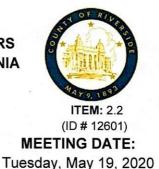
SUBMITTAL TO THE BOARD OF SUPERVISORS COUNTY OF RIVERSIDE, STATE OF CALIFORNIA



FROM: COOPERATIVE EXTENSION:

SUBJECT: COOPERATIVE EXTENSION: FY19-20 Cooperative Extension Annual Report, All

Districts. [\$0]

RECOMMENDED MOTION: That the Board of Supervisors:

Receive and file the FY19-20 Cooperative Extension Annual Report.

ACTION:Consent

Etaferahu Takele 5/13/2020

MINUTES OF THE BOARD OF SUPERVISORS

On motion of Supervisor Jeffries, seconded by Supervisor Spiegel and duly carried by unanimous vote, IT WAS ORDERED that the above matter is approved as recommended.

Ayes:

Jeffries, Spiegel, Washington, Perez and Hewitt

Nays:

None

Kecia R. Harper Clerk of the Board

Absent: Date: None May 19, 2020

By:

XC:

Cooperative Extension

puly

SUBMITTAL TO THE BOARD OF SUPERVISORS COUNTY OF RIVERSIDE, STATE OF CALIFORNIA

FINANCIAL DATA	Current Fiscal Y	ear:	Next Fiscal Year:		Total Cost:		Ongoing Cost		
COST	\$	0	\$	0	\$	0		\$	0
NET COUNTY COST	\$	0	\$	0	\$	0		\$	0
SOURCE OF FUNDS	Budget	Budget Adjustment:			N/A				
COUNCE OF FORD					For Fis	cal Ye	ar:	N/A	١.

C.E.O. RECOMMENDATION: Approve

BACKGROUND:

Summary

UCCE, in partnership with the County of Riverside, has provided research-based information and educational programs to the residents of county of Riverside for over 100 years. Following the establishment of the Federal Smith Lever Act (1914) the County and the University entered into a cooperative agreement in 1917. The Smith-Lever Act created a nationwide Cooperative Extension network to bring research and education from land grant universities to the public.

Section 32330 of the State Education Code allows the County Board of Supervisors to appropriate funds for the support and maintenance of extension work in order to maintain the partnership.

Impact on Residents and Businesses

University of California Agriculture and Natural Resources (UCANR) brings the power of UC research to give people the tools to improve the lives of all Californians. This is done through both county-based Advisors and campus-based Extension Specialists who work as teams to develop and provide practical, trusted, science-based answers to solve practical issues that face Californians. UCCE Advisors are problem solvers, catalysts, collaborators, educators and stewards of the land, living in the communities they serve.

- Promoting economic prosperity—Improving agricultural production and developing a qualified workforce.
- Promoting healthy people and communities through nutrition education and 4H youth development programs.
- Promoting healthy environment and sustainable urban landscape through urban horticulture and the Master Gardener program.

SUBMITTAL TO THE BOARD OF SUPERVISORS COUNTY OF RIVERSIDE, STATE OF CALIFORNIA

ATTACHMENTS:

Attachment A: Letter to BOS and CEO of Riverside 5-6-20 (1)
Attachment B: Annual Report FY 2019-20; 5-6-20#final #2

Page 3 of 3 ID# 12601 2.2

Annual Report 2019-20 Cooperative Extension Riverside County

UNIVERSITY OF CALIFORNIA Agriculture and Natural Resources



Research and Education

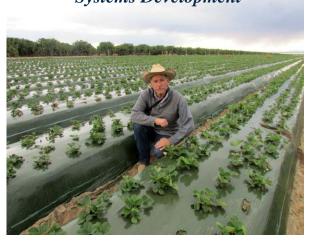
Nutrition and Consumer Sciences: Healthy Communities Development



Master Gardener: Healthy Environmental
Management Strategies



Agriculture and Pest Management: Healthy, Sustainable and Viable Food Systems Development



4-H: Healthy Youth Development



Serving Riverside County residents by delivering research and educational programs in Agriculture, Nutrition, Youth Development, and Natural Resources Since 1917.

University of California, County of Riverside and U.S. Department of Agriculture Cooperating

http://ceriverside.ucanr.edu/

Cooperative Extension in Riverside County was established by an MOU signed in 1917 between the University of California and the County of Riverside.

Cooperative Extension in Riverside County

The University of California Cooperative Extension (UCCE) in Riverside County was formed in 1917 following the Smith Lever Act (1914) that created the nationwide Cooperative Extension with the mission of delivering research information from land grant universities to the public. Riverside County entered a cooperative agreement with the University of California Agricultural and Natural Resources (UCANR) for conducting research and educational programs in agriculture and natural resources, 4-H youth development, nutrition and family and consumer sciences to cause skills and knowledge changes and improve the quality of life and economic well-being of citizens.

