## Tropiflora's Terrestrial Bromeliad Care

Terrestrial bromeliads are not of a single genus or even 'type' of bromeliad, rather as a group are those that are soil dependent. While terrestrial bromeliads have little in common aside from their need to be in soil, there are some basic natural groupings of characteristics that can be made. Nearly all terrestrial bromeliads lack the ability to hold water in the leaf axils. Terrestrial plants have access to moisture at the root zone, something that epiphytic plants do not. Most species need good soil drainage too, even those that prefer some constant moisture still do not like poorly draining, dense soils.

Ananas This is the group containing the familiar Pineapple, grown widely across the globe. Also in this group is **Pseudoananas**, which has the look of an Ananas or Bromelia, but does not make the familiar fruit. This genus may eventually be sunk into Ananas and may also include other terrestrial bromeliads now in the genus Aechmea, but for now is a stand alone, pineapple. These plants like rich, loamy soil with a constant moisture content. Good drainage is still preferred. Full sun or bright light is best for form and color. Pots should be large enough to hold the plant upright, but also to accommodate a substantial root system. Some species grow to over three feet across. Propagation is by offsets from the base of the plant or between lower leaves and from adventitious offsets at the base of the fruits.

Bromelia and related genera Deinacanthon and Neoglaziovia are terrestrials that lack a reservoir and grow, for the most part, in open grasslands, restinga or rocky caatinga and occasionally in open forests. All can withstand full sun or very bright light, and their coloration and form will be much better in stronger light too. There are some miniatures or very small varieties suitable for pot culture, but with Bromelia especially, growing in containers is a challenge. Not only for their sheer size, but most species of Bromelia and the related genera, produce offsets on long stolons which need room to develop and to emerge from the soil. Too small a container will result in a pot full of soil-less roots and un-emerged stolons winding around in the pot that may eventually push the plant right out of the container. In general, this group likes loamy soil, good drainage, frequent watering but with some wet-dry cycling. Fertilize occasionally for good growth, when growing potted.

**Deuterocohnia** is a genus that is getting more popular, even among succulent fanciers. Generally very dry growing plants from the deserts of Peru and the 'southern cone' countries of South America. *Deuterocohnia* is famous for its perennial inflorescence on most species. The inflorescence will form between the leaves near the top of the rosette, and can vary between a foot to over 6 feet tall in some varieties. Rather than dying off after blooming, it forms new branches and flowers each new season. Generally from very arid, sunny locations, they nonetheless have fairly thin (not particularly succulent) foliage and can tolerate extended dry

conditions. A rich loamy, but good draining mix is best, though some grow their plants in a very Spartan, 'dirty Perlite' or pumice mix.

*Dyckia* is perhaps the most widely grown terrestrial genus by bromeliad and succulent fanciers. Varying in size from a few inches across to nearly three feet, there are many very handsome species and a great many hybrids with decorative foliage. The bloom spikes are usually a foot to three feet tall and are formed laterally, sometimes in multiples, and bear bell-shaped yellow to orange flowers. In spite of their 'cactus-like' look of stiff, glossy, spiny leaves, they are a genus that enjoys frequent watering. Avoid 'wet feet' by planting them in a fast draining media with some moisture retentive properties, but do not allow them going for extended periods without water. Plants frequently outgrow their pots, 'shading' the soil from water, and will begin to show signs of stress. Repotting to keep some soil exposed to overhead watering is best and a larger container accommodates more of a root system for these terrestrials. Shriveled, yellowing leaves is generally a sign of too little water and/or a root-bound plant. Full sun or bright light produces the best color and form. Propagation is by offsets or seed and sometimes by division of a clump.

**Encholirium** is a genus of terrestrial and saxicolous plants mainly from central Brazil. Though there are some smaller varieties, many are quite large, with very spiny leaves. In nature this genus is found on stony ground or growing on steep hillsides of solid rock, forming a root system in the smallest of cracks. Adapting these plants to cultivation has been a challenge and therefore there are few species commonly available in cultivation. Generally speaking, they need a pot large enough to allow overhead watering, loamy but very good draining soil. Allow drying between watering and protect from extended periods of rain outdoors. Propagation is usually from seed, though some species produce offsets. The main rosette will die off after blooming.

*Hechtia* is a genus of sun-loving species that are often restricted to the hottest, driest parts of its range, that from the Big Bend of Texas to Honduras. By far, most species are endemic to Mexico. Small to almost giant in size, most species are comfortable in a 6-inch to 10-inch pot. In cultivation they like good drainage and ample sized pots. Watering during the hot seasons should be thorough, but on a frequency that will allow complete drying between watering. Stressful, hot, dry conditions lend to more compact, colorful foliage, often with red banding or spotting. Propagation is by offsets mainly, as *Hechtias* are dioecious and two sexes are required to pollinate the flowers.

