

CHRYSANTHEMUM: QUEEN OF EAST

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Introduction

The chrysanthemum (*Dendranthema grandiflora*) is important ornamental crop mainly grown for the production of cut flowers, loose flowers and pot plants. The plant belongs to family Asteraceae and is popularly known as "Queen of the East". In general, chrysanthemum is a qualitative short day plant. It flowers only when short photoperiods are available. But the demands for the flowers are more especially during occasions like New Year, Christmas, mother's day, etc. If the farmer is able to produce during these peak consumption periods it fetches a lot to the farmer.



Varieties

CO 1 (yellow coloured flowers), CO 2 (purple coloured flowers), MDU 1 (yellow coloured flowers) Indira and Red Gold.

Climate: Tropical and subtropical climatic conditions are ideal. However, the best temperature for growing chrysanthemum is 20-28°C for day and 15-20°C for night. Since chrysanthemum is a short day plant, planting should be done such that flowering coincides with short day conditions. Under Tamil Nadu conditions, it is planted during April-May so that it flowers during September - December.

Soil: Well drained red loamy soil with pH of 6 to 7.

Propagation and planting: Commercial propagation is through terminal cuttings (5-7 cm long) or suckers. Planting during June - July at 30 x 30 cm spacing on one side of ridges (1,11,000 plants/ha).

Irrigation

Irrigation is done twice a week in the first month and subsequently at weekly intervals.

Manuring

Recommended dose - 25t FYM and 125:120: 25 kg NPK/ha.

Basal application - half of N + entire P and K; top dressing - half of N applied 30 days after planting.

Pinching: Done 4 weeks after planting to induce lateral branches.

Desuckering: Remove the side suckers periodically.

Micronutrients: Foliar spray of ZnSO₄ 0.25% + MgSO₄ 0.5%.

Biofertilizers: Soil application of 2 kg each of *Azospirillum* and *Phosphobacteria* per ha at the time of planting. It is to be mixed with 100kg of FYM and applied.

Growth regulators: Spray GA3 @ 50 ppm on 30, 45 and 60 days after planting.

Plant protection:

Pests:

Thrips, aphids and leaf eating caterpillars: Spray Acetamiprid @ 0.3 g/l or Indoxacarb @ 1 ml/l

Diseases:

Root rot: Soil drenching with Copper oxychloride 2.5 g/lit or Trifloxystrobin + Tebuconazole @ 0.75 g/litre or Difenoconazole @ 0.5ml/l

Leaf spot: Foliar application of Mancozeb @ 2.5g/l or Azoxystrobin @ 1g/l

Chrysanthemum mosaic disease

1. Cuttings should be obtained from virus – free indexed stocks.
2. Removal and destruction of infected plants.
3. Destruction of the weed host.
4. Spraying Monocrotophos 0.05 per cent controls the vector and reduces the disease.

Leaf spot

To control the leaf spot, spray Mancozeb @ 2 g/lit.

Duration

The duration is 6 - 8 months for plant crop and 4 months for ratoon crops.

Harvest

Harvesting of the flowers starts from 3rd month onwards at 4 days intervals. Harvesting is done at 3/4 to full open stage for nearby markets and 1/2 open stage for distant markets.

Yield

An average yield of 20 t/ha from plant crop and 10 t/ha from ratoon crop can be obtained.