

CTAHR RESEARCH NEWS



May-June 2007
Volume 3, Issue 5

Healthy
Hawaii soil

Budding
scientists visit
CTAHR

2008
Congressional
earmarks in
danger

Jonathan Deenik checks the health of eggplants as part of a soil improvement study in Kula, Maui.



C. Y. Hu
Associate Dean and
Associate Director for
Research

From the Associate Dean and Associate Director for Research

The *CTAHR Research News (CRN)* magazine is taking a breather during the summer months again. Instead of going to press in May, our May/June issue is finally reaching you now. We plan to send you the July/August issue in mid-August, to greet the beginning of a new academic year.

Improving soil fertility was a major task when Hawaii Agricultural Experiment Station was established in 1902, and it continues to be one of our major efforts in CTAHR. In this issue, Dr. Jonathan Deenik tells a compelling story about the important issues of managing the most important resource under our feet: soil. As you read Jonathan's story, you will notice several key elements in all the work conducted by our faculty: integration of research with extension and teaching; keeping our stakeholders involved; conducting work at various branch stations outside Manoa; and seeking maximal impact. Although not mentioned in his article, Jonathan was also instrumental in partnering with community groups in Makaha Valley on several watershed projects (see *CRN* 2006 May/June issue). As we continue to celebrate CTAHR's centennial this year, Jonathan is an excellent example of our dedication to the spirit and mission of a land-grant institution! We are truly fortunate to have young faculty like him, working hard to help CTAHR fulfill its vision of a diversified economy, sustainable environment, and strong communities.

We also have a great story from Ania Wiczorek and her lab team on how they introduced a number of primary school students in Hawaii to molecular science and our college.

Our research programs are being challenged at this time due to the loss of special grants this year. We have been working very hard to distribute our increased formula funding to as many affected programs as possible, however, the hole is just too big for us to fill. Although the vice chancellor's office is willing to consider our request for additional funds, that promise is contingent on our receiving the FY 2008 special grants. Based upon early conversations, we've had with individuals up-to-date on the budget process, there is a **strong probability that our earmarks will NOT be funded again this year**. It appears that the Senate Agriculture Appropriations Sub-committee, in their markup of the Agriculture Appropriations Bill, may eliminate or at best, reduce earmarks in the FY 2008 budget. In the meantime, we need to continue to pursue extramural grants and contracts to support our research programs. Doug has good news to report: although most likely we will not surpass the record high in FY 2004, our grants and contracts intake has exceeded \$23 millions this year. A more detailed analysis follows after the closing of fiscal year in the next issue of *CRN*.

Campus leadership is experiencing a transition this summer, and Doug has the complete story for you. We are in the process of changing *CRN* format to allow reader inputs, which should be implemented next month. As always, please submit your publication achievements so that we can share your work with others. Enjoy your summer, and we will see you again in August.

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Keeping Hawaii soils healthy and productive

By Jonathan Deenik, Ph. D.
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Jonathan Deenik spreads composted animal manure on a test plot.

Healthy, productive soils are the foundation of a secure food system. Producing crops, however, can have a negative impact on the soil environment including the excessive accumulation of nutrients like nitrogen and phosphorus, the loss of soil organic matter, and the deterioration of soil physical properties. Excess nitrogen (N) and phosphorus (P) from fertilization poses a threat to valuable and fragile freshwater and coastal ecosystems. The loss of soil organic matter reduces the diversity and abundance of soil microorganisms, which play key roles in fundamental soil processes like nutrient cycling and the maintenance of good soil tilth. In order to compensate for these losses, larger chemical inputs are required to maintain production, which in turn, reduce farm profits, increase dependence on imports, and reduce the overall sustainability of the farm. Long-term

cultivation without the addition of organic matter also destroys soil structure and increases soil erosion, and the loss of one of our most valuable resources: soil. Our program focuses on assisting farmers in Hawaii implement soil management practices that maintain good crop production, and more importantly, enhance soil quality and protect the soil for future generations. Our work integrates research and extension activities with a strong commitment to farmers throughout Hawaii. In order to have the most impact, we conduct much of our work in partnership with a wide diversity of clients including cabbage and lettuce farmers on the fertile soils of Waimea (Big Island) and Kula (Maui), sweet corn producers on windward Oahu, taro farmers in Hanalei and Kauai ranchers trying to improve forage quality on the highly weathered and nutrient depleted soils of Olomau.

