PLANT FACT SHEET

Olea europaea L.

GENUS *Olea* **FAMILY** Oleaceae

COMMON NAMES Olive

EDIBLE PARTS AND USES

Edible parts: Fruit, Herb, Spice, Manna, Leaves, Oil

The ripe fruit is used after being pickled or preserved. It is also used for oil. Raw fruit contain an alkaloid making them bitter and unpalatable. This is removed by lye curing (1.3-2% caustic soda), then washing with water and then transferring to a saline solution.
The leaves are used for flavouring.
The tree is the source of an edible manna.

DESCRIPTION

A medium sized evergreen tree. It grows to 16 m high and can spread to 10 m wide. The trunk is often gnarled and twisted. The leaves are greyish-green. They are feather shaped and grow opposite each other. Leaves are replaced every two or three years. The flowers are small and cream coloured. They are on long stems in the axils of leaves but are hidden by the leaves. Some flowers contain both male and female parts while others are male only. Pollination is by wind but most olives are self pollinated. Fruit set is better with cross pollination and some varieties can only be cross pollinated. The fruit is small and green or black and oily. The shape, size and colour of fruit vary with variety.

HABITAT

It suits warm temperate, subtropical and Mediterranean climates. Olive require a long hot growing season to properly ripen the fruit. They also need sufficient winter chill to insure fruit set. It can grow in regions with temperature ranges from 7-35°C. Plants can survive frosts but green fruit can be damaged as -2°C. Trees are wind tolerant. Olives can grow on any well drained soil up to pH 8.5. A pH of 6.5-7.5 is ideal. They can tolerate mild salty conditions. In India it grows as 750-1450 m altitude. It grows in Miombo woodland in Africa. It suits hardiness zones 8-10. In Sichuan and Yunnan.

PRODUCTION

Cultivation

Growing trees from seed mean they revert to wild small fruited kinds. Seed are poorly viable and may take 2 years to germinate. Normally trees are grown by budding or grafting. Suckers can be used but these may be wild seedling kinds. Trees can be grown from cuttings. Cuttings 30-35 cm long and 3-8 cm thick from 2 year old wood are used with rooting hormone. Thinning the crop can increase fruit size. Thinning to 2-3 fruit per twig is

best. Pruning both regulates growth and shapes the tree. Careful pruning can avoid bearing in alternate years. Olives never bear fruit in the same place twice and normally produce on the previous year's growth. Many varieties are self-sterile and need suitable cross pollinators.

Harvesting and Seed Production

Trees can reach bearing age in about 4 years. Trees can live for 500 years. Green olives are picked unripe, black olives when ripe.

NOTES

There are over 20-40 Olea species.

PICTURES



Credit: Food Plants International (Bruce French)



Credit: Food Plants International (Bruce French)



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Credit: Food Plants International (Bruce French)

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