We continue to develop research and education that leads to production of nutritious and abundant food; and provide educational programs to make every food choice and every food dollar count. We drive economic prosperity through innovation. We connect people, tools and data to equip communities to prepare for change. We educate residents to create sustainable gardens and landscapes, from growing food to building fire-safe landscapes and making every drop of water count.

The University of California Agriculture and Natural Resources provides academic advisors and educators and the county provides operational and support staff funding in accordance of Section 32330 of Educational code that allows for the Board of Supervisors to appropriate funds for the support and maintenance of extension work. For FY 2019-20 Cooperative Extension Riverside County included \$3.4 million from the University (including federal funding), an increase by 20% from the previous year, and \$683,980 from the County of Riverside.

The benefits of having UCCE in the County of Riverside is multiplied by the expertise we bring to the county from the entire UC system, including research and education from the campuses, experiment stations as well as academics and educators from other counties. Additionally, we bring together a wide array of external partners that help to solve local and statewide problems with science-based solutions. In the 4-H youth development and the Master Gardener programs, we engage the use of volunteers services which in 2019 exceeded 300,000 hours of service from adult volunteers with an estimated value of \$7.7 million.

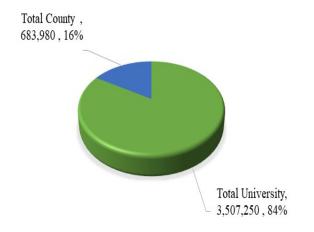
We are grateful to have wonderful community partners and county support that has benefited the county for 104 years. We are looking forward to continuing to provide high-quality science-based education and outreach programs to the youth, at risk citizens, agricultural businesses and helping those who need it most.

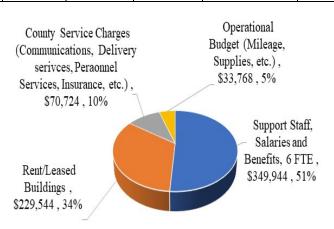
Etaferahu Takele, Director/Department Head Tel. 951-683-6491 Ext.221 Fax: 951-788-2615

E-mail: ettakele@ucnar.edu https://ceriverside.ucanr.edu; https://ucanr.edu UCCE budget sources include the University of California Division of Agriculture and Natural Resources, the Federal Government and the County of Riverside

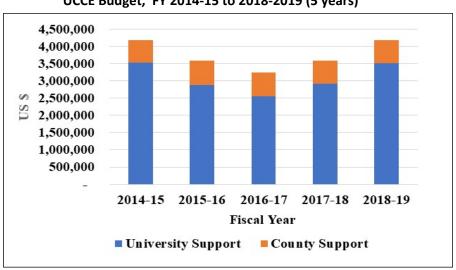
UC Cooperative Extension (UCCE) Riverside County Budget by Fund Source and Utilization

2	Fund Source University Federal Total University	\$ 3,144,967 362,283	% 75% 9%	Support Staff Salaries and Benefits (6 FTE)	Rent- Lease of facilities (\$)	County Service Charges (\$)	Operational Budget (Mileage, Supplies, etc.) (\$)	Total (\$)
4	Total University Total County	3,507,250	16%	(\$)			C(C.) (7)	
4	Total University+County	4,191,230	100%	349,994	229,544	70,724	33,768	683,980





UCCE Budget, FY 2014-15 to 2018-2019 (5 years)



Healthy agricultural systems are essential to our quality of life and economy. UCCE spark innovation and encourage environmentally friendly production practices.

Agriculture in Riverside County

Profile

- Agriculture in Riverside county is a viable and sustainable industry with over 200,000 acres, approximately 3,000 farms producing over 120 commodities including vegetables, vines, field, and tree crops. Agriculture provides 27,000 jobs, has a direct value of an average of \$1.30 billion per year from 2015 to 2018 with an economic value exceeding \$3.9 billion per year.
- Riverside County has a favorable climate for growing multiple crops per year and is supported by availability of good agricultural land and water especially in the eastern part of the county. Cooperative Extension' research and educational programs continues to find solutions to combat and control invasive pests and diseases. We provide guidance to help growers maintain viability and sustainability of the agricultural industry in Riverside County as they are faced with high production costs arising from increasing land and water values especially in the Temecula Valley and Western Riverside County.

UCCE Role in Agriculture

- ♦ Cooperative Extension Academic Advisors (UCCE Advisors) developed new and innovative tools and skills that improved agricultural productivity, controlled pests and diseases and developed efficient irrigation management.
- In FY 2019-20, UCCE advisors conducted innovative research projects that increased avocado production, determined effective pest and disease management practices in grapes, citrus, vegetable crops and alfalfa, and evaluated techniques that increased irrigation efficiency for alfalfa, dates and avocados. Educational seminars and field trips were given so that clientele could see the research successes, which encourages commercial and residential adoption. In 2019, UCCE farm advisors reached their clientele with 37 educational activities, multiple newsletters and websites per year.

