

INDICATIVE PLANT PALETTE

| TREES                                 |                               |            |  |         |
|---------------------------------------|-------------------------------|------------|--|---------|
| Species                               | Common Name                   | Girth      | Condition  | Density |
| Sorbus aria 'Majestica'               | Whitebeam 'Majestica'         | 18-20cm    | BR :Standard :Clear Stem 175-200   | Counted |
| Prunus subhirtella 'Autumnalis Rosea' | Autumn Cherry 'Rosea'         | 14-16cm    | BR :Clear Stem 150-175 :Standard   | Counted |
| Prunus serrula 'Tibetica'             | Tibetan Cherry                | 14-16cm    | BR :Clear Stem 150-175 :Standard   | Counted |
| Prunus serrula 'Plena'                | Bird Cherry                   | 14-16cm    | BR :Clear Stem 150-175 :Standard   | Counted |
| Prunus 'Sunset Boulevard'             | Flowering Cherry              | 14-16cm    | BR :Clear Stem 150-175 :Standard   | Counted |
| Malus domestica 'Rosemary Russet'     |                               |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Malus domestica 'Cornish Aromatic'    | Apple                         |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Malus dom' 'Fair Maid of Devon'       |                               |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Malus dom' 'Devonshire Quarrenden'    |                               |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Malus dom' 'Beauty of Bath'           |                               |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Malus 'Discovery'                     | Apple                         |            | MM106 Root stock :2 Tier :1m clear stem 45cm between branches :Espalier :C | Counted |
| Liquidambar styraciflua 'Worpleston'  | Sweet Gum 'Worpleston'        | 20-25cm    | RB :Standard   | Counted |
| Cornus kousa var. 'Chinensis'         |                               | Multi-Stem | Multi Stem :3 Stems :C   | Counted |
| Carpinus betulus 'streetwise'         |                               | 16-18cm    | BR :Clear Stem 175-200   | Counted |
| Carpinus betulus 'Frans Fontaine'     | Hornbeam                      | 16-18cm    | BR :Clear Stem 175-200   | Counted |
| Betula utilis var. 'jacquemontii'     | Birch                         | 16-18cm    | Standard :Clear Stem 175-200 :RB   | Counted |
| Betula nigra                          | River birch                   | Multi-Stem | Multi Stem :C :RB  | Counted |
| Betula albosinensis 'Fascination'     | Chinese Red Birch             | 16-18cm    | Standard :Clear Stem 175-200 :RB   | Counted |
| Betula albosinensis                   |                               | 16-18cm    | Standard :Clear Stem 175-200 :RB   | Counted |
| Amelanchier lamarckii                 | Snowy Mespius                 |            | Multi Stem :Branched :C  | Counted |
| Acer x freemanii 'Autumn Blaze'       | Red Acer                      | 12-14cm    | RB :Standard   | Counted |
| Acer campestre 'Queen Elizabeth'      | Field Maple 'Queen Elizabeth' | 12-14cm    | RB :Standard :Clear Stem 125-150cm   | Counted |

| SHRUBS                            |                        |         |          |                |
|-----------------------------------|------------------------|---------|----------|----------------|
| Species                           | Common Name            | Height  | Pot Size | Root Condition |
| Hebe rakaiensis                   | Shrubby Veronica       |         | 5L       | 5/m²           |
| Hydrangea arborescens 'Annabelle' | Sevenbark 'Annabelle'  |         | 5L       | 5/m²           |
| Viburnum opulus                   | European cranberrybush |         | 5L       | 5/m²           |
| Sarcococca confusa                | Christmas box          | 40-60cm | C5       | Bushy          |
| Cornus sanguinea 'Midwinter Fire' | Dogwood                | 60-80cm | C10      | Bushy          |
| Viburnum davidii                  |                        | 40-60cm | C15      | Bushy :6 brks  |

