

Intercultural Operations

Weed Control

Weeds are controlled mainly by hand weeding or hoeing, however this practice is very laborious and expensive. Chemical control of weeds by spraying Diuron @ 5 kg a.i. /ha and Atrazine @ 5 kg a.i./ha are found satisfactory for the control of weeds in both young and bearing litchi plantations. As these are pre-emergence herbicides, which inhibit weed growth for 6 or more weeks, therefore, the spray should be repeated after 2 months of previous application. The use of mulch also controls the growth of weeds. Black polyethylene mulch is more superior in controlling weeds than the organic mulch.

Tillage

Maintenance of good sanitary conditions is a must for keeping an orchard in healthy and disease-free condition. As litchi is a shallow rooted tree with most of its feeding roots close to the surface, only shallow tillage is recommended. The shallow tillage operations should be limited to upper 5-7 cm soil layers. If deep tillage is necessary then it is carried out from November to February, as the trees are least active during this period.

Intercropping

The litchi is a slow-growing tree and takes at least six years to come to flowering and fruiting. Intercrop like legumes in pre-bearing stage of trees not only provide more income but also improve health of the trees. The choice of intercrop depends upon the climate and soil and marketing facilities. Vegetables or leguminous crops like pulses, berseem, etc. can be successfully grown during the initial stages. Some quick-growing fruit plants such as drumstick, papaya, and banana can also be grown in the early years of a litchi plantation. Papaya and banana are more suitable due to their upright growth and due to short productive life of 2-3 years. While growing intercrop, care should be taken to ensure that the intercrop is not grown at the cost of the litchi plants. The rows of intercrop should be kept away from the litchi tree.

Training and Pruning

Training of young litchi plants is done to establish a good framework. Pruning is usually done to remove the dead or diseased branches and damaged shoots. Since litchi flowers are borne mostly on current year's growth, the removal of the ends of the fruiting branches promotes new shoots and flowering next year. Therefore while harvesting, a portion of the twig is cut off along with the fruits. When the trees become too old and produce fruits of small size, heavy pruning improves the yield and quality of fruits by promoting new shoot growth.