Growing good crops usually requires nutrient inputs such as conventional fertilizers or organic materials like manures or fish meal. In Hawaii, where farmers can plant multiple cropping cycles throughout the year, fertilizer inputs tend to be high and nutrients like P can accumulate to very high levels in the soil. If sediments enriched in phosphorus leave these fields in runoff during rainstorms, they end up in streams and in the ocean where they have a negative impact on water quality. With a grant from the USDA-NRCS, and the assistance of extension agents **Randall Hamasaki** (Kamuela), **Robin Shimabuko** (Kahului), and **Steve Fukuda** (Wahiawa), we have been working with farmers in Waimea (Big Island), Kula (Maui), Ewa (Oahu) and Waianae (Oahu)



Farmer/cooperator, Rob Nozawa, from Kahuku, Oahu, tills under a Sunn hemp crop in a field trial to evaluate the effect of green manures on soil quality and crop production.



Robin Shimabuko joins Jonathan Deenik on a soil sampling study.

to help them reduce phosphorus fertilizer inputs in fields that no longer require additional fertilizer. Through a number of on-farm trials, we have shown that they can get excellent crop yields without adding P fertilizers because the fields contain sufficient amounts of reserve P from previous fertilizer applications. There are several benefits to reducing P inputs: (1) farmers save considerable amounts of money and increase their profitability, (2) a non-renewable resource like P is not used wastefully; and (3) the potential for contaminating water resources is reduced.

In a related project funded by Maui County, I am working closely with extension agents **Robin Shimabuko** and **Alton Arakaki** (Molokai) to calibrate our soil testing procedures with P requirements for a range of important vegetable crops. Results will be used to update the fertilizer recommendation protocols used by the CTAHR Agricultural Diagnostic Service Center at the University of Hawaii.

Animal manures are also excellent fertilizers, but if they are not applied in the correct amounts their use is problematic: too little results in crop failure and too much leads to excessive amounts of N and P that can contaminate water resources. Deciding how much to apply to meet crop nutrient requirements is complicated by the fact that the nutrients in manures are mostly in their organic forms and must undergo microbially mediated reactions in the soil to become available for plant use. With the support of the USDA-NRCS, we



Extension agent, Steve Fukuda (right), confers with Leeward Oahu coast farmer, Owen Kaneshiro, on a study to improve the use of nutrients.

are conducting a series of field trials in the Waimanalo and Poamoho Experiments Stations on Oahu and the Lalamilo and Mealani Stations on the Big Island, to characterize N availability from dairy, chicken, and swine manures added to these soils with contrasting chemical and physical properties. Information generated from these trials will provide reliable recommendations on how much manure to add to their fields to satisfy crop nutrient requirements for the range of soils found in Hawaii.

With the demise of the sugarcane industry in Hawaii, large parcels of former sugarcane land have become available for pasture. Through funding obtained from the TSTAR program, Drs. **Mark Thorne** (HNFAS), **Harold Keyser** (Maui County), **Linda Cox** (NREM), and I are conducting large field experiments on the Big Island and Kauai, designed to find the optimum combination of lime, N fertilizer, and legume inter-seeding to improve forage quality on former sugar lands. Results from this interdisciplinary project will help ranchers implement cost-effective soil management practices to improve forage quality and further develop the nascent grass-fed beef industry in Hawaii. In addition, results from these experiments are applicable to CTAHR's current biofuels initiative, which proposes to use tropical grasses as potential sources of biofuel.