| HEDGING          |                 |          |             |  |
|------------------|-----------------|----------|-------------|--|
| Species          | Common Name     | Height   | Pot Size    | Root Condition                                   |
| Ilex aquifolium  | Common Holly    | 90-120cm |             | Instant Trough :Finished                         |
| Carpinus betulus | Common Hornbeam | 100cm    | As Supplied | Bushy :Instant Hedge :Finished                   |
| Taxus baccata    | Common Yew      | 60-90cm  | RB          | Height 1.2m<br>Bushy :4 brks :Finished Height 1m |

| NATIVE SUCCESSIONAL BULB MIX |              |                         |               |         |
|------------------------------|--------------|-------------------------|---------------|---------|
| Species                      | Abbreviation | Percentage Contribution | Specification | Density |
| Anemone nemorosa             |              | 5%                      | Grade 6/7     | 7/m²    |
| Crocus mix                   | CRO          | 20%                     | Grade 6/7     | 7/m²    |
| Galanthus nivalis            |              | 25%                     | Grade 6/7     | 7/m²    |
| Hyacinthoides non scripta    |              | 20%                     | Grade 6/7     | 7/m²    |
| Narcissus 'February Gold'    |              | 15%                     | Grade 6/7     | 7/m²    |
| Narcissus 'Tete a Tete'      | NARTT        | 15%                     | Grade 6/7     | 7/m²    |

| SHADE MIX 1                                      |              |                         |               |         |
|--|--------------|-------------------------|---------------|---------|
| Species  | Abbreviation | Percentage Contribution | Specification | Density |
| Anemone hybrida 'Hononire Jobert'                | AHS          | 5%                      | Full Pot      | 7/m²    |
| Anemone x hybrida 'Konigin Charlotte'            |              | 5%                      | Full Pot      | 7/m²    |
| Anthriscus sylvestris 'Ravenswing'               | ANTSY        | 5%                      | Full Pot      | 7/m²    |
| Aquilegia vulgaris var. 'stellata 'White Barlow' |              | 5%                      | Full Pot      | 7/m²    |
| Asplenium scolopendrium                          |              | 5%                      | Full Pot      | 7/m²    |
| Bergenia 'Bressingham White'                     | B'BW'        | 9%                      | Full Pot      | 7/m²    |
| Brunnera macr. 'Jack Frost'                      |              | 5%                      | Full Pot      | 7/m²    |
| Dryopteris affinis                               |              | 7%                      | Full Pot      | 7/m²    |
| Geranium phaeum ' Album'                         |              | 10%                     | Full Pot      | 7/m²    |
| Geranium phaeum ' Album'                         |              | 8%                      | Full Pot      | 7/m²    |
| Hosta 'Royal Standard'                           | HOSRS        | 7%                      | Full Pot      | 7/m²    |
| Liriope muscari 'Monroe White'                   |              | 10%                     | Full Pot      | 7/m²    |
| Lonicera nitida 'May Green'                      | LONNIMG      | 5%                      | Bushy :C      | 7/m²    |
| Luzula nivea                                     |              | 9%                      | Full Pot      | 7/m²    |
| Sarcococca confusa                               | SARCO        | 5%                      | Bushy :C      | 7/m²    |

| SHADE MIX 2                        |              |                         |                    |         |
|------------------------------------|--------------|-------------------------|--------------------|---------|
| Species                            | Abbreviation | Percentage Contribution | Specification      | Density |
| Asplenium scolopendrium            | ASPSC        | 10%                     | Full Pot           | 7/m²    |
| Cornus canadensis                  | CORCA        | 10%                     | Bushy :Full Pot    | 7/m²    |
| Dryopteris affinis                 |              | 10%                     | Full Pot           | 7/m²    |
| Epimedium rubrum                   | EPIRU        | 5%                      | Full Pot           | 7/m²    |
| Hakonechloa macra                  |              | 15%                     | Full Pot           | 7/m²    |
| Helleborus niger                   | HELNIR       | 5%                      | Full Pot           | 7/m²    |
| Helleborus orientalis              | HELLOR       | 5%                      | Full Pot           | 7/m²    |
| Liriope muscari 'Monroe White'     |              | 10%                     | Full Pot           | 7/m²    |
| Luzula nivea                       | Lni          | 15%                     | Full Pot           | 7/m²    |
| Sarcococca hookeriana var. humilis | SARHOHU      | 5%                      | Bushy              | 7/m²    |
| Viburnum opulus                    | VIBOP        | 5%                      | Bushy :Branched :C | 7/m²    |

