



## Imperial County

## Agricultural Briefs



**University of California**  
Agriculture and Natural Resources

### Features from your Advisors

*December 2016*

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## **SUGARCANE APHID FOUND IN IMPERIAL COUNTY ON SUDANGRASS**

*Eric T. Natwick, Entomology Advisor, UCCE Imperial County*

In the September 2016 *Imperial Agricultural Briefs Newsletter*, I reported on the first finds of the sugarcane aphid (SCA), *Melanaphis sacchari* (Zehntner, 1897), in central Arizona and central California. Now I am reporting on the first find in Imperial County, California. The SCA caused severe damage to sorghum crops from Florida, across the U.S. to California since 2013 and SCA damaged sorghum in central Arizona and central California late last summer and fall. As the name implies, SCA is a pest of sugarcane, but it can feed and reproduce on several other grass species such as sorghum grown for grain or forage including sudangrass, *Sorghum sudanense* (Piper); it can also survive and thrive on some grassy weeds such as Johnsongrass. The SCA has been a minor pest on sugarcane, in the southeastern U.S. since the 1970's. This was true until it was first detected on sorghum in the mid-south of the U.S. in 2013. Since becoming a pest of sorghum in 2013, SCA rapidly expanded its range infesting sorghum crops throughout the southern states including California and Arizona, and now Imperial County of California. The SCA was detected in Imperial County by Laura Arellano, Plant Pathologist/Entomologist with the Imperial County Agricultural Commissioner's Office on November 17, 2016 near Holtville, CA. The SCA was again detected on volunteer sorghum and volunteer sudangrass near Holtville on January 18, 2016. This new aphid has already caused economically important damage in central Arizona and central California and very likely will cause serious damage to sudangrass in Imperial County next spring and summer. Growers may want to consider this potential damage before entering into new sudangrass production contracts. Imperial County growers plant very few acres of sweet sorghum or grain sorghum, but these crops will definitely be at risk. This is especially true because we do not yet have any special local needs 24c labels of Section 18 emergency exemption labels for the two insecticides that have been found to be efficacious against SCA; Sivanto Prime and Transform WG. Several insecticide efficacy studies by university entomologists, Dr. Ayman Mostafa at the University of Arizona have shown that the two most efficacious insecticides for control of SCA are Sivanto Prime and Transform WG which are available in some states under Section 18 Emergency Exemption labels. Two other insecticides; chlorpyrifos and dimethoate are also available, but with much less efficacy for SCA control. However, chlorpyrifos and dimethoate can be important rotation partners with Sivanto Prime and Transform WG for insecticide resistance management. None of the insecticides mentioned above are

labeled for use on sudangrass in California, although some formulations of dimethoate and chlorpyrifos have California labels for use on sorghum and grain sorghum.

The SCA causes damage to susceptible crops by removing plant sap needed for plant growth and seed production; thereby, causing stunting and reduction of grain and hay yields. Additionally, the direct feeding by SCA results in the aphids excreting copious quantities of plant sugars and water called 'honeydew'. In addition to the sticky mess, honeydew supports the growth of sooty molds and the black discoloration reduces hay quality; therefore, demanding a lower price if the hay can even be sold. Sooty molds also block out sunlight decreasing the plant's ability to produce sugars through photosynthesis, further reducing quality and yield potential. The honeydew can also foul hay harvesting equipment and can gum up the combine during grain harvest. In addition to direct feeding injury, SCA is the vector of three persistent viruses (millet red leaf, sugarcane yellow leaf, and sugarcane mosaic viruses).

Because there are similar aphid species feeding on sugarcane and sorghum crops, identification is a key first step to aphid management. Two aphids that might be confused with SCA are greenbug, *Schizaphis graminum* (Rondani) and the yellow sugarcane aphid, *Sipha flava* (Forbes).

