried out a tree survey exercise in accordance with BS5837:2012 recommendations (see explanatory tree survey notes [at appendix BH1](#)).

Tree No.	Species	Ht m	Diam mm	Brch Sprd m	GC m	LMB m	LS	Comments	Preliminary Management Recommendations	Rem Con yrs	Cat
1	Silver Birch <i>Betula pendula</i>	13	340	N4.5 E3 S5 W5	1.5	2n	EM	Has been pruned hard back and high crown lifted on east side where it overhangs the boundary line and the neighbours pond-dead ivy clinging to trunk	No work considered essential at time of survey	>40	B1
2	Pedunculate Oak <i>Quercus robur</i>	18	640	N8 E5 S6 W8	1.5	3n	M	Suppressed to the south by other trees-small and large diameter deadwood throughout-stubs-previously reduced and reshaped-low branching habit	Remove major deadwood	>40	A1
3	Weeping Silver Pear <i>Pyrus salicifolia</i> 'Pendula'	3.5	240	N4 E4 S2 W3	1	2.5 nesw	EM	Suckers-small diameter deadwood throughout-crown lifted 1m above ground level-previously reduced and reshaped-low branching habit-one stem has been removed at some point(1m above ground level on north side)	No work considered essential at time of survey	30-40	B1

3.2 A Tree Root Protection Schedule has been prepared in accordance with BS5837:2012 recommendations (see Plan BJH 01/02 at [appendix BH2](#))

Tree No.	Tree Species	Cat	Diam mm	BS5837:2012 Table D1 Radial Protect. Zone m	BS5837:2012 Table D1 Root Protect. Area m ²	Is An Offset Required To Cater For Existing Rooting Pattern Restrictions
1	Silver Birch <i>Betula pendula</i>	B1	340	4.1	52	NO – free rooting to all directions
2	Pedunculate Oak <i>Quercus robur</i>	A1	640	7.7	185	NO – free rooting to all directions
3	Weeping Silver Pear <i>Pyrus salicifolia</i> 'Pendula'	B1	240	2.9	26	NO – free rooting to all directions

4.0 IMPACT ASSESSMENT & TREE PROTECTION MEASURES RECOMMENDED

4.1 The finalised planning layout drawing has been provided to me and an assessment made as to the viability of retaining trees as part of this layout in order that they meet the RPA requirements of BS5837 - the data is presented here in tabular format:-

Key: **RSAM** = Remove for sound arboricultural management reasons **RTFD** = Remove to facilitate development **UF** = under footprint of proposed development

YES = Yes can be retained and fully protected

YES (1) = Yes can be retained subject to mitigation measures being applied

Tree No	Species	Cat	Stem Diam mm	BS5837:2012 Radial Protection Area m	BS5837:2012 Polygon Area m ²	Distance from Site Features (see key above)	Can Tree Be Retained
1	Silver Birch <i>Betula pendula</i>	B1	340	4.1	52	12.7m to new corner of new building	YES
2	Pedunculate Oak <i>Quercus robur</i>	A1	640	7.7	185	12.2m to end wall of new building	YES
3	Weeping Silver Pear <i>Pyrus salicifolia 'Pendula'</i>	B1	240	2.9	26	3.7m to end wall of new building	YES (1) NO

This tree cannot be retained because of work to divert Public
Sewer and 2.3m deep foundation trench for Garage

4.2 **YES**

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There are 2 trees in this category on this project where work will take place well outside their RPA and they can be fenced off and fully protected for the duration of all demolition and construction works :-

Tree 1 – Silver Birch

Tree 2 – Pedunculate Oak

4.3

YES (1)

None of the work in Section 4.3 is needed as Tree 3 cannot be retained

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There is 1 tree in this category on this project where work will take place just outside the RPA but in order to allow room for standard scaffold erection and construction techniques it will be necessary to entrench the protective fencing :-

Tree 3 – Weeping Silver Pear

- Firstly, prune the tree as described in the Tree Works Schedule - see Section 5 below.
- Erect full specification protective fencing as set out on plan **BJH 03/04**.
- Lay a geotextile membrane and then 100mm of wood chippings over which lay butted up scaffold boards.
- Works may now proceed with standard trench dug footings.

