

Post-Harvest Pruning in Cherries

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For over a decade the cherry industry has been doing more and more pruning of bearing trees between cherry and apple harvest. This is a time of year when we have labor available and don't have to fight the inefficiencies inherent with dormant pruning in the snow and cold.

To date we have observed no negative impact on winter hardiness of trees, nor any effect on spring flower bud hardiness. However, because of the concern for potential increased susceptibility to winter injury and possible influence on next season's growth, we suggest the following precautions:

- Do not prune after mid-September.
- Avoid exceptionally heavy pruning, particularly of sweet cherries, at this time.
- Do not prune young tart or sweet cherries that have not filled their space in late summer.

Having said that extra heavy pruning should be avoided in late summer, I want to comment that many sweet and tart orchards need exactly that! Too many orchards are getting too tall for the spacings at which they are planted. The result is excessive shading in the lower canopy which results in loss of lower fruiting wood, trees too tall to get adequate spray coverage for controlling cherry leaf spot and brown rot, and a large drop for cherries onto the harvester, which may increase fruit bruising and softening.

This season we conducted a preliminary study to evaluate the effect of drop height on soft fruit problems in tarts. While this preliminary study is very limited in scope, the data show a strong trend towards increased damage as the drop height increases. For all of these reasons, it is very important that tree height be limited!

Some suggestions for tree height to optimize light reception:

- For triangular shaped trees, the height of the bearing area of the tree should be no more than three times the clear alleyway width. The clear alleyway is the distance between the branches of the trees from row to row, not the plant distances between rows. For example, a six-foot clear alleyway would imply the tree height could be up to 3 X 6 ft., or 18 feet plus about four feet from the ground to the base of the desired fruiting area, for a total height of about 22 feet.
- For a rectangular shaped tree, the height of the bearing surface should be twice the drive alleyway distance. For example, again assuming a six foot clear alleyway implies a height of 2 X 6 ft., or 12 feet plus four feet from the ground to the desired base of the fruiting area, for a total height of 16 ft.

These formulas address light only. You need also to consider the capability of your sprayer to adequately cover tops of trees and possibly the propensity of the block to have soft fruit problems. We hope to be able to collect more data on the effect of tree height on soft fruit in coming years.