Below are some links that can be useful for aphid identification and for making treatment decisions for SCA and other sorghum pests;

<http://agriflifeextension.tamu.edu/solutions/sugarcane-aphid/>

<http://www.sorghumcheckoff.com/newsroom/2016/03/28/sugarcane-aphid/>

<http://agriflifeextension.tamu.edu/wp-content/uploads/2016/03/sugarcane-aphid-guide-images.pdf> - Scouting for sugarcane aphid

[http://entomology.ifas.ufl.edu/creatures/field/bugs/yellow\\_sugarcane\\_aphid.htm](http://entomology.ifas.ufl.edu/creatures/field/bugs/yellow_sugarcane_aphid.htm)

## PHOTOPERIODISM IN ONIONS

*Oli Bachie – Agronomy Advisor – Director UCCE Imperial County*

Onion (*Allium cepa* L.), of the Liliaceae family, is a species of great economic importance and is widely cultivated all over the world. Under appropriate photoperiod and temperature regimes, onion leaves progressively change from photosynthetic to storage units (bulbs). Bulbing is mostly considered as a carbohydrate accumulation and is easily observable as basal swelling. While there are many onion varieties, they can be generally classified by the daylength and their bulb color. The sensitivity of onions to day length, known as photoperiodism, is crucial for designating planting schedules. Some onion varieties may have enhanced leaf photosynthetic activity if longer daylength and higher temperature conditions coincide with the onset of their bulbing. In other words, bulb formation is a strong sink, demanding higher photosynthetic activity to fulfill the storage demands of onion bulbs. Higher temperatures generally accelerate onion bulb development, hence accompanied with increased physiological activities of onions.

Short-day onion varieties bulb at 10-11 hours of day length, while the long day onions require greater than 12 hours for bulbing. Most California varieties begin to bulb at 12 to 15-hour day lengths. Therefore, selection of onion varieties and / or planting dates is extremely important for production of good bulb onions. Growers would need to choose the best planting periods to match their onion bulbing stages with the onset of long days or short days and higher temperature ranges. Growers may also need to select varieties that match their growing environments (short or long day lengths) and depending on their intended onion production period (months) to obtain optimum bulb sizes and yield. The coincidence of favorable growing conditions with bulbing stages of onion varieties could enhance the speed at which nutrients may be partitioned into the bulbs. Therefore, matching plant growth and development with favorable conditions could ultimately enhance yield and profitability of the onion crops.

For further information, review the following information

- Bachie O. and M. McGiffen. 2007. Growth response of onion varieties to varying photoperiod and temperature regimes (Abstract). HortScience 42 (4): 852-
- Bertaud D.S. 1990. Photoperiod and temperature affect sprouting of onion bulbs (*Allium cepa* L.) Annals of Botany 66, 179-181
- De Mason D. A. 1990. Morphology and anatomy of onion. In Onions and Allied Crops, pp. 27-51. H.D. Rabinowitch and J. L. Brewster. Boca Raton, Florida: CRC Press.
- Lancaster J. E. et al., 1996. Bulbing in Onions: Photoperiod and Temperature Requirements and Prediction of Bulb Size and Maturity. Annals of Botany 78: 423–430, 1996.  
<http://aob.oxfordjournals.org/content/78/4/423.full.pdf>  
<http://extension.oregonstate.edu/gardening/onion-bulb-formation-strongly-linked-day-length>.
- Onion bulb formation is strongly linked with day length.



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# HELP

We are requesting your assistance.....

We are in the process of updating the 2013 Field Crops and Vegetable Crops Guidelines to 2016/2017. We have been trying for several months to get prevailing rates for 2016. The following pages have the rates used for the 2013 Guidelines. If anyone of you can provide us with 2016 rates in any of the areas so that we can complete the Guidelines, it would be greatly appreciated.

Please forward any rates to Oli Bachie at [obachie@ucanr.edu](mailto:obachie@ucanr.edu) or Nannette Kniffin at [dnkniffin@ucanr.edu](mailto:dnkniffin@ucanr.edu).

