



Perennial Vegetables

The Permanent Vegetable Garden

Presented by Patricia Cherundolo
Polk County Florida
Patty@pobox.com

What is a perennial vegetable?

- Perennials are plants that live for 2 years or longer

Why Use Perennial Vegetables?

- Less Work
 - Till the soil once
 - Once established there is little maintenance
 - Just mulch, weed, fertilize, and water when needed
- Build Soil
 - Perennials build soil through organic matter of their leaves and roots

Why Use Perennial Vegetables (con't)

- Provide Ecosystem Benefits
 - Moderate microclimates making areas around them cooler and more moist
 - Roots catch and store water and nutrients
 - Supply critical habitat to a number of animal, fungal, and other life-forms
- Eco-Friendly
 - Global Warming - captures carbon and sequesters it in long term soil humus and plant parts
 - Oil conservation – gasoline not needed to till each year
 - No soil erosion

Common Perennial Vegetables

Artichokes



Jerusalem Artichokes



Asparagus



Onions and Garlic



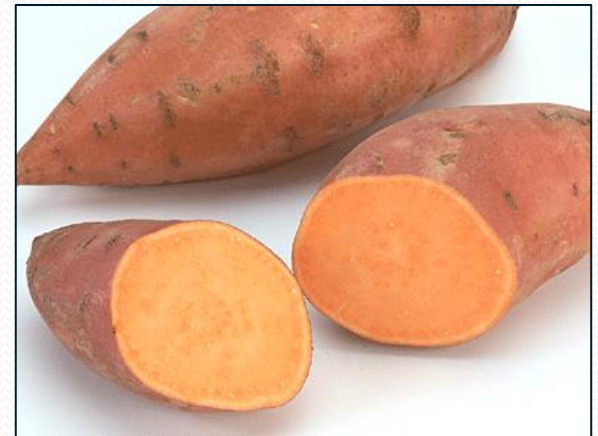
Potatoes



Rhubarb



Sweet Potatoes



Watercress



Water Chestnuts



Slide Definitions

Frost tender – plants damaged or even killed by the slightest winter frost.

Frost sensitive – plant damaged by hard freeze. Usually killed back to the ground.

Toxic chemicals in some plants are shown in red. Need to be cooked to release poisons as a gas.

Arracacha – *Arracacia xanthoriza*

- 3 to 5 feet tall and wide
- Short days needed for roots to fill out
- Propagate by dividing shoots from crown
- Stems and leaves are used like celery
- Roots cooked like potatoes
- Sun to part-shade
- Moist well drained soil



Zone 9A and Higher

Aroids – *Xanthosoma* & *Colocasia* spp.

- Most species grow to 6 to 8 feet tall and grow in a clump the same width
- Need flooded, wet, or very moist soil
- Propagate by division or plant corms
- Needs to be cooked by roasting, baking, or boiling until sweet. Cook leaves for 10 to 20 minutes and cook corms until soft.
- Cook corms like potatoes
- Can be grown in water or land
- Sun to part-shade

Zone 8A and Higher



Oxalic Acid

Asparagus – *Asperagus officinalis*

- Grow 3 to 5 feet tall
- Plant 8 to 14 inches apart and rows 3 to 5 feet apart
- Propagate by seed or root division
- Harvest early in spring before stalks open up
- Can be eaten raw or cooked
- Full sun
- Moist well drained soil



Zone 9A and Lower

Bamboo Shoots

- Not all bamboo is edible
- Can be pickled, fermented or boiled
- Clumping and running



cyanogenic glycosides – cook in water

Clumping Bamboo

- Grow from 30 to 120 feet
- Full height in tropical and sub-tropical areas
- Full-sun to part-shade
- Propagate by breaking apart clumps
- To eat, remove sheath and boil in salted water 2- 15 minutes. Bitter tasting shoots should be boiled in two changes of water.
- Moist well drained soil



Zones 8A and Higher

cyanogenic glycosides – cook in water

Running Bamboo

- Grow from 10 to 75 feet
- Multiply rapidly – give them space or wall them in
- Propagate by division
- Shoots harvested when just below soil
- Cook sweet shoots 5-10 minutes and bitter shoots 10-20 minutes with one change of water
- Sweet shoots can be eaten raw



Zones 8A and Higher

cyanogenic glycosides – cook in water



Bean Family

- Hyacinth Bean
- Perennial Beans
- Winged Bean

Hyacinth Bean – *Lablab purpureus*

- Plants grow to 18 feet – grow on a trellis
- Propagate by seed
- Flowers are eaten raw or steamed
- Young leaves are eaten raw in salads and older leaves are cooked like spinach
- The large starchy root tubers can be boiled and baked
- Seeds and pods should be boiled in two changes of water before eating
- Full sun
- Moist to dry soil



Zones 9A and Higher

Frost sensitive

cyanogenic glycosides – cook in water

Perennial Beans – *Phaseolus* spp.

