

VEGETABLE GARDEN PLANTING GUIDE

Vegetable Gardens



By
Charles Marr
Extension Specialist

A well-planned, properly tended vegetable garden can provide not only an excellent source of fresh, nutritious vegetables, but also relaxation and enjoyment for the entire family. With a few simple tools, a little space, and a

desire to assist nature in plant growth, anyone can be a successful home gardener. This publication is a brief guide to vegetable gardening planting information.

Vegetable Yields

Vegetables	Average crop expected per 100 feet	Approximately planting per person
Asparagus	30 lb.	10-15 plants
Beans, snap bush	120 lb.	15-16 feet
Beans, snap pole	150 lb.	5-6 feet
Beans, Lima bush	25 lb. shelled	10-15 feet
Beans, Lima pole	50 lb. shelled	5-6 feet
Beets	150 lb.	5-10 feet
Broccoli	100 lb.	3-5 plants
Brussels sprouts	75 lb.	2-5 plants
Cabbage	150 lb.	3-4 plants
Cabbage, Chinese	80 heads	3-10 feet
Carrots	100 lb.	5-10 feet
Cauliflower	100 lb.	3-5 plants
Celeriac	60 lb.	5 feet
Celery	180 stalks	10 stalks
Chard, Swiss	75 lb.	3-5 plants
Collards and kale	100 lb.	5-10 feet
Corn, sweet	10 dozen	10-15 feet
Cucumbers	120 lb.	1-2 hills
Eggplant	100 lb.	2-3 plants
Garlic	40 lb.	1-5 feet
Kohlrabi	75 lb.	3-5 feet
Lettuce, head	100 heads	10 feet
Lettuce, leaf	50 lb.	10 feet

Vegetable Yields

Vegetables	Average crop expected per 100 feet	Approximately planting per person
Muskmelon (cantaloupe)	100 fruits	3-5 hills
Mustard	100 lb.	5-10 feet
Okra	100 lb.	4-6 feet
Onions (plants or sets)	100 lb.	3-5 feet
Onions (seed)	100 lb.	3-5 feet
Parsley	30 lb.	1-3 feet
Parsnips	100 lb.	5 feet
Peas, English	20 lb.	15-20 feet
Peas, southern	40 lb.	10-15 feet
Peppers	60 lb.	3-5 plants
Potatoes, Irish	100 lb.	50-100 feet
Potatoes, Sweet	100 lb.	5-10 plants
Pumpkins	100 lb.	1-2 hills
Radishes	100 bunches	3-5 feet
Salsify	100 lb.	5 feet
Soybeans	20 lb.	50 feet
Spinach	40-50 lb.	5-10 feet
Squash, summer	150 lb.	2-3 hills
Squash, winter	100 lb.	1-3 hills
Tomatoes	100 lb.	3-5 plants
Turnip greens	50-100 lb.	5-10 feet
Turnip roots	50-100 lb.	5-10 feet
Watermelon	40 fruits	2-4 hills