As soon as we can get these rates updated, we should be able to get the Guidelines completed fairly quickly and get them printed. We have kept email addresses and/or phone numbers of people or companies that have inquired about updated Guidelines.

Thank you in advance for your assistance.

| 2016 Prevailing Rates                                  |  |                         |  |                         |
|--|--|-------------------------|--|-------------------------|
| IMPERIAL COUNTY  |  |                         |  |                         |
| Crops  |  |                         |  |                         |
| <b>Heavy Tractor Work and Land Preparation</b>         |  |                         |  |                         |
| <b>Operation</b>                                       |  | <b>2013<br/>\$/acre</b> |  | <b>2016<br/>\$/acre</b> |
| Plow   |  | \$ 58.50                |  |                         |
| Subsoil 2nd gear                                       |  | \$ 81.00                |  |                         |
| Subsoil 3rd gear                                       |  | \$ 73.00                |  |                         |
| Landplane  |  | \$ 25.50                |  |                         |
| Triplane   |  | \$ 22.00                |  |                         |
| Chisel 15"   |  | \$ 62.50                |  |                         |
| Wil-rich chisel  |  | \$ 30.50                |  |                         |
| Big ox   |  | \$ 49.00                |  |                         |
| Slip plow  |  | \$ 89.50                |  |                         |
| Mark/Disc border                                       |  | \$ 20.00                |  |                         |
| Make cross checks (taps)                               |  | \$ 12.00                |  |                         |
| Break Broder   |  | \$ 11.50                |  |                         |
| Stubble disc   |  | \$ 43.50                |  |                         |
| Stubble disc with cultipack                            |  | \$ 43.00                |  |                         |
| Regular disc   |  | \$ 24.00                |  |                         |
| Regular disc with cultipack                            |  | \$ 30.00                |  |                         |
| List 30" beds - 12 row/40" beds - 8 row                |  | \$ 33.00                |  |                         |
| List 30" beds - 12 row/40" beds - 8' row (GPS)         |  | \$ 28.00                |  |                         |
| List 30" beds - 12 row/40" beds - 8' row w/fert. (GPS) |  | \$ 29.50                |  |                         |
| Float  |  | \$ 21.00                |  |                         |
| Dump (scraper) border                                  |  | \$ 28.50                |  |                         |
| Corrugate  |  | \$ 30.00                |  |                         |
| <b>Light Tractor Work</b>                              |  |                         |  |                         |
| <b>Operation</b>                                       |  | <b>2013<br/>\$/acre</b> |  | <b>2016<br/>\$/acre</b> |
| Power mulch dry  |  | \$ 45.00                |  |                         |
| Power mulch with herbicide                             |  | \$ 52.50                |  |                         |
| Shape 30" beds - 6 row                                 |  | \$ 20.00                |  |                         |
| Plant Vegetables (lettuce/broccoli)                    |  | \$ 33.00                |  |                         |
| Plant market onions, carrots                           |  | \$ 33.00                |  |                         |
| Shape 40" beds - 4 row                                 |  | \$ 20.50                |  |                         |
| Plant sugar beets & cotton 30" beds                    |  | \$ 33.00                |  |                         |
| Plant sugar beets & cotton 40" beds                    |  | \$ 24.50                |  |                         |
| Mulch plant wheat                                      |  | \$ 24.50                |  |                         |
| Plant alfalfa (corrugated)                             |  | \$ 24.50                |  |                         |
| Spike and furrow out 30" beds - 4 row                  |  | \$ 21.00                |  |                         |
| Spike and furrow out 40" beds - 4 row                  |  | \$ 16.50                |  |                         |
| Furrow out 30" beds - 4 row                            |  | \$ 22.00                |  |                         |
| Furrow out 40" beds - 4 row                            |  | \$ 21.00                |  |                         |
| Lilliston 30" beds - 6 row                             |  | \$ 24.00                |  |                         |



