

# Kanna (*Sceletium tortuosum* L.)

## PRODUCTION GUIDELINES



**Introduction:** Kanna is a creeping, succulent medicinal herb indigenous to South Africa, naturally found in the Eastern Cape, Northern Cape, and Western Cape. Traditionally, it is used to elevate moods and to alleviate anxiety and stress. It has long succulent vines, with short, green, fleshy leaves and produces white to pale yellow flowers. Kanna begins to produce flowers about six weeks after transplanting; however, flowering is most abundant in spring.

**Propagation:** Kanna can be easily propagated through cutting. Kanna cuttings should be taken in early autumn, while the plants are in active growth. Cuttings should be treated with a rooting powder (containing rooting hormone called indole butyric acid) and set in well aerated and well-drained growing media. After 6 weeks, the cuttings will show signs of vegetative shooting and when lifted, established roots should be observed.



**Crop management:** Kanna grows well during winter, autumn, and spring, but enters a dormant period in summer. It requires sandy-loam soil and winter temperatures above 15°C, as it is sensitive to frost. In areas where winter temperatures drop below 15°C, frost covers should be used. The field where Kanna is cultivated should be kept clean, and soil moisture must be carefully monitored to prevent rotting and damping-off.



**Water requirements:** As a succulent plant, Kanna does not require frequent irrigation. Newly propagated cuttings should be lightly irrigated. Field-transplanted seedlings should be watered on the same day after transplanting, then irrigated once every two weeks. Once the plants are well established, irrigation can be reduced to once a week. During summer, irrigation may be reduced to once a month or omitted entirely, depending on soil moisture levels. Excessive irrigation in summer may increase plant mortality due to a higher risk of rotting.

**Pests and diseases:** The major pests observed on cultivated Kanna were black aphids, cutworms, and root-knot nematodes. It is recommended to apply cutworm bait immediately after transplanting. Root-knot nematodes were noted only on mature plants.

**Fertilizer:** Established Kanna cuttings should be supplemented with suitable multi-nutrients. While based on the soil analysis transplanted seedlings should be given macro-nutrients N:P:K as a base fertilizer, followed by supplemental applications. Fertilizer application should be split and once in winter, autumn and again once in spring. Organic fertilizer can also be used.

**Harvesting and drying:** Flowers and stem can be harvested in spring to early summer before the onset of dormancy. Cut back vines 10-15 centimetres from the ground to form new side shoots. The harvested material can be oven dried for 1-3 days at 45±5 °C until fully dried, also under shade and full sun exposure for 3-6 days until completely dry.



### CONTACT US:

Prof. SO Amoo (AmooS@arc.agric.za)

Dr. MM Mofokeng (MofokengM@arc.agric.za)

Dr. NT Sithole (SitholeNT@arc.agric.za)

Mr. KV Maedza (MaedzaK@arc.agric.za)

Ms. M Ramudzuli (MbavhaleloR@arc.agric.za)

Mr. TJ Mahlangu (MahlanguT@arc.agric.za)