Historical Mention

UCCE established a small farm program and placed a farm advisor in the Coachella Valley of Riverside County in the early 1960s. The advisor supported growers in the Coachella Valley to grow high value crops such as okra and chili peppers and helped them reduce their water consumption and lower production costs by converting from furrow irrigation to drip irrigation practices. Growers at our Centennials celebration in 2014 testified about the continuing innovation effectiveness in reducing irrigation water use in crop production and improving growers profits.





Agriculture: Pests/Integrated Pest management Control Carmen Gispert, Farm Advisor

Riverside County UCCE advisors are continually engaged in the development of effective pest control to prevent crops loss while also increasing producer profitability. Investigations of new products and chemistry lead to new registrations of treatments while also reducing potential development of pesticide resistance. UCCE farm advisors have worked on the following and other projects in 2019-20.



Vine mealybug (Planococcus ficus) and Coachella Valley grapes: The vine mealybug is a small, cryptic insect that infests all parts of the grape vine, producing large amounts of honeydew (clear, sugary excretions) and damaging the fruit and foliage resulting in unmarketable grapes and economic losses. Riverside County UCCE viticulture advisor has conducted a research applying pheromones (insect communication/ signaling chemicals) at various times throughout the year to document effective timing of pheromone sprays on vine mealybug populations and preventing insect damage to the grapes. This new approach will support the \$128 million (2016-2017) table grapes industry in the Coachella Valley.



Glassy-winged sharpshooter (GWSS) Scouting in the Coachella Valley: GWSS had done much damage to the Riverside County wine grape industries about 20 years ago, which has ultimately resulted in a loss of over 400 wine grape acres. Though the magnitude of the presence of GWSS has reduced, its prevalence is still concerning. Riverside County UCCE Viticulture advisor in collaboration with the University of California specialists at UCR received funding from the California Department of Food and Agriculture (CDFA) and is conducting a project to determine the movement of the GWSS and the most effective timing for controlling this important pest. This project is in year 2 of 4.

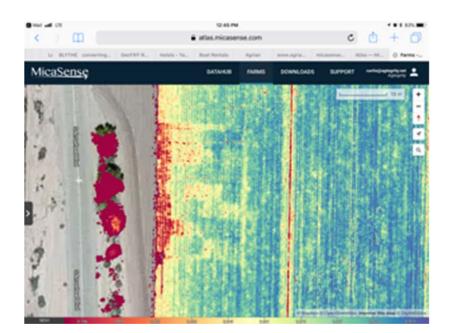


Agriculture: Pests/Integrated Pest management Control Michael Rethwisch, Farm Advisor

Alfalfa Pest control: The blue alfalfa aphid is a major pest of alfalfa. UCCE farm advisor in the Palo Verde Valley in 2020 found from his research yield loss of over 0.5 tons/acre, valued at over \$100/acre and over \$4,500,000 in lost production if not controlled. Products that resulted in highest yields are not yet available in California. The blue alfalfa aphid research conducted by the farm advisor in Riverside County is considered the front-line work for the western US, contributing greatly to the data base for expected and much needed insecticide product registrations for California usage.



Alfalfa stem heavily infested with blue alfalfa aphids





New technology, spectral analyses using a drone, to determine alfalfa aphid feeding. The yellow rectangles showing stress on alfalfa growth caused by blue alfalfa aphid feeding and the darker blue area indicates less feeding stress. Red areas is feeding damage by alfalfa weevil. Gray areas are bare soil, and red within the gray areas are trees/shrubs.

Brighter green and taller plots were treated with effective insecticides providing good control of blue alfalfa aphid and increased alfalfa yields.

Agriculture: Pests/Integrated Pest management Control Sonia Rios and Eta Takele, Farm Advisors

Asian Citrus Psyllid Monitoring and Prevention: The Asian Citrus Psyllid (ACP) is the vector of the bacterial pathogen that causes Huanglongbing (HLB or citrus greening) which is a fatal disease of citrus. There is no known cure for this disease. The disease has devastated citrus production worldwide and is the primary factor that has destroyed ~75% of Florida citrus production. This disease was found in Riverside County residential citrus trees (Riverside, Norco and Corona). Cooperative Extension advisors are continually engaged in training growers and master gardeners on the disease and management of the insect vector ACP. At this time, prevention by controlling psyllids is the only way to manage the spread of the disease. Once a tree is infected, it must be removed. Regulatory measures implemented by CDFA and the Agricultural Commissioner in Riverside County, in addition to heightened awareness and monitoring have slowed the spread of the disease. The Citrus industry in Riverside County was valued at over \$170 million in 2018 Ag. Commissioner's Crop Report. This does not include the value of allied business and job creation.

Cooperative Extension advisors in Riverside County in collaboration with state and local regulator agencies are rallying to get the attention and collaboration of the community to prevent ACP. As Dr. Georgios Vidalakis, a professor and director of the citrus protection program at UC Riverside said "This is a community disease. "We can try as much as we like to fight this, and our state Department of Agriculture and our growers are (fighting), but if our neighbors, if our community altogether doesn't do the right thing, we're going to lose the battle."



