

Effect of Tannin Additions Postfermentation with Gelatin Remediation in Paso Robles Cabernet Sauvignon

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The resultant color of a Cabernet Sauvignon wine connotes overall quality. Therefore, it is in the best interests of a winery to produce a well-balanced wine, containing the deepest color possible, using the least amount of additives. This experiment studied the effects of adding ColorPro, VRSupra, and Gelatin Extra No.1 to Cabernet Sauvignon fruit from Paso Robles to determine if anthocyanin and tannin levels changed with respect to the aforementioned supplements. To increase color and tannin extraction, ColorPro was added to the grape must prior to fermentation. A tannin powder, VRSupra, was added later in the winemaking process to reduce the bitterness and astringency obtained as a by-product of the enzyme addition. It is our presumption that the more tannin added throughout the winemaking process, the less gelatin remediation is needed on the wine prior to bottling. Three different tanks of Cabernet Sauvignon were monitored and analyzed. Varying rates of ColorPro were added at the hopper (0, 60, and 100 mL/ton). Postfermentation, four neutral American barrels were filled with free-run wine from each tank. Different rates of VRSupra tannin were added to the four barrels from each tank (0, 10, 20, 40 g/hL). The Adams assay was used to quantify amounts of total phenols, anthocyanin, tannin, and long and short polymeric pigments. Results suggest that there are no significant differences in the resultant stable color of the wines, but tannin levels were influenced by the addition of ColorPro, as well as VRSupra, determined by the Harbertson-Adams assay.