HORTICULTURE Project No: 10-HORT3-Connell

Almond Culture and Orchard Management

Overall Project Leader: Joseph H. Connell University of California Cooperative Extension, 2279-B Del Oro Ave., Oroville, CA 95965-3315 (530) 538-7201, jhconnell@ucdavis.edu

SUMMARY OF CURRENT PROJECT ACTIVITIES

Under the ongoing University of California Cooperative Extension program, county-based farm advisors conduct small research projects, including the following six almond-related efforts:

- Increasing the Nonpareil Percentage:
 Pollenizer Arrangement and Bloom Timing
 (Project Leader: Joseph H. Connell, UCCE)
 This ongoing replicated experiment is exploring whether Nonpareil yields can be increased by planting pollenizers down the Nonpareil rows, and also whether the mix of early blooming and mid-blooming pollenizers makes a difference.
- The Impacts on Young Almond Trees of Delaying Pruning until Early Spring (Project Leader: Carolyn DeBuse, UCCE, Solano and Yolo counties) The purpose of this comparative experiment is to ascertain whether it would be effective to prune young almond trees in the usually dry early spring, when they are less likely to be exposed to the canker-causing pathogens that are prevalent in the wet dormant period when trees are traditionally pruned.
- Salinity Tolerance of Six Almond
 Rootstocks (Project Leader: David Doll,
 UCCE, Merced County) This experiment will
 examine the documented differences in
 growth and almond yield between peach almond hybrid rootstocks and peach
 rootstocks to test a hypothesis that hybrids
 perform better in areas of elevated salt levels.

- Evaluation of Almond Production on Raised Beds (Project Leader: John Edstrom, UCCE, Colusa County). The purpose of this ongoing effort is to evaluate the feasibility and consequences of employing a novel raisedbed orchard-planting system—developed in Australia—in the clay-layered and shallow soils found in the Central Valley.
- **Exploring Ways of Suppressing the** Tenlined June Beetle (Project Leader: Elizabeth Fichtner, UCCE, Tulare County) This project takes three-pronged approach to coping with the Tenlined June beetle. One prong consists of developing a technique to measure TLJB metabolic function as a first step to suppressing the larvae. A second prong calls for assessing the influence of soil matric potential and soil texture on TLJB activity; given that TLJB damage may be greater in drier orchard areas. The third prong consists of assessing the impact of MicroLife All-Organic Biological Fertilizer on the metabolism of TLJB larvae—and product's value as a potential larvae suppressor.
- Increasing the Boron Level in Almond Trees in Sutter County—How Long Can It Last? (Project Leader: Franz Niederholzer, Sutter and Yuba Counties) This ongoing experiment is designed to answer the question posed in the project title, which, in turn, stems from a Nickels Soil Laboratory study showing that a fall or bloom foliar boron spray can increase nut yield where hull boron levels are deficient. Results for 2009 were better than for 2008, so attention is now focused on 2010.

For More Details, Visit

- Poster location 5, Exhibit Hall, Session 3; or on the web (after January 2011) at AlmondBoard.com/AlCposters
- 2009-10 Annual Report CD (09-HORT3-Connell); or on the web (after January 2011) at AlmondBoard.com/ResearchReports