

Bolston House,  
Bonvilston

## Outline implementation specification

LA.102

**Ground preparation:** Protect retained trees/areas of retained soil where structural landscaping is proposed in accordance with an approved Arboricultural Method Statement and Tree Protection Plan. Tree protection fencing shall be erected as noted within an Arboricultural Method Statement and Tree Protection Plan. The fence is to be maintained for the duration of the works. Protection of existing trees against damage to be in accordance with the BS 5837:2012 - Trees in relation to design, demolition and construction - Recommendations. Protective fence to be approved by the LPA. Any excavations shall be in accordance with B.S. 8000 part 1:1989.

**Imported soil:** Soils may need to be imported to make up for any deficiency of soil on site.

**Subsoil:** Where required, supply approved imported subsoil to B.S. 8601:2013 Specification for subsoil and requirements for use - Multipurpose subsoil, to make up any deficiency in on-site subsoil.

**Topsoil:** Where required, supply approved imported topsoil to B.S. 3882:2015 Specification for topsoil - Multipurpose topsoil, to make up for any deficiency in on-site topsoil. Certification of soil shall be in accordance with BS 8601/3882.

**Soil profiles:** Soil profiles outside of retained, in-situ soil, should comprise:

- 300mm topsoil over 600mm subsoil for trees planted within shrubs or where trees are planted in grass areas.
- 300mm topsoil over 300mm subsoil for shrub planting areas (with no trees) and the adjacent grass areas, and 150mm topsoil over 150mm subsoil for grass areas only.

**Excavation:** Any excavations in order to win soil for re-use as part of landscaping must be undertaken in accordance with BS 3882:2015, BS 8601:2013 and the 2009 DEFRA Construction Code of Practice for the Sustainable Use of Soils on Construction Sites.

**Trees:** excavate a few centimeters shallower than root-ball and twice its width with sloping, scarified sides. Root-balls of trees shall be set on a 150mm depth of horticultural grade sharp sand. Semi-Mature trees shall be set on a 400-450mm depth of horticultural grade sharp sand. **Shrubs:** excavate 300 x 300 x 300mm depth.

**Backfilling:** **Trees:** Backfill to reinstate 300mm over 600mm profile and do not add compost or fertiliser unless soil analysis demonstrates the need. If compost is applied it should be worked in generally to the top 150mm, not back-filled into tree pits. **Shrubs:** Backfill to reinstate soil profiles provided above and do not add compost or fertiliser unless soil analysis demonstrates the need.

**Cultivation:** Do not cultivate tree and shrub planting soils, only cultivate prior to planting if the soil is compacted (for example due due site/construction activities). For grass seeding areas, cultivate topsoil to a loose friable tilth suitable for grass seeding. Collect and remove from site all stones, builders' rubble and other deleterious material over 50mm in any dimension.

**Grass areas:** Grass areas to be sown at a rate of 4g/m<sup>2</sup> with a suitable grass seed mix such as Emorsgate Seeds Mixture EL1 "Flowering Lawn".

**Planting areas:** Plant specification to be in accordance with the HTA National Plant Specification. Tree planting to be in accordance with BS 8545:2014 - Trees from nursery to independence in the landscape recommendations.

**Tree planting:** No tree to be planted that does not conform in full with **Table 1, p.21, BS 8545:2014**, to be established via nursery inspections prior to and on delivery of trees. The positioning of proposed trees are to avoid underground services. **No tree to be substituted by an alternative without formal agreement by the LPA, but prior consultations with nurseries should clearly establish availability.**

**Tree anchoring:** Rootball fixing strap system to be provided by Platipus to secure the trees.

Supplier: Platipus. Product: Tree Anchoring with Strap. Product Code: RF1s/RF2s (depending on tree size). Ref: www.platipus-anchors.com/applications/tree-and-irrigation/ rootball-fixing-system---strap/

**Note:** Above ground stake supports for trees shall only be used where ground anchoring methods prove ineffective, but shall not be used to support trees with defective root-balls. Staking shall comprise x3 untreated wooden stakes set with two to the SW side and attached low (never more than one-third tree height) using flexible ties such as hessian nature-ties, arbor-tie or rubber straps. Ties shall allow for flexure without abrasion of the stem and all stakes and ties shall be removed before the third growing season.

**Root barriers:** Root barriers shall be installed (to be provided by GreenBlue Urban. Product: ReRoot 2000) and at a suitable depth to protect buried services. It shall be installed approximately 250mm parallel to the buried services and within 3m of the proposed trees.