Developing management strategies that enhance soil

organic matter is one of my top priorities. Conventional agriculture has been very successful at producing copious amounts of food, but it has come at a cost: we have depleted soil organic matter with a negative impact on soil quality. Under the guidance of NREM's **Dr. Greg Bruland** and myself, **Parker Filer** (TPSS graduate, BS 2006 and current MS student at Cornell University) analyzed soil carbon (C) pools in a range of soils from the Big Island, Oahu and Kauai. He found



Benny Yamamoto of Benny's Farm on Maui, shares the bounty of his Maui onion crop with Jonathan Deenik. Benny has been getting advice of fertilizer optimization.

that soils under conventional practices had significantly lower total C, labile C and microbial biomass C compared with uncultivated soils or soils under organic cultivation. With funding from TSTAR, I am working with Dr. **Janice Uchida** (PEPS) and extension agents **Randall Hamasaki**, **Robin Shimabuku**, **Jari Sugano**, and **Steve Fukuda** on a project to help conventional vegetable farmers find viable soil management strategies that build soil organic matter without compromising crop production. The farmers have played a central role in developing the project, and we feel that by being involved in the trials from the beginning they will be more likely to adopt strategies that have worked on their farm. **Amanda McClellan**, a 2007 TPSS graduate



Jonathan L. Deenik

Born: Bogata, Colombia; raised Brussels, Belgium.

Joined CTAHR: 2003

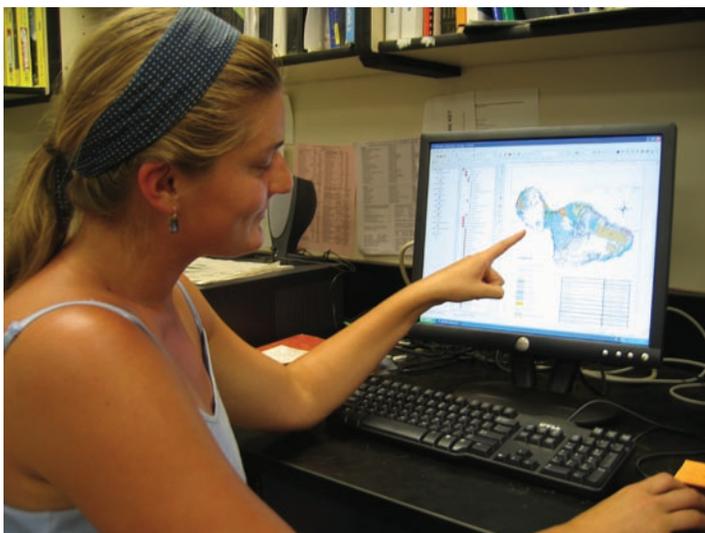
Educational History: Ph.D., Soil Science, University of Hawaii; M.S., Soil Science, University of Hawaii; BA, Art History/History, College of Wooster.

Specialization: Soil Fertility/Soil Quality
Current Work: soil organic matter dynamics, soil quality monitoring, nitrogen and phosphorus management in intensive vegetable systems, nitrogen dynamics in flooded taro soils.

Languages spoken: French, Italian, Nepalese, Spanish, Hawaiian, Sango.

will join the project as a Research Assistant in the Fall of 2007.

Just recently, I collaborated with Amanda, Dr. **Goro Uehara** (TPSS), and Dr. Michael Antal (Hawaii Natural Energy Institute) on a small project looking at the possibility of using flash carbonized (charred) macadamia nut shells as a soil amendment. As part of her independent study, Amanda showed that the degree of carbonization influenced the chemical properties of the charcoal and, in turn, its value as a soil amendment – poorly carbonized material had a toxic effect on plant growth compared with well-carbonized charcoal that had a beneficial effect on plant growth. These findings are important because of increasing interest in applying charcoal to soils for its beneficial effects on plant growth and as a means to sequester carbon and reduce greenhouse gases.



Amanda McClellan points out the distribution of soil types on Maui using GIS software.



Robin Shimabuku (right), and CTAHR Kula Experiment Station technicians harvest romaine lettuce phosphorus trial.

My passion for soils was kindled as I worked in the cassava patches of Southern Cameroon and rice paddies of Central Nepal during my two stints as a Peace Corps Volunteer. Since joining CTAHR, this passion has grown as I work with students, colleagues, and farmers. We have exciting challenges and opportunities ahead as we strive to fulfill CTAHR's vision of a diversified economy, sustainable environment, and strong communities.

Hawaii's future researchers: Invasion of the CTAHR molecular ecology laboratory!

