## Production of Ornamental Trees, Shrubs, and Tropicals in Argentina—An Overview

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Mitre 360 - (1854) Longchamps, Pcia, Buenos Aires, Argentina

Argentine production of ornamental plants began in the early 20th century, when the European immigrants arrived. Most of them had been farmers in their own countries. There was a curious tendency to work on different types of plant production depending on their origin. The Italian families were dedicated to tree and shrub production for ornamental use or for fruit and forest tree production. Those coming from northern Europe (especially Germany and Holland) were dedicated to cut flower and later to foliage pot plants. The Portuguese immigrants produced cut flowers and still do; however, a large group is dedicated to growing vegetables. It was similar with the Japanese immigration; some of them still produce cut flowers, while the others began with cut flowers but now are growing flower pot plants, such as annuals or perennials like rhododendrons, cyclamen, or chrysanthemums.

Almost every nursery is still a family enterprise. Now, the 3rd or 4th generation is working at plant production. Those enterprises were managed by people with practical knowledge. Some of them used to travel to Europe, where they found novelties and could see new crop production techniques. Today, the youngest train themselves better. In many cases they have an academic degree; they're agricultural or forestry engineers or, at least, agricultural technicians, though the "field experience" is still considered more important. In fact, no university in Argentina prepares the students for an economic activity dealing with ornamentals. So, whoever wants to do it as a professional must add his own experience to the physiological principles and crop methods the university teaches.

You can see all kinds of technical methods in our nurseries. Advances have been made in greenhouse production of tropicals where the heating systems are automatic; however, in most of the cases irrigation is done manually. Some nurseries are making great efforts and new investments. Manuel Kogiso has 2000 square meters of new, plastic greenhouses with automatic shading systems for photoperiod management in *Euphorbia* production with subterranean warm water pipes for heating. Now, his owner (a new member of IPPS) is beginning with three consecutive annual cycles of *Impatiens* New Guinea hybrids, Rieger begonia (*Begonia ×hiemalis*), and *Euphorbia pulcherrima*. In this way, he'll grow 80,000 plants/year with earlier flowering and a sure sale.

Propagation is still conventional, though micropropagation is slowly gaining acceptance. In Argentina, laboratories that work on tissue propagation don't do it properly. Usually, they don't have enough plants at the right time. The growers don't trust the method because they have real troubles during transplantation. Despite this, some of them are introducing micropropagation by importing plants from those countries where the job is done well, such as Holland. These advanced techniques, however, are only for the best growers, those who have understood the deep changes occurring in Argentina during the last 4 or 5 years. Now, if you don't change you will not survive. Even though Argentine people are skeptical and

rather pessimistic (no matter if you are a propagator or a journalist), the managers of leading enterprises have accepted the challenge of producing higher quality crops.

The estimated pot plant production during 1993 was: 30 million annuals produced, using 1000 greenhouses. That represented an annual invoicing of \$6 million (US). The same number of greenhouses were dedicated to flower pot plants such as *Rhododendron*, *Cyclamen*, Rieger begonia, *Euphorbia*, growing 3.5 million units and an annual invoicing of \$8 million (US). Twelve and one-half million tropicals and foliage pot plants were produced in 2500 greenhouses, with an annual invoicing of \$25 million (US).

We can see some progress in shrub and tree production too. Argentine nurseries have two principal characteristics:

- 1) They do the entire growing process; they sow the seeds or plant the cuttings, transplant them to the field or to the containers until they reach a saleable size, and finally transplant them to the soil, package them, and sell them.
- 2) Every shrub and tree nursery produces an enormous number of species; the bigger ones cultivate more than 400 or 500 species. They're not specialized and, in my opinion, that's a management problem.

More than 3.5-million ornamental shrubs and trees are produced and sold in our nurseries every year. For that, 1000 ha near Buenos Aires are cultivated, with 20,000 square meters of greenhouses for cuttings, seedlings, and container crops and 70,000 square meters of shaded area. This means an annual invoicing of \$25 million (US). If we add forestry and fruit trees and rose plants, the overall income comes to \$60 million (US).

And what can we say about sales? Thirty years ago the retail nurseries were open to customers during fall and winter and plants were sold only during the resting stage. Then came the tropicals "boom", during the late 1970s, allowing shops to be opened year-round. Finally, the owners began to put trees and shrubs in containers and to sell them even during the summer.

At the present time, the plant shops try to offer a good service to their customers. You can buy a plant or a gardening tool or you can get a garden designer or just a gardener to maintain your garden in good condition. Customer service is not of high quality in many of our plant businesses. Some shops are well-managed, with sound business practices. In these shops, quality is considered basic. But again, in my country you'll find everything. Small shops are open every spring, waiting for the holy miracle of survival. Others keep going for several years, but people in charge do not have enough knowledge and cannot give advice to the customers. We also have street sellers and even roadside ones.

In summary, the essential troubles of plant production and business in Argentina are:

- 1) The low degree of investment as a result of many years of economic recession and financial speculation. This situation is reversing.
  - 2) The seasonal sales that result in low income for cultivators and retailers.
- 3) An economic reality that has not stabilized enough to allow the sale of large numbers of plants, considered by most people as sumptuary objects.