

STREET TREE STANDARD

At Leafland, we believe that a quality specimen tree is nurtured from root to tip. These specifications and guidelines are for the supply of healthy, vigorous trees that are disease, damage, and defect free. This standard can be used for inspection of trees supplied for landscaping and street plantings.

1. Identification: Trees should be clearly labelled until planted.

2. Health and vigor: The size, colour, and appearance of leaves should be typical for the time of year and stage of growth of the species/cultivar.

3. Pests and disease: Trees shall be free of pests and disease.

4. Injury: Trees should show no evidence of foliage damage (e.g. distortion from herbicides or frost), trunk damage, or branch damage.

5. Self-supporting: Trees should be able to support themselves in an upright position with a full head of foliage while standing in the container and also after planting, without the use of canes or stakes. The trunk should be rigid for the lower quarter to half of its height, becoming gradually more flexible through the upper half. The trunk should be able to bend by approximately 30° side to side without the container lifting off the ground when the tree is bent at 80% of the tree's height, and shall return to an upright position after the test has been completed.

6. Trunk: The trunk should be strong, upright and reasonably straight, firm in the container. It should be free from wounds and blemishes. It must have a taper which is appropriate to the species and evident from root to crown. An un-tapered, parallel trunk may be accepted where it is a species characteristic e.g. standard cherries, Pseudopanax.

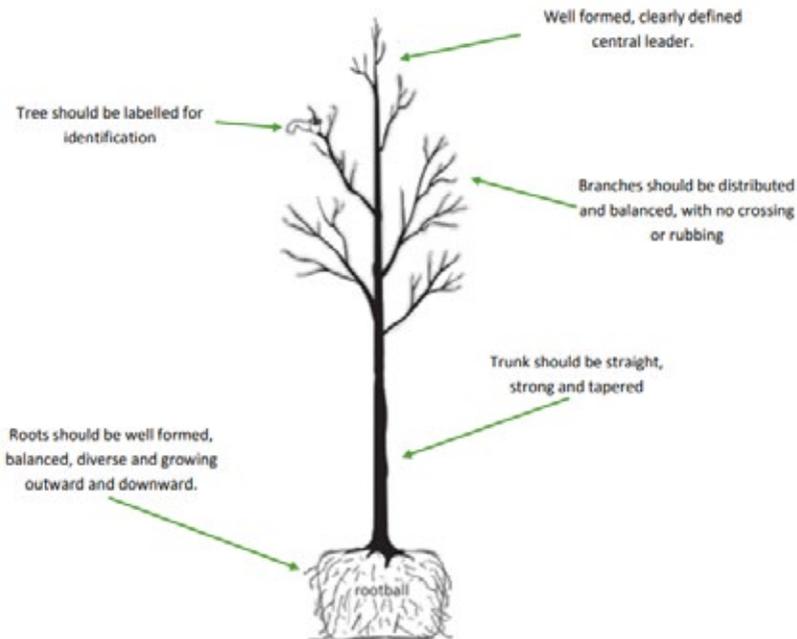
7. Pruning: Pruning practices shall benefit the tree's development. Pruning shall be undertaken to internationally-recognised arboricultural standards. The diameter of any wound shall not exceed 50% of the diameter of the trunk immediately above the point of pruning.

8. Central leader: Trees should have a relatively straight, well formed, clearly-defined, central leader for the height of the tree, with the apical bud intact. Trunks shall be free of co-dominant stems. This does not apply to multi-stem, weeping, or other tree forms where a straight leader is not a natural characteristic.

9. Form and symmetry: Form and habit should be true to species, with no crossing or rubbing branches, and a well-balanced appearance. The difference in crown distribution on opposite sides in any aspect should not exceed 20%. Branches should be distributed radially around (species dependent) and vertically along the trunk, not clustered in several areas, and should be no greater than 50% of the diameter of the trunk, measured 20mm above the branch bark ridge.

10. Included bark: Trees should be free of included bark. Included bark is where the branch bark ridge fails to expand outwards and, as the trunk and branch continue growing, it becomes more enclosed. Branch bark ridges that are included (concave) are considerably weaker than those with a prominent ridge line (convex). Some included bark will be tolerated in species where it naturally occurs e.g. kowhai, Tilia, Plagianthus, Ulmus.

11. Graft unions: Graft unions should be sound and the scion and rootstock compatible. The union of the scion and rootstock should be well knitted and show no obvious signs of incompatibility for the entire circumference of the graft. Graft unions are often different diameters and this does not indicate incompatibility.



12. Roots: Roots should be free of decay and damage. The tree should have a well-formed, diverse, and balanced root system with no kinked, circling, or girdling roots. To allow roots to have an even 360° spread, the centre of the trunk should be approximately central in the container. Roots should grow in a generally outwards and downwards direction. Shaving, pruning, or peeling off the shell of roots on the periphery and bottom of the root ball and teasing the roots out cuts away most defects, but if this is not the case, roots that are distorted as a result of inappropriate growing practices should not be accepted. Water management is critical after root pruning to avoid severe wilting and stress.

13. Root-ball occupancy: The root system should fully occupy, and be well established, in the container. Once the container is removed, 90% of the soil volume should remain intact. The outer edge of the root-ball should be free of woody circling roots and the base free of matted roots. The trunk should not be loose in the container.

14. Height of root collar: The root collar should be within the top 1 - 2 inches of soil, just below the surface of the root ball, with no large roots crossing over the main roots.

15. Maintenance: Container trees should be weed free and moist.

16. Supply and collection: Trees and plants should be handled with care at all times, lifted by the container and placed on the ground or into vehicles. Trees and plants should be thoroughly watered before they are transported from the nursery.

17. Transportation and storage: All tree and plant material should be carefully packed and protected during transport to prevent damage. Foliage should be protected from desiccation during transportation. Plant roots should be protected at all times from drying out. Plants and trees should be planted as soon as possible, but until then should be stored in shade, well protected, sheltered and well-watered.