

Arboricultural Impacts: Summary		
(For details, see below)		
<b>Impact</b>		<b>No. of Trees</b>
Trees to be removed		1
Trees to be pruned		9
Trees where manual excavation needed within RPAs		1
<b>Trees to be Removed</b>		
<b>No</b>	<b>Species</b>	<b>Category</b>
12	Flowering cherry	C (123)
<b>Trees that will require pruning.</b>		
<b>No.</b>	<b>Species</b>	<b>Works (outline only)</b>
1	London plane	Crown lift to clear all pendulous branches to a maximum of 8m above ground level to the north & north-west side of canopy over hanging boundary wall; remove four subsidiary branches back to stem and historic knuckle (@ approx. 10m) of sub-dominant stem growing to north and overhanging boundary, emanating from east fork at crown break. Remove pendulous branches from underside of ascending dominant regrowth branch from historic knuckle (@ approx. 10m) over hanging site boundary.
2	London plane	Remove sub-dominant branch growing laterally to north and overhanging site boundary back to trunk just below cavity on north side of trunk at approx. 5m. On dominant ascending stem also emanating from below cavity on north side of trunk, remove one subsidiary branch at approx. 9m on north side of stem.
3	London plane	(a). Reduce large lateral scaffold branch (@ 8m) on north-west side of trunk and notably overhanging site, back to historic pruning stub directly over boundary and approx. 8m from the trunk bringing the protrusion back in line with existing canopy. (b). Reduce north-east branch (@ 10m north side of trunk), branch 'kinks' north-east at approx. 8m from trunk, reduce limb back to the third fork, leaving the ascending branch and removing the lateral, approx. 3m from the 'kink' above boundary.
4	London plane	(a). Branch emanating on west side of trunk (@ 10m) at approx. 1.5m forks into two sub-dominant branches, one grows parallel to boundary, the other protrudes north-west and overhangs boundary; at approx. 1.5m from the fork, the branch links into an ascending branch and a descending pendulous branch; remove the pendulous branch back to the fork. (b). Branch emanating on north side of trunk (@ 10m), grows north for approx. 1.5m before it 'kinks' into a descending, pendulous form and overhangs boundary; remove this branch back to trunk. (c). Approx. 1m above crown break (@ 12m) on north stem, sub-dominant pendulous branch grows north-west; approx. 2m from north stem, branch 'kinks' after two subsidiary branches and grows to north overhanging boundary; reduce branch back to 'kink' leaving the two subsidiary branches.
5	London plane	(a). Remove north-east branch emanating at approx. 10m and immediately forming a knuckle where the only surviving bit of the branch has been chopped off at 2.5m. (b). Reduce two heavy branches that grow to the north-east and overhang the site back to appropriate pollard points at approx. 4m from the wall. (c). Remove first branch on north-west side that emanates from west fork above 1.5m and the north-west branch from this point, back to fork at 1m from junction point to remove the lateral branch that heavily overhangs the site. On north part of this branch, emanating from 1m from former pollard point, remove first sub-branch which descends and heavily overhangs the site.
6	London plane	(a). Lowest branch NE side on sub-stem of south stem, which emanates adjacent to main trunk bifurcation point at approx. 3.5m; reduce back to third sub-branch which is an ascending sub-branch almost directly above line of existing building, to remove larger part of branch below. (b). Reduce two low branches from upright northern stem which overhangs site back to approx. second sub-branch in both cases. Both branches emanate from main knuckle at approx. 10m. (c). Remove low bowed branch that emanates from main knuckle on eastern stem at approx. 10m and grows to NW, this branch is overtopped by the canopy of tree number 5.
7	Tree of heaven	(a). Remove lowest branch on eastern stem which emanates at approx. 2m above main fork junction point on trunk back to the stem. (b). Crown lift pendulous branches to approx. 8m above ground level on north side of canopy.
8	Fig	Lightly reduce S side of canopy back to site boundary to provide clearance to enable demolition of existing wall, floor and associated foundations.
9	Tree of heaven	Crown lift branches on north side of canopy, overhanging site, to approx. 8m above ground level.
12	Flowering cherry	Fell to ground level and remove stump.
13	Portuguese laurel	Prune north-west extent of canopy touching boundary wall, back to previous pruning points leaving it approx. 1m from the wall.

**Tree Felling**

Felling is defined as the cutting down of a tree to a point as close to ground level as is reasonably practicable, but no higher than 100mm above surrounding ground level. (Unless a tree has pronounced buttress roots which makes this impractical, in which case it should be cut to as close to 100mm as possible).

