## **Building an Ever Blooming Orchid Collection**

There are 4 selection criteria for choosing orchids to build your own "Ever Blooming" collection of orchids, by using any one, or all 4 selection criteria, alone or in combination, anyone can have a small collection that always has something in bloom. The selection critia are.

- Orchids that are sharply seasonal plants, a careful selection will cover the calendar, when you have nothing in bloom, buy a sharply seasonal species in bloom. It will always bloom at roughly the same date the in future years.
- Orchids that have no fixed bloom cycle, that bloom as soon as new growth has matured, often blooming more than once a year. Here good specimen plant culture is essential, the more growths you have in development, the more often the plant will bloom.
- Orchids with very long lived inflorescences, that have a sequential bloom habit. Some Paphiopedillum & Psychopsis will bloom on the same stem for 5 years or more.
- Orchids with exceptionally long lasting flowers, a few plants for each season will cover the calendar. Certain orchids have flowers that will be in good condition for 5 or 6 months. A smaller number have individual flowers that will last 9 months or more.

A collection that is too heavily populated with young seedlings will not have enough mature plants to provide blooms, this can be frustrating. Be sure to acquire enough mature blooming size plants to keep frustration in check. It is worth spending the extra money to acquire a selection of blooming size plants. Blooming habits of an orchid will change as the plant goes from a first bloom seedling to a mature, multigrowth plant. The improvement in bloom quality, number and frequency is often quite dramatic. Give your plants time to mature. Good culture is essential to see the full potential of the flowers.

## This bears emphasis: Good culture is essential, poorly grown plants, even with good "Everblooming" genetics, won't bloom well or often if they are not growing well.

This is a list of some orchids, whose traits lend themselves to being part of an ever blooming orchid collection when they are mature specimens.

*Phalaenopsis*, the ubiquitous big box store orchid, is a surprisingly good canidate for the ever blooming orchid collection. Phalaenopsis have 3 traits that can be taken advantage of when you include them in your collection.

First some *Phalaenopsis* species are multifloral, sequential blooming when well grown. *Phal. amboinensis, cornu-cervi, equestris* (mostly late winter-spring-summer) *fasciata, gigantea, hieroglyphica, lueddemanniana, mariae, micholitzii, pallens, pantherina, sumatrana, venosa* (mostly summer-fall-winter). The above species have an inflorescence that will grow and produce flower buds for several years, do not cut the stems off these species until the stem is brown and dry. The flower stems may sit dormant for part of the year, then will make more flowers the next bloom season. Young seedlings with less than three pairs of leaves will not display this trait. The key is to raise specimen sized plants by giving them good cultural conditions. Hybrids with these species in their backgrounds will display the multifloral or sequential blooming traits when mature. The good news is that most modern Phal. hybrids have one or more of these species in their backgrounds, as these species are the source of many of the colors popular today.

These hybrids with the above Phal species will often have a flower or two open all year round. Many of the spotted, barred and striped *Phalaenopsis* hybrids, especially the ones with yellow or green background colors have a number of the above species in their ancestry. Also most of the red flowered Phals have very long lived inflorescences. A few really satisfying hybrids are; Phal. Baldan's Kaleidoscope, Brother Sara Gold, Be-Glad, Ambo-Tris, Venus, Brother Rose and Dtps. Newberry Parait, and many of the *equestris* hybrids. The Phalaenopsis market is large, new hybrids are widely available, older hybrids quickly become unavailable, your best bet is to find a hybrid you like, with colors and pattern of markings you like. Then raise it on to a specimen plant. Chances are fair to good that once the plant reaches the stage where it has more than two pairs of leaves you will see the mature blooming pattern, which often will be year round blooming. My mother's plant of Baldan's Kaleidoscope has had a flower open on it continuously for five years at a stretch. The only time it recently did not have at least one flower open is when she cut the stems to be used in a bridal boquette.

The second trait that makes Phalaenopsis an everblooming orchid is the long lasting quality of individual flowers. Most Phalaenopsis flowers on a healthy plant will remain in good condition for 3 to 5 months. If the flowers wilt in less than 4 weeks on a Phalaenopsis hybrid, you should check the health of the plant, something is wrong and should be addressed.

The third trait that Phalaenopsis hybrids have is the tendency to produce branches on inflorescences about 6 months after the first flush of flowers. This combined with the long lasting flowers means that it is common for a well grown Phalaenopsis to be in bloom 9 months of the year.

**Paphiopedilum** as a goup are not usually thought of as 'Everblooming'. Many Paph species tend to be slow growing, requiring 3 or more years to mature a single growth. Then they often only produce one flower, and then the wait is on until the next growth matures and blooms. The good news there are exceptions. One can find Paphs that qualify as 'Everblooming' because they have several of the "Everblooming" traits. Long lasting flowers, long lived inflorescences, non-seasonal blooming, and sharply seasonal bloom habits can be found individually, or in combination in various species and hybrid Paphs.