| 2016 Prevailing Rates                         |  |                |        |                |
|---|--|----------------|--------|----------------|
| IMPERIAL COUNTY                               |  |                |        |                |
| Crops   |  |                |        |                |
| Lilliston 40" beds - 4 row                    |  | \$             | 22.50  |                |
| Plastic mulch total \$ laid in field          |  | \$             | 378.00 |                |
| Lilliston 30" beds - 6 row/herb               |  | \$             | 30.00  |                |
| Lilliston 40" beds - 4 row/herb               |  | \$             | 26.00  |                |
| Plant alfalfa (flat)                          |  | \$             | 22.50  |                |
| Plant alfalfa beds                            |  | \$             | 22.50  |                |
| Plant bermudagrass                            |  | \$             | 22.50  |                |
| Plant with drill (sudangrass, wheat)          |  | \$             | 23.00  |                |
| Plant no-till                                 |  | \$             | 35.00  |                |
| Plant corn slope                              |  | \$             | 30.00  |                |
| Cultivate 30" beds - 4 row                    |  | \$             | 25.00  |                |
| Cultivate 40" beds - 4 row                    |  | \$             | 23.00  |                |
| Spike 30" beds - 4 row                        |  | \$             | 19.50  |                |
| Spike 40" beds - 4 row                        |  | \$             | 16.50  |                |
| Inj. fertilizer & furrow out 30" beds - 4 row |  | \$             | 26.50  |                |
| Inj. fertilizer & furrow out 40" beds - 4 row |  | \$             | 28.00  |                |
| Fertilizer dry & furrow out 30" beds - 4 row  |  | \$             | 25.00  |                |
| Fertilizer dry & furrow out 40" beds - 4 row  |  | \$             | 23.50  |                |
| Inject fertilizer flat                        |  | \$             | 21.00  |                |
| Broadcast dry fertilizer 400-500 lbs          |  | \$             | 13.50  |                |
| Ground spray 30" beds - 8 row                 |  | \$             | 19.00  |                |
| List 80" melon slope beds                     |  | \$             | 25.50  |                |
| Plant 80" melon slope beds                    |  | \$             | 34.00  |                |
| Plant 80" beds (24 line planter)              |  | \$             | 34.50  |                |
| Back fill furrow (melons)                     |  | \$             | 16.00  |                |
| Cultivate 80" melon slope beds                |  | \$             | 23.50  |                |
| Center 80" melon beds                         |  | \$             | 28.50  |                |
| Re-run 80" melon beds                         |  | \$             | 20.00  |                |
| Inj. Fertilizer & furrow out 80" melon beds   |  | \$             | 40.00  |                |
| Bust out 80" melon beds                       |  | \$             | 19.00  |                |
| solarization                                  |  | \$             | 480.00 |                |
| Chop cotton stalks 30" beds                   |  | \$             | 24.00  |                |
| Chop Cotton Stalks 40" beds                   |  | \$             | 21.50  |                |
| Run border                                    |  | \$             | 8.00   |                |
| <b>Harvest Costs</b>                          |  |                |        |                |
|   |  |                |        |                |
| <b>Operation</b>                              |  | <b>2013</b>    |        | <b>2016</b>    |
|   |  | <b>\$/acre</b> |        | <b>\$/acre</b> |
| Windrow alfalfa seed                          |  | \$             | 23.50  |                |
| combine alfalfa seed                          |  | \$             | 48.50  |                |
| Swath bermudagrass                            |  | \$             | 16.00  |                |
| Rake bermudagrass                             |  | \$             | 6.50   |                |
| Rake borders (before combine)                 |  | \$             | 4.50   |                |
| Dump rake                                     |  | \$             | 10.50  |                |
| Cleanup (after dump rake)                     |  | \$             | 5.25   |                |
| Swath sudangrass                              |  | \$             | 14.00  |                |



