

Landscaping Specification

GENERAL

Soil conditions - cultivate and plant into moist friable soil that is not waterlogged. Do not plant into frozen or snow covered soil.

Climate conditions - carry out the work while soil and weather conditions are suitable for the relevant operations. Do not plant during periods of frost or strong winds.

Plant during the following periods:
Bare root deciduous trees and shrubs: late October to late March.
Container grown plants: at any time if ground and weather conditions are favourable. Ensure that adequate watering and weed control is provided.

Machines and tools - use only machinery and tools suitable for the site conditions and the work to be carried out. Use hand tools around trees, plants and in confined spaces.

Underground services - Contractor is responsible for knowing the ascertaining the position of any underground services and shall take precautions to prevent any damage occurring to them. Immediately inform the appropriate body if damage occurs. The contractor shall be responsible for any claims resulting from such damage.

PLANT MATERIAL

Plant quality in general - to comply with the relevant part of BS 5436 and BS 5236 for any advanced nursery stock where applicable.
Materially undamaged, sturdy, healthy, vigorous, of good shape and without elongated shoots. Grown in a suitable environment and hardened off.
Free from pests, diseases, discoloration, weeds and physiological disorders.
With balanced root and branch systems. True to the names and sizes indicated within the plant schedule.

Bare root plants - all bare root plants shall have vigorous fibrous root systems which are reasonably equally developed in all directions and of adequate extent to support the growth of the plants root system.

Container grown plants - supplied in a growing medium with adequate nutrients for the plant to thrive until permanently planted. Covered in the container, firmly and well watered. With root growth substantially filling the container, but not root bound, and in a condition conducive to successful transplanting. Grown in the open for at least two months before being supplied. Grown in containers with holes adequate for drainage when placed on any substrate commonly used under irrigation systems.

Planting trees - spread a minimum of 70mm thick layer of well-rotted manure in the bottom of each pit and fork over. Lay 50mm min. mixture of peat substitute/leaf mould/sharp sand 6:2:1 by volume, the peat being well moistened. All manure is to be covered so that none comes in direct contact with the tree roots. Soak the roots of bare-rooted trees in water for at least an hour before planting. Continue backfilling with top soil into which 170g/m² of bonemeal has been mixed (per tree). Firm down well by heeling as filling proceeds. The tree must be planted to the same depth as in the nursery and to the same orientation. Before unloading, the depth and diameter of the rootball shall be measured to facilitate the digging of the pit to the correct size. Back filling shall be done in layers of 150-225mm depth with each stage firmly consolidated to eliminate air pockets.

Staking - to be requisite length, pressure impregnated (with preservative non injurious to plants) or barbed softwood 75mm diameter.

Tree ties - to be plastic ties 'Tom' pattern, nailed to stake with large head galvanised nails.

Watering - at the time of planting, each tree shall be well watered in. If there is a risk of frost within the 24 hours the watering shall be delayed until such risk has passed.

Mulch - apply 50mm mulch around trees immediately after watering in. Mulch to consist of pulverised natural pine bark such as 'Cambrian' ornamental grade from Cantland Products Ltd, 30 Regent Street, Cambridge or equivalent. Graded particles 8mm-20mm with all fines removed, free from pests, disease, weeds and additives.

Rootballed plants - root balls shall be well filled with fibrous roots and consist of reasonably cohesive natural soil which has been carefully lifted at the nursery so that it remains fully attached to the roots of the tree. Plants which have had bare roots bagged up with soil or containerised are not acceptable.

Transplanted at least twice in the nursery. Single, straight leader. Substantial and evenly developed side shoots to within 0.2m of ground level. Main stem to be substantial enough to be supported by short stake and single tie.

Labelling - when supplied to site trees to be labelled in accordance with the relevant part of the latest BS 5436 in order that they can be readily identified.

Substitutes - if specified trees are unavailable or known to be likely to be unavailable at the time of ordering, submit alternatives and obtain approval from LPA before making any substitution.

PREPARATION OF PLANTING

Site clearance - Prior to cultivation all rubbish including stones, bricks, concrete, mortar, building materials, bottles, cans, litter, wood, plastic etc to be removed to tip. Remove all weed from planting areas either by hand pulling or using a herbicide containing glyphosate as the active ingredient which should be applied in accordance with the manufacturer's instructions allowing sufficient time prior to cultivation for the chemical to be effective.