| SHADE MIX 3                                      |              |                         |               |         |
|--|--------------|-------------------------|---------------|---------|
| Species  | Abbreviation | Percentage Contribution | Specification | Density |
| Anthriscus sylvestris 'Ravenswing'               | ANTSY        | 5%                      | Full Pot      | 7/m²    |
| Aquilegia vulgaris var. 'stellata 'White Barlow' |              | 6%                      | Full Pot      | 7/m²    |
| Asplenium scolopendrium                          |              | 7%                      | Full Pot      | 7/m²    |
| Bergenia 'Bressingham White'                     | B'BW'        | 9%                      | Full Pot      | 7/m²    |
| Digitalis lutea                                  | DIGLU        | 6%                      | Full Pot      | 7/m²    |
| Dryopteris affinis                               |              | 7%                      | Full Pot      | 7/m²    |
| Geranium phaeum ' Album'                         |              | 8%                      | Full Pot      | 7/m²    |
| Hakonechloa macra 'Aureola'                      |              | 6%                      | Full Pot      | 7/m²    |
| Helleborus 'Havington Mix'                       |              | 5%                      | Full Pot      | 7/m²    |
| Hosta 'Royal Standard'                           | HOSRS        | 7%                      | Full Pot      | 7/m²    |
| Liriope muscari 'Monroe White'                   |              | 10%                     | Full Pot      | 7/m²    |
| Lonicera nitida 'May Green'                      | LONNIMG      | 5%                      | Bushy :C      | 7/m²    |
| Luzula nivea                                     |              | 9%                      | Full Pot      | 7/m²    |
| Pachysandra terminalis 'Green Carpet'            |              | 5%                      | Full Pot      | 7/m²    |
| Sarcococca confusa                               | SARCO        | 5%                      | Bushy :C      | 7/m²    |

| SUN MIX 1                                    |              |                         |               |         |
|--|--------------|-------------------------|---------------|---------|
| Species                                      | Abbreviation | Percentage Contribution | Specification | Density |
| Achillea millefolium 'Cerise Queen'          | ACHMICQ      | 10%                     | Full Pot      | 7/m²    |
| Actaea simplex Atropurpurea Group 'Brunette' |              | 3%                      | Full Pot      | 7/m²    |
| Artemisia 'Powis Castle'                     | APCa         | 9%                      | Full Pot      | 7/m²    |
| Astrantia major 'Ruby Wedding'               | ASTMARUW     | 7%                      | Full Pot      | 7/m²    |
| Calamagrostis x karutiflora 'Karl Foerster'  |              | 7%                      | Full Pot      | 7/m²    |
| Centaurea nigra                              |              | 10%                     | Full Pot      | 7/m²    |
| Geranium phaeum                              |              | 9%                      | Full Pot      | 7/m²    |
| Hylotelephium 'Matrona'                      |              | 7%                      | Full Pot      | 7/m²    |
| Lupinus 'Gallery White'                      | LUPGW        | 5%                      | Full Pot      | 7/m²    |
| Nepeta racemosa 'Walkers Low'                | NEPRAWAL     | 10%                     | Full Pot      | 7/m²    |
| Pennisetum alopecuroides 'Hameln'            |              | 10%                     | Full Pot      | 7/m²    |
| Potentilla fruticosa 'Pink Charm'            | POTFRPIC     | 5%                      | C :Bushy      | 7/m²    |
| Stachys byzantina 'Silver Carpet'            | SbSC         | 5%                      | Full Pot      | 7/m²    |
| Stipa gigantea                               |              | 3%                      | Full Pot      | 7/m²    |