| 2016 Prevailing Rates                  |  |                          |  |                 |
|--|--|--------------------------|--|-----------------|
| IMPERIAL COUNTY                        |  |                          |  |                 |
| Crops                                  |  |                          |  |                 |
| Rake sudangrass                        |  | \$ 7.25                  |  |                 |
| Swath alfalfa                          |  | \$ 11.25                 |  |                 |
| Rake alfalfa                           |  | \$ 6.50                  |  |                 |
| Bale (all stypes of hay - small bales) |  | \$0.80/bale              |  |                 |
| Haul & stack hay - small bale          |  | \$0.35/bale              |  |                 |
| Bale (large bale 4x4)                  |  | \$11.25/bale             |  |                 |
| Haul & stack hay - big bale            |  | \$ 4.75                  |  |                 |
| Load with hay squeeze                  |  | \$77.50/load             |  |                 |
| Dig sugar beets                        |  | \$3.25/clean ton         |  |                 |
| Haul sugar beets                       |  | \$3.00/clean ton         |  |                 |
| Combine wheat                          |  | \$18.00/acre+ \$0.65 cwt |  |                 |
| Haul wheat                             |  | \$6.00/ton               |  |                 |
| Combine bermudagrass seed 1st time     |  | \$52.00/acre             |  |                 |
| Combine bermudagrass seed 2nd time     |  | \$35.75/acre             |  |                 |
| Haul bermudagrass deep (local)         |  | \$ 202.00                |  |                 |
| Pick cotton 1st/2nd time \$0.03 cts/lb |  | \$ 39.50                 |  |                 |
| <b>Prevailing Rates by the hour</b>    |  |                          |  |                 |
| Operation                              |  | 2013<br>\$/hour          |  | 2016<br>\$/hour |
| Motor grader                           |  | \$ 110.00                |  |                 |
| Backhoe                                |  | \$ 88.00                 |  |                 |
| Water truck                            |  | \$ 82.00                 |  |                 |
| Wheel tractor                          |  | \$ 71.00                 |  |                 |
| Scraper                                |  | \$ 100.00                |  |                 |
| Versatile                              |  | \$ 140.00                |  |                 |
| D-6                                    |  | \$ 108.50                |  |                 |
| D-8                                    |  | \$ 138.50                |  |                 |
| Buck ends of field                     |  | \$ 62.50                 |  |                 |
| Pipe setting (2men)                    |  | \$ 77.00                 |  |                 |
| Laser level                            |  | \$ 163.00                |  |                 |
| Work ends (disc out rotobucks)         |  | \$ 65.50                 |  |                 |
| <b>Miscellaneous Operations</b>        |  |                          |  |                 |
| Operation                              |  | 2013<br>\$/acre          |  | 2016<br>\$/acre |
| E.C. (G.P.S.) Mapping                  |  | \$ 55.00                 |  |                 |
| Dust control                           |  | \$ 34.00                 |  |                 |

## CIMIS REPORT AND UC DROUGHT RESOURCES

*Khaled M. Bali, Irrigation Water Mgmt Specialist, Kearney Ag Research & Extension  
Sharon Sparks\*, Imperial Irrigation District*

California Irrigation Management Information System (CIMIS) is a statewide network operated by California Department of Water Resources. Estimates of the daily reference evapotranspiration ( $ET_0$ ) for the period of December 1 to February 28 for three locations in Imperial County are presented in Table 1.  $ET$  of a particular crop can be estimated by multiplying  $ET_0$  by crop coefficients. For more information about  $ET$  and crop coefficients, contact the UC Imperial County Cooperative Extension Office (352-9474) or the IID, Ag Water Science Unit (339-9082). Please feel free to call us if you need additional weather information, or check the latest weather data on the worldwide web (Google CIMIS for the current link to CIMIS site).