Cultivation - do not dig or cultivate within the root spread of trees and shrubs to be retained. Break up compacted topsoil to its full depth.

Tree pits - shall be of a diameter 600mm greater than the root ball. The depth of the pit shall be 225mm deeper than the root ball and not less than 600mm deep. The base of the tree pit shall be forked over to a depth of 225mm.

MAINTENANCE AND MAKING GOOD DEFECTS

Maintenance prior to practical completion - at all times maintain planned areas in a clean, tidy and largely litter free state.

Maintenance and defects liability period - the maintenance and defects liability run concurrently for 18 months (three years) after practical completion.

Maintenance - Make visits at approximately monthly intervals during the growing season and as necessary to fulfil the requirements of this specification. After each visit remove soil and other debris from surrounding hard surfaces and leave the site in a clean and tidy condition. Fork over beds as necessary to keep soil loose. Ensure that the trees are not damaged by the use of mowers, nylon filament rotary cutters and similar powered tools. Every two months check condition of stakes and ties and replace if missing or broken. Adjust as necessary to allow for growth and prevent the rubbing of bark. Prune at appropriate times to remove dead, dying, diseased or damaged wood and suckers, to promote healthy growth and natural shape.

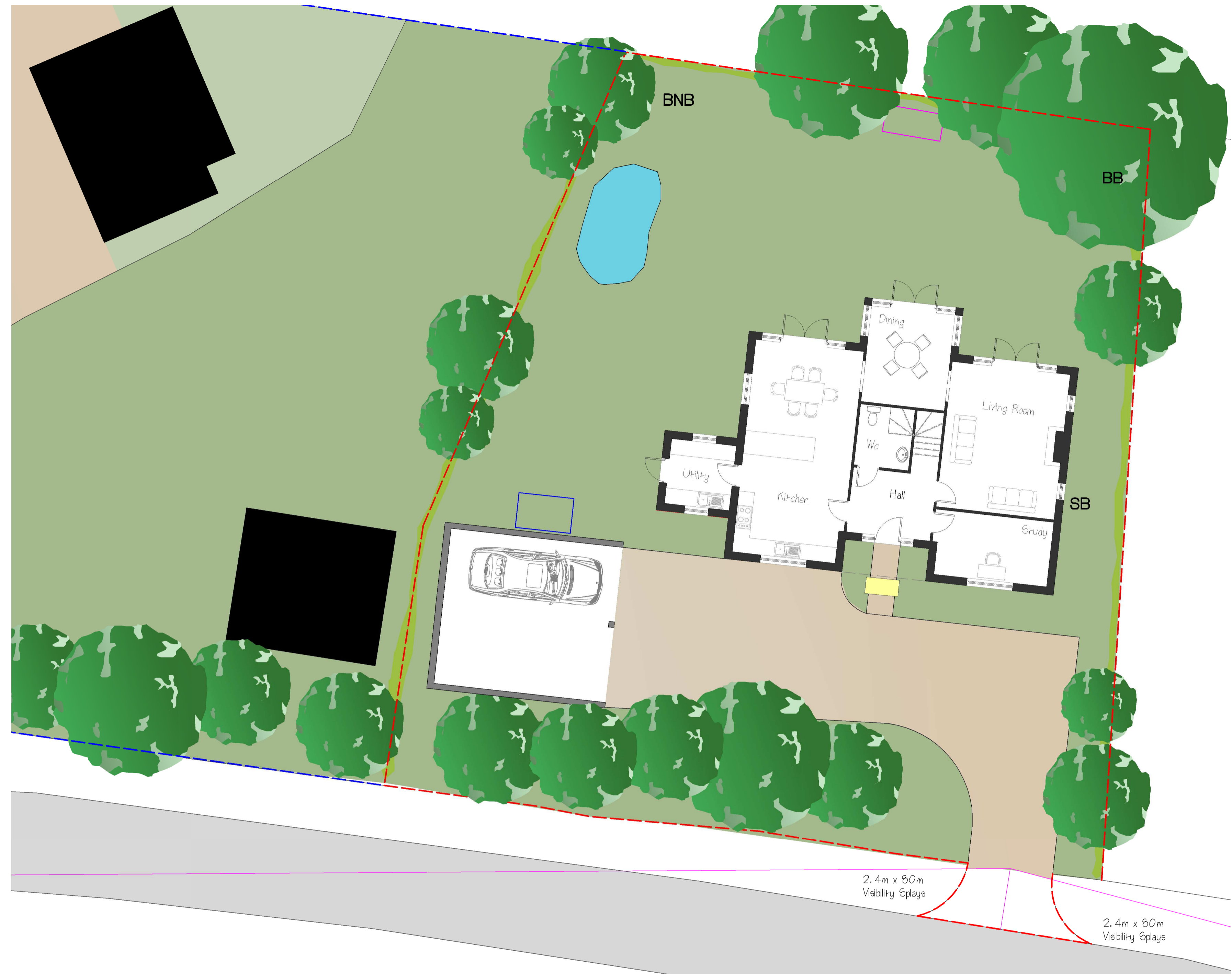
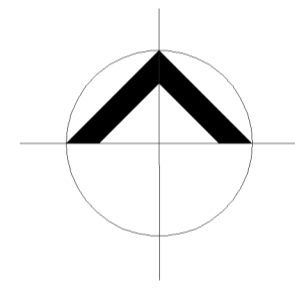
Failures of Planting - Excepting Heft or malicious damage after practical completion, any of the trees that have failed to thrive, during the defects liability period, will be regarded as defects due to materials or workmanship not in accordance with this specification. Unless otherwise instructed they must be replaced by approved equivalent trees. Replacements must match the original specification. Replacement planting is to be carried out during the planting season within which the defects are discovered.