- Lima beans – *P. lunatus*
- Cache bean – *P. polyanthus*
- Runner beans – *P. coccineus*
- Climbing varieties are perennials and bush varieties are annuals
- Full sun
- Variable soil

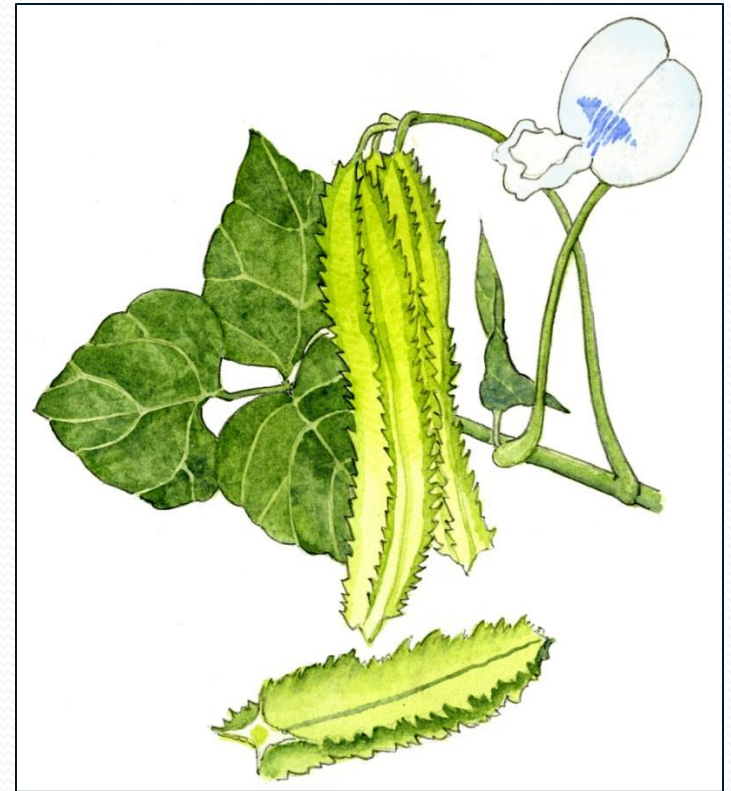


Zones 9A and Higher

Frost sensitive

Winged Beans – *Prosphocarpus tetragonobolus*

- Grow to 12 feet
- Propagate by seed – scarify seeds and then soak overnight
- Young pods eaten like green beans
- Unripe seeds can be eaten like lima beans
- Dried seeds are roasted or used to make bean milk, tempeh, or tofu
- Young leaves – top 3 sets – cooked
- Flowers edible raw
- Tubers edible raw or cooked
- Full sun
- Moist well drained soil



Zone 9A and Higher

Frost sensitive

Bitter Melon – *Momordica charantia*

- Vine grows 13 to 16 feet
- Grow on trellis
- Propagate by seed
- Cook by cutting in half and removing seeds and fibers. Then soak or boil in salt water and use in Asian recipes.
- Full sun
- Moist well drained soil



Zone 9A and Higher

Nine Star Broccoli - *Brassica oleracea botrytis asparagoides*

- Grows to 3 feet tall and 3 feet wide
- Does not head first year
- Heads, leaves and stems are all edible on all broccolis
- Eat raw or cooked. Cook by steaming, boiling, stir frying, or roasting.
- Full sun
- Moist well drained soil



Zones 8A and Higher

Camass- *Camassia* spp.

- Grow 2 feet tall and grows in colonies
- Propagated by dividing bulbs
- Bulbs to 3 inches wide depending on variety
- Bulbs should be cooked at 257 degrees for 9 hours
- Grow only blue camass or know your grower
- Sun to part-shade
- Moist to seasonally wet soil



Zones 9A and Lower



Edible Canna - *Canna indica* var. *edulis*, syn *Canna edulis*

- Grow 6-10 feet tall in colonies
- Propagated by dividing rhizomes
- Roots and young shoots can be eaten raw or cooked. Cooked roots are sweet.
- Young leaves are used to wrap tamales
- Sun to part-shade
- Moist to wet soil



Zones 8A and Higher

Cassava – *Manihot esculenta*

- Grows to 16 feet
- Needs a 9 month growing season
- Propagation done by stem cuttings
- Roots cooked like any other root crop
- Leaves cooked like spinach
- Full sun
- Moist to dry soil



Zones 9A and Higher

cyanogenic glycosides – cook in water

Frost sensitive

Chaya – *Cnidoscolus chayamonsa*



Zones 9A and Higher

- Grows to 6 feet in any soil
- Space 3 to 4 feet apart
- Propagate by stem cuttings
- Cooked and eaten like spinach – cook for at least 3 minutes in water or fried
- Sap can be irritating. Wash off if you get it on your skin.
- Full sun
- Moist to dry soil



cyanogenic glycosides – cook in water

Frost sensitive

Chayote – *Sechium edule*

- Sprawling climbing vine to 30 feet– need a fence or trellis
- Plant entire fruit leaving 1/4 to 1/3 of fruit above ground
- Eat raw like summer squash or cooked like potatoes
- Fruit, root, stem, and seed are all edible
- Short day fruiting cycle
- Full sun
- Moist, well drained soil