Table 1. Estimates of daily Evapotranspiration ( $ET_0$ ) in inches per day

| Station                 | December |       | January |       | February |       |
|-------------------------|----------|-------|---------|-------|----------|-------|
|                         | 1-15     | 16-31 | 1-15    | 15-31 | 1-15     | 16-28 |
| Calipatria              | 0.07     | 0.07  | 0.08    | 0.09  | 0.12     | 0.14  |
| El Centro (Seeley)      | 0.06     | 0.06  | 0.08    | 0.09  | 0.12     | 0.14  |
| Holtville<br>(Meloland) | 0.06     | 0.06  | 0.08    | 0.09  | 0.12     | 0.14  |

\* Ag Water Science Unit, Imperial Irrigation District.

### Water and Drought Online Seminar Series

The latest research-based advice on weathering a drought is now available free online. The UC Division of Agriculture and Natural Resources is working to help farmers cope with the unwelcome outcome of historically low rainfall the last three years. UC scientists, with support from the California Department of Water Resources, have recorded video presentations on high-priority drought webpages.

Each presentation is about one half hour in length and is available at the link below:

<http://ciwr.ucanr.edu/>

Then click on the drought resources link.

**University of California**  
Agriculture and Natural Resources

## POSITION VACANCY ANNOUNCEMENT

**University of California Cooperative Extension  
Division of Agriculture and Natural Resources**

**Area Cooperative Extension Advisor - Irrigation and Water Management  
Serving Imperial and Riverside Counties**

AP#16-14

**LOCATION HEADQUARTERS:** Holtville, Imperial County, California

**CLOSING DATE:** For full consideration, all application materials must be received by January 2, 2017 (open until filled)

**POSITION PURPOSE:** The Area Cooperative Extension (CE) advisor for irrigation and water management will conduct a multi-county based extension, education and applied research program with a focus on irrigation, water management, soil salinity, and water quality standards related to irrigated agriculture. The CE advisor will also address high priority and core issues related to limited water supplies in the region. Key clientele will include growers, farm managers, irrigation districts, pest control advisers, commodity groups, conservation/environmental groups, public agencies, and agricultural related businesses.



**BACKGROUND:** University of California, Division of Agriculture and Natural Resources (UC ANR), is the statewide division of the University of California that administers Cooperative Extension, which is responsible for local program development and delivery throughout the state of California. University of California Cooperative Extension (UCCE) is a network of colleagues with a focus on research, education programs, and outreach to resolve local challenges in communities where they live and work. UC ANR is the bridge between local issues and the power of UC Research. UC ANR's CE advisors, CE specialists and Agricultural Experiment Station (AES) faculty develop and deliver practical, science-based solutions that contribute to healthy food systems, healthy environments, healthy communities, and healthy Californians. To learn more about existing UCCE programs in these vibrant communities, visit: <http://ceimperial.ucanr.edu/> and <http://ceriverside.ucanr.edu/>.

Our priorities in research, education, service, and resource allocation are guided by the UC Strategic Vision [http://ucanr.edu/About ANR/Strategic Vision/](http://ucanr.edu/About%20ANR/Strategic%20Vision/). There are 5 strategic initiatives that ANR is currently focusing on: Endemic and Invasive Pests and Diseases (EIPD), Healthy Families and Communities (HFC), Sustainable Food Systems (SFS), Sustainable Natural Ecosystem (SNE), and Water Quality, Quantity and



Security (WQQS). This position will primarily address priorities found in the WQQS, SFS, and SNE Strategic Initiatives. The Strategic Plans for each strategic initiative can be found at <http://ucanr.edu/sites/StrategicInitiatives/>.

**ACADEMIC EXPECTATIONS:** All UC ANR CE advisors are responsible for performance in the areas of 1) applied research and creative activity, 2) extension of knowledge and information, 3) professional competence and activity and 4) University and public service.

