

Weed Shifts in North Coast Grapes Due to Changing Weed Control Practices

John A. Roncoroni UCCE Weed Science Farm Advisor, Napa

Email : jaroncoroni@ucdavis.edu

Weed control practices in North Coast Vineyards, particularly those in Napa County have change in the last 20 years. Many vineyards have adopted 'no-till' or minimum tillage practices for weed control within the vineyard. Changing from tillage using herbicide under the vine has changed the weed composition. The herbicides used in that 20 year period have also changed. Some new herbicides have been registered for use in grapes. The biggest change in herbicide use is the shift by some managers to using postemergent herbicides exclusively.

We really don't have any new weeds in the vineyard, but there has been a shift in their occurrence and density. The 'old' weeds: Filaree, Prickly Lettuce, Sowthistle, Mustards, Wild Carrot, Chickweed, Annual Bluegrass, and Wild Oats are still around and important problems in many vineyards. The 'new' weeds: Filaree continues to be a serious weed problem and is now joined by Sharpoint Fluvellin, Horseweed, Panicle Willowherb, and Hairy Fleabane that have been around in fairly low numbers for years. Hairy Fleabane is not a problem in vineyards in the North Coast, yet. It is now found on roadsides and in areas outside of and around the vineyard, but has the potential to move into the vineyard and become a very serious problem.

The characteristics that these new weeds share is that they are not well controlled by glyphosate (Roundup). The exception is Sharpoint fluvellin. Fluvellin is controlled by glyphosate but grows at times in the North Coast when glyphosate is not normally used. Germination is in mid-to- late summer, and continuing into the fall when vines are most susceptible to glyphosate drift.

The practice of 'RoundUp' only has gained popularity because of the relatively low cost of glyphosate products and a reduction in cultivation because of high cost and increased erosion potential. Many growers have chosen not to use pre-emergence herbicide because of the threat of off-site movement. Many growers are now re-evaluating their weed control practices to control these new weeds.