Zones 9A and Higher

Frost sensitive

Chicory and Dandelion

- Full sun to light shade and well-drained soil
- Good garden soil gives plants better tasting leaves
- Plant 12 inches apart
- Propagate by seed or divide plants
- Can be eaten raw or cooked
- Use like spinach
- Chicory can be roasted for a replacement for coffee
- Full sun
- Moist, well drained soil



Myrrh Chicory

Zones 9B and Lower

Chinese Artichoke – *Stachys affinis*

- 18 to 24 inches tall
- Plant 12 inches apart
- Propagates by seed, runners, and tubers – can carpet a large area quickly
- Tubers produced that can be eaten raw or cooked
- Full sun to part shade
- Rich well-drained soil

Zones 9B and Lower



Chufa– *Cyperus esculentus* var. *sativa*

- Up to 12 inches tall
- Plant 5 inches apart and rows 30 inches apart
- Propagates by tubers
- Tubers produced that can be eaten raw, soaked, or cooked
- Full sun
- Moist to wet soil

Zones 8A and Higher



Frost sensitive

Daylily – *Hemerocallis* spp.

- 10-20 inches tall
- Plant 1 foot apart
- Flower buds can be used like green beans
- Flowers can be used in salads or battered and fried
- Some leaves can be cooked
- Root tubers can be cooked
- Full sun
- Moist, well drained soil



Zones 8A and Higher

Globe Artichoke – *Cynara scolymus*

- Grows to 6 feet tall and 6 to 8 feet wide
- Need cool summers and mild winters
- In areas with hot summers, grow in part shade
- Propagate by division of suckers or seed – depending on variety
- Harvest before bracts/scales start to open.
- Boil buds, peeled flower stems, and leaf mid-ribs
- Full sun
- Moist, well drained soil



Zones 9B and Lower

Good King Henry – *Chenopodium bonus-henricus*

- Grows to 2 feet tall
- Space plant 12 to 18 inches apart and rows 2 feet apart
- Shoots, leaves, flower-buds, and seeds are edible
- Shoots eaten like asparagus
- Seeds eaten like any grain
- Propagate by seed or dividing plant
- Full sun to part shade
- Moist, well drained soil



Zones 9B and Lower

Oxalic Acid

Ground Cherry – *Physalis* spp.

- Plant grows to 4 to 6 feet
- Plant 3 to 4 feet apart
- Propagate by seed and cuttings
- Fruit can be eaten raw or cooked
- Cut back after fruiting
- Full sun
- Poor well-drained to moist soil

Zones 8A and Higher



Ground Nut - *Apios americana*

- Crawling vine grows 4 to 8 feet
- Plant in moist to wet soil with something to climb on – like a shrub or tree
- Plants 1 foot apart
- Propagate by planting tubers in fall, dividing plants, or cuttings
- Cook like potatoes
- Full sun to part shade
- Moist to wet soil



Zones 9B and Lower

Haitian Basket Vine – *Trichostigma octandrum*

- Vine grows to 20 feet
- Propagate by seed or layering
- Can be made into a shrub with trellises
- Boil for 10 minutes to remove bitterness
- Full sun to part shade
- Moist to wet soil



Zone 9A and Higher



Hibiscus Family

- Cranberry Hibiscus
- Roselle Hibiscus
- Sunset
- Kenaf
- Over 70 varieties

Zone 8A and Higher

Cranberry Hibiscus – *Hibiscus acetosella*

- Grow to 10 feet tall and 3 feet wide.
- Propagate by seeds or stem cuttings
- The leaves and flowers are edible and make an attractive addition to salads, slaws, or stir fries
- Flowers can be made into tea or a cold drink
- Full sun
- Moist well drained soil



Zone 9A and Higher

Frost sensitive

Roselle Hibiscus - *Hibiscus sabdariffa*

- Grows 6 to 8 feet tall
- Propagate by seeds or stem cuttings
- Fruit is known as the Florida cranberry – flower calyxes(fruit) can be used like cranberries
- Full sun
- Moist well drained soil

Zones 8A and Higher



Frost sensitive

HIBISCUS SUNSET- *Hibiscus manihot*

- Grows to 10 feet tall
- Propagate by seeds or stem cuttings
- Flowers can be eaten raw or cooked
- Leaves very nutritious – 5% protein
- Leaves used same as collards
- Full sun to part shade
- Moist well drained soil



Zones 8B and Higher

Frost sensitive

Kenaf - *Hibiscus cannabinus*

- Grows to 10 feet
- Propagate by seeds or stem cuttings
- Seed is 20% oil – can be used as a biofuel
- Leaves very nutritious
- Use raw or cooked
- Leaves resemble marijuana
- Full sun to part shade
- Moist well drained soil



Zones 8A and Higher

Frost sensitive

Jerusalem Artichoke – *Hellanthus tuberosus*

- Plants grow 4 to 6 feet tall. Can reach 12 feet.
- Plant tubers 4 inches deep and 1 to 3 feet apart
- Propagate by tuber or parts of tuber
- Dig up in spring and only what you will use
- Raw or cook like any root crop
- Full sun
- Moist well drained soil



