

COUNTY OF MADERA
 BUDGET UNIT DETAIL
 BUDGET FOR THE FISCAL YEAR 2022-23

Department: COOP. EXTENSION
 SERVICE (09200)
 Function: Other
 Activity: Ag. Education
 Fund: General

	ACTUAL <u>2020-21</u>	BOARD APPROVED <u>2021-22</u>	DEPARTMENT REQUEST <u>2022-23</u>	CAO RECOMMENDED <u>2022-23</u>
<u>ESTIMATED REVENUES:</u>				
OTHER FINANCING SOURCES				
680200 Operating Transfer In	3,561	0	0	0
TOTAL ESTIMATED REVENUE	3561	0	0	0
<u>EXPENDITURES:</u>				
SERVICES & SUPPLIES				
720300 Communications	871	1,100	1,100	1,100
721400 Professional & Specialized Services	92,639	95,003	99,795	99,795
721601 Rents & Leases - Co Vehicle	3	0	0	0
TOTAL SERVICES & SUPPLIES	93,513	96,103	100,895	100,895
<u>TOTAL EXPENDITURES</u>	<u>93,513</u>	<u>96,103</u>	<u>100,895</u>	<u>100,895</u>
<u>NET COUNTY COST (EXP - REV)</u>	<u>93,513</u>	<u>96,103</u>	<u>100,895</u>	<u>100,895</u>

COOPERATIVE EXTENSION

COMMENTS

The University of California Cooperative Extension (UCCE) is the county-based research and educational program of the University of California, Division of Agriculture and Natural Resources and is a cooperating partnership between the County of Madera, the University of California and the United States Department of Agriculture.

The Mission of UCCE:

To serve California through the creation, development, extension and application of knowledge in agricultural, natural and human resources.

UCCE serves the local citizens of Madera through:

- Agriculture research and education to develop and improve agricultural practices.
 - Youth development programs to develop life skills, leadership and community service through (hands-on) education.
 - Nutrition education programs that help individuals and families to eat better, stretch their food dollars, handle food safely and improve health.
 - Extending information on sustainable landscape and gardening practices to the community.
- Our mission is accomplished through the education and research programs conducted by UCCE advisors and program leaders. The advisors and program leaders work with agricultural clientele, county residents, youth, families and community agencies to provide science-based knowledge and solutions to local residents.

A major strength of the UCCE partnership is the ability to leverage internal and external resources to serve the residents of Madera County. For each dollar of County support, more than three additional dollars are leveraged from state, federal and private sources. Although the revenue from increased agricultural productivity resulting from the research and extension programs is difficult to measure in any given year, it is estimated that for \$1.00 invested in agricultural research and extension, there is a return of \$20 to the community.

Programs serving agriculture provide research-based answers to production challenges; assisting local growers and allied industry in the sustainable, economically viable, and safe production of their crops. Advisors serving Madera County cover 4-H Youth Development, Dairy, Horticulture, Livestock and Natural Resources, Nutrient Management and Soil Quality, Orchard Crops, and Viticulture. We have a strong Master Gardener program serving the public of Madera County. The CalFresh Healthy Living, UC program provides support and resources to teachers in low-income Madera County Schools.

COOPERATIVE EXTENSION

COMMENTS (continued)

Pursuant to a 2013 agreement with the University of California (UC), Madera County finances clerical staff, office supplies, facilities, and operating expenses for Cooperative Extension (CE). The Multi-County Partnership agreement also includes Fresno County and resources are provided to allow for delivery of the Cooperative Extension services there. UC is responsible for funding salaries and benefits for the academic staff and procuring grant funding for programmatic efforts. The total budget for Fiscal Year 20/21 was \$8,433,976.; 7% of which was provided by the Counties and 93% by the University.

4-H Youth Development

In 4-H, youth discover and develop their potential to grow into competent, contributing, and caring citizens. Learn-by-doing activities, youth-adult partnerships, and research-based educational programs help members develop and enhance their leadership skills and build a wide range of life skills. Along with traditional community-based clubs and residential overnight camp programming, 4-H has adapted to COVID related restrictions by offering virtual and blended opportunities. Additionally, our 4-H Advisor and Program Representative continue to offer programs targeted to rural, low income, and minority populations to introduce them to the benefits of 4-H.

Dairy

The dairy extension program goal is to provide dairy producers with applied research and extension education programs across a spectrum of industry issues as they relate to the dairy production system. This includes environmental stewardship, quality assurance, animal welfare, food safety and production efficiency in order to assist dairy producers in making their operations compatible with current and future environmental concern and contribute to the success of their operations.

