CONCLUSIONS

The inconsistent results obtained over a period of years are difficult to explain, but are possibly related to the effects of the previous growing season on the propagation material. What is quite certain is that high quality propagation material is particularly important if good results are to be achieved.

Micropropagation techniques have been successful with all three plants, and it may be that conventional propagation will eventually be redundant. Whether or not the plants produced by micropropagation will grow as well as those from cuttings, or will be produced more economically remains to be seen.

TASMANIA, AND THE PLANTS WE PROPAGATE THERE

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Tasmania is the smallest state in the commonwealth of Australia. Our total land area is equivalent to that of the Irish Republic. Most of the state is mountainous with numerous lakes and beautiful scenery. Being an island state and away from any cold landmasses our climate is very moderate. Temperatures in the midthirties are rare, while during the winter the temperature seldom drops below freezing.

This means that we can grow a very wide range of plants. Apart from a wide range of native flora, one will find all kinds of European, American, New Zealand and South African plants. All native trees and shrubs are evergreen and many of those flower during the winter months supplying food for many honey-eating birds.

A large proportion of our native plants are eucalypts, which come in all shapes and sizes. Many of them have silvery leaves like Eucalyptus cordata, which reduces water loss during a dry period.

In the rain forest areas tree ferns, Dicksonia antarctica, are abundant and some of them will grow to 50 feet in height.

Eucalyptus ficifolia (scarlet flowering gum) grows into a small tree and displays a mass of flowers, ranging in color from red to pink or white and is summer-flowering. Eucalyptus leucoxylon 'Rosea' is winter-flowering.

Another very large group are the acacias or wattles, as they are called. They vary from medium sized trees to dwarf shrubs and most of them are winter-flowering with a few exceptions.

A popular New Zealand species is Metrosideros excelsus, or N. Z. Christmas tree, which flowers around Christmas (midsummer) with masses of bright red flowers.

We have numerous shrubs with bottle brush type flowers, such as Banksia marginata and Banksia collina, which form small trees and are often found in exposed positions.

A lot of breeding work takes place with the Grevillea species, which come in numerous shapes and sizes. The tallest growing one is Grevillea robusta, although being a subtropical tree it grows very well in Tasmania. Some hybrid ones are Grevillea 'Poorinda Peter', G. 'Ivanhoe', G. juniperina, and G. Poorinda Queen'. All these and dozens more are popular with the home gardeners as most of them flower all year and attract honey eaters to the garden.

Another group with bottle-brush-type flowers are the callistemons; this is also a genus popular with hybridizers. A few examples are Callistemon citrinus, C. viminalis and a special West Australian selection called C. 'Kings Park Special'.

An import from California is Lavatera assurgentiflora, which is extremely fast growing and flowers for a very long time.

Anigozanthus, or kangaroo paw, is a typical Australian native and a lot of breeding is going on with some excellent results.

An interesting little creeper is Sollya heterophylla, which also comes in a pink and a white form.

Baeckea densifolia is a low, spreading shrub with masses of white flowers.

Crowea exalata is a beautiful shrub with masses of pink flowers.

Tibouchina urvilleana 'Edwardsi' [syn. Lasiandra 'Edwardsi'], a native of Brazil, is an easily grown, very long flowering shrub.

The prostantheras, or mint bush, include a number of aromatic shrubs, which are very free-flowering, with mauve or pale blue flowers.

Cassia is a large genus of mainly tropical species. But some, like Cassia corymbosa, grow well under our conditions and produce masses of bright yellow flowers.

Clethra arborea, or lily-of-the-valley tree, grows into a small tree and produces lily-of-the-valley-like bunches of flowers.

Convulvulus cneorum, a native of south Europe is a useful rock-garden species.

Myoporum floribundum has an unusual growth habit and makes an interesting garden specimen.

An important group is that of the Boronia family. Boronia heterophylla or red boronia is well known and easily grown. Boronia megastigma, or brown boronia, is the most widely grown boronia as a garden shrub for acid soils and as a cut flower. The flowers are extremely heavily perfumed and much sought after. It is probably worth trying to grow this plant as a house plant in your

country; if you succeed in getting it to flower, sales are guaranteed.

It can be grown from seed or cuttings, sown on top of peatmoss. The seedlings are usually a bit variable in growth habit and we mainly use cuttings of selected plants. Boronia plants do best in an acid soil and should be grown in full sunlight outside during the summer months and brought in under frost free, but light conditions during the winter. Flowering is in early spring. Boronia will stand a few degrees of frost without ill effects.

Some Leptospermum cultivars ("tea-trees" as we call them) could also offer some possibilities as a house plant. Some larger growing plants are Leptospermum scoparium, L. 'Coconut Ice', L. scoparium 'Horizontalis', and one which could be considered for use as a houseplant is L. scoparium 'Nanum', which only grows to about 12 in. tall; it usually flowers in winter with masses of red flowers. All of the tea-trees are propagated from cuttings.

The last ones I would like to mention are the New Zealander Hebe 'Wairiki' and H. buxifolia. Both will stand a few degrees of frost and, if grown in the full sun outside during the summer and brought in under frost free conditions during the winter, could be an interesting addition to your houseplant assortment.