**Research:** All UC ANR CE advisors develop and implement applied research programs to provide science-based information addressing complex issues. The CE advisor will provide essential leadership to address critical issues related to irrigation and water management facing irrigated agriculture in the two counties. The focus of the applied research program will be based on a needs assessment and may include partnerships with a variety of campus and county-based colleagues. The program should address issues of conservation and profitability in ways that are environmentally compatible and acceptable. The CE advisor will develop new information to enhance effective and efficient water management by designing and conducting research projects in cooperation with UC personnel, other Universities in the region, government agencies and other interested parties.

**Extension of knowledge:** County and community partners rely on UC ANR CE advisors as a critical resource for providing research-based information across a variety of disciplines. CE advisors disseminate appropriate, science-based information to inform clientele, using extension methods that are responsive to clientele needs and appropriate for the audience and situation. Science-based research results and other



educational information will be disseminated using a variety of methods including individual consultations, presentations at producer and industry meetings, workshops, short courses, field demonstrations, UC ANR publications, newsletters, technical reports to commodity boards/funding agencies, peer-reviewed journal articles, and an appropriate mix of contemporary and emerging electronic tools (such as online learning, web content systems and repositories, social media, impact and evaluation tools), along with specialized and public media outlets. Programs will be developed and carried out in collaboration with other UC ANR academics and appropriate statewide efforts including UC ANR Program Teams and Workgroups, as well as related government and private industries. The CE advisor will develop and conduct educational and outreach programs that encourage the adoption of research based irrigation practices to improve irrigation efficiency and water quality in the low desert, including the Salton Sea Watershed.

**Professional Competence:** All UC ANR CE advisors are required to demonstrate professional competence in their programmatic areas. Professional competence includes participation in training activities to enhance professional development, such as administrative trainings, professional conferences, or workshops. Professional competence also includes activities that reflect professional standing within the programmatic area, such as presenting at conferences or workshops, holding offices in professional societies, invited presentations, or reviewing/editing publications.

**University and Public Service:** All UC ANR CE advisors are required to actively serve the University, as well as the public. University service may occur at the local, division, state, national, or international level. Examples of potential University service activities include serving on a university workgroup or committee, providing leadership in program teams, or advocacy efforts. Public service should involve activities and events in which the CE advisor uses their professional expertise to benefit groups or efforts outside the

University. Examples may include serving on external boards or councils, participating in community events, and leadership of non-University collaborative groups.

**MAJOR RESPONSIBILITIES:**

- Develop and implement effective UC ANR Cooperative Extension applied research and educational programs to address the identified priority needs of the clientele that are consistent with ANR's Strategic Vision and ANR initiatives  
<http://ucanr.edu/sites/StrategicInitiatives/>
- Conduct and report regular needs assessments to identify priority issues or problems relevant to the local clientele groups being served.
- Disseminate useful, science-based information to inform clientele, using extension methods that are responsive to clientele needs and appropriate for the audience and situation.
- Maintain and promote UC ANR CE's credibility and visibility by participating in professional organizations and collaborating with government agencies, commodity groups, allied industry groups, policy makers and other organizations by providing independent science-based information and leadership.
- Evaluate programs and report accomplishments, results, and potential or actual impacts to scientific and lay audiences through a variety of outreach methods.
- Develop collaborative teams with other UC ANR academics, including CE specialists, AES faculty, CE advisors and/or others, to address priority issues for UC ANR.



**RELATIONSHIPS:** The CE advisor is administratively responsible to the UCCE Imperial county director with input from the UCCE Riverside county director.

**AFFIRMATIVE ACTION:** An understanding of and commitment to UC ANR's affirmative action goals and commitments is expected of all CE advisors and county directors.

**EDUCATION AND EXPERIENCE:** A minimum of a master's degree is required though other advanced degrees are encouraged, in disciplines such as Water Resources/Sciences, Irrigation, Agricultural Engineering, Soil Science or other closely related discipline. Extension experience and demonstrated excellence in the areas of applied research is desired. Coursework and experience in statistical analysis, experimental design, soil fertility, soil physics, water quality, principals of irrigation and agricultural engineering, and geographic information systems is desired. Excellent written, oral and interpersonal communication skills are required.