Vegetable Crop Information

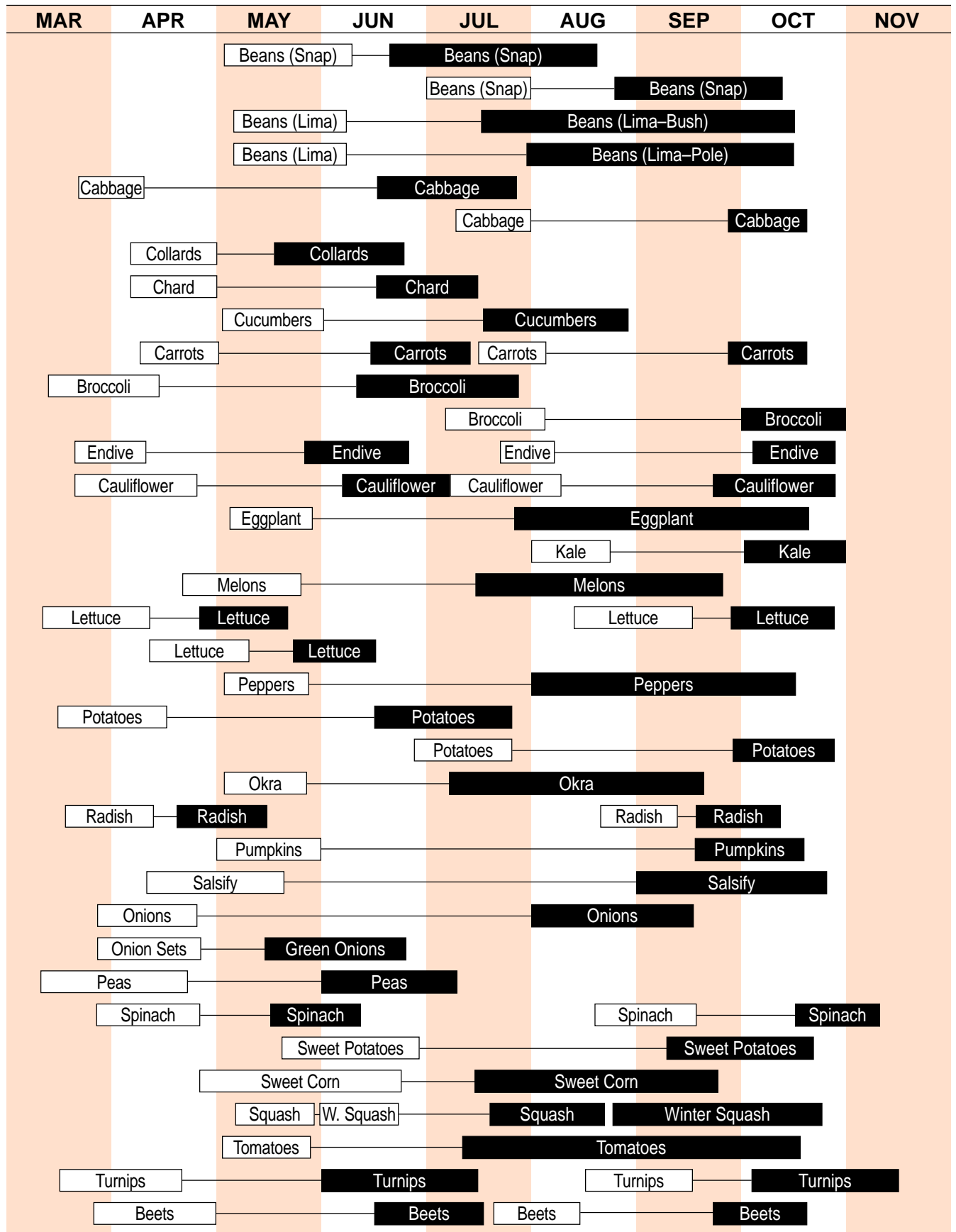
Crop	Type of Planting	Days to First Harvest	Plants or Seeds Per 100' Row	Days to Germinate	Optimum Temperature (F)	Depth of Planting (In.)	Avg. Spacing Within Row (In.)	Avg. Spacing Between Rows (In.)	Frost Resistance
Asparagus	Perennial (Crowns)	2nd Season	75	—	—	8	18	48	Hardy
Asparagus	Seed (Transplant)	4th Season	2 oz.	10–20	65–75	1	3	6	Hardy
Rhubarb	Perennial (Crowns)	2nd Season	30	—	—	1	36	35–48	Hardy
Beans Snap	Seeded	50–60	½ lb.	5–8	70–85	2	3–4	36	Tender
Beans—Lima	Seeded	65–75	½ lb.	5–8	75–85	2	4–8	36	Tender
Beets	Seeded	55–65	2 oz.	7–10	50–60	½	2–4	18	Half-Hardy
Broccoli	Seed or Transplant	60–80*	½ oz. or 75	(6–8)	(50–60)	(½)	18–24	36	Hardy
Brussels Sprouts	Seed or Transplant	85–95*	½ oz. or 100	(6–8)	(50–60)	(½)	12–18	36	Hardy
Cabbage	Seed or Transplant	65–80*	½ oz. or 75	(6–8)	(50–60)	(½)	12–18	36	Hardy
Chinese Cabbage	Seeded	80–90	¼ oz.	5–7	55–70	½	10–12	36	Hardy
Carrots	Seeded	70–80	1 oz.	10–12	55–70	½	2–3	18	Half-Hardy
Cauliflower	Seed or Transplant	85–100*	½ oz. or 75	(6–8)	(55–70)	(½)	18–24	36	Half-Hardy
Cucumbers	Seed or Plants	60–65	½ oz.	5–8	75–85	½–1	10–48	48–72	Very Tender
Eggplant	Transplants	75–90*	50 plants	(8–12)	(75–85)	—	18–24	36	Very Tender
Garlic	Sets	140–160	3 lbs.	—	—	1	4–6	18–36	Hardy
Horseradish	Roots	Fall	75–100 roots	—	—	3–4	12–18	36	Hardy
Kale	Seeded	60–90	1 oz.	6–9	50–60	½	2–4	36	Hardy
Kohlrabi	Seed or Transplant	60–75	¼ oz.	(6–8)	(50–60)	(½)	5–6	18–24	Hardy
Lettuce (Seed)	Seeded	45–50	½ oz.	6–8	50–70	¼	2–4	18–24	Half-Hardy
Lettuce (Plants)	Transplants	35–45	100–200 plants	(6–8)	(50–70)	(¼)	2–4	18–24	Half-Hardy
