

Vandaceous Orchids



Vanda Robert's Delight

The Genus Vanda is one of the most popular groups of Orchids grown. Extensive hybridizing has been done within the genus and with other genera to produce orchids of exceptional beauty. There are three distinct groups of Vandas which are easily distinguished by the shape of their leaves.

Strap-leaf Vanda has rather flat, broad leaves growing close together, alternating on the right and left sides to give a beautifully symmetrical plant. The flower stems also alternate sides, coming from the axils of the leaves on the upper part of the plant.

Terete-leaf has cylindrical leaves, shaped like and about the thickness of a pencil on mature plants. These leaves grow to four to six inches long and are sharp or blunt tipped, with their bases encircling the stem. The flower stems appear on the side of the stem opposite the leaf. They are sun loving Orchids.

Semi-terete Vanda is a hybrid between the Strap-leaf and Terete-leaf Vandas and the leaves are somewhat in between. These orchids require bright light, and upon hardening can be grown in full sun, so are ideal for landscaping in frost free areas. They will reward you with multi-spikes of beautifully coloured blooms several times a year.

Light

Adult strap-leaf Vandaceous orchids require 60/65% shade and will grow and flower regularly; the best containers to grow them in are wooden baskets or clay pots. The semi-terete types require a little more light so they need to have a 50% shade, also the northern wall should also be made of 50% shade cloth. This also lets in further light. It does appear that Vandas do a lot better under black shade cloth than any other colour.

Air Movement and Humidity

The air should be buoyant and moist. You may well ask how to obtain and retain good air movement as well as providing high humidity. Orchids appreciate having moisture around them but not on them. It has been found hanging (Old Man's Beard) around the baskets and clay pots and letting it drape down with and below the root system of the plant, is very beneficial. The old man's beard catches the water and fertilizer, keeping moisture close to the plant but not directly on the plant itself.

In a fairly large and open shade-house, bromeliads, placed under the benches and hanging plants are also very handy to assist in maintaining moisture in the atmosphere, hence maintaining the humidity within the shade-house.

Vandaceous orchids require plenty of fresh air. Carbon Dioxide and Oxygen enter and are released through the stomata in the leaves, and as this exchange or transpiration only occurs in Vandaceous orchids at night, good air movement both day and night is essential. Carbon dioxide is used by the plant in the process of photosynthesis, in which water and nutrients form sugars, the plant foods. The process of photosynthesis is carried out only in the presence of light.



V Crownfox 'Gigi Magic'

Temperature

The majority of Vandaceous orchids thrive when the temperature fluctuates between 10C night time minimum in the winter, and 35C day time maximum in the summer. Vanda orchids however can tolerate much greater extremes.

Vanda orchids are very intolerant of long hot periods. This is when it is very important to keep the humidity up to your plants, perhaps by watering the "Old Man's Beard" which has been draped around the root system, and by watering the floor, by doing this you will lower the temperature in the shade-house as well as creating extra humidity.

Water

Vandaceous plants depend heavily on good quality water. As they have a monopodial growth habit, the plants cannot retain water for any great length of time. It is advisable at all times to water these plants as early in the morning as possible, so that by noon the foliage of the plants will be dry. Water left on the plant in the middle of the day will cause sun burn. This can be a serious problem if it occurs in the crown of the plant. Orchids do not appreciate being wet and cold, so water your plants in the winter time only on bright and clear mornings. Adult plants are watered once a week in the winter time and every day during the summer.

Young seedlings in community pots or 50mm tubes are grown under Alsynite and are watered every day when the weather is warm to hot, and once a week in the depth of winter. Always put your plants to bed dry.



Vanda hindsii

Fertilizer

Vandaceous orchids are very hungry plants. During the growing period, in general this would be from September to the end of March. The adult plants are fed once a week as follows: for two weeks use a well balanced fertilizer and the following week use a low nitrogen fertilizer. For young seedlings use a well balanced fertilizer for three weeks and the following week use a low nitrogen fertilizer.

During the dormant period, when the weather starts getting cooler and the daylight hours shorten, reduce the food to your plants. Adult plants are fed only once a fortnight with a low nitrogen fertilizer in order to keep the root system plump. The young seedlings feed only once a fortnight, rotating a balanced fertilizer with a low nitrogen fertilizer.

Fertilizer which are recommended to use are;-

Peter's Orchid Special **18 N - 7.8 P - 14.9 K**

Peter's Blossom Special **10 N - 13.1 P - 16.6 K**

Using this fertilizing program promotes strong healthy new growths which are not prone to disease.

Potting Media

When potting Vandas from flask or community pots, use 60% bark, 30% washed charcoal and 10% polystyrene. When the plants have outgrown their 50mm tubes, they are either potted into 115mm plastic pots which have excellent drainage or if the plants are growing well, put them directly into baskets or clay pots which have plenty of holes. In 115mm pots use 60% bark, 30% coarse washed charcoal and 10% larger chunks of polystyrene. In baskets or clay extra coarse bark is used, charcoal and polystyrene is used to support the plants until the roots have gripped the container, then it is a good idea to tip out any surplus media as it is no longer required. This assists Vandaceous orchids by providing plenty of good air circulation around the roots. When you tip out the surplus potting mix, it is a good time to put Old Man's Beard loosely around the top of the basket or clay pot and exposed root system.



V Fuchs Fortune

Pests and Diseases

Observation is the key word. Observe your plants when watering and fertilizing. Keep a sharp eye out for any abnormalities in appearance for performance in your plants. Isolate these plants when located, identify the problem and then deal with it immediately.



Fungus and bacterial diseases are usually noticed as a collapse of the plant tissue, frequently with water soaked appearance. Depending on the disease, it may attack the leaves, the stem or the root system. These diseases require high humidity to survive. Some appear with high humidity and low temperatures, while other types are not activated until the temperatures are relatively high.

Discourage these diseases by watering you orchids as early as possible in the morning so when the temperature reaches its peak, your plants will be dry and will remain so as the temperature falls at night.

V Keeree's Blue 'Sapphire Show'

Fungal and bacterial problems can be kept to a minimum with good house keeping, no debris left under the benches, good air circulation around your plants, and regular spraying with a preventative fungicide to protect your plants against infection.

Great success had been obtained with Kocide, which is a copper based powder. A dosage of 1.5 grams per litre, and mist only on dry foliage, then let the plants dry off for a minimum of two days. There should be no run off onto the root system. Kocide used twice a year should be ideal.

Some General Hints

The best fertilizing program in the world will not compensate for poor growing conditions. When Vandaceous orchids are poorly grown or carelessly handled, they will fall victim to insects or disease, however with reasonable attention given to their basic needs, their troubles will be few.

By Ros Xerri

These notes have been used at our New Grower's Meetings. They are from various sources and we thank the authors. All articles are supplied in good faith and the Bribie Island Orchid Society and its members will not be held responsible for any loss or damage.