5.0 PRE-DEVELOPMENT TREE WORKS SCHEDULE

N.B. – these tree works are to be undertaken prior to contractors taking possession of the site for Demolition or Construction phases of work

No	Species	Tree Works Recommended
1	Silver Birch <i>Betula pendula</i>	• No works required at this time
2	Pedunculate Oak <i>Quercus robur</i>	• Advise the removal of all large diameter pieces of dead wood
3	Weeping Silver Pear <i>Pyrus salicifolia 'Pendula'</i>	• Reduce and reshape this tree so that it has a radial spread of 2m on the new building side and 2.5m in all other directions • a sound framework for new growth in the future • All final cuts to be made adjacent to living growth points • Also remove all dead wood and clean out the central areas This tree is to be removed

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6.0 PHASING AND WORKS PROGRAM

6.1 All of the specified tree works are to be undertaken [ideally by an experienced arborist] prior to any demolition or construction contractors commencing works on site [as detailed in this report and on plan **BJH 03/04 – Tree Retentions and Removals Plan** at [appendix BH3](#)].

6.2 Erect full specification (Section 6.2 and Figures 2/3 of BS5837:2012) protective fencing as shown on the Tree Protection Plan and the following restrictions will apply :-

- A copy of the **Tree Protection Plan – BJH.04** is to be pinned up in the offices/mess hut on site for all site staff to see.
- The area within the fenced off exclusion zone is to be regarded as **sacrosanct** and the fencing shall not be taken down or relocated at any time without the prior written approval of the monitoring arboriculturist or local authority tree officer, unless this has already been agreed as part of the planning application consent process and is detailed in writing and shown on a plan.

The following prohibitions shall apply within the area enclosed by the Tree Protection Fencing :-

- **No** mechanical digging or scraping once the initial ground cover vegetation has been cleared and the site fenced off.
- **No** storage of plant, equipment or materials
- **No** vehicular or plant access
- **No** fire lighting
- **No** handling, discharge or spillage of any chemical substance, including cement washings
- **No** action likely to cause localised water-logging
- **No** change in ground levels
- In addition any materials whose accidental spillage would cause damage to a tree are to be stored, handled or mixed well away from the outer edges of a retained trees RPA.
- It will be very important for any vehicle drivers to have undergone a pre-contract induction session where the trees to be retained are to be highlighted and the need for care and attention when working nearby with wide loads; tall loads; plant with swinging booms, jibs and counterweights (including drilling rigs) or slewing hydraulic arms to avoid contact with trunks or crowns.

- All site works storage areas and compounds/welfare units and any mixing areas must be located outside of and well clear of retained tree RPA's.
- 6.3 The Demolition works may then be undertaken – with the existing building being pulled in on its own footprint away from the canopies of the retained trees.
- 6.4 The Construction works may now proceed subject to verification that the protective fencing measures are in place and have not been altered or amended during the demolition works - as shown on the Tree Protection Plan.