Head Lettuce	Seed or Transplants	60–85*	1½ oz. or 75	6–8	60–70	½	12–15	18–24	Half-Hardy
Muskmelon	Seed or Plants	80–90	½ oz.	7–12	75–85	1–1½	48–72	48–72	Very Tender
Mustard	Seeded	50–60	¼	6–8	50–60	½	2–4	18–24	Hardy
Onion (Sets)	Sets	100–120	2 qts.	—	—	1½–2	3–4	12–24	Hardy
Onion (Plants)	Transplants	100–120*	300 plants	—	—	1½–2	3–4	12–24	Hardy
Okra	Seeded	50–60	2 oz.	6–12	75–85	½	18–24	36	Tender
Parsley	Seeded	60–70	½	8–10	55–70	½	2–4	18–24	Half-Hardy
Parsnip	Seeded	Fall	½ oz.	10–12	55–70	¼–½	3–4	18–24	Half-Hardy
Peas	Seeded	60–80	1 lb.	7–10	50–65	2	1–2	12–24	Hardy
Peppers	Transplants	65–80*	50 plants	(10–14)	(75–85)	(½)	18–24	36	Tender
Potatoes	Tuber Pieces	70–90	10 lbs.	—	50–60	2–3	8–12	36	Half-Hardy
Pumpkin	Seeded	110–130	1 oz.	7–10	75–85	1	72–90	72–90	Half-Tender
Radish	Seeded	25–30	1 oz.	4–6	50–60	½	2–3	12–18	Hardy
Rutabaga	Seeded	90–120	½ oz.	5–10	50–60	½	4–6	18–24	Hardy
Salsify	Seeded	140–150	1 oz.	8–12	55–70	½	2–3	12–18	Half-Hardy
Spinach	Seeded	40–45	2 oz.	9–12	55–70	1	2–3	12–18	Half-Hardy
Squash—Summer	Seeded	50–55	1 oz.	7–10	75–85	1	36–48	48–72	Very Tender
Squash—Winter	Seeded	50–55	1 oz.	7–10	75–85	1	60–72	96	Very Tender
Sweet Corn	Seeded	80–100	½ lb.	6–8	70–80	2	14–18	36	Tender
Sweetpotatoes	Plants	130–140	75–100 plants	—	—	—	12–16	36–48	Very Tender
Swiss Chard	Seeded	50–60	1 oz.	9–12	55–70	½–1	6–8	18–24	Half-Tender
Tomato	Transplants	70–85	30–60 plants	(7–10)	(75–85)	(½)	24–48	36–48	Tender
Tomato	Direct Seeded	80–95	¼ oz.	7–10	75–85	½	24–48	36–42	Tender
Turnips	Seeded	45–65	1 oz.	5–10	60–70	½	3–4	12–18	Hardy
Watermelon	Seeded	80–90	1 oz.	8–12	80–90	1–2	72–90	72–90	Very Tender