**SALARY:** Beginning salary will be in the Cooperative Extension Assistant Advisor Rank and commensurate with applicable experience and professional qualifications. For information regarding Cooperative Extension Advisor salary scales, please refer to the University of California website:  
<http://ucanr.edu/sites/anrstaff/files/250093.pdf>

If the successful candidate is currently a UCCE Advisor with indefinite status, the candidate will be offered the position commensurate with applicable experience and professional qualifications with eligibility to retain such indefinite status.

**BENEFITS:** The University of California offers comprehensive benefits including two days per month paid vacation, one day per month paid sick leave, and approximately thirteen paid holidays per year. This position is eligible for sabbatical leave privileges as per the terms of University policy. For more information, refer to the UCnet website at: <http://ucnet.universityofcalifornia.edu/compensation-and-benefits>.



**HOW TO APPLY:** To be considered, applicants must electronically submit the following four components of the Application Packet to [ANRacademicsearch@ucanr.edu](mailto:ANRacademicsearch@ucanr.edu):

1. Cover Letter
2. ANR Academic Application Form— from the ANR website at:  
<http://ucanr.edu/academicapplication>  
Please include a list of potential references. If you are selected for an interview, the search committee will contact the references you listed on the UC ANR application form (a minimum of four (4) and a maximum of six (6) names, current addresses, phone numbers and email addresses). Please do not send letters of reference.
3. CV or Resume
4. College Level Transcripts: Submit all university-level transcripts as a single PDF file with your application packet.

**Application and associated materials will not be returned to the applicant.**

A search committee will review all applications, interview candidates, and recommend individuals most suitable for the position.

**For information regarding this position, please contact**

*University of California  
ANR Academic HR  
LeChé McGill  
(530) 750-1281*

*E-mail Address: [ANRacademicsearch@ucanr.edu](mailto:ANRacademicsearch@ucanr.edu)  
Internet: <http://www.ucanr.edu/jobs>*

**PLEASE REFER TO POSITION NUMBER AP #16-14 IN ALL CORRESPONDENCE**

The University of California is an Equal Opportunity/Affirmative Action Employer. All qualified applicants will receive consideration for employment without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, disability, age, protected veteran status or other protected categories covered by the UC nondiscrimination policy.

As of January 1, 2014, ANR is a smoke- and tobacco-free environment in which smoking, the use of smokeless tobacco products, and the use of unregulated nicotine products (e-cigarettes), is strictly prohibited.



COOPERATIVE EXTENSION  
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HOLTVILLE, CALIFORNIA 92250-9615

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(760) 352-0846



### 27<sup>th</sup> Annual Fall Desert Crops Workshop Survey

In order to better serve you, our clientele, please take a few minutes to fill out this brief survey and return it to the registration staff before you leave today. Thank you.

- 1) What topics/issues would you like to see presented in the future?
- 2) Would you like the format to remain the same or would you like?  
(Circle your preference)
  - a. Remain the same
  - b. Fewer topics, longer presentations
  - c. Fewer topics, shorter day
- 3) How do you receive your information about the Fall Desert Crops Workshop?
- 4) Do you have any suggestions on how we can make the workshop more beneficial to you?

Optional: Name \_\_\_\_\_ Email address: \_\_\_\_\_



*The University of California prohibits discrimination or harassment of any person in any of its programs or activities.  
(Complete nondiscrimination policy statement can be found at <http://ucanr.org/sites/anrstaff/files/107734.doc>)*

*Inquiries regarding the University's equal employment opportunity policies may be directed to John Sims, Affirmative Action Contact,  
University of California, Davis, Agriculture and Natural Resources, One Shields Avenue, Davis, CA 95616, (530) 752-1397.*