

Greenhouses

Most greenhouses that are already established for the cultivation of tropical plants (high humidity and stabilized temperatures) make ideal environments in which to grow *Nepenthes*. Due to their different requirements, highland and lowland species are best maintained in separate greenhouses (see temperature, below).

Terrariums

An aquarium or similar glass tank can make an excellent growing chamber for keeping a small collection of tropical plants and is surprisingly easy to maintain. *Nepenthes* thrive in the high humidity that a terrarium provides and most species will rapidly outgrow even large tanks. Lighting is best provided by several fluorescent tubes (any broad-spectrum brand works well) positioned directly on the lid of the tank.

Houseplants

An increasing number of plant collectors have been finding that, with proper care, many *Nepenthes* may be grown as houseplants on sunny windowsills. In addition to catching a few annoying houseflies, a healthy plant with pitchers makes a fascinating addition to the windowsill garden. Those species of *Nepenthes* which can tolerate relatively dry air and temperature fluctuations seem to perform best indoors. Good candidates include: *N. alata*, *N. maxima*, *N. tobaica*, *N. ventricosa*, and various hybrids. It is very important to insure that plants grown indoors receive adequate light and humidity. Plants should only be kept on bright windowsills which receive a minimum of 3 hours direct sun each day. Additional humidity can be provided by frequent spraying with pure water.

Outdoors

Depending upon local climate conditions, *Nepenthes* can make suitable plants for the patio or outdoor garden seasonally or year-round. In temperate areas which receive regular cool and foggy weather, some highland species can be grown. Success has been achieved with *N. ventricosa*, *N. alata*, and others. The plants should be kept in a moderately sheltered (50% shaded) area, sprayed and protected from frost. Growers in tropical climates can cultivate lowland *Nepenthes* species outdoors year-round.

Containers

Nepenthes can be grown in a variety of containers, but plastic pots are generally preferred because they are economical, lightweight, and come in a great range of sizes. Most *Nepenthes* will do well in a one-gallon pot, but some of the larger species (*N. bicalcarata*, *N. merrilliana* ,

N. sumatrana

, others) require containers of 4-5 gallons to reach full size. Seedlings and young plants can be grown in 4-6 inch pots or trays. Clay pots, though attractive, are avoided by many growers due to the belief that they accumulate harmful salts and chemicals. However, experience shows that healthy *Nepenthes* can be grown for many years in clay pots, especially if they are given high-quality pure water. Containers should always have sufficient holes to permit rapid drainage and good soil aeration. Hanging baskets and pots are an excellent way to display larger specimens, and allows for the trailing vines and tendrils to grow without support.

Soil

In the wild *Nepenthes* grow on a wide range of substrates ranging from clay soil to mossy tree trunks. Fortunately, it is usually not necessary to duplicate these conditions in cultivation and a single general compost with few variations will suffice for most species. A suitable potting media for *Nepenthes* should be well-drained, slightly acidic and poor in nutrients. Most growers prefer to

mix their own. A simple well-balanced mix can be made by combining equal parts of organic and inorganic ingredients. These provide some moisture retention whilst being low in pH and relatively nutrient-free. Inorganic materials such as pumice, perlite, sand, granite chips, and clay pellets help to increase drainage and soil aeration, which is an important factor in the growth of healthy *Nepenthes* roots. The addition of one part charcoal chips assists in aeration and may aid in preventing stagnant media.