| SUN MIX 2                           |              |                         |               |         |
|-------------------------------------|--------------|-------------------------|---------------|---------|
| Species                             | Abbreviation | Percentage Contribution | Specification | Density |
| Achillea millefolium 'Cerise Queen' | ACHMICQ      | 10%                     | Full Pot      | 7/m²    |
| Allium aff. 'Purple Sensation'      |              | 5%                      | Full Pot      | 7/m²    |
| Echinacea purpurea                  | ECHPU        | 15%                     | Full Pot      | 7/m²    |
| Hebe rakaiensis                     | HEBRA        | 3%                      | Bushy :C      | 7/m²    |
| Hemerocallis 'Summer Wine'          | HEMSW        | 5%                      | Full Pot      | 7/m²    |
| Lavandula angustifolia 'Hidcote'    | LaH          | 7%                      | C :Bushy      | 7/m²    |
| Nepeta racemosa 'Walkers Low'       | NEPRAWAL     | 10%                     | Full Pot      | 7/m²    |
| Philadelphus 'Manteau d'Hermine'    | PHIDHEA      | 3%                      | Bushy :C      | 7/m²    |
| Phlomis russelliana                 | PHLRU        | 10%                     | Full Pot      | 7/m²    |
| Spiraea nipponica 'June Bride'      | SPINIJB      | 3%                      | Bushy :C      | 7/m²    |
| Stachys byzantina 'Silver Carpet'   | SbSC         | 10%                     | Full Pot      | 7/m²    |
| Stipa tenuissima                    |              | 10%                     | Full Pot      | 7/m²    |
| Verbena bonariensis                 | VERBO        | 9%                      | Full Pot      | 7/m²    |

| SUN MIX 3                                    |              |                         |               |         |
|--|--------------|-------------------------|---------------|---------|
| Species                                      | Abbreviation | Percentage Contribution | Specification | Density |
| Acanthus mollis 'Niger'                      | ACAMONI      | 3%                      | Full Pot      | 7/m²    |
| Achillea millefolium 'Cerise Queen'          | ACHMICQ      | 10%                     | Full Pot      | 7/m²    |
| Actaea simplex Atropurpurea Group 'Brunette' |              | 7%                      | Full Pot      | 7/m²    |
| Artemisia 'Powis Castle'                     | APCa         | 9%                      | Full Pot      | 7/m²    |
| Astrantia major 'Ruby Wedding'               | ASTMARUW     | 7%                      | Full Pot      | 7/m²    |
| Calamintha nepeta nepeta 'Dwarf'             | CALNEDD      | 10%                     | Full Pot      | 7/m²    |
| Centaurea nigra                              |              | 9%                      | Full Pot      | 7/m²    |
| Cistus purpureus 'Alan Fradd'                | CISPUAF      | 5%                      | C :Bushy      | 7/m²    |
| Geranium phaeum 'Samobor'                    |              | 10%                     | Full Pot      | 7/m²    |
| Hylotelephium 'Matrona'                      |              | 7%                      | Full Pot      | 7/m²    |
| Nepeta racemosa 'Walkers Low'                | NEPRAWAL     | 10%                     | Full Pot      | 7/m²    |
| Pennisetum alopecuroides 'Hameln'            |              | 10%                     | Full Pot      | 7/m²    |
| Stipa gigantea                               |              | 3%                      | Full Pot      | 7/m²    |