**Bark mulch:** Provide and spread evenly over all planting areas an organic graded bark flakes or similar approved bark mulch to a depth of 50mm. For trees, and in particular those planted in grass, apply a 50mm depth of mulch to give Mulching shall be free from toxins, pathogens and other extraneous substances

harmful to plant, animal or human life. Ensure that all weeds have been cleared and that the soil have been watered thoroughly prior to mulching.

**Maintenance:** All landscape areas to be maintained in accordance with B.S. 7370 Part 3:1991 and Part 4:1993; including weed control, and adjustment to tree stakes and ties. Refer to the below.

**General notes:** Substitutions, if made, should be similar in size, form and water demand. Plants shall be arranged to avoid straight lines and geometric patterns.

Soft landscape areas to be maintained in accordance with **B.S. 7370 Part 3:1991** and Part 4:1993. The maintenance of trees should be in accordance with **BS 3998:2010** and **BS 8545:2014**. Maintenance operations to successfully establish plants shall be carried out for the first 5 years after planting.

Maintenance operations for successful plant establishment shall include watering; weed control; fertiliser application; pest and disease control; pruning; and litter picking. Watering for trees should follow an irrigation plan in accordance with BS 8545:2014 and must be in anticipation of drought.

Tree pruning should be in the winter months or summer (July-August). Cherries must be pruned only in the summer months after flowering.

The replacement of failed trees should occur once reasons for failure have been identified and amendments to the specification are made as necessary. Shrubs which die, are removed or become seriously damaged shall be replaced in the next planting season with others of similar size and species, to be agreed in writing by the Local Planning Authority. For all new landscape areas, the following maintenance programme shall be undertaken:

<b>Inspections:</b>	January - December. Replace dead plants when necessary.
<b>Watering:</b>	When necessary in accordance with an irrigation plan.
<b>Pest and disease control:</b>	January.
<b>Litter removal:</b>	January - December
<b>Weed control:</b>	February - May; July; and September.
<b>Prune:</b>	Winter months or summer.
<b>Fork over planting beds:</b>	March.
<b>Cut grass and trim edges:</b>	March - October.
<b>Apply fertiliser:</b>	April.
<b>Lightly fork over planting beds:</b>	September.
<b>Rake / scarify grass</b>	September.
<b>Mulch:</b>	Mid to late spring.

**Watering:** Water trees in accordance with an irrigation plan as per BS 8545:2014. Watering shrubs shall be carried out to maintain vigorous plant growth. Water shall soak into the ground; it is not sufficient to dampen the surface. Water must be applied slowly to avoid damage to plants.

**Weed control:** Hand weed to remove all weeds and their roots using a hoe, trowel or fork. Apply a herbicide to kill re-growth when required.

**Fertiliser:** Applications of fertiliser to be carried out early in the growing season. Ensure correct fertiliser application. Inspect once a month and after very heavy winds. Adjust ties if necessary to conform to stem growth or to prevent chafing.

**Pruning:** At the appropriate season for the species, pruning to be carried out to remove all damaged diseased or dead wood. Prune shrubs to ensure the plant is kept well balanced and in good shape. For trees, pruning shall be in accordance with **BS 3998:2010**.

**Pest and disease control:** To be carried out if necessary and in accordance with best practice.

**Litter removal:** Collect and remove all extraneous rubbish.

**Fork over planting beds:** Prick up trodden or compacted soil surfaces to aerate the soil without damaging the plants.

**Mulching:** Mulching to be topped up annually over the duration of the agreed maintenance period. At the end of the maintenance period, undertake a final mulch. Ensure that the soil is thoroughly moistened prior to remulching, applying water where necessary. Planting beds and trees: re-mulch to a minimum depth of 50 mm.

**Mowing:** Amenity grass areas shall be managed to a height of 40mm. Species rich grass areas to be mowed as advised by the supplier.

**Raking/Scarifying:** Relieve thatched conditions and remove dead grass in the autumn over all grassed areas.

**Spiking (Aeration):** Aerate to increase water, nutrient and oxygen movement into the soil.

**General:** If grass surface is disturbed by over use, restore by firming or lifting with a fork

Any newly planted trees, plants or hedgerows, which within a period of 5 years from the completion of the development die, are removed, become seriously damaged or diseased, or in the opinion of the Local Planning Authority otherwise defective, shall be replaced. Replacement planting shall take place during the first available planting season