**Paph.** species of the subgenus *Cochlopetalum*, are the "ever blooming" Slipper Orchids, sequentially blooming on long lived inflorescences. *Paph. chamberlainianum* also known by some as *victoria-regina, Paph. glaucophyllum, kalinae, liemianum, moquetteanum, primulinum, primulinum* var. *purpurescens, & victoria-mariae*. All hybrids within the Cochlopetalum grouping listed will be multifloral sequential bloomers. These species and their hybrids such as Pinocchio (*primulinum* x *glaucophyllum*) may have as many as 20 or more flowers per flower stem. They will bloom one or two at a time, so that the plant may be in continuous bloom for up to five years on a single inflorescence. Intersectional hybrids with Paphs not in this group will have increased flower counts over the other parent, but they will not be long lived sequential multiflorals until the percentage of Cochlopetalum ancestry is over 50%.

**Maudiae type** Paphiopedilum hybrids can become ever blooming as specimen plants. These types of hybrids are non-seasonal and will bloom anytime a growth matures. Normally it takes 18 months to two years for a Maudiae to mature and bloom a growth. The growths set bud and will bloom as soon as the growth is mature, with no rest or wait for a seasonal change. If you allow your Maudiae type hybrid to become a multi-growth plant, it is possible to always have a growth coming up into bloom. This pattern begins to show when your plant has six or more growths in the clump. Try to get your plant up to the point where it needs a 5 inch or more diameter pot to hold all the growths. This is when Maudiae type hybrids will put on the constant show. You might feel so so about the flower of a single growth Paph Maudiae, but when you see

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a specimen plant of Paph Maudiae, say growing in a 6 inch pot, with many growths in various stages of development and 3 or more flowers open, the improvement in flower size, form and quality will be amazing. They are very impressive when well grown as specimen plants.

The genus *Phragmipedium* has many species and hybrids that qualify as ever blooming. Look for hybrids involving *Phrag longifolium, sargentianum, lindleyanum, besseae* and *schlimii*. All these species have inflorescenses that can with good culture produce 20 or more flowers, one or two at a time for a year or more. I personally have witnessed a *Phrag longifolium* whose inflorescence continued to grow and bloom for a full 5 years, yeilding about 35 flowers one or two at a time. *Phrag besseae* and *schlimii* impart branching inflorescences to their offspring, to good effect. A detailed Phragmipedium culture sheet is available at <u>www.schordje.com</u>.

From the Oncidium Alliance we have the Butterfly orchids of the genus Psychopsis which are noted for their inflorescences that will continue to grow and bloom for five or more years. Each flower lasts about two weeks, and is followed about a week or two later by the next flower. This group is one of my favorites. The species are; krameriana, papilio, sanderae, and versteegiana. The intra-generic hybrids are equally good; Mendenhall, Butterfly, Memoria Bill Carter and Mariposa. They seem easy to grow, intermediate temperatures are preferred, light should be a little brighter than for *Phalaenopsis*, about 1200 to 3000 foot-candles of light. Psychopsis like to stay moist for <sup>3</sup>/<sub>4</sub> of the year, they should not be allowed to dry out between watering. Late winter they appreciate a somewhat drier watering schedule, they are easy to grow, and usually will be fine even if you don't remember to give them a dry rest. I have seen *Psychopsis* grown very bright, with Cattleya and Vanda, and grown with hard drying out between waterings, while this does not work for me, I have seen some nice blooming specimens grown by others with this treatment. You can experiment, I keep mine fairly moist year round. With brighter light, the beautiful leaf patterns become very bold. There are free culture sheets for the Psychopsis species at www.orchidculture.com follow menu links to the Free Sheets page.

In the **Cattleya Related Alliance** there is one, choice, widely available ever blooming species, *Broughtonia sanguineae*. It is a compact growing sun loving species from Jamaica. My plant has been in continuous bloom for many years now. Each inflorescence continues to grow and put out flowers for years at a time. To keep a Broughtonia in bloom all you have to do is keep it in bright light, it loves sun. Its hybrids are frequent bloomers, often blooming two or three times a year. Some of the hybrid genera are *Brassotonia, Cookara, Cattleytonia, Diabroughtonia, Hasegawara, Hawkinsara, Laeliocatonia, Otaara*, and *Schombocatonia*. Look for hybrids where *Broughtonia sanguineae* is in the lineage of one of parents. The intergeneric hybrids won't have as many flowers per stem, but they become everblooming as specimens, because they all will bloom as soon as a growth matures.

*Cattleya* (formerly *Sophronitis*) *cernua* is one of the Cattleya Alliance species that blooms as soon as a growth matures, a specimen plant will be in bloom off and on all year round. This trait occurs often in the *Sophronitis* genus, and is passed on to their hybrids. *S. cernua* happens to be more heat tolerant than other members of Sophronitis, so it is the easiest of the group to grow. Most of the complex intergeneric *Cattleya* hybrids that include *Sophronitis* will bloom more than once a year, grown on as specimen plants they definitely can be considered a key part in an ever blooming collection.

