# **Greenhouse Gardening Tips**

Anyone who has done gardening in the open will be applying their knowledge to the greenhouse, just altering it a little to garden under glass. A greenhouse is not always a "hot house", as it is sometimes called. Plants usually do their best at temperatures slightly lower and with a much higher humidity than is usually maintained in our houses. A small greenhouse can have its temperature regulated relatively easy.

There are six main reasons an amateur uses a greenhouse:

- (1) Raising plants for winter use.
- (2) Holding over garden plants to be used as "parent" plants next season.
- (3) Getting an early start for tender plants started from seed.
- (4) Increasing the possibilities of a greater variety and continuous supply.
- (5) Easier culture of small vegetables for winter use.
- (6) To propagate, and experiment with various plants as a hobby, or to develop new varieties.

### **Choosing A Site For Your Greenhouse**

Choose a level, clean site in a low-traffic area. Your greenhouse should receive the maximum amount of winter sunlight available. Be sure to consider the following:

- the change in angle of the sun between summer and winter
- shadows cast by existing structures and/or trees
- growing trees: will they shade the greenhouse in the future?
- existing deciduous trees will allow winter sun; evergreens will not

If possible, align your greenhouse with the long side facing south, for two reasons:

- the angle of the roof is engineered for catching the maximum amount of the sun's rays in the winter with the least amount of loss by reflection.
- if you end up using shadecloth during the warm days in spring and summer, you will need to shade only one side, instead of both sides

#### Light

Orient your greenhouse so that the sun will reach it the maximum number of hours during each day. The most important time for the sun to reach any greenhouse is during the spring and fall when the sun is lowest in the southern sky. Find the place where there is clearing towards the southeast through the southwest or as much sun is available.

### Workspace

Your greenhouse interior should allow enough room for potting plants and moving about comfortably. Also take into consideration the height of the benches and tables you plan to use. If you want a sink, where will you put it? Will you have storage space for tools? All of these questions should be dealt with before you begin to build your greenhouse.

Potting benches can be designed to fold down when not in use. They're usually slotted so dirt can fall to a collection bin below. Redwood is a good choice for the interior benches, but if you're concerned about the use of this wood, ask your local lumber yard about other rot-resistant woods. Avoid pressure-treated lumbers, since they are impregnated with highly toxic arsenic. To make the job easier, try a do-it-yourself bench kit with aluminum framework pieces-just add wood.

### **Temperature**

The more sun that is provided, the more heat the greenhouse will produce. The more heat is produced the more need you will have to provide ventilation. Place a thermometer in the shade near the middle of your greenhouse and monitor the temperature at different times during sunny and cloudy weather. If the temperature is reaching 80 degrees-90 degrees or higher and the plants you are growing need a moderate range of 60 degrees-70 degrees then you will have to compensate by ventilating. The temperature readings you record should be used to determine what plants you can grow, when.

#### Ventilation

Adequate ventilation is achieved when air can freely circulate among the plants. Spread your plants evenly throughout the greenhouse, rather than jamming them all onto one bench, so the air is distributed evenly. Greenhouses overheat easily, and in the middle of summer in the southern part of the US, you're more likely to cook your plants than to nurture them if you don't have a way to get rid of the excess heat. Choose your ventilation system by which region you live in and the size and design of your greenhouse.

The simplest option is to open up one or both doors in the morning depending on the weather report and leave them open until late afternoon. This will allow frost protection at night and some increased warming during the day.

Another alternative for cooling is the simple principle of water evaporation. Hose down your greenhouse floor and open your ceiling vents, and the entire unit will cool down quickly.

## **Soil And Irrigation**

Commercial potting soil is good for the average home garden greenhouse, especially if you're growing veggies in large beds rather than smaller houseplant pots. These soil mixtures should include sand, peat moss, perlite, vermiculite, and fir bark for adequate drainage.

The only time you need to water is when the soil is dry. Over watering in a climate-controlled greenhouse environment has been the death of many a plant or seedling. While many greenhouse owners prefer the control of hand watering, drip irrigation systems are effective and also prevent the leaves from getting too much water on them. Drip systems are gentle on seedlings, too.

You may not need to water every day. It's wise to study the water requirements of your particular greenhouse and document your regime in a gardening notebook. This makes it easier for a friend or neighbor to take care of your plants when you're busy or out of town.

#### Maintenance

Each type of greenhouse will have its own maintenance requirements. One general rule is to regularly disinfect the entire greenhouse-with a scrub brush and a mixture of diluted bleach, being careful not to get any on your plants. Open up any vents to let the fumes out, scrub down all the walls and floor, then rinse with clean water.

Periodically, between disinfectings, spray the walls and corners with a hose set on the jet nozzle. This will keep the spider mites and whiteflies to a minimum.

## **Produce Tips**

Carrots, beets, turnips, and other root crops do well in deep boxes which fit well under benches.

Tomatoes, peas, cucumbers, and pole beans need tub-type containers. Lettuce, or other low leafy vegetables may be planted in the tub with the taller vegetables.

For corn, you've never seen the likes of, plant directly in the floor of the greenhouse, in a bed prepared for it. Plant pumpkin between the rows of corn to save space.

Water your indoor plants with room temperature water, so not to injure your plants. Tap water should stand for 1 day to rid water of chlorine. This will avoid brown tips on plants.

For good drainage, use any of the following in the bottom of your boxes or pots: broken clay pots, cracked walnuts, marbles, charcoal, or gravel. Clay pots should be soaked in water a few minutes before using. This will prevent the clay from absorbing the moisture from the potting soil.

Indoor trellises can be made out of coat hangers. Bend to any shape you desire (heart, star, or other) and insert into pot.

Herbs are nature's insecticides. Be sure to include a variety of them in your garden. Make an effective and natural insecticide by adding onions and garlic to a jar of water. Let it stand for a week and then spray your plants.

Throw crushed egg shells on your garden for plant growth. To add acid to the ground, use dried coffee grounds.

Rinse vegetables and fruits outside before bringing them into your home. Place chicken wire over a wooden box that the bottom has been cut out of. Rinse the vegetables with your garden hose. The dirt and bugs will stay outdoors and your kitchen will stay clean.