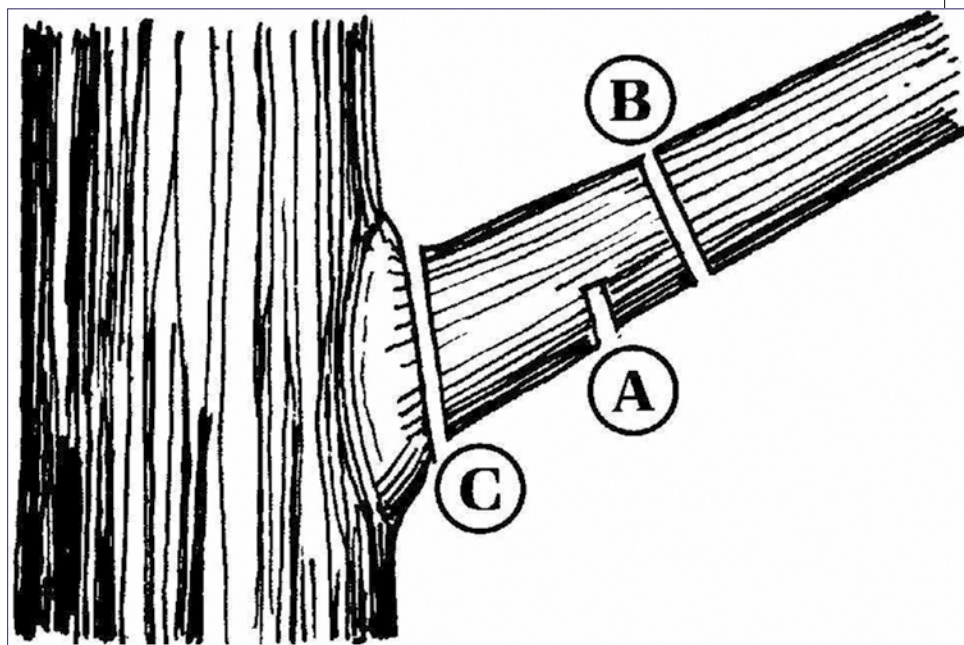


Pruning 101: Pruning Dos and Don'ts for Healthy Trees

In late October, during the last major heat wave of 2017, I had the unfortunate experience of visiting an avocado grove that had been recently pruned by an inexperienced pruning crew with little or no supervision. Unfortunately, that grove will suffer from the effects of that pruning for several years, and it will probably require follow up pruning to correct the tree structure. Although this was a devastating experience for this grower, it can be a learning experience for the rest of us. Here are a few basic dos and don'ts about pruning that should always be followed.

Use Sharp, Clean Pruning Tools

You should always make sure that the pruning crew's tools are clean and sharp prior to the starting of any pruning work in your grove. Sharp tools will make clean cuts that heal quickly. Clean tools will prevent the spread of pathogens. We are fortunate in avocado that we don't have many pathogen problems, but avocado sun blotch viroid (ASBVd), *Fusarium euwallaceae*, and dothiorella branch canker can all be moved via contaminated pruning tools. Good sanitation practices always should be followed



An illustration of the three-cut pruning method. The first cut is a shallow undercut about 12 inches from the branch's point of origin (A); the second cut is made on the top side of the branch about 1 to 2 inches beyond the undercut (B); the final cut is made at the branch collar to remove the remainder of the branch (C).

and pruning tools cleaned between each tree. Lysol® disinfectant spray, alcohol or 10 percent chlorine bleach all can be used to effectively disinfect tools. Wipe away any debris prior to sanitizing the tool to ensure the disinfectant contacts the metal.

Follow the Three-Cut Method for Large Branches

Any branch over about 1½ to 2 inches in diameter should be pruned using the three-cut method to ensure a clean cut and no bark tearing. The three-cut method is done as follows:

Make a shallow relief cut on the



When a large branch is removed without following the three-cut method the result is a large jagged wound that will not heal properly and is an opportunity for disease to enter the tree.

underside of the branch about 12 inches from the branch collar. The relief cut should go about one-third of the way through the branch.

Remove the bulk of the branch by making a second cut about one to two inches beyond the relief cut from the top side of the branch. As the cut is made from the top side, the branch will break free between the top cut and relief cut.

Make a final, clean cut at the branch collar to remove the remainder of the branch.

Apply Whitewash

Avocados are very sensitive to sunburn, especially when pruned heavily and areas of the canopy that were previously shaded are exposed to direct sunlight. Sunburn can occur very

quickly following pruning, so it is a good practice to follow immediately behind a pruning crew and whitewash newly exposed areas of the canopy. There are commercially available whitewash products and sun protectants, such as Surround®, which is a kaolin clay product. But the most economical whitewash is cheap interior latex paint diluted 50:50 with water. Exterior latex paint or latex paint formulated for bathrooms should never be used. These often contain fungicides and mildewcides that can be harmful to the trees.

Watch the Weather Forecast

Although we generally have good weather in California, you should pay attention to the forecast if you are planning to prune, especially if you're going to be making heavy pruning cuts. If a heatwave is forecast, it is best to wait for the heat to pass before pruning to help avoid sunburn. Likewise, if rain is in the forecast, wait for the rain to pass. Fresh pruning wounds are susceptible to pathogen entry until the wound surface

has a chance to dry and cure — usually 24 to 48 hours. Rain immediately following pruning could wash pathogens into the pruning wounds, so it is better to play it safe and wait for the rain to pass.

Don't Apply Pruning Wound Sealant

Pruning wound sealants, commonly tar or wax-based products, should not be used. Countless studies have shown that properly-made pruning cuts created with sharp tools heal more quickly than those treated with pruning wound sealants. These sealants actually prevent the tree's natural wound response from occurring and can lead to more disease and rot issues than they prevent.

Pruning avocados in California is never an easy task since there is always fruit on the trees that will be removed. But following a few basic steps can help ensure that your pruning job doesn't turn into a pruning nightmare. 🥑



Severe branch and fruit sunburn due to the lack of whitewash following pruning.