Monitoring, identifying and removal of trees if infected by ACP along with CDFA and the Agricultural Commissioner of Riverside County



Educating Growers: UCCE farm advisors, UC specialists and researchers cooperating: Citrus Growers Seminar, Palm Deseret Campus, UCR (June, 2019)



Agriculture: Crop Disease Management Jose Aguiar and Michael Rethwisch, Farm Advisors

Disease management and control, especially in vegetable crops in the Coachella Valley is of importance to Riverside County. Examples of these diseases include soil born necrotic stunt virus and tomato bushy stunt virus (TBSV) in lettuce; bell pepper and chili pepper Fusarium Wilt caused by *Fusarium oxysporum* var. *vasinfectum*; and Late Blight of celery, caused by *Septoria apiicola*. UCCE Riverside County farm advisors developed management and control strategies and extended this information to growers, helping them to prevent and/or reduce the impact of diseases. UCCE farm advisors have worked on the following and other treatments in 2019-20.



Green Beans: Rhizoctonia stem and root rot has been a common problem of newly planted fields seedlings when growers do not practice crop rotations. Rhizoctonia stem and root rot is a serious problem because the seedlings will die. This disease is usually associated with cool, wet soils and attacks the roots. Riverside County UCCE advisor identified a cost effective method of managing this disease including shallow plantings which allow faster germination coupled with waiting for warmer weather to plant and for growers to practice clean tillage to eliminate fungi living on other plants. This finding helped protect the 900 acres of green bean production in the county grown Valley.



Anti-Heat Stress Products: Heat stress in the low desert is known to negatively affect cotton yields and economics. The UCCE advisor in the Palo Verde Valley with cooperating cotton growers conducted a research and made comparisons of various products to alleviate heat stress. While some products provided no increase, other products were successful. Best returns were noted to be over 250 lbs./acre of cotton lint, resulting at ~\$125/acre more grower income. The positive outcomes noted in previous years have resulted in 2020 plantings of a higher valued, but much more heat sensitive cotton species to determine if similar increased yields but greater values can be achieved.



Agriculture: Irrigation Efficiency and Water Use Management Aliasghar Montazar, Farm Advisor

Deficit irrigation management in high water consuming crops: Water availability for agriculture and urban uses continues to be a high priority. To reduce/minimize impacts of recurring droughts on crop production and the water supplies uncertainty that the Colorado River Basin is increasingly facing, several projects of deficit irrigation evaluating/comparing tools and strategies were conducted by Riverside County UCCE advisors for several crops. The goals of this research is to develop impactful agricultural water conservation tools and approaches for the resiliency of agricultural system in the low desert of California.

Date Palms: Date palms water consumption could reach 8 acre feet per acre. Given our concerns described above, UCCE Riverside County farm advisor is conducting a project monitoring water consumption and crop coefficients in grower fields for developing user-friendly deficit irrigation tool that works under flood and micro-irrigation systems. This project is a CDFA specialty crop funded project (2017-19).



Agriculture: Irrigation Efficiency and Water Use Management Aliasghar Montazar and Carmen Gispert, Farm Advisors

Deficit irrigation management in high water consuming crops continued.



Alfalfa: Alfalfa is another crop with high water consumption between 5-7 acre feet per acre that the farm advisor is conducting experiment for identifying deficit irrigation strategies in the Palo Verde Valley for optimizing alfalfa forage production and sustainability. This project was funded by USDA-NRCS (2019-2021).



Grapes: Water savings is of interest to both agriculture and urban audiences in western Riverside County. Research results from irrigation experimentation conducted by Riverside County UCCE farm advisor was delivered to 250 members of the Temecula Winegrowers Association, providing each with a summer irrigation decision tool. The research data indicated that changing irrigation practices across the 1,200 acres of vineyards could result in savings of \$195,600 in water purchases for Temecula wine grape growers. The research also indicated an increased crop value per ton by 10-20% (\$155-\$310 per ton). There are 8 wineries in Temecula that installed a system to irrigate using RDI (reduced deficit irrigation) after attending the farm advisor's 2018 workshops to growers. Widespread adaptation is expected during the 2020.

We promote healthy people and communities; safe, nutritious and abundant food; and education to make every food choice and every food dollar count. Research has shown for every \$1 invested in Expanded Food Nutrition Education Program (EFNEP); there is an \$8 health cost saving.

Nutrition, Family and Consumer Sciences (NFCS) Program Chutima Ganthavorn, Advisor

County Statement: Riverside County has a high incidence of overweight/obese adults (67.5%) and youth (39.5%). These adults and youth lead sedentary lifestyles contributing to obesity rates that exceed California rates: 20% and 50%, respectively. Twelve percent of adults are eligible to receive CalFresh benefits and 64% youth receive free or reduced meal pricing. Ten percent of adults are food insecure.