**Orthophytum** contains sun-loving species as well as some shade growers. The sun loving types are generally, though not completely restricted to those with a nidular inflorescence. Species such as *burlemarxii*, *albopictum* and *navioides* resemble some smaller species of *Bromelia* and take about the same growing conditions. Generally saxicolous, growing in cracks or between rocks, they thrive in a good draining mix with a gritty texture and enjoy bright light. Bulb pan

pots are good for these types. Among those with a tall scape, *O. lemii, horridum* and a few others can be grown in full sun or partial shade.

**Puya** is a huge genus of mostly Andean species that often grow at very high altitudes on tree-less plains, on slopes and in bogs. Few members of this genus are in cultivation due in part to the relatively giant size of many in this genus. Those that are small enough for container culture are often cool-growing and thus unsuitable for many growers, save those in cooler, drier Mediterranean climatic zones. *Puyas* need ample root room and a good draining mix that is not allowed to dry completely out.

Cryptanthus is far and away the most widely cultivated, popular genus of terrestrial bromeliads that are not grown in direct sun. There are a couple of exceptions, but on the whole, most species prefer loamy soil that never is allowed to become completely dried out but still affords good drainage. Bright, indirect light, out of direct sun is best. Too little light may result in faded colors and a dull appearance while too much light can cause bleaching or burning. Drying out for extended periods will cause permanent damage such as poor root development and drying or yellowing leaves. Cryptanthus are extremely popular as a house plant and in terrariums. A pot large enough to accommodate a vigorous root system is recommended. Regular fertilization will make a big difference in how your plants grow and look. Propagation is by offsets which are almost always rootless, but can be stuck into constantly moist, warm soil to root. Cold sensitivity is a factor in growing Cryptanthus, with temps in the 40's (F) barely tolerated. Forzzaea, Lapanthus and Rokautskyia belong in this group as well.

**Disteganthus** is an obscure, rarely grown genus related to *Bromelia*. Mainly forest dwellers, they require warm temps, evenly moist but good draining mix and protection from direct sun. A generally fussy, difficult genus of just a couple species.

*Navia* is a genus that has many rather spectacular members, but few are in cultivation. Growing largely in the 'Lost World' of the Guyana Shield of Venezuela and surrounding countries, they are frequently restricted to a single locality on wet cliffs or rock outcrops. Notoriously difficult to adapt to cultivation, hence there are only a few that can regularly be found. *Navia* enjoys constantly moist but not wet media that has good drainage and aeration. Light can be from fairly shaded to quite bright, but not full sun. Propagation is by seed and offsets.

Orthophytum & Sincoraea have shade loving members along with the sun lovers. Normally those with a scape for an inflorescence (Orthophytum) as opposed to the nidular types (Sincoraea), enjoy some degree of shade. In nature these are often found growing under deciduous tree canopy or scrubby vegetation. Occasionally they occur in situations where they are in sun part of the day and shaded by rocks the rest of the day. These types like quick draining mix with some water retentive qualities. Peaty or loamy soils mixed with Perlite or pumice are

good. Bright, indirect lighting and winter warmth make a handsome plant. Regular fertilization will reward you with bigger size, more ample blooms and a good flush of offsets for propagation. A growing favorite amongst bromeliad and succulent fanciers. The genus *Lapa*, which used to be a *Cryptanthus*, then an *Orthophytum*, belongs here culturally too.

**Pepinia** and **Pitcairnia** can be listed together here, though they both have a wide variety of species from a wide variety of habitats. There are those few that grow in full sun in dry conditions, but most are sub-mesic or of types that enjoy some moisture and partial sun. Again it is hard to generalize about any genus, especially one so large and diverse, but on the whole, *Pepinia* and *Pitcairnia* enjoy large containers, well draining soil that is kept a little moist, warmth and bright indirect light. You may find that some are deciduous and therefore will require less water when dormant. Most species in cultivation are easy to grow and enjoy regular fertilization. Propagation is by seed and divisions.

## Tropiflora, LLC

3530 Tallevast Road, Sarasota, Florida 34243
Phone: (941) 351-2267 Fax: (941) 351-6985 Email: sales@tropiflora.com
This copyrighted material may not be reproduced for any purpose beyond personal use without express written permission by an agent of Tropiflora, LLC.
All rights reserved. © 2024 Tropiflora, LLC