By Ania Wieczorek, Ph. D.
Assistant Specialist
Molecular Ecology Lab and Agricultural Biotechnology Outreach Program
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A budding scientist learns about DNA at CTAHR.

The month of May was dedicated to stimulating interest among Hawaii's children in molecular biological research. Molecular biology is one of the fastest advancing fields of biology today, and touches on many disciplines in our College. It is also used in medicine, forensic science and essentially all facets of biology, as well as applications such as industrial biotechnology, environmental monitoring and conservation, agricultural security and many other valuable products. The application of molecular biology is based on a firm understanding of DNA and its importance to living organisms. To bridge the inevitable gap that exists between researchers and the general public, we have designed a program to engage young people in molecular biology and to provide them with

examples of applications in molecular ecology. We involved university staff, graduate, and undergraduate students so they will understand the need for engaging the youth in what we do. Our program consists of two components: participation in the agricultural and environmental awareness days and a hands-on laboratory program for students.

Agricultural and environmental awareness days are arranged on different islands, and this year was the first on Oahu. Our participation involves giving 20-minute lectures to groups of 5th grade students from various public schools to make them realize that we have limited space for producing food and that the human population is ever growing. Because farmers are faced with many problems that reduce yield we explain how the knowledge of DNA and associated traits can improve crops for higher production using classical breeding and genetic engineering. We get repeated invitations to participate because the presentations are so well-received, and seeing the children's excitement and responses about the research we discuss is rewarding.

For the very first time, we invited 75 students from

1st to 6th grades to visit my lab and participate in a variety of activities. Before the visit, the teachers were provided with two children's books on DNA and when they arrived at UH-M, we opened with a 30-minute talk about DNA. The level of preparedness was amazing: six year olds could name DNA bases and knew exactly what DNA meant. It was very cute to hear them saying "deeo-ksy-rybo-noo-klayik acid!" The first activity is to be a "detective." The students were given a "crime" to solve (who stole the shirt) and then used microscopes to examine hair fibers and investigate fingerprints. They learned that the uniqueness of the "clues" is the result of DNA and its unique expression in each individual. They then participated in an art project to make a genetic tree by using their own traits (like attached earlobes, bitter taste and tongue rolling) to see how each person has his/her own unique combinations. The last activity elicited the most impressive responses: the children extracted DNA from papaya in the research lab. For safety reasons, but mostly to impress the importance of working with care, they were all provided with child-sized lab coats, lab gloves and safety goggles. Much comparison of extractions and jumping up and down was done when the DNA precipitated out! We surprisingly learnt that children in Hawaii had no experience with putting on gloves – which proved to be the biggest challenge of the exercise – and each participant took a package with projects home to do with their parents.

Although setting up a children's program like this is very challenging and time consuming, it is all worth it when you see their absolute delight and amazement

in extracting and seeing the DNA, realizing what they have just achieved, and hearing that some have decided they will become scientists and will work at UH. If we can obtain funding to expand the program, I would like to include and offer it to the numerous public schools on Oahu.

The children we deal with are young and have hundreds of different and new interests, but by planting the seed of curiosity and appreciation of science, we are taking a step in the right direction. This was a very satisfying experience for me, but it would not have been possible without my graduate students (**Jaco Le Roux**, **Martha Coleman**, **Adam Vorsino** and **Stephanie Dunbar**) undergrad (**Neil Akatsuka**), **Shirley Ishihara** (TPSS departmental secretary-who took the role of leader of one of the groups), and of course **Carol Tran** (APT), who made the material appropriate for the audience and handled logistics.



Carol Tran helps a student build a DNA tree.



Seeing is believing for this young sleuth.

CTAHR Welcomes New UH-M Chancellor

By Doug Vincent
Special Program Director for Grants and Contracts

On July 1, 2007, Dr. Virginia Hinshaw will assume the position of Chancellor of the University of Hawaii at Manoa. CTAHR takes this opportunity to welcome Chancellor Hinshaw to Hawaii. As the founding college of the University of Hawaii and as Hawaii's Land-Grant University, we look forward to working with Chancellor Hinshaw. Dr. Hinshaw's past appointments in major Land-Grant Universities such as University of California-Davis and the University of Wisconsin-Madison, brings extraordinary experience to UH-Manoa. Prior to her appointment at UH-Manoa, Dr. Hinshaw served as Provost and Executive Vice Chancellor for Academic Affairs and Finance at UC-Davis. Before her appointment at UC-Davis, Dr. Hinshaw held positions as Dean of the Graduate School and Vice Chancellor for Research at the University of Wisconsin-Madison. We look forward to Chancellor's Hinshaw's leadership.