Zones 9B and Lower

Jewels of Opar - *Talinum paniculatum*

- Grows 18-24 inches tall
- Space 12-24 inches apart
- Grow in full-sun to full-shade
- Propagate by seed or stem cutting
- Eat raw or use with any spinach recipe



Zones 9A and Higher

Job's Tears- *Coix lacryma-jobi*

- Grows 3 to 4 feet tall
- Space 6 to 12 inches apart
- Grow in full-sun
- Prefer moist soil
- Propagate by seed
- Cook like any grain



Zones 10 and Higher

Katuk – *Sauropus androgynus*

- A woody upright bush, to 9 feet
- Plant 2-3 feet apart
- Eat raw or cook like spinach
- Propagate by seed or stem cutting
- Can be eaten raw or cooked like spinach
- Full sun to part shade
- Moist well drained soil



Zones 9A and Higher

Frost tender

	Actual quantity per half cup serving of fresh leaves		% Daily Value USDA, 2000 calorie diet	
	Katuk	Spinach	Katuk	Spinach
Protein	4.9 g	0.43 g	9.8	0.9
Calcium	51 mg	15 mg	5.1	1.5
Iron	2.7 mg	0.4 mg	15	2.3
Vitamin A	1122 IU	1407 IU	22	27.6
Vitamin C	83 mg	4.2 mg	138	7

Lovage - *Levisticum officinale*

- Grows to over 6 feet
- Plant 1 foot apart
- Propagate by seed
- Leaves used to flavor soups, casseroles, sauces and marinades or as a vegetable
- The stems and the seeds are used to flavor baked goods
- The roots can be peeled and used as a vegetable
- Full sun to part shade
- Moist well drained soil



Zones 9A and Lower

Malabar Spinach - *Sasella alba*

- Plant 6 inches apart by a fence or trellis. Vines up to 12 feet
- Eaten raw in salads or use in any spinach recipe
- Propagate by seed or cuttings
- Full sun
- Moist well drained soil

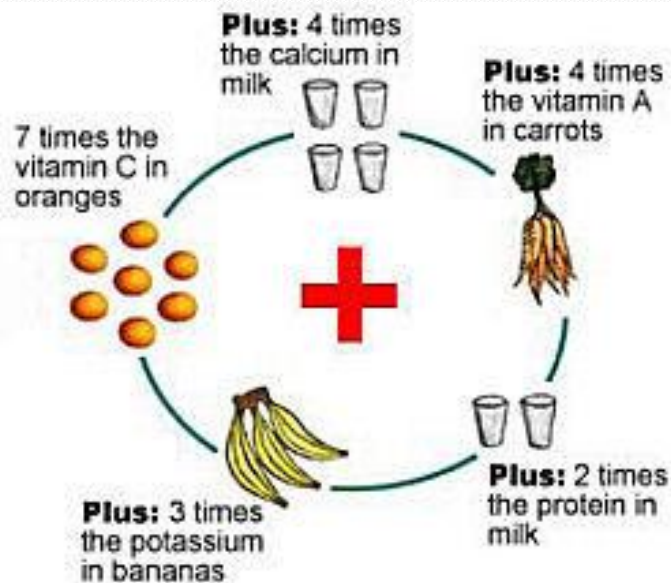
Zones 9A and Higher

Frost tender



Moringa – *Moringa* spp.

- Grow to 20 feet in one summer
- Leaves, flowers and roots edible
- Propagate by seed or stem cutting
- Leaves can be dried or frozen or eaten raw
- Use like spinach
- Full sun
- Dry to moist soil



Zones 9A and Higher

Frost sensitive

New Zealand Spinach– *Tetragonia tetragonioides*

- Grows 1 to 2 feet tall
- Leaves and top 3 to 4 inch shoots are edible
- Propagate by seed or cutting
- Eat raw or cook like spinach
- Full sun to part shade
- Dry to moist soil



Zones 9A and Higher

Oxalic Acid

Nopal Cactus – *Opuntia* spp.

- Grows 12 to 18 feet tall
- Propagate by planting a pad. Dry pad for 2 to 4 weeks and then bury them half way in the ground
- Can be cooked, fried, or eaten raw – remove spines before eating
- Flowers and fruits are also edible
- Full sun
- Extremely well drained soil



Zones 8A and Higher

Okinawa Spinach – *Gynura crepioides*

- A vine that can get to 4 feet tall and sprawls to 5 feet in diameter
- Up to six plants per person should be enough to provide ample vegetables
- Propagate by stem cuttings
- Use raw or cook like spinach
- Full sun to part shade
- Moist well drained soil



