

UK COOPERATIVE EXTENSION SERVICE

UNIVERSITY OF KENTUCKY — COLLEGE OF AGRICULTURE

Catnip

Introduction

Catnip (*Nepeta cataria*), best known as a stimulant for cats, is a perennial herb in the mint family (Labiatae). Cats, both domestic and wild, are attracted to catnip mainly due to a compound known as nepetalactone present in plant tissues.

In addition, catnip has several properties beneficial to humans. Once used as a folk remedy for a wide variety of medical problems, today catnip's essential oils are used in a number of pharmaceutical products and dietary supplements. For example, catnip contains thymol, a compound that can be used as antiseptic. Additionally, catnip extract has a mild anti-spasmodic effect which reduces muscle cramps. Leaves and stems are used in herbal tea mixtures and as flavorings in foods. Researchers have also found that catnip contains several chemicals (cintonellal, citral, carvacrol, and pulegone) that repel insects; thymol has fungicidal properties.

Marketing

Catnip is primarily marketed for cats in stuffed toys, catnip filled balls, compressed pellets, and in shaker bottles. Marketing possibilities include farmers markets, pet stores, and higher-end retail stores. Growers should have an established market available before beginning production.



Market Outlook

Strong marketing skills are essential for success with a niche product like catnip. Most commercial catnip for toys is of a lower grade, consisting of dried, ground-up stalks, as well as leaves. However, the most aromatic portions of the plant are the blossoms and leaves. Savvy growers may be able to develop a market for a higher grade product, especially if well-packaged to retain freshness, and therefore, potency. Organic growers with an existing consumer

base that prefers organic goods may also have a distinct marketing advantage.

Wholesale markets for herbs are difficult to break into. Potential wholesale producers would need to have a marketing agreement in line before producing large amounts of a thinly traded crop like catnip. Producers with creativity and good marketing skills may be able to capture a niche of the pet supplies market, which comprises about 20 percent of the more than \$30 billion that U.S. pet owners spend on their animals.

Production Considerations

Site selection and planting

Catnip prefers sites with full sun, well-drained soil, and adequate moisture. This herb can be seeded and grown in a greenhouse or hotbed until plants are the proper size for transplanting.



Greenhouse float beds and transplanters designed for tobacco production could be used for catnip. Plants are then transplanted to the field mechanically or by hand once all danger of frost has passed. Small seed size, slow germination, along with a poor ability to compete with weeds makes direct-seeding to the field difficult.

Catnip is a moderate nitrogen feeder, so a pre-plant broadcast of nitrogen is recommended. Additional applications can be sidedressed after harvest to speed regrowth.

Pest management

Since catnip contains chemical compounds that discourage insect feeding and fungal growth, it has few insect and disease problems. Weeds are the greatest threat to production because catnip is a poor competitor with other plants. Because there are no herbicides labeled for this crop, hand weeding, and cultivation are the main techniques for weed control.

Harvest

Catnip is ready to harvest at full bloom when aromatic properties are at their peak. Stems are cut a few inches above the crown in order to allow for plant regrowth. Generally, plantings may be cut twice (mid-summer and fall) during the growing season. Cutting can be accomplished by hand or with a side bar cutter mower. Some growers gather the crop using a standard baler once stems have dried sufficiently. Harvested plants are dried naturally in the shade or with an artificial dryer. Further drying and processing may be required, depending on the buyer and use.

Labor requirements

Labor needs per 1/5 acre are approximately 64 hours for production, 52 hours for harvest, and 6 hours for processing.

Economic Considerations

A crop to be niche-marketed directly to the consumer will demand very low amounts of land

and capital, likely less than 1/4-acre and \$1,000 in operating expenses. There is a small wholesale market for catnip. No amount of any crop should be grown without first having a marketing plan prepared.

Initial investments include land preparation, purchase of seed, transplant production, and plant establishment. The most significant cash outlay for the small-scale producer will be the purchase of seed. Two-year production costs for 1/5 acre of catnip in Kentucky would be \$500 to \$900, depending on the amount of hand weeding and cultivation required. Hand-harvest and marketing costs are estimated at \$820 per 1/5 acre. Total expenses, including both variable and fixed, would be approximately \$1,950 for 1/5 acre over 2 years. Presuming wholesale returns of \$2,240, returns to operator labor, land, capital, and management would be approximately \$110 per 1/5 acre. Certified organic production or niche direct marketing of catnip products could generate two to three times the profit.

Selected Resources

- Selected Internet Resources for Herb Marketing (University of Kentucky, 2005)
<http://www.uky.edu/Ag/NewCrops/herbmarketing.pdf>
- Catnip (Virginia Tech, 2001)
<http://www.sfp.forprod.vt.edu/factsheets/catnip.pdf>
- Certified Organic Versus Non-Organic Budgets for Catnip Herb (British Columbia Ministry of Agriculture, Food, and Fisheries, 2002)
http://www.agf.gov.bc.ca/busmgmt/budgets/budget_pdf/specialty_organic/CatnipWin.pdf
- Production of Catnip as a Commercial Crop (University of Maryland, 2008)
<http://www.calvertag.org/News/CatnipProductionJune2008.pdf>
- Production of Catnip in North Carolina (North Carolina State University, 1990)
<http://www.hort.purdue.edu/newcrop/proceedings1990/V1-527.html>