Hinshaw



Konan



Smatresk



Johnsrud

Mahalo to Interim Chancellor Konan and Vice-Chancellor Neal Smatresk

With the appointment of Chancellor Hinshaw, we bid Interim Chancellor Denise Konan a fond aloha with many thanks for her leadership for the last almost two years. Interim Chancellor Konan was appointed in August 1, 2005. CTAHR appreciates her leadership and support for the college during her tenure. She returns to the Economics Department faculty and we wish her continued success with her career. CTAHR also bids aloha to Vice-Chancellor for Academic Affairs Neal Smatresk. Dr. Smatresk recently joined the University of Nevada – Las Vegas. We wish Dr. Smatresk best wishes and good luck in his new position as Executive Vice President and Provost. UH Vice President for Academic Planning and Policy Dr. Linda K. Johnsrud has been appointed UH-Manoa's Interim Vice-Chancellor for Academic Affairs.

The research calabash

By Doug Vincent
Special Program Director for Grants and Contracts

Seeking Nominations for CTAHR Distinguished Visiting Scholar Program

CTAHR Faculty are encouraged to nominate scholars, intellectuals and other distinguished individuals for the CTAHR Excellence in Science Distinguished Visiting Scholar Program. Nominations to the Dean's Office will be accepted through **June 30, 2007**. The purpose of this program is to provide CTAHR and our campus with remarkable intellectual and educational experiences and to nurture the scholarly atmosphere in CTAHR. For more information about the program, go here: http://www.ctahr.hawaii.edu/vincent/CTAHR_Visiting_Scholar_RFP.pdf

CTAHR to Host USDA CSREES Official

Dr. Peter Burfening, National Program Leader, Competitive Programs at USDA Cooperative State Research, Education and Extension Service (CSREES) will visit CTAHR on **Friday, June 29, 2007**. Dr. Burfening is one of two CSREES liaisons assigned to the University of Hawaii and works with the National Research Initiative and the Small Business Innovation Grants Programs at CSREES. Dr. Burfening will be meeting with CTAHR administrators and faculty and will present a seminar at 10:00 – 11:30 pm on Friday. The title of the seminar is "How CSREES Relates to Your Programs or What do the Feds Really Do for You!" For more information or to schedule meetings with Dr. Burfening contact Doug Vincent at vincent@hawaii.edu. Polycom will be available to neighbor islands.

Hawaii AgriTourism Informational Meeting

The potential of agricultural tourism will be discussed at an informational meeting to be held on **Thursday, June 28, 2007 at 2:00 pm – 4:30 pm** at the Hawaii Department of Agriculture Plant Quarantine Office at 1849 Auiki St., Honolulu. If you have an interest in Agritourism, please consider attending this important meeting. RSVP to lanii@aliiikulavender.com. Or Contact Jody Smith smithjos@hawaii.edu or Kent Fleming fleming@hawaii.edu in CTAHR.

New CTAHR Extension Web Site

Have you noticed the difference? CTAHR's Office of Communication Services has completed the new CTAHR Extension Web site. Check out the new and improved web site here: <http://www.ctahr.hawaii.edu/site/extprograms.aspx>.

Communication and Transparency

The CTAHR Office of Research is constantly striving for improved communication between our office and our stakeholders. Our efforts, including the *CTAHR Research News*, may not reach everyone. We want to alert you to three endeavors to improve communications among us in CTAHR. The first has already begun. The notes from the

monthly CTAHR Leadership meeting are now posted on the CTAHR web site. Go here: <http://www.ctahr.hawaii.edu/ctahr2001/Faculty/index.html>.> to read the notes. Thanks to Dale Uno and the Office of Communication Services for helping improve communications. The other two initiatives will be forthcoming later this summer and fall. Please look forward to a couple of listening sessions that will be scheduled early in the Fall Semester. We had suggestions that rather than holding listening sessions on particular topics, that the faculty and staff would appreciate an open-ended listening session where all issues can be surfaced. Stay tuned and please participate when these sessions are scheduled. Lastly, look out for the CTAHR eXchange. The CTAHR eXchange will open up discussions using web logs and forums as an opportunity to "Communicate Ideas, Discuss Issues, Seek Solutions, and Raise Concerns." Look out for this service by the Fall Semester. More details will follow.