Frost sensitive

Zones 9A and Higher

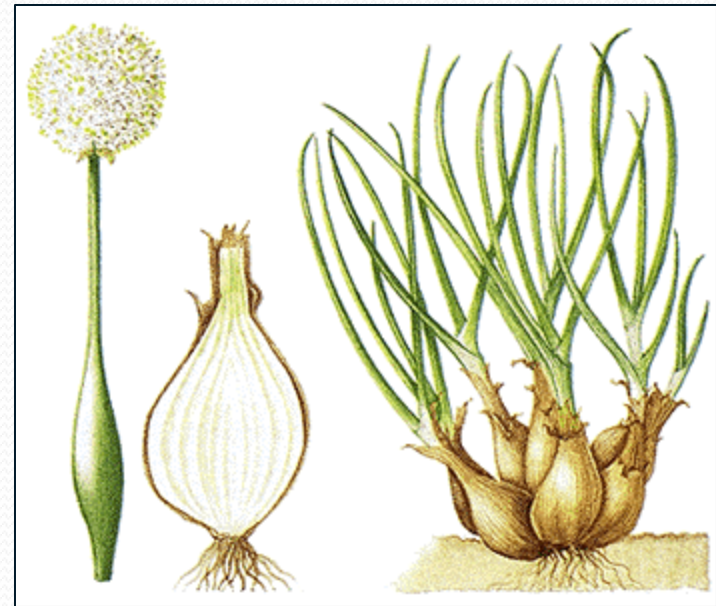


Onion Family

- Multiplier Onions
- Perennials
- Miscellaneous

Multiplier Onions – *Allium cepa aggregatum*

- Plant bulbs in spring 6 to 8 inches apart
- Need rich well-drained soil
- Plants should not be allowed to dry out
- Propagation – bulb division
- Harvest when tops die down. Brush off dirt and store in warm dry place for 2 months. Store in cool dry place.
- Use in any recipe needing onions
- Full sun
- Moist, well drained soil



Zones 8A and Higher

Perennial Onions — *Allium* spp.

- Some varieties are: perennial sweet leek, walking onion, Welsh onion, scallion, garlic chives, chives, and ramson
- Most prefer full sun and rich soil
- Propagate by dividing bulbs or by “walking” bulblets
- Use like green onions in recipes
- Light variable
- Moist, well-drained soil



Zones 8A and Higher

Society Garlic - *Tulbaghia violacea*

- Full sun to full shade. Doesn't flower in shade
- Light sandy soils best
- Drought tolerant
- Propagate by dividing rhizome during dormant periods – winter
- Leaves and flowers taste like garlic
- Use raw or cooked with recipes for mild garlic flavor
- Full sun
- Moist, well-drained soil



Zones 8A and Higher

Perennial Cucumbers- *Coccinia grandis*

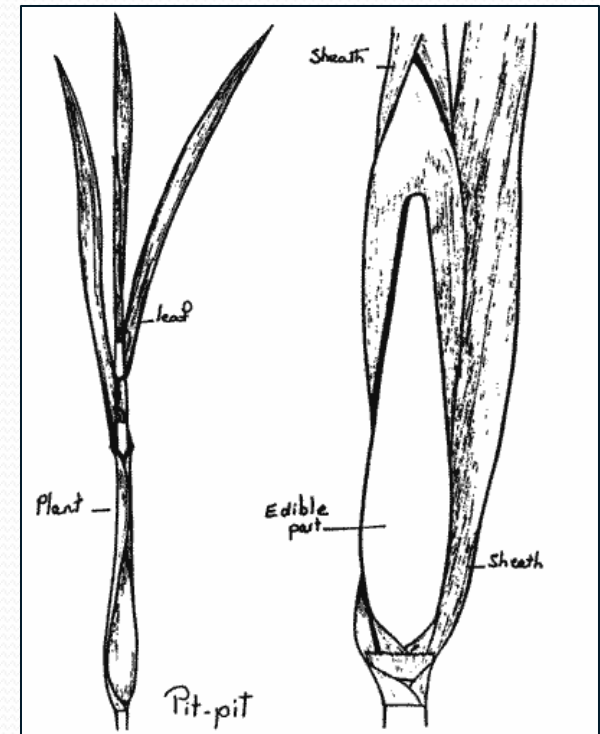
- Vine – give it plenty of space or a trellis
- Propagate by seed and vines rooting while spreading. Sterile variety recommended for tropics
- Eat melons when light green like cucumbers
- Leaves can be eaten raw or cooked
- Use raw or cooked with recipes for mild garlic flavor
- Full sun to part shade
- Moist, well-drained soil



Zone 9A and Higher

Pitpit– *Saccharum edule*

- Grows 6 to 10 feet
- Edible part is a banana-sized vegetable wrapped as a leafy sheath
- Propagate by plant division and cuttings
- Can be used like cauliflower
- Full sun
- Moist, well-drained soil



Zone 9A and Higher

Pokeweed– *Phytolacca americana*

- Anything red on this plant is poisonous
- Grows 4 to 10 feet tall and as wide
- Roots and seeds are the most poisonous parts of the plant
- Young shoots and young leaves can be eaten but must be cooked
- Cook in water. Change water 3 times before serving
- Full sun to part shade
- Moist, well-drained soil