Lighting Specification

External Lighting

1. Minimise spill of light with the use of directional luminaires, shades, baffles and louvers to direct light where it is needed and prevent overlight.
2. Minimise light spill by eliminating any bare bulbs and upward pointing light fixtures. The spread of light should be kept near to or below the horizontal plane, by using as steep a downward angle as possible and/or shield hood.
3. Use light sources that emit minimal ultra-violet light (van Langevelde and Fata, 2001) and avoid the white and blue wavelengths of the light spectrum.
4. Limiting the height of lighting to 8m and increase the spacing of lighting will reduce the spill of light into sensitive habitats.
5. Avoid using reflective surfaces under lights or light reflecting off windows.
6. Only the minimum amount of light needed for safety and access should be used and turned off when the site is not in use.
7. Artificial lighting proposals should not directly illuminate habitats, which may be of value to foraging or commuting bats and birds (e.g. hedgerows and adjacent gardens).
8. Lighting that is required for security reasons should use a lamp of no greater than 2000 lumens (150 Watts) and be PIR sensor activated, to ensure that the lights are not on only when required.
9. Lighting positioned in locations indicated on attached drawing.

Proposed LED lamps (Max 2000 lumens / 150 Watts) with PIR sensor



1:100 Proposed Bio Enhancement Site Plan

Legend

- Existing / Proposed Hedges
- Post and rail fence
- Close boarded fence
- Construction Fencing
- Timber Cladd Bin Enclosure
- Hedge Hog Nesting Box
- BB BAT BOX
- SB SWIFT BOX
- BNB BUMBLEBEE NEST BOX (boxes sunk into the ground)
- Entrance road with kerb finish. Raised kerb edge with surface water gullies
- Garden Space
- Terrestrial Habitat
- Proposed pond

Species	No.	Height and Form	Plant Size on Girth	Root Condition
Birch - Betula pendula	2	Selected Standard 3.00 / 3.50	12-14	BARE
Beech - Fagus sylvatica	1	Selected Standard 3.00 / 3.50	12-14	BARE
Oak - Quercus robur	1	Selected Standard 3.00 / 3.50	12-14	BARE
Hazel - Corylus avellana	2	Feathered Tree 1.50/2.00	10B+	BARE
Hornbeam - Carpinus	1	Feathered Tree 1.50/2.00	10B+	BARE
Sorbus torminalis	1	Feathered Tree 1.50/2.00	10B+	BARE
Native Crab Apple - Malus sylvestris	1	Feathered Tree 1.50/2.00	10B+	BARE
Bird Cherry - Prunus padus	1	Feathered Tree 1.50/2.00	10B+	BARE
Common Hornbeam - Carpinus betulus	2	1.20 / 1.50	5 tr	BARE
Mixed Native Hedge - 15% Hazel, 60% Field maple, 5% Common privet, 15% Guelder rose (Viburnum opulus), 5% Dog rose		0.80 / 1.00	2 tr	

