District Academic Senate

Sustainability Institute

Fall 2015 Newsletter December 9, 2015 Volume 1, Number 2

In this issue the SI reports:

- Students hear from the CDWR on the drought
- LACCD and the SCMI
- Watershed Council holds workshops on environmental funding and regional biodiversity
- CSUN hosts regional sustainability officers
- Valley College hosts OEHHA crumb rubber turf workshop
- Interview with Rob West on Gold Creek Field Station.

California Dept. of Water Resources speaker:

As part of the SI speaker series, students from across the campus at East LA College and Valley College heard Mr. Jeff Winchester from the Southern Field Division Headquarters at the Pyramid Lake Visitors Center. He addressed changes in the State Water Project (http://www.water.ca.gov/state_water_project_home.cfm) and the Owens Valley and Colorado River sources for LA water under our current drought conditions. Mr. Winchester pointed out that we need more snow than rain to put a dent into the currently depleted water reserves. He presented a brief history on how LA gets its water. Groundwater resources are very much at risk while at the same time representing an important future resource for urban Southern California. Both events were well attended and students got a very good idea of the extent of our water deficit. Some students seemed eager to work for the State Dept. of Water Resources.

LACCD and the SCMI:

As detailed in our last issue, the LACCD is putting final touches on our membership in the Southern California Marine Institute thanks to support from the Board of Trustees and leadership from Chancellor Rodriguez. Tours for faculty are planned for the Spring and support for curriculum will be sought to make the most of this outstanding marine facility at the port. SCMI is slated to be the anchor tenant at AltaSea, a new major facility still in the planning stages at City Dock One right across from Terminal Island, its current location. The SI will contact faculty in the next two months for creating an advisory committee for meeting the curriculum opportunities it represents.

Watershed Council Workshops

The Council for Watershed Health (http://www.watershedhealth.org/Default.aspx formerly the Los Angeles and San Gabriel Rivers Watershed Council) held two workshops this Fall on funding environmental orgs and on urban biodiversity. The Funders Forum at the Alameda Street HQ featured both donors and media on how to improve revenue for small environmental organizations and how best to do outreach using local media. In the area of funding attendees heard from donors large and small. The Metropolitan Water District (http://www.bewaterwise.com/) is a good source for small grants up to $2,000 for projects that involve fresh water in the coastal zone. The applications are done online (http://www.mwdh2o.com/inthecommunity/community-outreach/Pages/default.aspx) and take 30 minutes. MWD can help in coastal water projects but must include the fresh water resources. Each applicant can get one sponsorship per year. Kevin McLaughlin (kmclaughlin@mwdh2o.com) is the contact person but don't call him at 213 2176619, send e-mail and be succinct. Proposals must be educational (no turf removal, no fundraisers or galas). We also heard from the Wells Fargo Foundation, (https://www.wellsfargo.com/about/charitable/ca_guidelines) which is the largest philanthropic bank in the region. Mr. Jonathan Weedman (weedmanj@wellsfargo.com) gave us advice on how to write a good application and avoid buzzwords like "synergy" and "add a column". His humor was well received as he explained the educational goals of their environmental programs. In this case applicants should be a 501(c)(3) and have a Board of Directors. (It's a good idea to have a WF person on that board.)

At Southgate the Watershed Council hosted a half-day panel and discussion on biodiversity in the urban coastal zone on November 19th. Attendees heard from Supervisor Hilda Solis and experts in biodiversity on the species richness of our Mediterranean climate and the challenges these face form drought and urban sprawl. Once again recycling wastewater was discussed as treated water can be re-injected into aquifers. We import 21,000 acre-feet every year. This can be replaced with recycled water and is cheaper than imported water, which costs $770 per acre-foot.

Our logo: The District learning tree is embedded in the "triple bottom line" of sustainable development: social justice, political equality and environmental sustainability. The SI endorses this approach to environmental education.

DAS
Sustainability Institute
Fall 2015 Newsletter December 9, 2015 Volume 1, Number 2

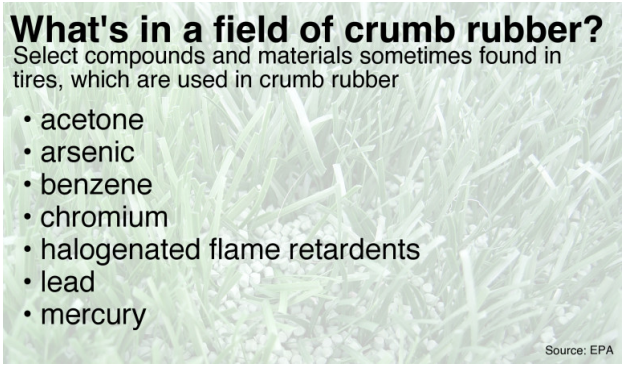
UCLA's Institute for the Environment and Sustainability hosts regional sustainability officers at CSUN

This December 8th event at Northridge included a tour of the campus to see the innovations and energy saving measures in some of the newest buildings at the Cal State campus. The Valley Performing Arts Center is very new, elegant and very popular venue for the arts in the San Fernando Valley. It is well designed for meeting energy savings and has a USGBC LEED Gold rating (http://www.usgbc.org/articles/about-leed). The new community center athletic facility has the latest in energy savings for heating, lighting and cooling and students actually contribute to electricity generation while using the equipment. Adjacent to the facility is CSUN's soccer pitch, which is crumb rubber (see below).