Felling shall be carried out in a controlled manner, using guide ropes where appropriate to ensure that trees or branches fall away from buildings, equipment, and other trees and understorey shrubs.

Where necessary, trees should be dismantled and removed in sections rather than felled from the ground to prevent them falling into, and damaging buildings, equipment, vehicles and the crowns of other trees.

No part of any tree shall fall outside the boundaries of the premises unless prior agreement has been reached with the adjacent landowner, and the client has been informed in advance.

In order to allow time for bats to re-locate, trees that are covered with dense ivy will be left for a period of 24 hours prior to cutting up or removal.

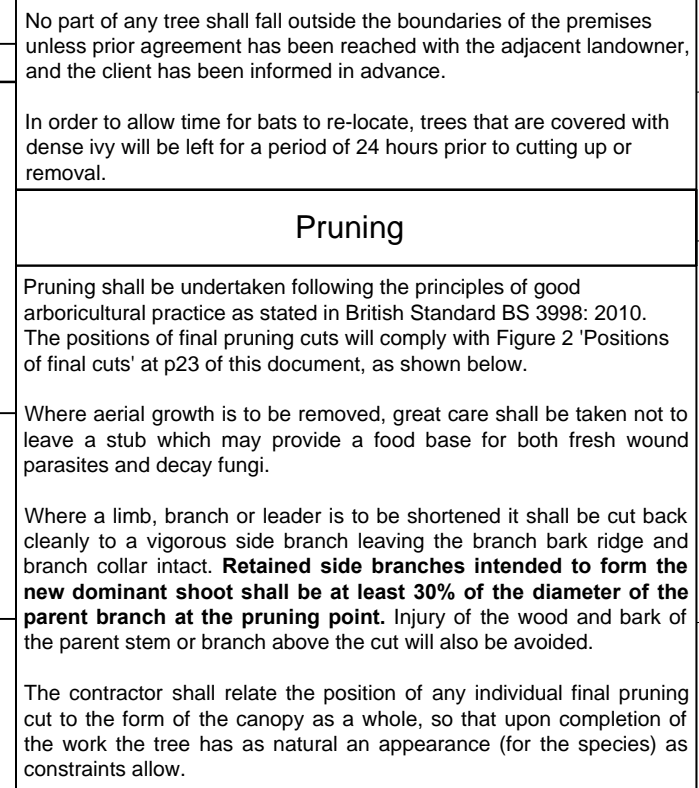
**Pruning**

Pruning shall be undertaken following the principles of good arboricultural practice as stated in British Standard BS 3998: 2010. The positions of final pruning cuts will comply with Figure 2 'Positions of final cuts' at p23 of this document, as shown below.

Where aerial growth is to be removed, great care shall be taken not to leave a stub which may provide a food base for both fresh wound parasites and decay fungi.

Where a limb, branch or leader is to be shortened it shall be cut back cleanly to a vigorous side branch leaving the branch bark ridge and branch collar intact. **Retained side branches intended to form the new dominant shoot shall be at least 30% of the diameter of the parent branch at the pruning point.** Injury to the wood and bark of the parent stem or branch above the cut will also be avoided.

The contractor shall relate the position of any individual final pruning cut to the form of the canopy as a whole, so that upon completion of the work the tree has as natural an appearance (for the species) as constraints allow.



**Crown Lifting**

Crown lifting is defined as the removal of all soft growth and branches or parts thereof within the limits prescribed by the Schedule of Works, which are below or which extend below the height specified therein.

Ascending branches that originate below the specified height, and have no foliage below this point, shall be retained unless otherwise specified. Descending branches that originate above the specified height, and have foliage below this point, shall be reduced back to the closest appropriate junction point to the desired height.

Crown lifting may result in the canopy base being not at one single level but stepped to allow for different clearances, for example where a tree overhangs both a footway and a road where different height clearances are required.

**Stump Removal**

Stump removal is defined as the action taken to physically remove the stump of a felled tree from the ground. The schedule specifies that tree stumps are to be removed in one of the following two ways:

**Ground out.** ("chipping" and "cutting" are synonymous with grinding) Stumps shall be ground to a minimum of 300mm below ground level with a proprietary machine which may be self-powered or driven from a power take-off shaft. Where stumps are to be ground out the Contractor is responsible for satisfying himself as to the whereabouts of any underground services or apparatus.

Where the intention of stump grinding is to reduce the potential for the spread of Honey fungus, it should normally extend through the base of the stump, leaving the major roots disconnected.

**Removed.** Stumps may be ground out as above; or alternatively may be dug or grubbed out with an excavator or a winch. The Contractor is responsible for satisfying himself as to the whereabouts of any underground services or apparatus.