| SUN-SHADE MIX                       |              |                         |               |         |
|-------------------------------------|--------------|-------------------------|---------------|---------|
| Species                             | Abbreviation | Percentage Contribution | Specification | Density |
| Achillea 'Credo'                    | ACHCR        | 5%                      | Full Pot      | 7/m²    |
| Allium 'Purple Sensation'           |              | 7%                      | Full Pot      | 7/m²    |
| Astrantia major 'Alba'              |              | 5%                      | Full Pot      | 7/m²    |
| Carex oshimensis 'Evergold'         |              | 7%                      | Full Pot      | 7/m²    |
| Carex pendula                       | CARPE        | 5%                      | Full Pot      | 7/m²    |
| Convallaria majalis 'Albostriata'   |              | 5%                      | Full Pot      | 7/m²    |
| Dryopteris filix                    |              | 5%                      | Full Pot      | 7/m²    |
| Euphorbia amygdaloides robbiae      | Ear          | 7%                      | Full Pot      | 7/m²    |
| Galium odoratum                     | GALOD        | 5%                      | Full Pot      | 7/m²    |
| Geranium pratense                   | GERPR        | 7%                      | Full Pot      | 7/m²    |
| Hedera helix                        |              | 5%                      | Full Pot      | 7/m²    |
| Lamium maculatum 'Beacon Silver'    | LAMMABS      | 7%                      | Full Pot      | 7/m²    |
| Leucanthemum vulgare                |              | 7%                      | Full Pot      | 7/m²    |
| Liriope muscari                     | LIRMU        | 7%                      | Full Pot      | 7/m²    |
| Ophiopogon planiscapus 'Nigrescens' |              | 4%                      | Full Pot      | 7/m²    |
| Origanum vulgare                    |              | 5%                      | Full Pot      | 7/m²    |
| Sanguisorba officinalis             |              | 7%                      | Full Pot      | 7/m²    |

| Podium - Mix 1                            |              |                         |                 |         |
|---|--------------|-------------------------|-----------------|---------|
| Species                                   | Abbreviation | Percentage Contribution | Specification   | Density |
| Aster 'Little Calow'                      |              | 10%                     |                 | 7/m²    |
| Festuca glauca 'Elijah Blue'              | Fgeb         | 15%                     | Full Pot        | 7/m²    |
| Hebe 'Midsommer Beauty'                   | HEBBEAA      | 7%                      | Bushy           | 7/m²    |
| Hemerocallis citrina                      |              | 5%                      | Full Pot        | 7/m²    |
| Miscanthus sinensis 'Gracillimus'         |              | 10%                     |                 | 7/m²    |
| Miscanthus sinensis 'Kleine Silberspinne' | MISSIKS      | 7%                      | Full Pot        | 7/m²    |
| Ophiopogon planiscapus 'Nigrescens'       |              | 10%                     | Full Pot        | 7/m²    |
| Pennisetum alopecuroides 'Hameln'         | Pah          | 4%                      |                 | 7/m²    |
| Perovskia atripl. 'Little Spire'          |              | 4%                      | Bushy :Branched | 7/m²    |
| Phormium tenax 'Purpureum'                | PHOPURA      | 2%                      | C               | 7/m²    |
| Salvia officinalis 'Purpurascens'         |              | 4%                      | Full Pot        | 7/m²    |
| Salvia x sylvestris 'mainacht'            |              | 5%                      |                 | 7/m²    |
| Stachys byzantina 'Silver Carpet'         | SbSC         | 7%                      | Full Pot        | 7/m²    |
| Verbena bonariensis                       | VERBO        | 10%                     |                 | 7/m²    |

| Podium - Mix 2                        |              |                         |                     |         |
|---------------------------------------|--------------|-------------------------|---------------------|---------|
| Species                               | Abbreviation | Percentage Contribution | Specification       | Density |
| Anemanthe lessoniiana                 |              | 7%                      | Full Pot            | 7/m²    |
| Asplenium scolopendrium               | ASPSC        | 6%                      |                     | 7/m²    |
| Euphorbia robbiae                     |              | 10%                     |                     | 7/m²    |
| Festuca glauca                        |              | 7%                      | Full Pot            | 7/m²    |
| Luzula nivea                          |              | 7%                      | Full Pot            | 7/m²    |
| Nepeta 'Six Hills Giant'              | NEPGIAA      | 10%                     |                     | 7/m²    |
| Pachysandra terminalis 'Green Carpet' | PACTEGC      | 10%                     | Bushy               | 7/m²    |
| Pennisetum alopecuroides 'Hameln'     | Pah          | 7%                      | Full Pot            | 7/m²    |
| Phlomis tuberosa 'Amazone'            |              | 8%                      | Full Pot            | 7/m²    |
| Pinus strobus 'Nana'                  | PINSTNA      | 1%                      | Multistem :Branched | 7/m²    |
| Polystichum setiferum                 | POLSE        | 10%                     |                     | 7/m²    |
| Rhus copallina                        |              | 3%                      | Branched :C         | 7/m²    |
| Sarcococca hookeriana var. humilis    | SARHOHU      | 7%                      | Bushy               | 7/m²    |
| Vinca minor                           | VINMI        | 7%                      | Bushy               | 7/m²    |