Most attendees were facilities managers from various campuses. Our own Beth Abels (Pierce, Architecture) also attended. Discussions followed questions on organizational structure and funding. Common experiences with vendors and technologies were also discussed. Santa Monica College (http://www.smc.edu/AcademicAffairs/Sustainability/Pages/default.aspx) stood out as the most funded community college sustainability organization.

OEHHA held workshop at Valley College on crumb rubber turf fields

The Office of Environmental Health Hazard Assessment (http://oehha.ca.gov/) (part of CalEPA) held a workshop December 3rd at Valley College to network with people in Los Angeles who are athletic directors and coaches who have athletes who play on crumb rubber turf.



They are conducting a risk assessment study (http://oehha.ca.gov/risk/SyntheticTurfStudies/SynthTurfWS101615.html) and creating a statewide database (http://oehha.ca.gov/risk/SyntheticTurfStudies/pdf/TurfStudyFactSheet102015.pdf) as a follow-up to a 2007 study on the health impacts of crumb rubber. There are known carcinogens in crumb rubber that might represent a health threat to some athletes. These fields are popular for their low-maintenance and water saving qualities. The LAUSD, Parks and Rec, and many colleges have adopted this turf on their playing fields. Interested faculty and staff should contact syntheticturf@oehha.ca.gov

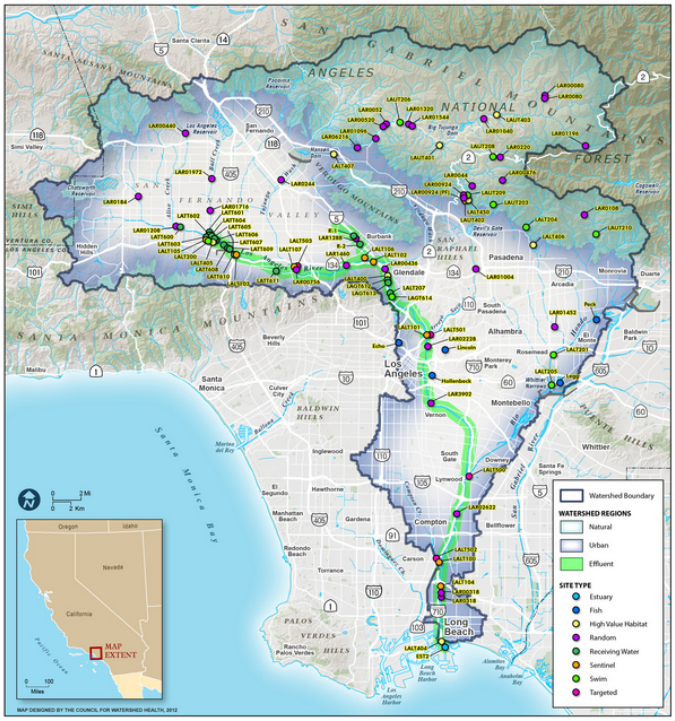
Gold Creek Ecological Field Station: an interview with Rob West.

The SI is interested in working closely with the Gold Creek committee to enhance the use of the facilities and to encourage outdoor environmental education. As we seek to integrate a concept of a coastal watershed into our urban environment, Gold Creek serves as an excellent learning lab for upper watershed protection and the rehabilitation of the L.A. River, a project long ago sought by City and County, and is currently gaining momentum in the City of Los Angeles government and local and

DAS
Sustainability Institute
Fall 2015 Newsletter December 9, 2015 Volume 1, Number 2

regional environmental organizations. The Sustainability Institute can help the Gold Creek reserve coordinate with Council for Watershed Health (formerly the Los Angeles and San Gabriel River Watershed Council) to share data gathering and provide student interns. Their citizen scientist program is ideal for our students. Future course offerings and internships in the LA River restoration projects and the SoCal Marine Institute will benefit from a greater use of the Gold Creek station.

Professor Robert West at East LA College is the current coordinator for the Gold Creek committee, which has for years worked to maintain the site and to develop curriculum in the sciences for the ecological study area for all faculty and students in the District. Dr. West has worked in all the areas of Gold Creek's multiple facilities and opportunities. One of those projects has been the Reserve's weather station that is used by students throughout the District. In addition, Rob helps maintain the trails and signage that cover many miles at the reserve and represent unique plant and animal communities. Every year the Gold Creek reserve hosts faculty as part of professional development in a half-day workshop that is led by an expert in a natural science field.



Today the Sustainability Institute is interviewing Dr. West in order to promote the reserve as a teaching laboratory to the faculty with interests in field studies. The availability of resources includes a wide range of disciplines that includes geology, biology, ecology, geography and the social sciences.

