# **BOTTLE GOURD**

Bushel Gourd, Calabash Gourd, Birdhouse Gourd

Lagenaria siceraria Curcurbitaceae

#### ECHO® PLANT INFORMATION SHEET

## **Description**

The Bottle Gourd (known also as Bushel Gourd) was probably native to Africa but because of its ability to float in saltwater without losing viability, it is now found in most countries. Archaeological studies in Peru have found remains of this gourd from 10,000 B.C.

#### Uses

The Bottle Gourd is typically grown for non-food use. The gourd is allowed to reach its full size on the plant and turned into a valuable container for grains or liquids. Mature fruits contain an extremely hard and waterproof rind when dried. The growing gourd may be constricted with bands to form any desirable shape. Designs scratched into the surface when the rind is still soft, will scar and remain in the mature fruit. Dried and waxed, the bottle gourd is waterproof and valuable for musical instruments, water jugs, kitchen equipment, planters, masks or floats for fishing nets. Because of its mild flavor, like summer squash, it is very versatile in the diet of humans and the plants with young gourds may even be fed to animals.

### **Common Names**

• Hindi



## Cultivation

- Elevation: 0-2500 m (8000 ft) Rainfall: 600-1500 mm (24-60 in), adapted to semi-arid conditions
- Temperature: 10-35 C (50-95 F)
- Soil: well-aerated, fertile soils with pH 6-7.

This gourd is a vigorous, annual vine that prefers hot days and warm nights. (18-30° C or 55-80° F) *Lagenaria* cross-pollinate easily hence the multitude of variations. The crop benefits from a large growing area, 3 m (9 ft) between plants, full sun, and mulch to prevent fruit from rotting. Bottle gourd has a good ability to suppress weed. It has an extensive but shallow root system and soil tillage should be minimized during the fruiting stage. Manual weeding around the base of the plant is recommended.

For continuous growth, irrigation is needed in the dry season. In some communities people use an old clay pot half buried next to the plant base for irrigation. The container is filled with water and covered with a half Bottle Gourd serving as a lid. The water gradually oozes out to the roots. Water is added once or twice a week. Bottle Gourd responds well to fertilizer. When available, ample manure is applied at planting.

## **Harvesting and Seed Production**

Plants can begin to flower as early as two months after seeding. Gourds can be left on the vines until the plants dry out, the stem turns brown or the seeds rattle inside. At this stage, the gourds have become hard enough that they can be cut open, the seeds removed and used as containers. The seeds from mature gourds will be dry and can be stored up to five years in a paper bag or left in the gourd itself. At this stage the seeds cannot be eaten, as they can be bitter and even poisonous.

#### **Pests and Diseases**

Diseases and pests are relatively few. However, to prevent insects from laying eggs in the rind, mosquito netting may be draped over the vines. Since the flowers need insects for pollination, do not cover the plants until after the blossoms have dropped off. Major diseases of Bottle Gourd are anthracnose during the wet months and powdery mildew during the dry season.

## **Cooking and Nutrition**

Immature gourds, young shoots and leaves may be eaten as a boiled or steamed vegetable. Young fruits are used as a cooked vegetable similar to zucchini. The flesh is white, firm, and has an excellent texture and a mild taste.

#### References

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