# **BROCCOLI**

### Calabrese, Chou Broccoli

Brassica oleracea var. italica

Brassicaceae

### ECHO® PLANT INFORMATION SHEET

## Origin

The Broccoli head is made of a cluster of many, dark green buds formed at the end of an edible stalk. The domesticated varieties that are now favorites for humans originally derived from wild cabbage in Asia Minor.

# **Uses**

Broccoli has become a common, favorite vegetable around the world and is one of the most valuable in terms of nutrition. In laboratory testing, broccoli is found to be more effective than antibiotics against the bacteria that cause peptic ulcers. It contains cancer fighting elements as well.

#### **Common Names**

- Spanish
  - o Brecolera
- French
  - brocoli asperge

## **Cultivation**

Broccoli prefers cool temperatures during the growing season, 4° - 21° C (40° - 70° F). Transplants should be planted in the garden in April or seeded directly in late summer. It is important that broccoli and other crucifer crops not be planted in the same place in successive years over a 2-4 year time span as the soil harbors microorganisms left from infected plants that will attack the new crop. Broccoli will tolerate a wide variety of soil types, sand, clay or peat. Irrigation of 10 in -12 in during the season is helpful as is mulch to help the soil retain moisture. Heads ready for picking can be available from 75-95 days from seed.

# **Harvesting and Seed Production**

Broccoli heads are harvested when the individual green buds are tightly clustered with no spaces between and the head is dark green in color. Secondary, small heads will appear after the main stalk is cut. Stop harvesting when yellow flowers show among the green buds and when outer leaves fade and lose color. Broccoli can lose its flavor and nutrients very quickly if not refrigerated. Broccoli is a biennial but in warm climates will produce seed in one season. It will cross-pollinate with other members of the *Cruciferae* family. If saving some plants for seed production, 2 km (1.2 mi) should separate crops within this family. The plant will grow very tall, yellow flowers turning into brown pods. When seeds rattle inside the pods, the plant should be pulled up and hung in a dry, dark place for two weeks. Seeds easily separate from the pods and will store up to five years.

## **Pests and Diseases**

Three types of caterpillars, larvae of different moths, are broccoli's worst pests. Early and continuous treatments are necessary with rotenone or Bt (*Bacillus thuringiensis*) both non-toxic to humans when used in moderation.

# **Cooking and Nutrition**

Young tender leaves as well as green heads, cooked or raw of any size with part of the fibrous stem attached are the edible parts of this plant. Vitamins A, B, C, and carotene are all abundantly present in Broccoli though they are water soluble and lost with overcooking. Store unwashed in refrigerator in lose plastic for 3-5 days, washing in cool, running water just before lightly cooking by steam or stir fry. If Broccoli is cooked too long or held too long before cooking, it turns bitter, begins to smell like sulfur and loses its nutritional advantages.

#### References

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