

TOMATO PLANTING GUIDE



Kenya Highland Seed Company LTD has an outstanding portfolio of selected determinate (Open Pollinated Varieties and Hybrid tomato varieties) that are segmented to perform well across different regions. Our Indeterminate varieties have the ability to perform well in the open field and under greenhouse units.

Nursery Establishment

- The plot should be well prepared by digging and mixing the soil with well decomposed farmyard manure.
- Poultry manure is not advisable to be used at the nursery level due to high nitrogen levels that inhibit proper seedling establishment.
- Drench the nursery bed with an insecticide and fungicide to prevent early attacks from soil borne pests and any fungal disease.
- For ease of nursery management practices such as weeding and irrigation, ensure the nursery bed is 1m wide and of a conventional length.
- Make shallow drills of 2cm - 3cm depth at a spacing of 10cm – 20cm apart. Thinly sow the seeds and cover them lightly using soil or well decomposed and fine farmyard manure.
- Irrigate the nursery bed frequently in the morning hours maintaining damp and not wet conditions.
- Seedlings are ready for transplanting in 3-4weeks time. Allow some extra days for seedlings to harden. This ensures reduced transplanting shock.
- Alternatively, the seeds can be sowed using seeding trays with appropriate propagation media such as Peat moss and Cocopeat.





LAND PREPARATION

- Tomatoes require well – drained deep fertile soils with a pH of 6.0 to 7.0 for optimal growth. However, most of the soils in Kenya are nutrient poor which in turn makes it difficult for farmers to achieve good yields.
- It is advisable for farmers to implement good soil management practices such as crop rotation and fertilizer application as per the recommendations from a soil test analysis.

TRANSPLANTING

- Tomato seedlings are ready for transplanting 3-4weeks from sowing. The nursery bed should be watered for ease uprooting the seedlings and transplanting in the evening hours to minimize risk of transplanting shock that arises from excessive evapotranspiration leading to permanent wilting which in turn makes the young seedlings dry up.
- Spacing depends on the variety grown and irrigation system used. For determinate (bush varieties) 60cm by 60cm or 75cm by 75cm is recommended and indeterminate varieties 60cm by 45cm.
- Furrow irrigation is an effective way for minimizing risks brought about by fungal diseases such as early blight. On the other hand, drip irrigation is efficient in water utilization.



- Overhead irrigation is not recommended to Solanaceous crops as this encourages spread of fungal diseases due to leaf wetness in which the pathogen spores landing on the host plant, an irrigation event allows the infection process to begin. As the disease progresses, overhead irrigation can splash the pathogens (spores) from infected plants to healthy plants leading to further disease spread.



NUTRITIONAL REQUIREMENT

- During transplanting, it is important to have the planting holes mixed with well decomposed manure and a basal fertilizer rich in Phosphorous for proper root development such as D.A.P or N.P.K.
- Top dressing should be carried out 3weeks after transplanting with a basal fertilizer rich in Nitrogen and a second application carried out 2-3weeks from the first top-dress.
- At the onset of flowering, top dress using a balanced N.P.K and repeat after harvesting to replenish nutrients lost through the harvesting process.
- Foliar fertilizers can be applied to substitute basal fertilizers applied especially during periods of high stress such as hot periods that can hinder nutrient uptake such as Calcium.





TOMATO SUPPORT SYSTEM

- Staking tomatoes should be done when the plants are still young to avoid stem damage by breaking which can in turn act as a secondary entry point of pathogens.
- It is not advisable to prune determinate (bush) varieties as this side shoots contribute to the overall yield by holding more fruits.
- Indeterminate varieties are pruned and this involves removal of extra flowers, side shoots and diseased leaves.
- Under good agronomic practices, determinate varieties can be harvested for a period of up to 3months while indeterminate varieties can be harvested for a period of over 6months.