Serving Individuals and Communities: Riverside County UC CalFresh UCCE worked to give families the tools to make healthier food choices, maximizing their food budget, and helping them be more physically active. During FY2019-20, we served 6,000 youth and adults through evidence based curricula, community workshops and one-on-one education at schools and community centers throughout Riverside County (not including our reach by partner organizations).

Providing Education: Riverside County focuses on preschool, middle, and high school youth with teacher extenders that carry out nutrition and garden education. We also teach parents of students in these schools how they can help their families lead healthier lifestyles.





The UC CalFresh team helped Wells Middle School achieve a gold medal from the Alliance for a Healthier Generation National Healthy Schools Award.

We partnered with Coachella Valley Child Nutrition Services to implement Smarter Lunchrooms Movement strategies and conducted a plate waste study at Bobby Duke Middle School.



Nutrition, Family and Consumer Sciences (NFCS) Program Continued.

Providing Education: Riverside County focuses on preschool, middle, and high school youth with teacher extenders that carry out nutrition and garden education. We also teach parents of students in these schools how they can help their families lead healthier lifestyles.



Teaching healthy food via hands on school gardens; 5 school gardens established in the last two years: collaborative effort with UCCE 4-H and UCCE Master Gardener programs.



Nutrition educators presenting to elementary school students

Historical Mention: Nutrition staff, 1956; food preservation, millinery, garment making, etc.,



Nutrition, Family and Consumer Sciences (NFCS) Program continued

Helping to Make Organizational and Environmental Changes: Riverside County UC CalFresh team worked with schools and community partners to provide county-wide wellness efforts. These efforts include garden-based education and support, Smarter Lunchrooms Movement (SLM) strategies, and Coordinated Approach to Child Health (CATCH) physical activity. These methods help educators teach youth to be healthy and make it easy for youth to choose healthy lifestyle options.

Building Partnerships: Together with our partners, we helped improve behaviors and change environments to help families lead healthier lifestyles. Our partners include: Riverside County Department of Public Health-Nutrition Education & Obesity Prevention Program, Department of Public Social Services, Dairy Council of California, Riverside Community; Health Foundation, Community; Settlement Association, Kaiser; Permanente, Heal Zone, Office; on Aging, Catholic Charities, YMCA of Corona, Torres Martinez, Alvord Unified, Coachella Valley, Unified, Banning Unified, Desert Sands Unified Head Start, Palm Springs Early Childhood Education.



Wellness Policies

Working with Tribal Youth: We landed a Youth led Participatory Action Research (YPAR) to raise awareness about community health and well being with the Torres Martinez Desert Cahuilla Indian Tribe youth in 2018-2019. UCCE nutrition advisor and the vegetable crops advisor collaborating have received Farm to School Planning Grant from USDA to build partnership and interest in a farm to school program.

Achievement Measures:

- Youth: 95% of EatFit students made at least one improvement in their eating behavior.
- Adult testimony received such as it has given me more knowledge and understanding about eating healthy.
- Organizational: 28 sites adopted one or more policy systems and environmental changes through gardens SLM, and CATCH reaching over 20,000 students.



In 4-H we believe in the power of youth. We know that every young person is unique, has strengths and real potential to improve our world. 4-H grows here

4-H Youth Development Program Claudia Diaz Carrasco, Advisor

The 4-H Youth Development program plays a special and vital role launching young people into healthy and productive lives. Research from Waves of the Future by Tufts University has shown that youth have the capacity to thrive when presented with resources for healthy development found in families, schools, and communities regardless of their background, socioeconomic status, race and gender .Youth participating in 4-H programs showed the following characters:

- ♦ 2 times more likely to have higher civic identity and engagement;
- ♦ 4-H youth are 3.4 times more likely to actively contribute to their communities;
- ♦ 1.9 times more likely to have higher levels of positive youth development.



Cooperative Extension Riverside County 4-H program has 27 community clubs. We have grown from 750 youth in 2017 to 6,021 youth in 2020 (802% growth). This has been attributed to the success of the Latino Initiative project. UCANR funded a program representative (PR) for a pilot program (2017-19). The impact of this initiative can be seen in the demographics of the 6,021 youth (85% Hispanic, 15% Non-Hispanic).

We have over 270,000 hours of adult volunteer service working with youth on projects including: STEM, agriculture, healthy living, citizenship, and leadership development.





Historical Mention: The Moreno Money Maker 4-H club helped observe June Dairy Month at the Farm Bureau event, 1965

4-H Youth Development Program continued.

UCCE 4-H Program (2019-20):

- ♦ Completed a total of 2,809 projects across the following content areas: Animals, Biological Sciences, Civic Engagement, Communications and Expressive Arts, Community / Volunteer Service, Consumer and Family Science, Environmental Education / Earth Sciences, Foods and Nutrition, Health, Leadership and Personal Development, Personal Safety, Physical Sciences, Plant Science and Technology and Engineering. 4-H volunteer lead at least 6 hours of hand-on instruction in each of the projects completed.
- Participated in an overnight summer camp experience led by 4-H teens. Campers had the opportunity to explore the outdoors and participate in a wide variety of STEM (science, technology, engineering and math) experiences such as veterinary science, engineering and movie making. Teens planning the 4-H camp reported significant increase in their skills of teaching and planning programs.

