

Fall Update Letter September, 2012

Dear Central Coast Wetland Managers, Scientists and Appreciators,

The members of the Central Coast Wetlands Group have been working hard since our last update in April, and we are excited to share our progress in building a collaborative community of wetland scientists and resource managers. Our current work includes the following:

Bar Built Estuaries Grant and Conference presentations

CCWG has been working on a grant from the US EPA Region 9 to study bar-built estuaries since 2009. The grant is winding down now, here are some of the activities we've undertaken recently.

- Module development and data collection: In April and May, CCWG travelled up and down the state visiting 30 Bar Built Estuaries from Redwood Creek in the North to Santa Margarita in the



Ross Clark and Sangeet Khalsa viewing Garcia Lagoon on the North Coast from above

South. At each site we ran the module that CCWG developed with the help of a TAC and the California Wetland Monitoring Workgroup's Level 2 Committee. Additionally, we collected YSI readings, water samples, wind speed, channel cross-sections and detailed vegetation surveys. At 10 sites we installed data loggers to record temperature and depth.

- Preliminary Historical Ecology: Comparing the current condition of the 30 lagoons to their historical condition, as depicted in the US Coast Survey T-sheets, is no easy feat. Developing a methodology to reflect the full extent of the "lagoon" boundary is challenging. Considerations include which habitat types to include in the extent, estimating the upstream location of the transition from BBE to river, and deciphering the symbols on the T-sheets (which were drawn by different surveyors over a 20 year period). Our methodology has changed a number of times to try to accurately depict not only loss, but conversion of habitat and land use since the T-Sheets.
- Data Analysis: The data collected in the field has been entered and the analysis is beginning. Results to come!
- Upcoming presentations: At the California Estuarine Research Society Meeting in late September, Ross Clark will be presenting the preliminary results of the CRAM data. Sierra Ryan

will be presenting about Historical Ecology methods. Sierra will also be presenting in October at the North American Association of Environmental Education on the outcomes of the exhibit at the Natural History Museum.

Integrated Regional Water Management Plan

CCWG has been working closely with the Regional Water Management Group for Greater Monterey County to develop and finalize the IRWMP necessary to be eligible for several funding sources including Prop 84. In addition to attending meetings and participating in multiple subcommittees, CCWG helped to write and is now working on both the Planning Grant and Implementation Grant. Read more below!

IRWMP Planning Grant

The Planning Grant for the IRWMP is now in full swing. CCWG is involved in the following:

- **Water Resource Project Coordination:** Katie Burdick, the process facilitator, has been interviewing stakeholders over the summer and developing the strategy to move forward. With the intensity and uncertainty of some of the issues in the region, she is guiding the subcommittee on a successful process to move forward, which is slightly different than our original design. Additionally, we are starting to develop the Joint Fact Finding process by identifying possible conflicts in the submitted projects.
- **Climate Change:** Over the last several months CCWG has been writing the Climate Change Chapter for the Greater Monterey County Integrated Regional Water Management Plan (IRWMP). As part of this process, we have put together a climate change technical advisory committee (TAC) comprised of individuals representing numerous regional agencies and organizations, to help review and advise on the chapter. The TAC was especially helpful in developing a climate change risk assessment as well as identifying and prioritizing next steps for climate change planning. CCWG will continue to work with the TAC to develop climate change projects for the Greater Monterey County region.
- **Web Development:** The funding for web development for the IRWMP is going to two websites. The IRWMP site that has been housed for years on CCWG's website is getting its own standalone site. Unveiling of the site is expected in October, although there will still be additional information added on an ongoing basis. The other website in development will be the Central Coast Action Tracker, with full mapping capabilities, intended to display information on IRWMP and non-IRWMP funded projects. We hope this site becomes a tool



From Climate Change Chapter: Preliminary inventory of water control structure locations overlaid with the Coastal Commission's priority

used by the region to show the cumulative progress of all the work being done here. This site is still in the early design phase.

