

than 2 months. This problem is particularly evident with vigorous native plants with strong taproots, such as *Eucalyptus* and *Acacia* species. In our experience, fast growing herbaceous plants like petunia and lobelia will form a dense mat of roots outside the base of the pot once the plants have reached full size, which then makes them unsuitable for retail sale.

Commercial preparations of algicides based on dichlorophen have proven in commercial experience to not only control algae on the sand surface, but also to inhibit root growth in the sand. As there are no recommended rates of this chemical for root pruning uses, we incorporated treatments at four rates into two of our 4-month trials. We used Debco's liverwort and moss control preparation (450 g litre<sup>-1</sup> dichlorophen). This active ingredient is also available in the formulation Kendocide® at 480 g litre<sup>-1</sup>.

Rates of 5, 20, 60, and 100 ml of preparation were applied per m<sup>2</sup> in 2 litres of water. The lowest rates allowed rooting through of several species. There were no significant differences in shoot growth. The highest rates eliminated root penetration into the sand and there was no evidence of phytotoxicity. The effects of intermediate rates of 30 and 45 ml litre<sup>-1</sup> suggest that 45 to 60 ml of preparation per 2 litres of water be used per m<sup>2</sup> of capillary bed for effective pruning of escaped roots over a broad range of nursery stock.

#### LITERATURE CITED

- Handreck, K.A. and N.D. Black.** 1994. Growing media: For ornamental plants and turf. University of N.S.W. Press.
- Stackhouse, J.** 1993. Capillary watering lifts plant growth rates. Austral. Hort. 91(2):35-38

---

## Deciduous Ornamental Trees in Australia

**Wesley J. Fleming and Liz Darmody**

Fleming's Nurseries P/L, PO Box 1, Monbulk, VIC 3793

Public demand for, and therefore the importation of, deciduous ornamental trees is ever-increasing. This influx has the potential to greatly enhance our environment. As professional horticulturalists and home gardeners alike, we realise the advantages that these trees offer as landscape subjects.

There are many outstanding ornamental cultivars now available in Australia. The *Acer* (maple), *Cornus* (dogwood), *Tilia* (linden), *Lagerstroemia* (crape myrtle), and ornamental *Pyrus* (pear) are a few species which we believe have potential, but these represent only a sample of what is currently available.

Consideration must be given to a whole range of criteria before a species or cultivar is selected for planting, e.g. the existence of underground sewerage; height, colour and design of surrounding buildings; power lines and other overhead obstructions; narrow streets; soil type; drainage; and aspect. People tend to place a high emphasis on what the site looks like when a tree is first planted. They want an "instant effect". Instead we need to teach people to look ahead and imagine how it will look in the future; will the perfect specimen at planting mature into a rather large and expensive problem 10 years on? The right tree needs to be chosen for the site.

Planting the tree is the easy part. To achieve the desired result in the long term is in fact quite complicated.

It is exciting to visit areas where careful forethought and planning have resulted in a harmonious landscape, where each tree can be appreciated on its own merits but also plays an integral part of the whole vista.

The range of ornamental trees available in Australia is continually increasing. Trees must be selected that reflect the given locality or site, they must seem to "naturally belong" by virtue of their form, texture, and colour. Trees that are aesthetically pleasing in all seasons are much sought after. A tree that is pleasing to the eye for only two to three months during autumn colour will be passed over for a cultivar which also displays lovely summer foliage and good branch structure in winter.

Colour is a very important consideration. The effect obtained by blending a combination of colours in the landscape or the use of one cultivar in a mass planting can be dramatic. Consideration also needs to be given to attributes such as tolerance to soil, and climatic conditions such as drought and heat, resistance to insect and disease attack. Consistent growth rate, good form, suitable root systems, and superior ornamental value are all criteria which should be thoroughly evaluated prior to species/cultivar selection.

Many thousands of dollars are spent each year on the purchase of trees. In Australia, street trees and their maintenance account for a considerable percentage of the public budgets. Correct tree selection from the outset would ensure significant savings by reducing pruning requirements, repairs due to invasive root systems, and replanting due to poor initial selection.

Australians appreciate beautiful trees, and they also have a keen environmental awareness. *The presence of trees in our communities has a tremendous impact on improving the health of the city environment and the quality of life of its residents.* Trees are invaluable in reducing noise levels, especially road noise pollution.

It is an exciting time to be involved in the Australian Horticultural Industry, with so many new plant species being introduced. We need to learn about the attributes and adaptability of any new introductions; cultural information from overseas must be used only as a guide. The performance of each new introduction must be assessed and evaluated under Australian conditions to ensure the delivery of a consistent product.

---

## Crape Myrtle Propagation

**Don Covan**

Simpson Nurseries, PO Box 160, Monticello, Florida, U.S.A. 32345

*Lagerstroemia indica* (crape myrtle) has been a popular deciduous flowering shrub or small tree in the Southern United States since its introduction from Asia more than 150 years ago. Crape myrtle's popularity has steadily increased, but took a huge leap when Dr. Donald R. Egolf of the United States National Arboretum began releasing new hybrid cultivars. By crossing *L. fauriei* (a small tree from Japan) with *L. indica*, Dr. Egolf produced hybrid cultivars with features which truly make them "a plant for all seasons".