Update on Bridge Funding

On April 6, 2007, we sent out an e-mail request to CTAHR faculty and staff requesting completion of a spreadsheet to estimate loss of earmark funded projects. The spreadsheet, developed by Jim Hollyer, provided a worksheet to calculate the "burn" rate of funds in various categories and to prioritize requests for funding. The deadline was close of business on April 23, 2007. Spreadsheets and instructions were posted on the web. We received 59 spreadsheets or responses to the call and 28 were funded. Of the spreadsheets received, 17 were for USDA ARS-funded Specific Cooperative Agreements. We subsequently learned that USDA ARS Specific Cooperative Agreements would be funded at 75% of FY 2006 levels. Therefore, with one exception, none of the requests for bridge funding for USDA ARS Specific Cooperative Agreements were funded. Rather, we concentrated on the USDA CSREES-funded projects which did not receive any supplemental funding.

Memoranda have been sent out to recipients of bridge funding. Twenty-eight requests for funding were approved. Using a combination of Hatch, Hatch Multi-State, McIntire-Stennis and Smith-Lever funding, bridge funding of \$857,600 was distributed to faculty projects. Five faculty members did not have a Hatch or Multi-State project to receive the bridge funding. For these individuals, we asked that a Hatch or Hatch Multi-State project be approved before we can release funds to them. The breakdown of bridge funding requests was as follows:

Requests	#	Amounts
TSTAR	20	\$665,500
Agricultural Diversification	2	\$23,500
Federal Floriculture Research	5	\$135,200
USDA ARS Termite	1	\$33,400

It should be noted that CTAHR had limited supplemental funds available to distribute to various projects, through additional Hatch, Multi-State, McIntire-Stennis Forestry formula funds to cover losses of over \$6.4 million in FY 2006 earmark funds. Not all requests could be filled.

Update on Hawaii Department of Agriculture Permit Moratorium

In last April's edition of the *CTAHR Research News*, we briefed you on the Hawaii Department of Agriculture Moratorium on all new and renewal import permits for microorganisms. < http://www.hawaii.edu/ehso/bio/DOA_moratorium.html > The blanket moratorium has **not** yet been lifted, however, through an agreement made with the Hawaii Department of Agriculture and the University of Hawaii, it now appears that exceptions will be made on a case-by-case basis. If the permit holder has submitted his or her annual or semi-annual reports to the HDOA, and if the reports meet the standards established by HDOA, then new permits or renewals may be granted. If you are still delinquent in submitting your reports, we urge you to do so as soon as possible. We are working closely with the UH Institutional Biosafety Office to facilitate this process. Thanks to Thomas Lim, Mark Burch and Hubert Olipares.

Reminder About Research or Outreach Contracts

Many of us receive contracts from state agencies such as the Hawaii Department of Agriculture, Executive Office on Aging, or Department of Land and Natural Resources or from private organizations such as the Hawaii Farm Bureau Federation for research or outreach projects. Most of these projects are **cost reimbursable** to the University. The funding agency only provides a portion of the funding to the University at execution of the contract. The University of Hawaii Office of Research Services (ORS) "fronts" the PI the **entire** amount of the project, and as certain milestones are met (e.g. interim progress reports or final reports), the funding agency reimburses the University. That is why it is so critical that these reports be submitted on time because the funding agency can resist paying, if these milestones as established in the contract are not met. Make sure that when you submit progress or final reports that you also notify ORS so that they can invoice the funding agency so that we can be paid. Also important is that if you **deviate from the scope of services or from the approved budget without amending the contract**, the funding agency is under no obligation to pay the balance of the contract. You **do not** have the latitude to make these discretionary changes with a contract as you may have with a grant. If you are having difficulty meeting the scope of services or other deadlines with the contract, contact the funding agency and discuss it with them and if necessary, amend the contract **BEFORE** making any changes. You might save the University of Hawaii some money and some headaches for you.