7.0 CONCLUSIONS

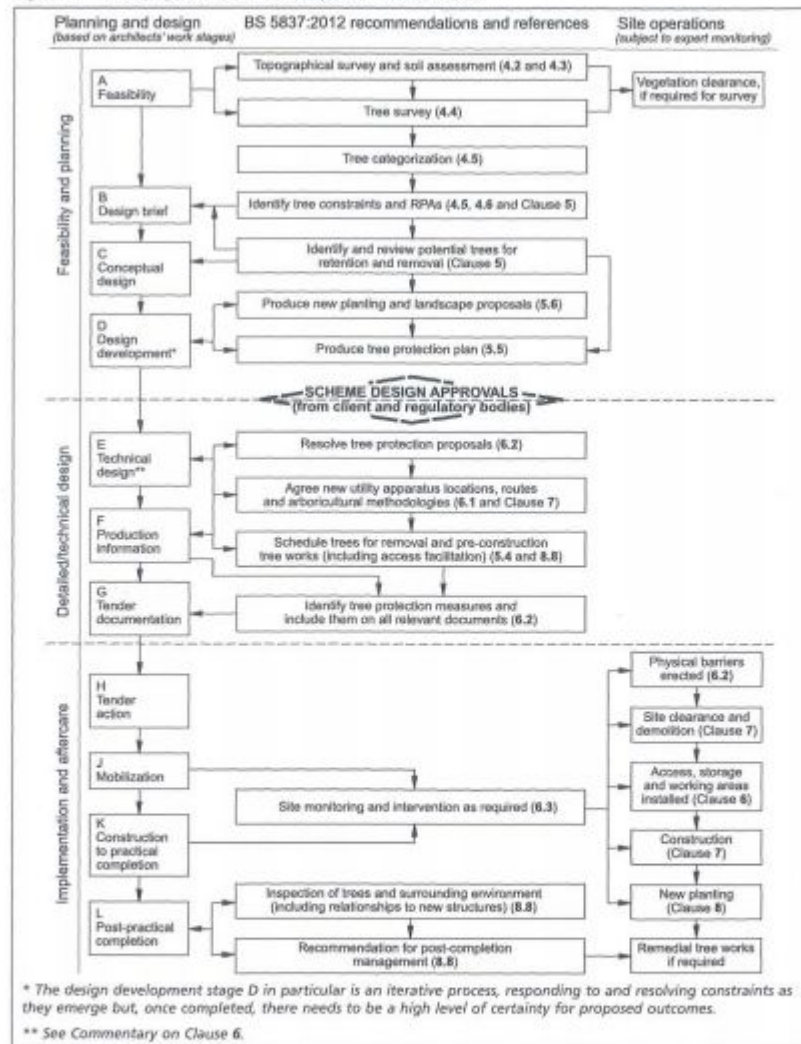
- Provided that the above Methodology is strictly adhered to I would not foresee any detrimental impact on the health or visual amenity value of any of the listed retained trees on this site.



BH 1

Figure 1 - Flow Diagram
& Tree Survey Notes

Figure 1 The design and construction process and tree care



TREE SURVEY NOTES

These Tree Survey Notes have been prepared in accordance with the recommendations of **British Standard 5837:2012** and they define the criteria for pre –development tree surveys.

- Each tree/group/hedge/shelterbelt/woodland has been allocated a unique number (No.), where specifically requested and appropriate fees are agreed small durable numbered metal tags can be applied to each tree/group surveyed.
- The tree species (**Species**) is provided in both English and Latin name formats.
- Height assessments (**Ht**) are estimated in metres. This will be adequate for the majority of cases, but where accurate heights become a critical issue it may be necessary to return to site, as a separately commissioned exercise, to collect accurate measurements with the aid of optical instruments.
- Trunk/stem diameters (**Diam**) are measured in millimetres at 1.5m above ground level – where the tree is inaccessible the diameter is estimated as indicated by suffix #
- Radial crown spread assessments (**Brch Sprd**) are estimated in metres from the centre of the trunk/group to each of the four primary points of the compass (N-north; E-east; S-south and W-west) in order to achieve a representation of the crown shape which will be shown on the accompanying tree survey plan. These provide a general guide as to the main bulk outline of a tree/groups crown but are not tape measured dimensions. These would only be undertaken as part of a separately commissioned exercise, where precise dimensions are critical to the project at hand.
- Both the canopy ground clearance (**GC**) and the height & compass direction of the lowest major branch (**LMB**) are estimated and shown in metres
- An assessment of a tree/groups 'life stage' (**LS**) is made in terms of its site specific maturity as part of the surrounding landscape, taking into account its overall shape and form in that setting, and is recorded thus :-
 Y - Young tree/group; SM - Semi-Mature tree/group; EM - Early-Mature tree/group;
 M – Mature tree/group; OM - Over – mature tree/group
- Data on the structural condition (**Condition Comments**) of the tree/group is provided to give its visual appearance and any significant health and safety issues.
- Details of any recommended tree works required at the time of survey is given under the heading – **Preliminary Management Recommendations**.
- An estimate of a tree/groups remaining contribution in years (**RC**) is made and is recorded thus :-
 0-5; 5-10; 10-20; 20-30; 30-40 or >40 years.
- The category grading (**Cat**) for each tree/group is assessed according to the criteria provided within **BS5837:2012**. The assessment is made of the tree/group in its current condition and within the environment encountered bearing in mind its suitability for retention as part of any future proposed