Following stump removal, backfilling with previously saved topsoil or, if necessary, an imported soil of similar texture will be undertaken in 150 mm layers, with firming by treading to ensure that no air pockets are left. The soil will be left at a height of approximately 75mm above the surrounding soil, to allow for future settlement.

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(For details, see below)

**Impact**

Trees to be removed: 1  
Trees to be pruned: 9  
Trees where manual excavation needed within RPAs: 1

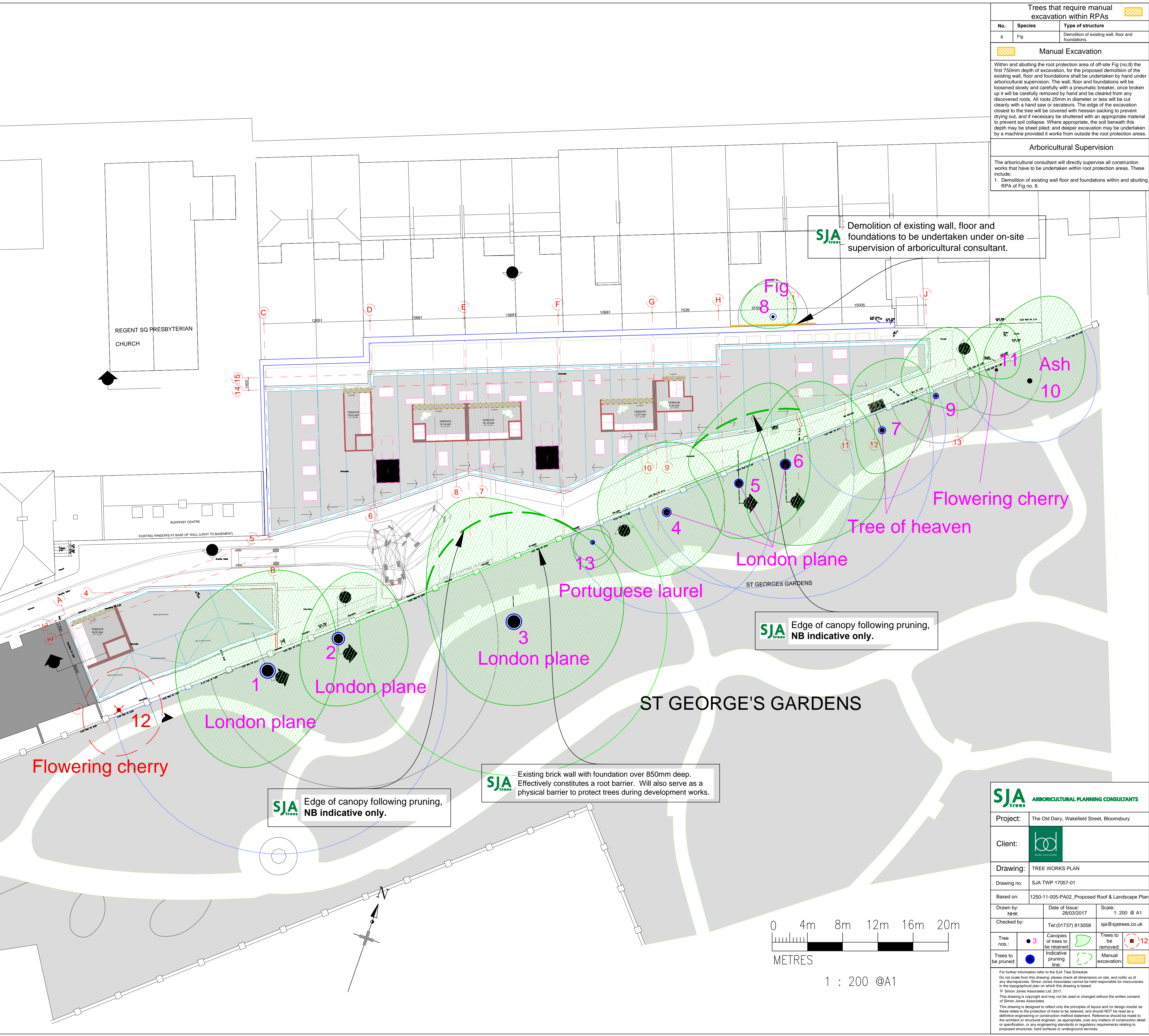
**Trees to be Removed**

No	Species	Category
12	Flowering cherry	C (123)