Community Services:

- ♦ 4-H youth and their families provide community service to the county in several ways. There were 51 community service programs provided by youth and families in 2019-20 Examples include:
- ♦ Community Betterment on-going trash pick-up, planting of trees/flowers, weed removal, painting, cleaning of public property, schools, and other non-profit organizations.
- ♦ Monthly collection of canned food and other items needed to support the food bank.
- Horse Rescue Committee- weekly meetings at T.H.E. Center providing horse grooming, exercise, training, and assistance to equestrians with special needs. Also, supports summer horse camp for children special needs by volunteering as camp counselors for 1-4 weeks.





Opportunities and challenges:

In Riverside County population grew by 33,534 in 2019, a near 1.5% growth from last year. Riverside is ranked 5th in population growth in the US. In 2020 population is estimated at 2.45 million, bringing new families into our communities. Many new families will seek our youth programs for their children. With 55% of Riverside County population being Hispanic Latino, continuing the Latino Initiative would be a critical need. As there is no funding to maintain a volunteer services coordinator/program representative, we request funding from the county to continue this program.

We educate our residents to create sustainable gardens and landscapes; from growing food to building fire-safe landscapes and making every drop of water count.

Master Gardener Program Rosa Olaiz, Volunteer Services Coordinator

Origination of Program: Riverside County pioneered the establishment of a Master Gardener volunteer program and has become instrumental for the expansion of the program throughout the state. Since its inception in 1980, we have trained over 1,600 Master Gardeners graduates with knowledge to extend environmentally safe and economically efficient gardening and landscaping into the community.

Gardening benefits include:

Provide health and wellness: Health and wellness suffer when people do not have the opportunity to interact with plants and the natural environment. According to the census, 95% of Californians live in urban areas. Densely populated cities disconnected from nature can have adverse consequences for mental, physical and spiritual health. Something as simple as visiting a nearby park, a tree outside a window, a flower box on a patio or an indoor plant can reduce stress and anxiety. UCCE Riverside County Master Gardener volunteers create positive impact every day by simply encouraging people to get outside and connect with nature through gardening and landscaping.



Historical Mention: Plant diagnosis by Master Gardeners in 1980





Plant Propagation

Picture: Six award winner UCCE Riverside County Master Gardener volunteers with the UCANR Assoc. VP Wendy Powers and UCANR Vice Provost Mark Bell (2019).



Master Gardener Program continued.

- ♦ In 2019-20, A total of 800 events, 220 educational booths, exhibits at festivals such as the Date and Lavender festivals, farmers markets, presentations and demonstrations and over 2,000 office consultations reached over 60,000 people.
- We introduced a Home Gardening Basics short course in 2018-19 which showed great success. The class is shorter than the regular Master Gardner Training. We trained 62 people. Staff shortage is the limiting factor to growing this program.



Date Festival display: 1st place winner, February, 2020



Delighted to take home a tomato plant



UCCE Riverside County Master Gardener program collaborates with schools and institutions such as the Women Infant and Children (WIC) to bring home horticulture education to elementary, middle and high school students.



Cooperative Extension Programs Delivery During the Corona Virus Disease, 2019 (COVID-19)

As the impacts of COVID-19 continue to be felt widely by all, UCCE advisors and educators in Riverside County have continued serving their clientele using new and innovative ways. We have expanded our Zoom teaching and social media outreaches to reach out clientele. Explore the links below to find practical, credible information, plus things to do and resources to tap: ucanr.edu/covid19communityresources

UCCE advisors and educations used the following program delivery methods during the COVID-19.

Agriculture

- Field Research: We have continued to do our field research while complying with the COVID-19 protective measures and in cases where face to face meetings must be avoided, we are conducting our programs via electronics. There are 10 projects that the UCCE advisors and staff in Riverside County continued with field experiments that included the monitoring and management of pests and diseases for citrus, avocados, and alfalfa. and irrigation management for dates and alfalfa.
- Creativity: Area residents asked to be 'Citizen Scientists': With COVID-19 currently resulting in 'shelter at home' situations for many people, including high school and college age students, 'handson' learning activities have become helpful. The recent observation of root rats in the Palo Verde Valley presented an opportunity for a hands-on activity for many people. UCCE advisor along with colleagues in the University of Arizona, and in the Utah State University have engaged residents of the three states to take on-line survey, document the extent of the problem so that scientists will discuss control and eradication methods. The survey available on the following: https://www.ucscurri.com/ratsurvey.