development; although the exact layout detail of any specific scheme will not be known at the time of surveying. The trees have been classified into one of four categories and colour coded as BS5837 recommends :- **■** (dark red); **■** (light green); **■** (mid-blue) and **■** (grey). Please note that suffixed numerical sub-categories are also applied for guidance only and do not carry any cumulative or increased value for the tree/group. This colour coding scheme will be applied to all drawings provided.

Table 1 – Cascade chart for tree quality assessment

Category and definition	Criteria			Colour on plan
Trees unsuitable for retention				
Category ■ Those in 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.	- 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 category U trees (i.e. where, for whatever reason the loss of companion shelter cannot be mitigated by pruning) - Trees that are dead or are showing signs of significant, immediate, and irreversible overall decline - Trees infected with pathogens of significance to the health and/or safety of other trees nearby, or very low quality trees suppressing adjacent trees of better quality NOTE Category U trees can have existing or potential conservation value which it might be desirable to preserve.			Dark Red
Trees to be considered for retention				
	Criteria – Subcategories			
	1	2	3	
Category ■ Trees of high quality with an estimated remaining life expectancy of at least 40 years	Trees that are particularly good examples of their species, especially if rare or unusual, or those that are essential components of groups or 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)	Light Green
Category ■ Trees of moderate quality with an estimated remaining life expectancy of at least 20 years	Trees that might be included in the 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	Mid Blue
Category ■ Trees of low quality with an estimated remaining life expectancy of at least 10 years, or young trees with a stem diameter below 150mm	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 value	Grey