Planning

THE PLANNING CONSULTANCY LTD

The Studio, 2 Bradbury Farm Barns
Hare Street, Buntingford,
Hertfordshire,
SG9 0DX

Project Name: Duck Street Cottage **Project No: 410**

Drawing Title: Bioenhancement Plan **Drawn by: CJH**

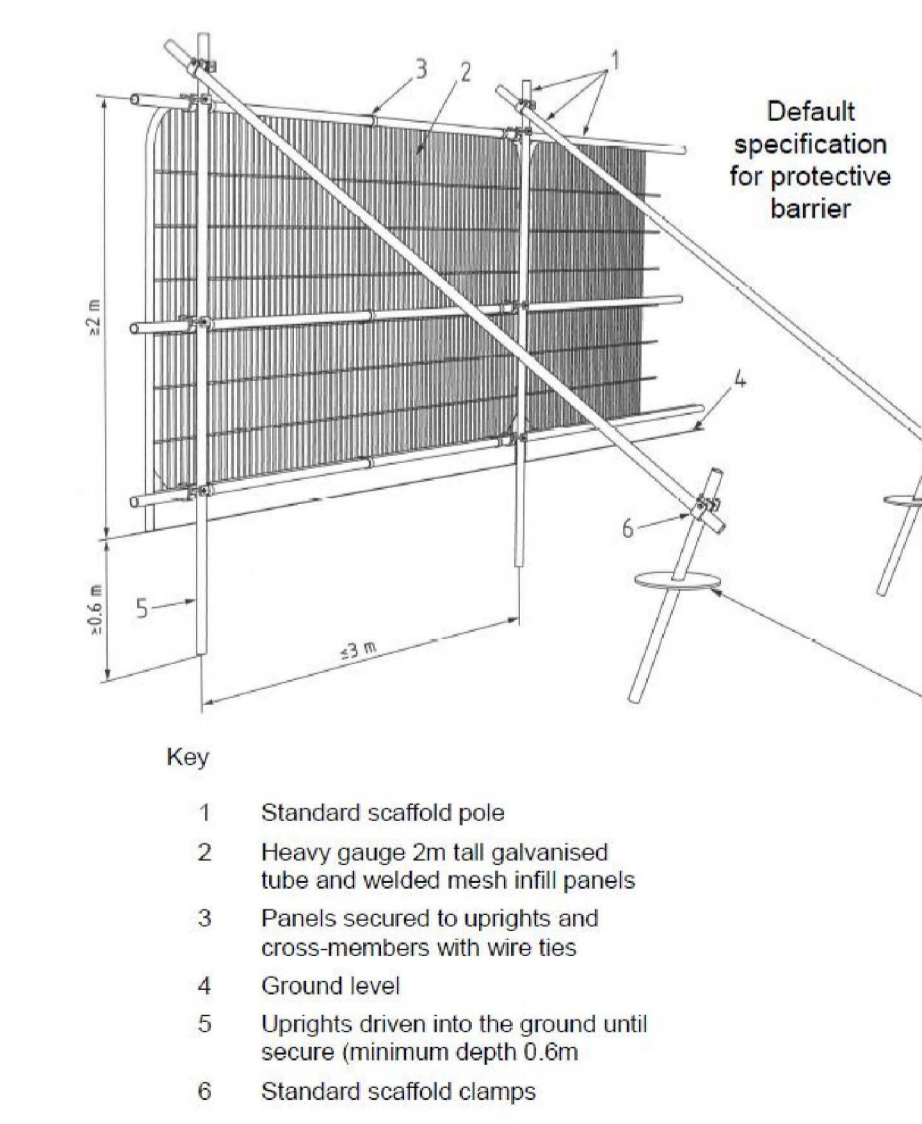
Scale: 1:100 @ A1 **Date Drawn: 31/08/2023** **DRG NO: 02**

Dimensions are in millimeters unless otherwise stated.

Tree Protection Details

Proposed Dwelling - Land Adjacent, Duck Street Cottage, Herts

BS 5837:2012 Figure 2: Default specification for protective barrier



BS 5837:2012 Figure 3: Examples of above-ground stabilizing systems