Zone 9B and Lower

**saponins, oxalates, and phytolaccine –
cook in water**

Purslane – *Portulaca oleracea*

- Plants are about 4 inches high and 6 to 8 inches wide
- Plant 12 inches apart
- Any kind of well drained soil
- Drought resistant
- Propagate by seed
- Can be used raw or cooked like spinach
- Full sun
- Dry to moist, well drained soil



Zone 9A and Higher

Frost tender

Rhubarb – *Rheum x cultorum*

- Grows in clumps 4 to 5 feet wide with 5 to 6 feet tall flower stalks
- Plant at least 3 feet apart
- Propagate by seed or dividing clumps
- Eat only the stalks or flower buds in moderation. The rest of the plant is poisonous
- Use in pies or soups, or cooked vegetable
- Part to full shade
- Moist, well-drained soil



Zone 9A and Lower

Oxalic Acid

Salad Burnett - *Poterium sanguisorba*

- Grows 1 foot wide and 1 foot tall
- Grow in full sun to light shade
- Use in salads, vinegars, cheese spreads, sauces for fish, salad dressings and in combination with other herbs in casseroles and creamy soups.



Zone 8A and Higher

Saltbush – *Atriplex halimus*

- Grows 4 to 6 feet tall and 8 feet wide
- Propagate by seed or cuttings
- Use raw or cooked like spinach
- Full sun
- Dry to moist, well drained soil



Zone 9B and Lower

Oxalic Acid

Seabeet – *Beta vulgaris maritima*

- Grows to 4 tall and 8 feet wide
- Plant forms clumps to 3 feet wide
- Propagate by seed
- Use raw or cooked like spinach
- Full sun
- Dry to moist, well drained soil



Zone 9B and Lower

Oxalic Acid

Sissoo Spinach – *Alternanthera sissoo*

- Grows 1 foot tall and creeps along ground
- Propagate by softwood cuttings
- Cook like spinach
- Part shade
- Moist, well drained soil



Zone 9A and Higher

Oxalic Acid

Frost tender

Stinging Nettles – *Urtica dioica*

- Handle with gloves – it really stings
- 3 to 7 feet tall
- Grow in full-sun to shade. Shade recommended for the tropics
- Propagate by seeds or stem cuttings
- Cooking disables the stinging parts of the plant
- Cook like spinach
- Sun to shade
- Moist, well drained soil



Zone 9B and Lower

Sorrel – *Rumex* & *Oxyria* spp.

- Grows to 4 inches to 2 feet depending on variety
- Propagate by seed or division
- Use leaves in soups or salads as you would spinach
- Small quantities of raw leaves are harmless
- Large quantities of raw leaves are toxic
- Sun to shade
- Soil variable

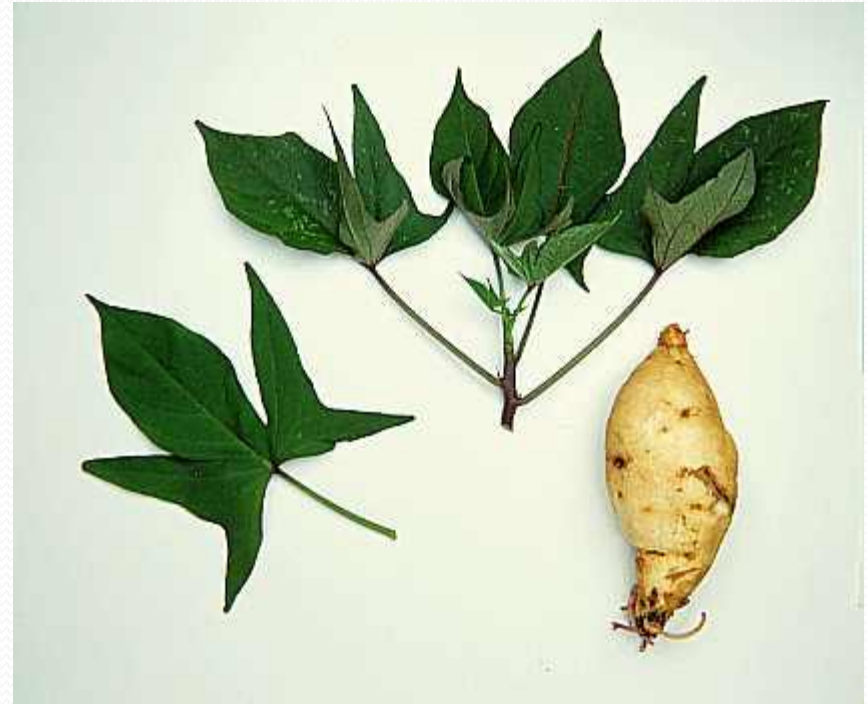
Zone 9B and Lower

Oxalic Acid



Sweet Potato – *Ipomoea batatas*

- Plant root cuttings or slips 3 feet apart
- Eat the leaves all summer then enjoy the tubers in the winter
- Leaves can be eaten raw or cooked
- Tubers can be eaten raw or cooked
- Full sun
- Moist, well drained soil