- Economic Feasibility Analysis: This part of the planning grant is intended to help project proponents complete their economic feasibility for IRWM applications. This is especially important for projects with benefits that are difficult to quantify monetarily. How much is habitat worth? What about clean surface water? Public access to nature?

IRWMP Implementation Grant

CCWG was one of the organizations that submitted a project to the first round of IRWMP implementation funding through the Greater Monterey County. The contracting for this project has been slow, we hope to see it come to fruition in the next few months. CCWG is working on the following:

- CCWG is the lead on the proposal, *Water quality enhancement of the Tembladero Slough and Public Access for the Community of Castroville*, which is the first phase of a project that hopes to restore or enhance 16 acres of wetland in and around the lower Gabilan watershed as well as provide for coordination with all the affected stakeholders. We have been talking with both local landowners and the Regional Board to find a way to integrate our wetlands into practices that will meet everyone's needs.
- *Watershed Approach to Water Quality Solutions* is a project in which we are partnering with the Monterey Bay National Marine Sanctuary and the Monterey County Resource Conservation District to focus on water quality improvements in the Santa Rita Creek watershed. Integrated Watershed Restoration Program funds provided by the Coastal Conservancy and distributed by Monterey County RCD are currently being used for planning and permitting of restoration along the creek in Salinas. The 50% design plans are complete and the permitting process is beginning. There is a Santa Rita Creek watershed fair on October 6th.

California Rapid Assessment Method

CRAM Depressional Fieldwork



Marshall pond, a depressional site on the north coast

Under a larger Coastal Impact Assistance Grant from BOEMRE to SFEI, CCWG has been contracted to finish the development of a CRAM module for depressional wetlands. The current version of the Depressional Wetland CRAM module does not adequately assess the condition of wetlands across the range of hydroperiod present in the state of California. With CCWG as the task lead, project partners (SFEI, SCCWRP, RECP) have worked together to form sub-teams (e.g. Core Team and Depressional Team) that developed conceptual models for, and adjust the module metrics representative of different

depressional wetland types from various regions across the state. A team of expert CRAM practitioners tested the new metrics at a range of depressional wetlands across the state. We are now compiling and analyzing all of the data. Next we will revise the current module to accommodate different hydroperiods.

CRAM Wet Meadow Module Development

Cara Clark is the co-lead in developing a CRAM module for Wet Meadows along with Sarah Pearce of the San Francisco Estuary Institute. Cara and Sarah have convened Review Team of experts to advise them on wet meadow hydrology and potential impacts. They drafted a new fieldbook revised from a previous version that was written to assess meadows in the Coast Ranges. The new version aims to incorporate important elements of meadows in the Sierra Nevada that may not have been captured in the previous version. They visited 12 sites from Modoc County down to Kings Canyon to test out the draft fieldbook. Various members of the Review Team joined in these field exercises to provide feedback on the module.



Drosera meadows, a wet meadow site in Yosemite

Upcoming CRAM projects

- Arid streams: Under a Wetland Program Development Grant from USEPA Region 9 to SCCWRP, CCWG has been contracted to assist in the development of a CRAM module for arid and ephemeral streams. This project will focus on the desert southwest portion of the state. Fieldwork is set to begin in Spring 2013.
- CRAM self-testing sites: Under a Wetland Program Development Grant from USEPA Region 9, CCWG will be developing a suite of sites across the state (36 in total) where trained CRAM practitioners can go out and test their ability to assess the wetland. Site packets will be created for each location which will include directions to the site, a map of the area to be assessed, a complete score sheet, and justifications for all of the scores.

Other Monitoring Information

CRAM Training video

CCWG recently collaborated with staff from USEPA Region 9 and EPA Headquarters in Washington to create a Riverine CRAM training video/powerpoint using a software called Prezi (www.prezi.com). Two days were spent in Sunol Regional Wilderness Park filming. The footage

was taken back to Washington and will be assembled into a proof-of-concept training tool. If reception is good then most likely we will be creating additional training tools for CRAM!