Newsletters—Electronics and Websites



University of California Cooperative Extension

Fresno, Kern, Madera, Riverside, San Bernardino, San Diego, San Luis Obispo, Santa Barbara, Tulare, & Ventura Counties

News from the Subtropical Tree Crop Farm Advisors in California

Palo Verde Valley Update April 2020

Something's Wrong with My (Neighbor's) Field!

Nutrition, Food and Consumer Sciences (NFCS)



Learn how to be healthy at home with UCCE Connects to You!

You can complete this 8 lesson program at home! Learn how to improve your health and the health of your family. Each lesson includes healthy recipes and lots of tips. Connect regularly with UC nutrition educators by phone or video chat so you can ask questions and get support. When you complete the program, you will receive a graduation certificate and a Walk Indoors DVD. We are providing this at no cost to you! Our goal is to improve the health of families in California.

Program Eligibility: Limited resource families with children

You will learn how to...

- ✓ Keep yourself and your family fit and healthy.
- ✓ Save money at the grocery store.
- Make healthy food choices.
- ✓ Plan and prepare low-cost, tasty meals.



contact: UCCE Nutrition Educator by calling ()_or	For more info	ormation, please
	contact: UCC	CE Nutrition
" 0 '	Educator by	calling ()_or
email@ucanr.edu	email	@ucanr.edu.

Lesson Topics:

- Get Moving!
- Plan, Shop & Save
- · Fruits & Veggies: Half Your Plate
- Make Half Your Grains Whole
- Build Strong Bodies: Milk & Protein
- Make A Change: Fat, Sugar, Salt
- Celebrate! Eat Smart and Be Active









California's CalFresh Healthy Living, with funding from the United States Department of Agriculture's Supplemental Nutrition Assistance Program — USDA SNAP, produced this material. These institutions are equal opportunity providers and employers. For important nutrition information, visit www.calFreshHealthyLiving.org. The Expanded Food and Nutrition Education Program (EFNEP) is a federally-funded program through the United States Department of Agriculture National Institute of Food and Agriculture (USDA NIFA).

It is the policy of the University of California (UC) and the UC Division of Agriculture & Natural Resources not to engage in discrimination against or harassment of any person in any of its programs or activities. Inquiries regarding ANR's nondiscrimination policies may be directed to UCANR, Affirmative Action Compliance & Title IX Officer, University of California, Agriculture and Natural Resources, 2801 Second Street, Davis, CA 95618, (530) 750-1343.



Nutrition, Food and Consumer Sciences (NFCS) Program continued.

- The NFCS Advisor is leading the UC program team to develop the UCCE Connects to You! Curriculum teaching protocol that is 100% learn-at-home. Participants can interact with our educators by video calling or group check-in via Zoom. Participant recruitment is being conducted in partnership with schools and agencies that we are currently serving.
- ♦ CalFresh Healthy Living, University of California program has released the youth student workbooks in a pdf file to share with teachers. UCCE advisor and educators in Riverside County are available to teach the lessons (with the teachers) on Zoom to answer questions and to engage students.
- For adult participants, UCCE Riverside County advisor and educators are promoting a free series of nutrition education classes after they participate in a physical activity Zoom class. We will share a PowerPoint presentation and lead exercises, share links and email handouts to participants. We will engage participants and be able to answer questions with a class size of approximately 20 participants at a time. We will provide these classes at various times.
- ♦ http://ceriverside.ucanr.edu/NFCS/

Master Gardener Program

Remote Helpline: Cooperative Extension in Riverside County has adopted Remote help line to assist the public with their gardening questions. This is an expansion of our program that we started four years ago for our desert help line. Master Gardener volunteers access the CE Master Gardener email/telephone messages and return emails/phone calls answering the public's gardening questions.

One of the Master Gardner Volunteers at the Riverside Helpline, 2020



Virtual Public Education: We are currently working with UCR Palm Desert to take short virtual "How to" gardening videos to the public through Facebook Live, zoom presentation and webinars.



Facebook

The Facebook coordinator has been active posting regularly to promote the remote helpline; displaying gardens from a number of the Master Gardeners. We have had 2,205 followers and 60 groups following our Facebook.

- ♦ March 24 through April 26, 2020 we had an increase of 136 new followers, from 2,205 to 2,341 followers on Facebook.
- ♦ Posts reached 20,300 up from 17,500 in March (2,800 more people)
- ♦ Facebook had 7,000 post engagements up from 4,201 (2,799 more engagements).





Facebook

The statewide UC Master Gardener Program office has established and will be managing a course on <u>eXtension campus</u>; <u>https://campus.extension.org/login/index.ph</u>



UCCE Master Gardeners of Riverside County

Yesterday at 1:10 AM - 3

Here's a tip! Soak seeds in warm water for 12-24 hours to reduce germination time. Many hard shelled seeds like beans, corn, sweet peas and nasturtiums benefit from this soaking method before direct sowing into the ground.