() = Seeding information for hotbed; allow 6–8 weeks in hotbed or greenhouse.

* From date of transplanting.

Vegetable Garden Calendar

Plant **Harvest**



Common Garden Problems

Symptom	Possible Causes	Corrective Measures
Plants stunted in growth; yellow color	Lack of soil fertility or soil pH abnormal	Use fertilizer and correct pH according to soil test. Use 3 to 4 pounds of complete fertilizer per 100 square feet in absence of soil test.
	Plants growing in compacted, poorly-drained soil.	Modify soil with organic matter or coarse sand.
	Insect or disease damage	Use a regular spray or dust program.
	Poor-quality seed or plants	Use high-quality seed or plants of recommended varieties.
Plants stunted in growth; sickly, purplish color	Low temperature	Plant at proper time. Don't use light-colored mulch too early in the season.
Holes in leaves; leaves yellowish and drooping, or distorted in shape	Insect damage	Use recommended insecticides.
Plant leaves with spots; dead, dried areas; or powdery or rusty areas	Plant disease	Use resistant varieties, remove diseased plants when they are noticed, and use a regular spray.
Plants wilt even though water is present	Soluble salts too high or root system damage	Have soil tested. Use soil insecticides.
Plants with weak root systems	Poor drainage	Use organic matter or sand in soil.
	Insect or nematode damage	Use recommended varieties and soil insecticides.
Plants tall, spindly and unproductive	Excessive shade	Relocate to sunny area. Keep weeds down.
	Excessive nitrogen	Reduce applications of nitrogen
Blossom drop	Hot, dry periods	Use mulch and water.
	Low night temperatures	Avoid planting too early in spring.
	Overwatering or disease	Stop watering or use regular spray program.
Tomato leaf roll	Excessive pruning or soil moisture fluctuations	Remove suckers when small. Use mulches.
Leathery, dry, brown blemish on the blossom end of tomato fruit	Blossom end rot	Maintain a uniform soil moisture supply. Avoid overwatering and excessive nitrogen.

Steps to a More Successful Home Garden

- Use mulches to conserve moisture, control weeds and reduce rots.
- Keep plants free of insects and diseases.
- Examine plants often to keep ahead of potential problems.
- Keep weeds out.
- Remove tomato suckers as soon as they form (1 to 2 inches long).
- Sample soil and have it tested every three to four years.
- Apply fertilizer to garden area in recommended manner.
- Thin when plants are small.
- Avoid excessive walking and working in the garden when the foliage and soil are wet.
- Wash and clean sprayer well after each use.

Brand names appearing in this publication are for product identification purposes only. No endorsement is intended, nor is criticism implied of similar products not mentioned.

Publications from Kansas State University are available on the World Wide Web at: <http://www.oznet.ksu.edu>

Contents of this publication may be freely reproduced for educational purposes. All other rights reserved. In each case, credit Charles Marr, Vegetable Garden Planting Guide, Kansas State University, November 1992.

Kansas State University Agricultural Experiment Station and Cooperative Extension Service

MF-315

November 1992

It is the policy of Kansas State University Agricultural Experiment Station and Cooperative Extension Service that all persons shall have equal opportunity and access to its educational programs, services, activities, and materials without regard to race, color, religion, national origin, sex, age or disability. Kansas State University is an equal opportunity organization. Issued in furtherance of Cooperative Extension Work, Acts of May 8 and June 30, 1914, as amended. Kansas State University, County Extension Councils, Extension Districts, and United States Department of Agriculture Cooperating, Marc A. Johnson, Director.

File code: Horticulture & Landscaping-5