Zone 8A and Higher

Sylvetta Arugula – *Diplotaxis muralis* & *D. tenuifolia*

- Small shrub 3-6 feet
- Space 6 to 12 inches apart
- Propagate by seed
- Can be used raw or cooked like spinach
- Taste much stronger than annual arugula
- Sun to part shade
- Moist to dry soil



Zone 9B and Lower

Tomato



Spring Tree - *Toona sinensis*

- Tree 10 – 15 feet tall
- Propagate by seed or root sucker
- Eat raw or cook like spinach
- Full sun
- Moist, well drained soil



Zone 8A and Higher

Yacón – *Smallianthus sonchifolia*

- Place plants 3 feet apart
- Grow to 6 feet tall
- Propagate by dividing non-eating tubers
- Tubers and leaves eaten raw or cooked
- Partial shade in mid- to late-summer in tropics
- Full sun to part shade
- Moist, well drained soil



Zone 9A and Higher

Yellow Asphodel – *Asphodeline lutea*

- Place plants 5 feet apart
- Grow to 2 feet tall
- Grows in 3 foot clumps
- Propagate by division or seed
- Roots eaten cooked
- Flowers eaten raw
- Spring shoots cooked like asparagus
- Harvest roots when plant is dormant
- Full sun to part shade
- Moist, well drained soil

Zone 9B and Lower



Yam Family

- *Dioscorea bulbifera* - Air potato
- *Dioscorea* spp. - Yam

Air Potato - *Dioscorea bulbifera*

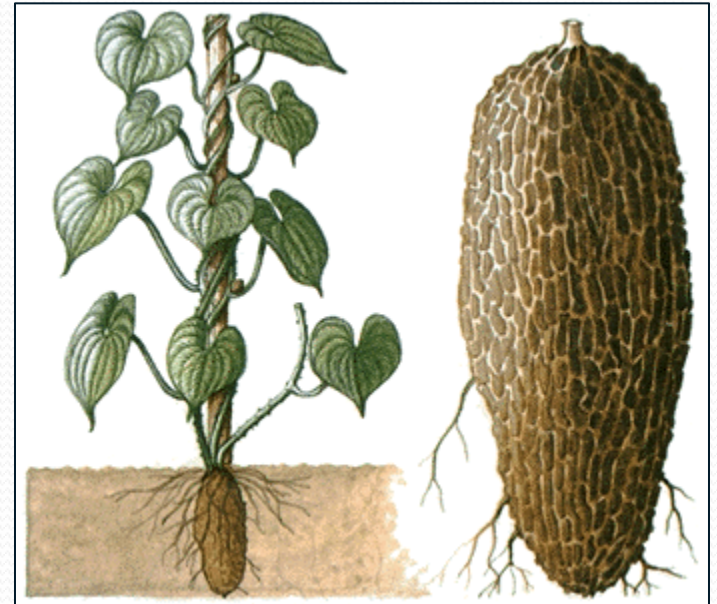
- Vine to 45 feet or more – grow on trellis and keep contained
- Propagate by burying aerial tuber
- Harvest aerial tubers when easy twist off vine or fall to ground
- Store in cool, dry place
- In-ground tuber can be harvested when foliage dies back
- Cook like any root vegetable
- Wild forms are toxic and tubers are bitter
- Full sun to part shade
- Moist, well drained soil



Zone 8A and Higher

Yams – *Dioscorea* spp.

- Vine to 30 feet or more – grow on trellis
- Propagate by burying 1/3 of tuber and eat the rest
- Tuber can be harvested when foliage dies back
- Cook like any root vegetable
- Full sun to part shade
- Moist, well drained soil



Zone 8A and Higher

Water Vegetables

- Add a fountain or other water container
- No need for pumps for plant growing only
- Most of these are rapid growing plants
 - Lotus
 - Water Celery
 - Water Chestnuts
 - Water Cress
 - Water Plantain
 - Water Spinach

Lotus – *Nelumbo speciosum*

- Water plant that grows to 4 to 5 feet
- Plant in pot in water garden
- Propagate by dividing rhizomes or by seed
- Harvest when plant is dormant
- Boil the young leaves and eat them as a vegetable
- Use rhizomes in soups or stew or boil for use in salad or other dishes
- Eat seeds raw, or parch and grind them into flour
- **Do not put in ponds or streams**



Zone 8A and Higher

Water Celery – *Oenanthe javanica*

- 2 to 4 feet tall
- Spreads by roots and branches into a dense colonies
- Grow in a water garden or moist soil
- Propagated from cuttings
- Use fresh or cooked like spinach
- Winter crop in tropics
- Some members of the family are poisonous
- Full sun to part shade
- **Do not put in ponds or streams**



Zone 8A and Higher

Water Chestnuts - *Eleocharis dulcis*

- Can be grown in any water container. Need 4 inches soil and 2 to 4 inches water once bulbs sprout
- Propagate from bulbs
- Harvest 3 to 4 weeks after leaves die down and turn brown
- The small, rounded corms can be eaten raw, slightly boiled, grilled, and are often pickled. Peel tough skin first though.
- Full sun
- **Do not put in ponds or streams**