NWCA Chinese Delegation

As a result of our work last summer on the National Wetland Condition Assessment, we were requested by EPA to provide wetland assessment training to a delegation of wetland scientists and managers from China. Over the course of two days at the Don Edwards National Wildlife Refuge, we taught all of the NWCA sampling protocols as well as CRAM and USA-RAM to the delegation.



Kevin O'Connor showing the Chinese Delegates how to conduct NWCA

Additional Information

USEPA Grant: Development of New Tools to Assess Riparian Extent and Condition-A Central Coast Pilot Study

CCWG is starting our new grant this month! Through the development of new tools to assess riparian habitat extent and condition, this project will pilot the State's Wetland and Riparian Area Monitoring Plan (WRAMP) to better manage riparian and riverine resources, integrate multiple monitoring and regulatory programs and stand as a model for rural and agricultural regions around the state. This proposal is in part a response to the Central Coast Regional Water Quality Control Board's specific request to develop tools and capabilities that support their "Vision of Healthy Watersheds." The four major tasks are: 1) Project administration, reporting, and formation of a Riparian TAC, 2) Map all riparian resources on the Central Coast using newly developed GIS methodologies, 3) Use of Level 1-2-3 data to evaluate a new Remote Riparian Assessment Method to support State riparian protection policy development, and 4) Expand the Riparian Area Mapping Tool to allow integration of aerial imagery into its analysis and allow for the tracking of temporal change in riparian habitat extent. We are beginning the process now of talking to other entities working on riparian assessments

Statewide Wetland Monitoring Strategy

CCWG continues to represent the Central Coast at the meetings of the California Wetland Monitoring Workgroup and the Level 2 Committee of the CMMW.

http://www.waterboards.ca.gov/mywaterquality/monitoring_council/wetland_workgroup/

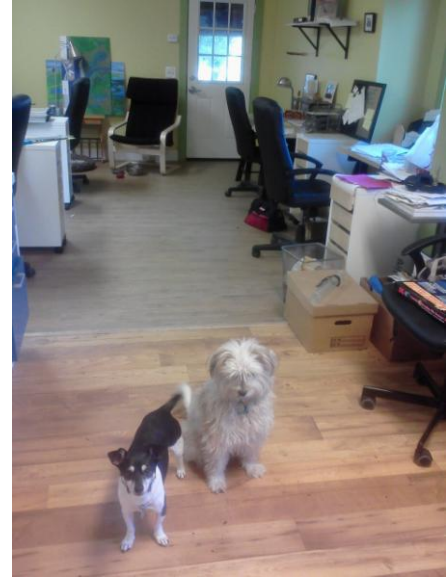
New Staff Member

CCWG is very excited to welcome our new staff member, Dr. Walter Heady, to the team! Walter just finished up his PhD at UCSC in Ecology and Evolutionary Biology. We are very fortunate that he has chosen CCWG as the place he wants to do his Post Doc. Walter will be helping us publish the results of some of our work, as well as analyze data from the lagoon sampling and be very involved in the new Riparian grant. He will also have a role teaching at MLML in the spring. If you want to contact Walter, his new email address is wheady@mlml.calstate.edu.

Office Remodel

Many of our partners have been to meetings that CCWG has hosted at the beautiful Moss Landing Marine Labs building, with a view or the Bay that is second to none. Most people don't realize that our office is actually down the hill from the main building. With CCWG growing in numbers, it was time to grow in space. With the help of MLML facilities staff we are now proudly set up in a beautiful, and yellow space, complete with built in heater!

Do you have any questions? Want to contribute your ideas about the structure and function of CCWG? Interested in working together? Please contact Sierra Ryan at sryan@mlml.calstate.edu with any ideas, questions or comments – we'd love to hear your feedback. You can also like us on facebook to view all of our sampling picture highlights.



New office complete with dogs