The **Pleurothallid Alliance** has quite a few species that are non seasonal ever bloomers, there are a few species in the genus *Pleurothallis* and the other related genera, such as *Lepanthe*, *Stellis*, *Porroglosssum*, *Restrepia*, *Tristelia* and others that have species that could be called ever blooming. I am not very familiar with the *Pleurothalids*, so my recommendation is to

try a few and see how they do. There are some delightful minatures that are very warmth tolerant in this group, take a chance and experiment.

The genus *Masdevallia* has fantastic showy flowers, they are the gems of the Pleurothallid Alliance. *Masdevallia* hybrids in particular tend to be non-seasonal, look for hybrids with *M. glandulosa, constricta, rex, triangularis, tonduzii, infracta* and *M. floribunda* as parents, these tend to be quite rewarding. The Masdevallia hybrids coming out of Hawaii, by & large are temperature tollerant. *Masdevallia infracta* is quite temperature tollerant, and imparts heavy texture to the flowers, and two or more flowers per inflorescence. In fact the only Masdevallia species and hybrids I recommend for south of St Louis, Missouri are *M. infracta* and its hybrids.

The biggest mistake growers make with the *Masdevallia* is not giving them enough light. The assumption is that all *Masdevallia* are cool growers, and in the effort to keep them cool, growers tend to shade them. The majority are actually intermediate growers, and there are a few warm growing species too, *infracta* in particual. Over heating the roots, rather than the leaves seems to be a problem. One trick is to use an empty terra cotta clay pot as a cache pot. The clay pot should be a little taller & a larger diameter than the pot the *Masdevallia* is in. Leave the air space between the two pots empty. The clay pot will shade the plastic pot when the sun is on the leaves, keeping the roots at ambient temperture. If the roots are protected from temperature extreems, the *Masdevallia* will tolerate warmer temperatures than one might expect. This allows you to give them some sun. When grown in light brighter than ideal for *Phalaenopsis*, but a little less light than optimal for *Cattleya*, the *Masdevallia*, especially the hybrids, will bloom repeatedly all year round.

In the **Dendrobium Alliance** there are a number of species with very long lasting flowers. The white flowered New Guinea *Dendrobiums* of the *Laturia* group are famous for having flowers that last six mounths or more. The *Laturia* all like bright light, as much as you would give *Cattleya*, they grow year round with no rest period, easy to grow. Most of the *Laturia* are intermediate growing, a small few need cool. My favorite Laturia is Dendrobium johnsoniae, it is a medium sized plant, 2 to 10 mostly white, fragrant flowers per inflorescence. Its flowers can last in good condition for 4 to 6 months, and to top it off, it can repeat bloom off and on over the year. H & R Orchids of Hawaii has used this species extensively in their Dendrobium hybrids, and some of their hybrids are very nice.

Members of the *Pedilonium & Calytrochilus* sections of **Dendrobium** also have very long lasting flowers, the small very brightly colored flowers are in dense 'brush like' tufts at the end of inflorescences, or in smaller tufts along the length of the canes. *Den. bracteosum, mohlianum, goldschmidtianum, glomeratum, & lawsii* are my favorites.

In the Oxypetalum group there is Dendrobium cuthbertsonii, whose flowers can last upwards of 9 months at a stretch. But the cultural demands of this species make it one that is not for the beginner.

The bulk of the Dendrobium are very sharply seasonal. If you like a Dendrobium, you can be pretty sure that it will bloom at the same time of year, each year every year with good culture. In terms of sharply seasonal, just as one can cover the calendar with Cattleya, one can also do this with just 18 different Dendrobium species.

The **Vanda Alliance** beyond the *Phalaenopsis* have quite a number of neat species & hybrids that send up blooms often. Most *Ascodenda* hybrids (*Ascocentrum* x *Vanda*) bloom more than once a year, especially notable is the often available *Ascodenda* Princess Mikassa. There are a couple all *Ascocentrum* hybrids that are very frequent bloomers, and they are mostly miniatures. I don't have a lot of experience with the Vanda Alliance, but the Vanda intergenerics can be contributors to the 'Everblooming Collection'. One of the Vanda relatives, is the charming miniature *Haraella retrocalla*. It is a delightful & frangrant miniature that blooms continuously

all year round, lovely yellow flowers, marked brown that at 1 inch natural spread are almost half the size of the plant.

There are thousands and thousands of orchid species and hybrids, and many genera that I have not mentioned that include species and hybrids with "Everblooming" traits. Exploring the possibilities can be a life long focus for your orchid collection. There will always be something new to surprise and delight.

Good culture is essential for any of these strategies to work. Kick your horticultural skills up a notch, you will be rewarded with significantly more flowers. It is also important to remember, most nurseries sell young plants. Most of the best of the ever blooming orchids will not become ever blooming until they are mature plants, sometimes years after the first blooming. Give your plants a chance to grow and mature and enjoy what they can do. This is a hobby for today and for the long term future. Enjoy and expore the possibilities.