

Den. kingianum } ***Den. x delicatum***
Den. speciosum }

These two Australian species and their natural hybrid, augmented with some genetic contributions from *Den. tetragonum*, *Den. bigibbum* & a few other species, form the basis for the Australian 'tropicool' Dendrobiums. In daily speech, often called 'Aussie' Dendrobiums.

Den. kingianum quickly grows into specimen size plants with slender canes in 4"-12" range (6-8" being typical). Flowers are usually pink, and carry a sweet fragrance. In situ it grows primarily as lithophyte (and occasionally as an epiphyte) at elevations from 150-4,000 feet (exposed to temperatures from below freezing in winter, to 110°F or more in summer).



Den. speciosum is also a primarily a lithophyte, but much slower growing. There are several varieties; all have stocky canes of varying heights, ranging from 3" to 72" when mature. This species is a valuable contributor to the hybrids, as it carries a huge number of either white or yellow, quite fragrant, flowers on each inflorescence. It has a broader geographical distribution, and grows at elevations ranging from sea level to 3,000 feet (temp range from 32°F to 110°F or more)



This first bloom plant is a sib cross between var. *curvicaule* (canes to about 34", with 2-4 leaves), and var. *grandiflora* (height?). This plant has now bloomed for 3 years, but still has some growing to do (canes have only reached +/- 10-12").

The cultural requirements are common for these two species, and their hybrids:

- For best blooming, plants should be outside in **full sun**, for as long as possible (the stiff 'leathery' leaves confirm that this is a full sun plant).
- In central NJ, I bring plants out in late April, preferably on the first of 2-3 days with overcast weather.
- I bring plants back inside, when the first frost is forecast (also see **NOTE**). *In 2017 plants stayed out through Nov 22nd.*
- September 15th : **No more fertilizer.** *This is a critical requirement. If you fertilize late, the plants produce lots of keikis, and no flowers.*
- October 15th : **Reduce watering by 90% (NOTE).**
- While indoor, place the plants as cool and bright as possible (warmer days are OK, as long as night time temps are low, ideally < 60°F.
- Once buds form, increase watering to 50%.
- Once buds open, increase watering to 100%, and start fertilizing again.

NOTE: Plants can stay out till night temperature drops to 32°F. However, excessive water (from fall rains) can inhibit flowering, so after Oct 15 protect the plants from the rain. If that is not possible, bring the plants inside instead.

There are many choices for pots & potting mixes. I have seen following combinations:

- Dick Doran : Bark mix, in small clay or plastic pots.
- Exotic Orchids : A few bark nuggets, small plastic pots.
- Fair Orchids : Spaghnum/bark (3:1), small clay pots.
- J&L Orchids : 100% spaghnum in clay pots.
- S.B.O.E. : Granite pebbles in plastic pots.
- Tewksbury O. : Cattleya mix in a clay pots.

Obviously, each of these choices requires a different level of watering during the growing season.

Den. kingianum blooms primarily on new canes, but will also produce a few spikes on older canes (1-2 years old), so large plants can put on quite a display.

Den kingianum often sets a number of keikis (especially if fertilized or watered beyond the cut-off dates). These plantlets can be separated as soon as they set a couple of roots. I usually start them in 2" plastic pots in pure sphagnum. I do not take small plants outside, till they are well established in the pots.

Some taxonomists have proposed moving *kingianum* to another genus = *Thelychiton*, but this has not been widely accepted.

Den. speciosum usually blooms in February. While it puts on a great display, the flowers are relatively shortlived (2-3 weeks).

Den. kingianum starts blooming in February, and can continue into April. Individual flowers only last 2-3 weeks, but since the flowers do not all open at once, the total flowering period is considerable longer than what you get from *speciosum*.



The natural hybrid between these two species, *Den. x delicatum*, has slender canes (10-16" tall) with a bulbous base. The flowers are most commonly white, and if possible, they appear to have even stronger fragrance than either of the parents.

At the SEPOS show in 2017 I had 2 or 3 established keikis with 3-5 flowers each on their first spike. People came from 40-50 feet away, asking what was producing that fragrance.



Den. kingianum tends to dominate in many hybrids. Here is a first bloom seedling of *Den.* (King Zip x Faye Roshan), which has not yet been registered.



Den. kingianum 'Red Ink'

Den. Kingianum 'J & L'

The 'J & L' clone is a typical pink flower. Here it is shown side by side with one of the darker colored clones.

Once you add *Den. tetragonum* to the mix, you get some distinctly different flowers. This species is somewhat less temperature tolerant, but the hybrids are still OK down to 35-40°F.



'Midnight Velvet'

'Sue'

AM/AOS



Den. Riverdye 'Maplewood' was registered in 2005, and has all the usual suspects in the family tree.

Finally *Den. Australian Robbie McInnis* 'Fair Orchids', registered in 2009, showing more tetragonum influence.

'Jewel' (below) is a *sillcockii* type (too much pigment on the back of flowers), while 'Sue' (above) is a true variety *sillcockii*. All 3 clones come from S.B.O.E..