SOFT SPECIFICATION NOTES

Proposed Tree Planting

Nursery Stock and Selection

All trees and planting are to be selected and tagged by the landscape architect prior to any stock being delivered to site. All planting should comply with the requirements specified in BS 3936:1992 'Nursery Stock' (Part One). All nursery stock and trees are to be free of pest and diseases prior to being delivered to site. All delivered stock is to be inspected by the landscape architect prior to any planting being carried out.

The Landscape architect reserves the right to reject trees and nursery stock that do not meet specifications as set out in the requirements and guidelines in BS 3936:1992 or in accordance with the landscape architects drawings. If a particular defect or substandard element can be corrected easily, appropriate remedies shall be applied and agreed with the landscape architect. If destructive inspection of a root ball is to be carried out, agreement should be in place prior as to the time and place of inspection. Inspection of shrub roots in containers or rootball can be carried out on site if required.

Tree Handling

It is recommended that companies that do not have experience with handling large trees or the required equipment to do so seek advice from the landscape architect or tree supplier. Furthermore, specialist hauliers are to be used who will have the correct lifting equipment to deal with unloading large trees.

The landscape contractor must follow the industry guidance method for handling trees. Below are recommended industry standards;

Dormant trees sizes of 12-16cmg :

These can be lifted and unloaded using a root hook and hoist. Even when the tree is dormant it is recommended to wrap the stem in hessian for additional protection when unloading maintaining the lifting weight on the root hooks.

Dormant trees sizes of 18-20cmg - 25-30cmg:

These can be lifted and unloaded using a 3 tonne sling in combination with a chain and root hooks. Even when the tree is dormant it is recommended to wrap the stem in hessian for additional protection when unloading.

Tree Planting

The tree supplier is to be approved by landscape architect prior to any ordering of stock. All trees are to be planted in the first available planting season after construction as root balled stock unless otherwise specified and agreed with the client. All tree pits are to be excavated 24 hours prior to delivery to reduce the time the rootball is out of the ground. All tree pits are to be excavated under favourable weather conditions to avoid deterioration of the soil structure and glazing. All excavations are to be carried out using a toothed bucket ensuring tree pit walls are not glazed, the walls of the tree pit can also be loosened with hand held tools.

Tree pit dimensions are subject to soil conditions, soil report provided by agronomist and rootball size. Tree pits can never be excavated too wide in an unrestricted space (open ground), however they can be too deep. All trees are to be planted at the correct height which is the same depth as the tree was growing on the nursery. The root collar must remain visible. Tree pit sizes are to be agreed with landscape architect prior to excavations. All tree pits are to be inspected by the landscape architect prior to planting. All tree pits are to have suitable irrigation pipe and end cap and aeration tubes if required (aeration tubes tend to be required for trees planted in a hard landscape environment). They are only required for the first two years after which they are superfluous. All irrigation pipes are to be placed as high as possible not at the base of the rootball. The tree would also benefit from an earth reservoir around the rootball on the surface to aid watering. The reservoir is best backfilled with bark mulch to avoid soil glazing on the surface.

Note: Trees may sink after planting due to soil settlement. With sandy soils generally there will be a settlement of 10% and clay soils 20%, this will need to be considered by the landscape contractor when planting and therefore the tree may need to be planted slightly higher to accommodate soil settlement.

Note: Never excavate deeper than the highest water table to ensure organic matter does not come in contact with groundwater resulting in anaerobic digestion within the soil.

All hessian and wire supports around the rootball are to remain in place when planting (in some case it may be required to loosen the hessian and wire). The hessian will quickly decompose. The wire will oxidize and also disappear in the soil eventually.