**Trees that will require pruning.**

No.	Species	Works (outline only)
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7	Tree of heaven	(a). Remove lowest branch on eastern stem which emanates at approx. 2m above main fork junction point on trunk back to the stem. (b). Crown lift pendulous branches to approx. 8m above ground level on north side of canopy.
8	Fig	Lightly reduce S side of canopy back to site boundary to provide clearance to enable demolition of existing wall, floor and associated foundations.
9	Tree of heaven	Crown lift branches on north side of canopy, overhanging site, to approx. 8m above ground level.
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These works will not be undertaken until the extent of pruning has been checked and confirmed by the appointed Arboricultural Consultant and the LPA Tree Officer once the existing buildings have been demolished. Pruning is to be undertaken in accordance with the British Standard Recommendations for Tree work, BS3998: 2010. Climbing irons or spikes are not to be used whilst pruning trees. Pruning will be undertaken according to the principles of good arboricultural practice as stated in Arboriculture Research Note ARN 48: 'A Definition of the Best Pruning Position' (AAAS, 1983). When removing branches, care will be taken to cut back to the branch bark collar or ridge so as not to leave a stub that could provide a food base for decay fungi; yet not to cut into or beyond this collar or ridge. Where limbs or branches are to be shortened they will be cut back cleanly to a vigorous side branch, leaving the branch bark ridge and collar intact. **At their point of origin, retained side branches intended to form the new dominant shoot shall be at least 30% of the diameter of the parent branch at the pruning point.**



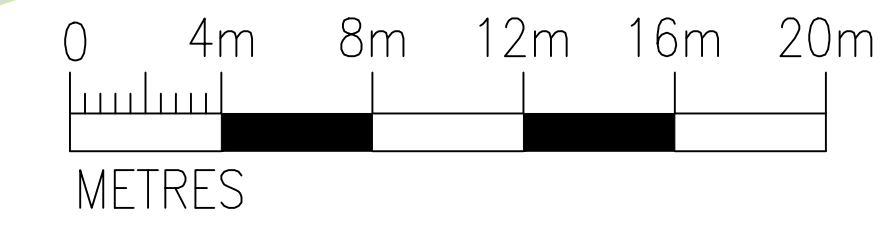
Trees that require manual excavation within RPAs		
No.	Species	Type of structure
8	Fig	Demolition of existing wall, floor and foundations.
Manual Excavation		
Within and abutting the root protection area of off-site Fig (no.8) the first 750mm depth of excavation, for the proposed demolition of the existing wall, floor and foundations shall be undertaken by hand under arboricultural supervision. The wall, floor and foundations will be loosened slowly and carefully with a pneumatic breaker, once broken up it will be carefully removed by hand and be cleared from any discovered roots. All roots 25mm in diameter or less will be cut cleanly with a hand saw or secateurs. The edge of the excavation closest to the tree will be covered with hessian sacking to prevent drying out, and if necessary be shuttered with an appropriate material to prevent soil collapse. Where appropriate, the soil beneath this depth may be sheet piled; and deeper excavation may be undertaken by a machine provided it works from outside the root protection areas.		
Arboricultural Supervision		
The arboricultural consultant will directly supervise all construction works that have to be undertaken within root protection areas. These include: 1. Demolition of existing wall floor and foundations within and abutting RPA of Fig no. 8.		

**SJA** Demolition of existing wall, floor and foundations to be undertaken under on-site supervision of arboricultural consultant.

**SJA** Edge of canopy following pruning, NB indicative only.

**SJA** Existing brick wall with foundation over 850mm deep. Effectively constitutes a root barrier. Will also serve as a physical barrier to protect trees during development works.

**SJA** Edge of canopy following pruning, NB indicative only.



1 : 200 @A1

**SJA** ARBORICULTURAL PLANNING CONSULTANTS

**Project:** The Old Dairy, Wakefield Street, Bloomsbury

**Client:**

**Drawing:** TREE WORKS PLAN

**Drawing no.:** SJA TWP 17057-01

**Based on:** 1250-11-005-PA02\_Proposed Roof & Landscape Plan

**Drawn by:** NIK **Date of Issue:** 28/03/2017 **Scale:** 1:200 @ A1

**Checked by:** Tel: (01737) 813058 **sj@sjatrees.co.uk**

Tree nos.:	● 3	Canopies of trees to be retained	● 12	Trees to be removed
Trees to be pruned:	●	Indicative pruning line	●	Manual excavation

For further information refer to the SJA Tree Schedule. Do not scale from this drawing; please check all dimensions on site, and notify us of any discrepancies. Simon Jones Associates cannot be held responsible for inaccuracies in the topographical plan on which this drawing is based.  
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