Chapter 6

CONCLUSION AND RECOMMENDATION

The study on the effects of management practice on yield and quality of tomatoes suggested that a wider plant spacing of 30 and 45 cm produced higher marketable yield than 15 cm plant spacing in the nonstaking treatment. Wider plant spacing also produced more and greater fruits, and resulted in the higher yield per plant. Staking resulted in significantly higher marketable yield than nonstaking at 15 cm plant spacing. Staking also reduced the unmarketable yield significantly.

A higher rate of K fertilizer contributes to better quality of tomato fruit in terms of total acidity and the color. K fertilizer also had interaction effects with staking and plant spacing on the total solids and the soluble solids. Staking and plant density did not have significant effect on the internal quality of tomato fruits, e.g. total acidity, total solids and soluble solids.

According to the results from the experiment, a wider spacing (75 x 45 cm) or lower plant population (29,630 plants/ha) without staking should be recommended to the farmers who grow VF 134-1-2 variety. Comparing this plant population with the population in the farmers' fields (Table 2), they are very close. Howver, when comparing the yields

from the experiment with those from the farmers' fields, there exists a very wide gap between them (Table 2 and Table 4). Hence other management practices, e.g. pest management, technique of fertilizer application, or the adjustment of row spacing are suggested to deserve further detailed observation. Since a high rate of K improved the quality of tomato fruits, but did not increase the yield, the recommendation will depend on the differential prices for different quality of tomato set by the processing plants.

Staking as an intensive cultivation method to obtain higher yield should be further explored for different varieties of tomatoes particularly in the nondeterminated varieties. To be economically feasible, planting date or seasons should also be explored to verify returns to investment of staking before general recommendation is made to the farmers.

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