Trees planted within hard landscape areas are to have tree grilles and guards where specified. Subterranean cellular product is to be used to ensure the tree has a minimum of 3m3 growing area. Type and manufacture is to be agreed with the client and landscape architect prior to installation. The landscape architect is to inspect all tree pits prior to planting.

Trees are to be supported either by high anchoring, low anchoring or underground anchoring systems. The type of anchoring system is to be agreed with the landscape architect and detailed within the specification of works. For trees that are <10-12cmg use 1no untreated softwood stake at min 10cm diameter driven into the ground at least 1m depth (30cm of which must be in undisturbed ground), the stake is to be placed on the side of the prevailing wind. Trees >10-12cmg use 2no untreated softwood stakes at min 10cm diameter driven into the ground at least 1m depth with horizontal bracing bar. Trees >25-30cmg use 3no stakes in a triangle around the tree (1.4m above ground level) with horizontal bracing bars, tree bands are to be secured to the posts with galvanised nails.

Underground anchoring systems are to be used for large compact rootballs or trees within hard landscape with tree grilles to BS 4043: 1989 'Recommendations for Transplanting Root-Balled Trees'. The type of anchoring system is to be agreed with the landscape architect. Biodegradable anchoring straps are to be used to ensure the straps do not grow into the trunk.

Note: There are benefits to using low level anchoring as field trials have demonstrated that the tree becomes independent in the ground quicker as a result of the wind rocking the tree that encourages root ground. However, this method is not recommended in exposed conditions or coastal locations due to a greater risk of the trunk breaking.

Ties and stakes are to be checked and adjusted every six months or after periods of strong wind and rain. All topsoil is to conform to BS 3882:2015 'Multipurpose' or similar approved by an agronomist. The tree pit shall be backfilled with previously prepared topsoil excavated from the pit and additional topsoil as required. All backfilled material is to include an organic slow release fertilizer to ensure there is no adverse affect on soil organisms (Vifax Q4HN) or similar approved at a ratio of 10 :7.5 :10.2 + TE. The second application to be made 10-16 weeks after planting depending on soil type and weather conditions.

Tree pit root barrier are to be installed to all trees within 3m of any underground service routes or within 2.0m of kerb lines & hard surfaces & building foundations. Type of root barrier material is to be agreed with the landscape architect. The landscape contractor is to confirm locations of all services prior to implementation of trees. Prior to installation NJUG specification and requirements are to be referred too.

Guidance for Tree Pit Sizes within Soft Landscape Areas

Final tree pit size will vary dependent on size of rootball, tree stock and soil type.

Below are general guidance sizes only. The landscape contractor is to speak to the grower to obtain exact sizes prior to delivery. Landscape Architect to inspect tree pits prior to planting.

Tree pit size guidelines:

| Tree size | Rootball Size | Tree pit size (length, width, depth) |
|-----------|---------------|--------------------------------------|
| 14-16 cmg | 50x50cm       | 80x80x65cm                           |
| 16-18 cmg | 50x50cm       | 80x80x65cm                           |
| 18-20 cmg | 60x60cm       | 80x80x75cm                           |
| 20-25 cmg | 70x60cm       | 90x90x75cm                           |

Tree aftercare and pruning

When a tree is lifted/harvested it will lose a percentage of it's root system. As a result the roots are unable to supply the crown with the water demand being placed on the root system which can cause stress to the tree. As a result the tree will respond by reducing the amount of foliage, in some cases when the water storage is great the tree will shed wood from the crown. Watering the tree is important in the first two years after transplanting. In very hot conditions the canopy can dry out even when the rootball is moist simply because there is not enough root development yet. Therefore, the only solution is to reduce the canopy volume to reduce the stress.

All pruning is to be done by removing first and second wood only, all pruning works are to be carried out by appropriately trained landscape contractors.

It is recommended that hessian is placed around the tree stems after planting to prevent the overheating of the trunks.

The flow of water within the bark will normally prevent this,