BH 2

Combined
Tree Survey & Root Constraints Plans

BJH 01/02

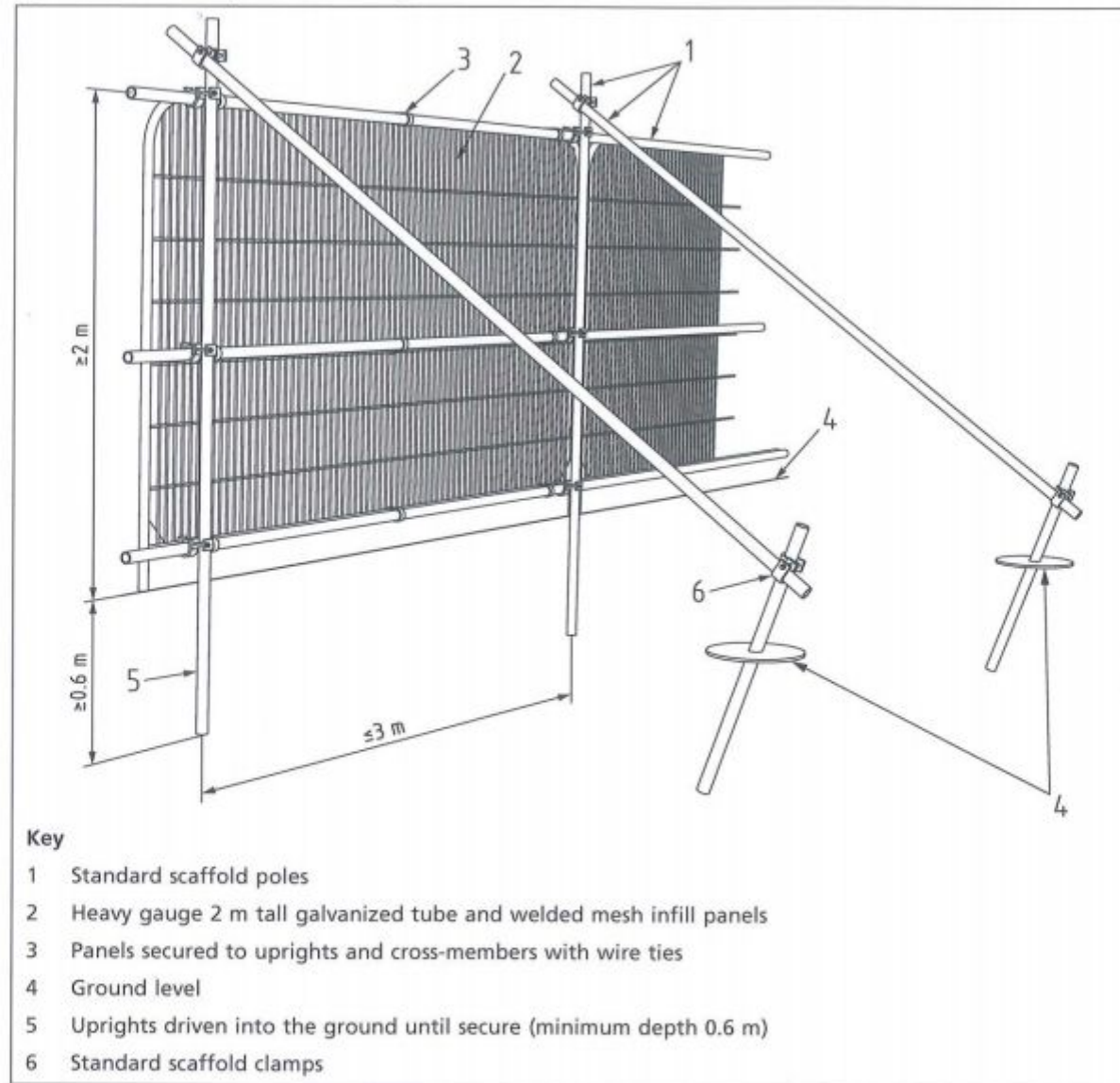


BH 3

Combined
Tree Retentions & Removals &
Tree Protection Plan BJH 03/04

+ BS5837:2012 – Figure 2

Figure 2 Default specification for protective barrier





BH 4

Qualifications & Experience



QUALIFICATIONS AND EXPERIENCE

- My name is Bernie Harverson and I am a self employed independent arboricultural consultant in private practice. I take instructions primarily in the South of England but also on occasions work nationwide and abroad and have offices at : –
3 Foxcombe Cottages, South Harting, West Sussex GU31 5PL and also at Cedar Court, 5 College Street, Petersfield
- I hold the following arboricultural qualification - **Master of Arboriculture** (Royal Forestry Society – 1976)
- I have over **forty** years of practical and managerial experience in the arboricultural industry including periods in both the public and private sectors.
- My Local Government sector experience comprises one year as a tree surgeon with Brighton Parks and nine years spent in Arboricultural Officer posts with both Westminster City Council and Portsmouth City Council
- My past practical experience in the private sector includes two years at Tilhill Forest Nursery and over ten years for various companies as a Climbing Arborist/Tree Surgeon.
- Managerial work in the private sector includes two years as manager of Beechings Tree Surgery Company and twelve years with CBA Trees as an Arboricultural Consultant.
- As an independent self employed Arboricultural Consultant I now provide a comprehensive range of services including :-
tree surveys, appraisals, assessments and inspections with particular reference to planning and development and tree safety audits with a service offered as a climber to undertake full climbing inspections to better understand the condition of a given tree before prescribing a management strategy.
- I also undertake litigation work appearing as an Expert Witness in Court Actions and at Planning Appeals, Hearings and Public Local Inquiries.

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