Plants with a determined bent

Mark Paul

Alcantarea *leaning into a Brazilian driveway*

The genus *Alcantarea* has some of the largest members of the Bromeliad family with some growing to two metres dimensions with a three metre inflorescence. There are 16 described species, all from eastern Brazil.

I have grown *Alcantarea* for over 15 years in the ground and in containers, from seed and offset, through innumerable increases in pot sizes as they expand impressively towards their mature dimensions and flowering. Of course, with every re-pot you re-centre and align your plant although it's to no avail, the plants invariably lean to one side of the pot. Rotating the plants as they grow minimises this, as well as the common practice of counter-balancing plants with concrete blocks or bricks on one side of the pot. But the inescapable fact is - *Alcantarea* lean.

In May I visited Brazil, particularly Rio de Janeiro and Mina Geritas, to see a number of *Alcantarea* species growing in their natural habitat of granite cliff faces. Their bleached skirts of dried leaves are visible at great distances.

On closer inspection, I realised the plants all lean into the cliff face to spread their substantial water-bearing loads (more than 60 litres) and later inflorescence and subsequent wind loads on to the cliff face. Even on less acute cliff faces and in cultivation on hillsides they lean acutely towards the slope. Local rock climbers and abseilers use *Alcantarea* as secure foot and hand holds; some of the stolons from past growth observed in *Alcantarea glaziouana* and *Alcantarea roberto-kautskyi* were a metre long, which in a nutrient impoverished environment means a long time to flowering.

Roberto-Kautskii

Alcantarea *growing amongst a boulder field.*

I visited Petropolis in the Organ Mountains behind Rio de Janeiro and was amazed at the diversity of colours and forms in *Alacantarea imperialis* (particularly since I am used to seeing comparatively few clones of the species in cultivation). Colours ranged from blacks to reds to greens with some plants having two tones. I saw massive plants with huge stacks of leaves, smaller compact plants with fewer leaves, broader leaves, finer leaves, pointed leaves and rounded (recurved under) leaf tips. Blotched pigmentation and variegates reasonably common in cultivation in Brazil were easy to see on the cliff faces on wet overcast days.

On the peak of Mt Sino in the Organ Mountains above Petropolis, *Alcantarea imperialis* dropped out at about 2,000m (although there were still *Alcantarea vresias* at the 2,400m peak, five hours walk up). Looking out along that immense chain of mountains stretching as far as I could see in both directions, I noticed every exposed cliff face plastered in Alcantareas. It made me consider two things: first, the diversity within a species possibly from wild collected seed, and secondly the diversity of *Alcantarea* species not yet scientifically described as reflected in some of the non-conforming forms of *Alcantarea* we grow, probably from seed sent to Australia in the 1940s and 1950s,. But at least now I understand why they lean. The other thing was that the sun was setting and we still had to get down. That's when we started to run.

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Top: Alcantarea *growing on a cliffside. Below: closeup of* Acantarea a,

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The Growing Friends propagate five species of *Alcantarea - a.extensa, a.geniculata, glaziouana a.imperialis* and a.*vinicolor* in small numbers