Zone 9A and Higher

Watercress – *Nasturtium officinale*

- Grow in running water or wet soil
- Propagate by cuttings
- Use raw in salads or on sandwiches
- Use in soups or cook like spinach
- Full sun to part shade
- **Do not put in ponds or streams**



Zone 8A and Higher

Water Mimosa – *Neptunia oleracea*

- Grow water gardens or wet soil.
- Use raw or cook like spinach
- Full sun to part shade
- **Do not put in ponds or streams**



Zone 9A and Higher

Water Plantain Family - Alismataceae

- *Sagittaria latifolia* – arrowhead, duck potato & wapato



- *Sagittaria graminea* – Chinese arrowhead, kuwai, Chee Koo



- Grow in wet soil or water – 1 to 3 feet tall
- Full sun to part shade
- Can be grown in pot in water gardens – easy to harvest tubers
- Multiply by rhizomes
- Propagate by tubers
- Cook like potatoes
- Full sun
- **Do not put in ponds or streams**



Zone 8A and Higher

Water Spinach – *Ipomoea aquatica*

- Aquatic variety banned in US.
- Plants grow 2-3 feet
- Use raw or cooked the same as spinach
- Propagate by seed or cuttings
- **Do ponds or streams**



Zone 9A and Higher

Frost sensitive



Perennial Herbs

The Mediterranean Herbs



Lavender

Fennel

Mint

Bay Leaf

Oregano

Sage

Tarragon

Lemon Balm

Marjoram

Rosemary

Thyme

Winter Savory

Bay Leaf - *Laurus nobilis*



- Aromatic evergreen tree or small shrub
- Leaves us fresh or dried as a herb for flavoring
- Drying enhances flavor
- Can grow to 38 feet in frost free area
- Can be grown in containers

Killed by freezes

Fennel

- Eat raw or cook like summer squash
- Bulb, leaves, seed and pollen are all edible.
- Swallowtail butterfly host plant.



Lavender



- Used as food flavoring or add to water for a drink
- Used as a flavoring in baked goods and pudding like desserts
- Bees make lavender honey
- Many different cultivars

Lemon Balm



- Grows to 2 feet
- Full sun to shade
- Leaves used to make tea or other lemon flavored drinks
- Leaves can be added where ever a lemon flavor is wanted

Frost sensitive

Marjoram



- Subtle lemon flavor with a hint of balsam
- More delicate than oregano
- Can be used in meat, vegetable, and egg dishes
- Symbol of happiness

Frost sensitive

Mint



- Under trees for shade in Florida or part-shade
- Many varieties of mint including chocolate
- Use to flavor drinks
- Used in toothpastes, soaps, and mouthwashes
- Helps liver and calms digestion
- Plants can get out of hand

Oregano



- Grows to about 20 inches
- Does best in part-shade
- Spreads 19 inches
- Used in Italian cooking
- Use on meat, pizza, or vegetables

Rosemary



- Small shrub to 5 feet
- Used to flavor meat or vegetables
- High in iron, calcium and vitamin B6
- Said to improve memory

Sage - *Salvia officinalis*



- Grows to 3 feet
- Different varieties – from small shrub to ground cover
- Used to flavor meat or vegetables
- Make sage sauce with butter and cooked sage
- High in iron, calcium and vitamin B6
- Said to improve memory

Tarragon



- Grows to 5 feet
- French and Russian types
- French tarragon best for food
- One of 4 ingredients in fines herbs
- Use on meat and vegetables and salads
- Make tarragon vinegar

Thyme



- Can be used as a ground cover
- Height 6-8 inches tall and 6-12 inches wide
- Use small leaves for flavoring meat, vegetables, and salads

Miscellaneous Food Plants

- Arrow Root
- Galangal
- Ginger
- Turmeric

Arrowroot - *Maranta arundinacea*

- Up to 2 feet tall
- Tuber contains 23% starch
- Tuber is made into arrowroot
- It is a thickener
- Makes clear fruit gels
- Used in ice cream
- Used instead of flour
- Sun to shade



Galangal - *Alpinia galangal*

- Used in Thai recipes
- Up to 6 feet tall
- Grows by rhizome to form a low growing clump
- Prefers a well-composted, moist, freely draining soil
- Used like ginger
- Plant in a shady spot
- Harvest just part of root



Ginger - *Zingiber officinale*

- Up to 3 feet tall
- Sunny to filtered location
- Prefers a rich, moist, well-drained soil
- Plant in spring and harvest in the fall
- Grows to 2-3 feet



Turmeric

- Rhizome usually baked and mashed to a powder – used in curry dishes
- Rhizome can also be used fresh like ginger
- Fresh leaves used to wrap food in to impart flavor



- High amounts of curcumin in rhizome – pain reliever
- Grow in part-shade – afternoon sun is good. Full sun also acceptable
- Harvest after leaves die down in the fall



The End

References and Sources

- www.perennialsolutions.org
- www.perennialvegetables.org/sources-of-plants-and-seeds
- www.pfaf.org – Plants For A Future
- <http://www.perennialsolutions.org/> Eric Toensmeier's website
- www.echobooks.org
- www.ebay.com