For more valuable information please visit our website: https://ucanr.edu/sites/RiversideMG/





4-H Youth Development Program

4-H Youth Campaign for Census Participation Via A Video Message: 4-H youth worked with the UCANR media to record youth voices to create a 2020 Census awareness campaign. The youth spent hours recording the bilingual scripts to be used for the media campaign for both video and radio advertisements

The youth in the project are:

- ♦ Sofia Yepez, 17, Moreno Valley High School
- ♦ Kilbert Membreno, 16, Innovation High in Moreno Valley
- ♦ Oscar Zamora, 10, Ruth Grimes Elementary

The goal of this campaign is to bring awareness of the importance of reporting to the census and the impact on federal funding for our communities.

4-H Jr. leader teaches younger members how to draw via Facebook Live.

https://www.facebook.com/Murrietamustangs4h/videos/2868527069863484/

Jacob Rhodes is 10 years old and has been in 4-H since 2017. Jr. leader Jacob has put together a directed draw video for you to enjoy. We may be separated but we aren't alone! He would love to see your finished ice cream cones if you follow along and do the draw. Even if you aren't a primary please feel free to still do the draw along with Jacob!!



https://www.facebook.com/Murrietamustangs4h/videos/2868527069863484/

Murrieta Mustangs 4-H Club created a Quarantine Calendar, filled with daily activities to do on your own or LIVE on zoom with your friends. The link the calendar is here

guarantine Calendar 4H

https://calendar.google.com/calendar/embed? src=5frqoq2ad9mgd45ri2nkar3shg@group.calendar.google.com&ctz=America/ Los Angeles&fbclid=lwAR3ZBGmdOmZYKslTOUicqKikKWYIUfZsLEwhAwXGTFcfSUnJFP9V3EefEH4&pli=1

We ask community members to Download it, print it, and share it and to make sure you take pictures or video of all the things you do and share it on our Facebook or instagram page using the hashtags #4hproud #4hgrowshere #murrietamustangs4h #menifeerangers4h #temecula4h



Directory Moreno Valley Office 951-683-6491

Coachella Valley-Indio (760) 342-6437

ceindio@ucanr.edu Jose Aguiar Vegetable Crops-Small Farms Advisor jlaguiar@ucanr.edu

Carmen Gispert Area Viticulture Advisor cgispert@ucanr.edu

Palo Verde Valley-Blythe (760) 921-5060

Michael Rethwisch Forage, Field and Vegetable Crops Farm Advisor mdrethwisch@ucanr.edu

<u>Cross County Programs</u> San Bernardino County (909) 387-2171

Janet Hartin Environmental Horticulture Advisor jshartin@ucanr.edu

Chris McDonald Inland and Desert Natural Resources Advisor (909) 387-2242 cjmcdonald@ucanr.edu

Imperial County (760) 352-9474

Oli Bachie Agronomy Advisor/County Director obachie@ucanr.edu

Aliasghar Montazar Irrigation and Water Management Advisor amontazar@ucanr.edu

Cooperative Extension

http//ceriverside.ucanr.edu https://ucanr.edu/

Offices

Moreno Valley-main office

21150 Box Springs Rd., Suite 202 Moreno Valley, CA 92557 951-683-6491 Ext. 228 Email:ceriverside@ucanr.edu

Indio Office

81-077 Indio Blvd., Suite H Indio, CA 92201-5635 760-342-6437 Email:ceindio@ucanr.edu

Blythe Office

290 N. Broadway Blythe, CA 92225-1649 760-921-5060

Email:cepaloverde@ucanr.edu

The University of California, Division of Agriculture and Natural Resources (UC ANR) prohibits discrimination against or harassment of any person in any of its programs or activities on the basis of race, color, national origin, religion, sex, gender, gender expression, gender identity, pregnancy (which includes pregnancy, childbirth, and medical conditions related to pregnancy or childbirth), physical or mental disability, medical condition (cancer-related or genetic characteristics), genetic information (including family medical history), ancestry, marital status, age, sexual orientation, citizenship, status as a protected veteran or service in the uniformed services (as defined by the Uniformed Services Employment and Reemployment Rights Act of 1994 [USERRA]), as well as state military and naval service.

UC ANR policy prohibits retaliation against any employee or person in any of its programs or activities for bringing a complaint of discrimination or harassment. UC ANR policy also prohibits retaliation against a person who assists someone with a complaint of discrimination or harassment, or participates in any manner in an investigation or resolution of a complaint of discrimination or harassment. Retaliation includes threats, intimidation, reprisals, and/or adverse actions related to any of its programs or activities.

University policy is intended to be consistent with the provisions of applicable State and Federal laws. Inquiries regarding the University's equal employment opportunity policies may be directed to: Linda Marie Manton, Affirmative Action Contact and Title IX Officer, University of California, Agriculture and Natural Resources, 2801 Second Street, Davis, CA 95618, (530) 750-1318.

Email: lmmanton@ucanr.edu. Website: http://ucanr.edu/sites/anrstaff/Diversity/Affirmative_Action/