

Avocado

Grow

Fruit or Vegetable?

Avocados are considered to be a fruit botanically and a vegetable in the nutrition and culinary world. They grow on an evergreen tree of the Lauraceae flowering plant family.

If grown from seed, avocado trees will produce fruit after 5 to 20 years. Commercial orchards graft trees and root stock to achieve avocado production within 1 to 2 years. Avocado trees prefer loose, decomposed granite or sandy soil. When planting, space 10 feet apart in all directions. Mature avocado trees grow to between 20 and 80 feet tall, depending on the variety, soil conditions and pruning. The trees only grow in subtropical or tropical climates. They need full sun and protection from the wind.

The avocado tree is biennial bearing, producing a high yield one year followed by a low yield the next. A single tree can produce up to 400 avocados per year.¹⁻²

Fun Fact: The Hass variety of avocado, named after Rudolph Hass, was developed to withstand near freezing temperatures (31 degrees F) to allow for year-round availability.¹

Choose

There are over a thousand varieties of avocados. The Hass avocado is one of the most common varieties and it is available year-round. The skin of Hass avocados turns dark purple to black when ripe. Other avocado varieties are called “green skins” because their skin color remains green as they ripen. Common green avocado varieties are Fuerte, Zutano, Bacon, Pinkerton, Reed and Gwen.

Avocados do not ripen on the tree. Instead, they fall off and ripen on the ground. Commercial orchards will use clippers to hand harvest avocados when unripe. Avocado produces ethylene gas, which triggers ripening as the avocados are stored together in transit to the end user or consumer. Avocados may be slightly soft to the touch but should not have cracks or sunken spots.¹⁻³



Fun Fact: Avocado trees can lower air temperature by evaporating water in their leaves.²

Store

Store avocados at room temperature until ripe. A firmer, green avocado can be ripened in a paper bag at room temperature within a few days. As the fruit ripens, the skin will turn darker. Once ripe, they can be stored in the refrigerator up to a week but should not be refrigerated until ripe. If cut, store avocado wrapped to prevent the surface from being exposed to air and turning brown. A small amount of lemon juice can be sprinkled on the cut avocado to prevent browning.³

Fun Fact: Avocados are also called alligator pears because of their pear shape and dark green skin.¹

Use

The best way to eat an avocado is fresh and unheated. Avocados can be eaten as a snack or side dish. They can be added to sandwiches, wraps, salads, salsas, dips and more. Guacamole is a traditional dip made with mashed avocados, garlic, lime, salt and pepper, and sometimes tomatoes or onion. Wash under clean, running water before preparing or eating avocados.¹⁻³

Avocado

Teach

Many Names

Originating in Central America, ancient Aztecs called the avocado **aoacatl**, which translates today to **ahuacatl** and is still used in parts of Mexico. Pedro de Cieza de León was the first European to give it a name, **aguacate**, the now common Spanish name for an avocado. The avocado was nicknamed “alligator pear” by English colonists, who mistakenly substituted the word alligator for aguacate. They added pear for the shape of the avocado. Americans evolved the term aguacate into avocado.¹⁻²

Fun Fact: Cut an avocado in half length-wise. Twist the halves ¼ turn to separate. Cut the flesh around the pit into 4 sections. This allows you to easily remove the pit. Then, slice, dice and/or scoop out the avocado flesh.²

Class Activity - Grow an Avocado Plant

Materials Needed:

- Clear glass jar (large enough to fit the avocado pit)
- Wooden toothpicks
- Avocados and avocado seed (pit)
- Cutting board and knife
- Plates and napkins
- Water

Steps: *Use food safety steps. Wash hands and produce.

1. Show an avocado to the class. Demonstrate how to cut the avocado in half and slice or dice it. Provide samples of avocado to students to taste.
2. Wash the avocado pit. Using 3 toothpicks, suspend it broad end down over a water-filled glass to cover about an inch of the pit.
3. Put it in a warm place out of direct sunlight. Replenish water as needed. Roots and stem sprouts should emerge in about 2 to 6 weeks.
4. When the stem is 6 to 7 inches long, cut it back to about 3 inches.
5. When the roots are thick and the stem has leaves, plant the sprouted seed in a pot with adequate soil to continue to grow.
6. Have students observe, measure and record growth.¹

Eat

Avocados are nutrient dense, cholesterol free and low in sodium. A serving of avocado, ½ of a medium avocado (50 grams), has about 80 calories. It is a good source of fiber, copper and folate. Avocado is also a source of vitamins K, B6, E, and C, potassium, lutein and zeaxanthin.

Fun Fact: “Heart healthy” avocados have unsaturated fat which research shows can help lower triglycerides, “bad” or LDL cholesterol, and blood pressure.⁵

Insoluble fiber aids digestion. Soluble fiber helps lower blood cholesterol. Copper is part of many enzymes. It helps your body produce energy in all body cells, develop connective tissue, myelin and melanin, and make hemoglobin which is needed to carry oxygen in red blood cells. Our bodies need folate for blood cell, DNA and genetic development. Vitamin K helps our body clot blood and make proteins needed for our blood, kidneys and bones. B6 helps our body make protein building blocks (amino acids), turn tryptophan into niacin and serotonin (a brain messenger), and make insulin, hemoglobin, and antibodies to fight infection. Vitamin E serves as an antioxidant, helping to protect cells from the damage caused by free radicals. Vitamin C helps form collagen to hold muscles, bones and tissues together, protects us from infections and bruising, aids in healing, keeps our gums healthy, helps our body absorb iron and folate from plants, and acts as an antioxidant to prevent cell damage. Potassium helps transmit nerve signals, contract muscles, maintain normal blood pressure, and regulate fluids and mineral balance. Lutein and zeaxanthin may help maintain normal vision.⁴⁻⁵

Find

For more avocado facts and resources, visit:

1. California Harvest of the Month, <https://harvestofthemonth.cdph.ca.gov>
2. California Avocado Commission, <https://californiaavocado.com/>
3. U.S. Department of Agriculture, Food and Nutrition Service, www.fns.usda.gov
4. USDA FoodData Central, <https://fdc.nal.usda.gov/index.html>
5. Academy of Nutrition and Dietetics, www.eatright.org