ENVIRONMENTAL HORTICULTURE AND MASTER GARDENER VOLUNTEERS

The mission of the Master Gardener program is to provide research-based information for gardening practices and technologies of home horticulture, integrated pest management (IPM), and environmental resource conservation. Master Gardeners answer questions, conduct demonstrations, diagnose plant/pest problems, and provide this horticultural assistance by e-mail, free gardening class at the Three Sister's demonstration garden located on the Madera College site. We aid Madera School district in collaboration with the Cal Fresh program, we are now working with Habit for Humanity for gardening education for their new homeowners and their volunteers. Madera County grounds crew has received support from the MG program in the Maintenance at the Oakhurst Library and North Fork library. We are offering zoom class with the Madera Library and hosting their new Story Walks project site in our demonstration garden at the college.

COMMENTS (continued)

LIVESTOCK AND NATURAL RESOURCES

Livestock and natural resources research and extension assists local producers in maintaining livestock production, a key economic sector in Fresno and Madera Counties, while conserving and enhancing natural resources and ecosystem services on working landscapes.

The livestock and natural resources program connect to clientele through social media, quarterly newsletters, and webinars, workshops, and symposia. Recent topics include:

- Livestock disaster preparedness and response
- Small acreage weed management
- Cutting-edge beef cattle health advancements
- Risk management for commercial sheep flocks
- Prescribed fire for wildfire risk reduction

Forage production data are used by USDA Farm Service Agency to help determine drought impacts to local livestock operations. A new study with sites in Fresno and Madera Counties is testing remote sensing methods to complement or replace physical forage sampling, to better detect drought and expedite compensation to ranchers in need.

Ongoing trainings cover the use of prescribed fire in forests and rangelands, including for weed management and fire risk reduction.

NUTRIENT MANAGEMENT AND SOIL QUALITY

The goal of the Soil Quality and Nutrient Management research and extension program is to provide growers, consultants, and allied industry the information they need to improve crop production while conserving resources. Efforts include webinars, a quarterly newsletter, organizing the annual Alfalfa and Forage Field Day, and research trials on cover crops, biostimulants, pistachio nutrition, and characterizing manure on San Joaquin Valley dairies.

NUTRITION, FAMILY, AND CONSUMER SCIENCES

The CalFresh Healthy Living, University of California Cooperative Extension (CFHL, UCCE) program brings \$1.25 million to Fresno and Madera counties to deliver direct nutrition and physical activity education and improve the lives of CalFresh eligible individuals and families. We partner with the county Department of Public Health, social services programs and local school districts to provide programming in schools and community centers.

COMMENTS (continued)

ORCHARD CROPS

The Orchard Crops advisor conducts research and extension activities to help Madera orchard growers, PCAs, and crop consultants improve their productivity and sustainability. Her extension program includes a podcast (Growing the Valley), a website (www.sjvtandv.com), annual meetings, as well as working with orchard decision makers individually through emails, phone calls, and more than 100 farm calls. Her research program includes an almond variety trial, where she manages one of three sites that are evaluating 30 different almond varieties; a research project examining the effect of boron, salinity, and soil oxygen levels on pistachio performance; a site to evaluate the field-scale feasibility of a new, pesticide free method to disinfect soils before planting new orchards; and developing new methods to reduce insect infestation in dried figs.

VITICULTURE

Karl continues his work on rootstocks within the San Joaquin Valley. His work with new nematode resistant rootstocks has identified nutrient uptake, canopy growth, water management, and yield differences between these rootstocks that will help growers better understand how to use these new rootstocks. With continued funding the effects these nematode resistant rootstocks have on wine quality will next be tested.

Karl, along with his colleagues in the Fresno office, recently (July of 2021) planted a trial at the University of California West Side Research and Extension Center (WSREC) near Five Points, CA. This trial will look at the interaction between rootstock, lower quality irrigation water, and drought stress. This is an important trial to identify which rootstocks can handle less and lower quality irrigation water, while still returning yields that are profitable for local growers.

In addition, Karl continues to work on vineyard mechanization. With the cost of labor rising many tasks have been mechanized. This gives San Joaquin Valley growers an interesting opportunity as some of the tasks that have been mechanized were tasks that previously had been only used in higher end wine production. Multiple mechanical management tools are now being trialed to see if they improve wine quality and pest management outcomes locally.

COOPERATIVE EXTENSION

SERVICES AND SUPPLIES

Services and supplies are recommended based on the Multi-County Partnership Agreement.

720300 **Communications** (\$1,100) is recommended unchanged for telephone and fax costs as required under the Multi-County Partnership Agreement.

721400 **Professional and Specialized** (\$99,795) is recommended and reflects a \$4,792 increase in the contribution to the University of California Cooperative Extension through a Multi-County Partnership Agreement.