Rob, the road up the Little Tujunga and on into Gold Creek can seem a bit distant and daunting to some. Does one need a 4x4 to get there? How far is it? Thanks for this opportunity George. About four miles up the paved Little Tujunga road is the Gold Creek turn off. The road is paved for another mile before reaching a dirt fire road. Under ordinary circumstances, meaning little rain, the dirt road is easily passable by passenger cars. However, should El Niño bring heavy rains this winter, our access might be limited to high-clearance vehicles until the US Forest Service chooses to grade the road. In those periods faculty and students will sometimes hike the last mile to the site from the end of the paved road.

How do interested faculty contact you or the committee to get access to the gate and the classroom facility? Anyone can reach me at 323-260-8115 or westrb@elac.edu to start the process. Ordinarily I will refer them to their campus representative, but as circumstances dictate I often meet faculty at the site. All users are required to inform the coordinator (currently me through June, 2017) of intended visits. This allows me to alert them of safety issues such as road conditions, and avoid scheduling conflicts.

Should faculty attend some orientation on how to use the plant and animal inventory and contribute to data gathering? Yes indeed, our station is conducted as a research and education site with a number of protocols for site usage. Orientation is required before leading students on the site. I staged two site orientations in the early Fall and will advertise more in the Spring. Any department with an interest in a group or virtual orientation should contact me as well.

Two important events occur every Spring where faculty can get an orientation. First, is the GC Workshop you already mentioned, which we expect to host this year on April 16th with a local expert in mycology lecturing and leading a field inquiry. Winter rains should enhance that event. Second is our annual GC Open House to which all district employees and their families are invited. This event will occur on May 14th with a paleobotanist speaking to us about the archeological record of plant use in our region. One of our biologists will typically lead an early morning bird walk and others will lead visitors on our trails during that event.

DAS
Sustainability Institute
Fall 2015 Newsletter December 9, 2015 Volume 1, Number 2

In addition to the multiple trails, the ecological study area includes the creek itself, which provides a unique riparian ecosystem. Does the facility include water testing lab equipment and microscopes? Firstly, I should mention that each of our four groomed and marked trails have printed guides to facilitate study. We have water quality and soil testing kits, microscopes, binoculars, capture nets and cages, and field guides, as well as an extensive reference collection, and plant, insect, and vertebrate collections. Unfortunately, at present we have no water in the creek bed due to the drought.

Are there opportunities for social science field research, like anthropology? Depending on the focus of the visit, there are any number of opportunities at Gold Creek. One that we have been promoting most recently has been use of the site by the Art communities of our several campuses. The Gold Creek committee's mandate is to keep the site as close to its natural state as possible, thereby offering any number of possible uses that respect that intent.

What do you perceive to be the biggest challenges facing the Gold Creek facility during this drought/ El Niño year? Wow, the list keeps growing, but the most immediately visible impact of the drought has been the death and downing of oak trees throughout the site. Our spring has been completely dry for six months. We are currently preparing for the coming rains by developing contingency plans, and clearing debris. Our biggest fear is that we might lose access due to severe erosion of the dirt fire road. To address that possibility we maintain a close and cooperative relationship with the Forest Service.

Is it possible to schedule overnight stays for students and their professors? The Gold Creek committee, which has successfully managed and operated the site since 1971, long ago determined that overnight camping would be detrimental to the site. Evening visits, however, are fine, but we do not have facilities to support camping. We walk a delicate balance between providing for access and safety while attempting to keep the footprint of our ecological impact as small as possible.

How can people access the weather station online? Our satellite transmitter failed in August, but it should be up and running by the time this interview is published. Meanwhile, the four years of data already collected can be accessed online at http://goldcreek.elac.edu where users can select the data and time range they desire to access. The web interface provides a number of viewing and downloading options that instructors and students find instructive and useful. Personally, I love to look at the depth distributed soil temperature/moisture data over the course of a year.

What do you think Gold Creek needs the most right now to keep up with the learning opportunities it represents? We need faculty bringing students to the site, conducting research, or just hiking the trails to appreciate its incredible diversity of species. Once faculty visit the site they will typically find a way to get back with students. I would like to encourage faculty with honors sections to bring their cadres to Gold Creek to explore research opportunities. Nature continues to inspire humans to wonder and wander about her beauty and bounty. Painters, poets, scientists and politicians alike find connection to the environment when exposed to its natural state. More student exposure equals more opportunity to cultivate an environmental ethic. The SI focus on watersheds is an example of how to enhance awareness about the most critical element in the natural environment and points to why we should value the relatively unspoiled tracts that contribute flow to our urban rivers and groundwater resources.
Thank you Rob West.

In our next issue we hope to have the promised update on student environmental clubs in the LACCD.

- More on the coastal watershed and integrated learning opportunities
- Updates on El Niño related weather
- Interview with David Beaulieu on the founding of the SI and its trajectory.

Hoping for Happy Holidays to all the faculty and friends of the Sustainability Institute.