

The best definition of an Herb is “a useful plant.” Many plants which are today known and grown purely as ornamentals were historically used for medicinal or other purposes.

Various species are used in medicines or beverages. For example, Lavandula varieties are grown for their looks, and as an oil crop for the cosmetics industry. Salvia cultivars star in the flower garden and the kitchen garden.

The Herb market is composed of many small players who grow herbs almost exclusively, and of larger growers who include herbs as a sideline to perennial or vegetable production.

### General Culture

**Potting and Spacing:** Root media must be well drained and should rewet easily when dry. Avoid media with high water holding capacity (e.g., those with a high percentage of peat), which tend to foster crown and root rots. Choose media with the appropriate texture for the finishing container. Large-particle bark media are not suitable for small pots. Optimum pH is 6.0 to 6.5.

Herbs are generally produced in 3½” to 4½” containers. One liner per pot is sufficient. Six-inch or gallon containers can also be used, if you have a market for larger pots. Multiple liners are often used in larger pots for a faster finish. More time and pinching are needed with only one liner. Plant liners level with the root medium surface.

Spacing of containers is generally not required since the production period is relatively short. However if sales are delayed, spacing (one-half to one pot space between pots) will be necessary.

## Important Herbs

**Basil:** Our ‘Kasar’ is for ornamental as well as culinary use.

**French Tarragon:** From cuttings, not seeds. Ours is the real thing.

**Lavender:** Perennial; use ‘Blue Cushion’, ‘Hidcote’ or ‘Munstead’.

**Mints:** All types for every taste.

**Oregano, Greek and Italian:** You usually have to have both.

**Rosemary:** ‘Arp’ and ‘Prostratus’ are popular; often trained on forms.

**Sage:** A wise addition to any Herb mix. Great for combination pots.

**Thyme:** Lemon Thyme is especially popular.

**Pinching:** Liners may have been trimmed during our production at some point prior to shipment, but not always. Use your “grower sense” to evaluate plants and pinch liners at planting if needed or within one week after planting for bushier plants and to help control height. Herbs that benefit from pinching are Basil, French Tarragon, Mints, Italian Oregano and Sages (especially Pineapple Sage).

### Fertilization and Irrigation:

Nutrient requirements are relatively low. Apply 100 to 150 ppm nitrogen every third irrigation from a complete N-P-K fertilizer with micronutrients that contains the majority of nitrogen in the nitrate form. Often a low rate of controlled release fertilizer like Osmocote or Nutricote is incorporated into the root medium at planting. Avoid overfertilization, which can cause elongated, soft growth, since no growth regulators are registered for height control.

Allow plants to dry between irrigations. Slight water stress can help control height but don’t allow excessive wilting. Avoid overwatering to prevent root and crown rots.

**Light and Temperature:** Use maximum available light intensity for best growth. Lavender, Rosemary and Tarragon grow best with natural long days. Most herbs are produced with night temperatures between 55° and 60°F. Day temperatures are normally 5° to 10°F higher. Use cooler day temperatures (low DIF) when possible to help control height. An exception is Basil, which needs warmer temperatures to prevent leaf discoloration.

**Overwintering:** Six-inch or gallon containers could be overwintered to enhance flowering (Lavender) or bushiness (Rosemary, French Tarragon) of finished plants the following year. Smaller pots should not be overwintered since losses are more likely to occur. Overwinter in protected structures at 35° to 40°F.

**Pests and Diseases:** It’s no surprise that few pesticides are registered for use on Herbs since they are often intended for human consumption. Since pesticides are limited, prevention is critical. Scout crops often to detect pests. Eliminate weeds in and around the growing area. Use proper watering practices and sanitation to reduce algae formation.

**Following are key pests and chemicals, which have been used for control.**

**Aphids:** Azatin XL, BotaniGard, Cinnamite (may be phytotoxic), M-Pede (or insecticidal soap), Ornazin, Pyrethrum TR 1100, Pyreth-it, Sunspray Ultra-Fine Spray Oil.

**Two-spotted spider mites:** Cinnamite (may be phytotoxic), M-Pede (or insecticidal soap), Pyrethrum TR 1100, Sunspray Ultra-Fine Spray Oil.

**Whiteflies:** Azatin XL, BotaniGard, M-Pede (or insecticidal soap), Ornazin, Pyrethrum TR 1100, Pyreth-it, Sunspray Ultra-Fine Spray Oil.

Diseases also plague herbs. Some crops and their disease sensitivity (in parentheses) are Basil (Fusarium), Sage (Rhizoctonia) and Mints/Rosemary (powdery mildew). Botrytis can also cause problems during cool, wet weather. Very few disease control pesticides are available for use with Herbs. Some registered products include Sunspray Ultra-Fine Spray Oil, Cinnamite (powdery mildew), Companion (biological fungicide), RootShield (crown and root rot) and ZeroTol (surface disinfectant). The best approach to disease control

## Scheduling

Approximate time required to finish 3½" to 4½" pots for early April sales in USDA Hardiness Zones 5b to 6b, using one 72 liner per pot and 55° to 60°F night temperature. Add 1 to 2 weeks if using 128 liners. Add 1 week to finish in March, subtract 1 week if finishing in May. Finishing times can vary depending on the Herb, light, temperature and specific grower culture.

**Basil:** 4 weeks

**Chives:** 4 weeks

**French Tarragon:** 6 weeks

**Lavender:** 7 weeks ('Hidcote', 'Munstead')

**Lavender:** 12 weeks ('Blue Cushion')

**Mints:** 3 weeks

**Oregano:** 4 weeks

**Rosemary:** 8 weeks

**Sage:** 4 weeks

**Thyme:** 4 weeks

is prevention. Good sanitation and discarding diseased plants is important. It is also critical to control the environment. Heat and ventilate moist air at the end of the day to reduce relative humidity over night. Use horizontal air flow fans to improve air circulation. ***Before using any pesticides, be sure that they are registered in your state. Check with your local county extension agent or state university extension service. See label for use rates and application methods. Always follow label directions.***



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