Vertebrate Animal Training Sessions

For those of you using vertebrate animals, the University of Hawaii Laboratory Animal Services (LAS) will be holding

training sessions for the new "Granite" on-line IACUC protocol submission and animal ordering system. The on-line system will permit submission of IACUC protocols, revisions to protocols, tracking of protocol approval and the ordering of laboratory animals. Two hour training sessions will be offered (sorry, Manoa only) in the Ag Sciences 215 Computer Lab starting Wednesday, July 11, 2007 through Monday, July 16, 2007 for protocol submissions. Space is limited so reserve your place by registering here: <http://www2.hawaii.edu/~uhvacup/granite/> You can register at the same site for the separate training for purchasing lab animals through LAS.

A reminder for those using vertebrate animals, that effective March 2007, that re-certification of the review of regulations for project personnel is required **every three years** and must be current for full and annual renewal of protocols covering vertebrate animal use. To request re-certification, go here: http://wct01.hawaii.edu/public/uhrr_cert/

Increase in Visa Filing Fees

Effective **July 30, 2007**, the U.S. Customs and Immigration Service will raise Visa Filing Fees. The new fees will be as follows:

H1-B or TN for Individual	\$320
Dependents of H-1B or TN	\$300
H-1B Fraud Fee for new H1-B petitions (no cost)	\$500
Premium Processing Fee (no change)	\$1000

For more information see the RCUH document here: <https://securercu01.rcuh.com/000168d/rcuh1.nsf/7b1e3e85b13603260a2564d6001576fd/918722d114d5c2f90a256f93007a6413?OpenDocument> or visit the U.S. Customs and Immigration Service web site: <http://www.uscis.gov/portal/site/uscis>.

Interested in the Farm Bill?

The 2007 Farm Bill is currently under consideration by the U.S. Congress. Among other things, the Farm Bill authorizes expenditures for various programs in USDA and Congress will rely upon this legislation for authority to appropriate funds that affect USDA budgets. The House Committee on Agriculture has created a web site that holds draft language to help in the markup process for this legislation. Please visit the web site to get more information: <http://agriculture.house.gov/inside/2007FarmBill.html>. This site will be updated frequently over the next several months and the bill is finalized, so visit often.

Grant Writing for Graduate Students – Fall Semester, 2007

Once again, Doug Vincent and Brian Turano will be offering "Grant Writing for Graduate Students" Fall Semester, 2007. The 1-credit course, ANSC or FSHN 697, will be held on Tuesdays from 12:00 noon – 1:15 pm in Ag Sciences 204. The course is open to all CTAHR graduate students. Over the semester, the students develop a grant proposal in its

different parts: goals, objectives, background, methods, title, and abstract. The course helps our graduate students focus and define a project through writing and peer review. The course is useful for students in all disciplines and at all stages for their graduate program. For more information, contact Doug Vincent at vincent@hawaii.edu or Brian Turano at turano@hawaii.edu. To read the course outline, go here: http://www.ctahr.hawaii.edu/vincent/Topic_Schedule_Fall_2007.pdf.

Opportunity Resource: Social Science Research Council

The Social Science Research Council is an independent, not-for-profit research organization, focusing on innovative approaches to issues of critical social importance. Currently the SSRC is supporting projects related to globalization, political and economic development, health, international security, human migration and information technology. This is done through workshops and conference sponsorship, scholarly exchanges, summer training institutes, fellowships and grants. There are several fellowships and scholarships available through SSRC. For more information, contact the web site: <http://www.ssrc.org/>.

Save the Date: 2007 Hawaii Conservation Conference – July 25 -27, 2007

The Hawaii Conservation Alliance will be hosting the 2007 Hawaii Conservation Conference “Conservation Strategies: Matching Science & Management” on July 25-27, 2007 at the Hawaii Convention Center in Honolulu. Plenary speakers, symposia and forums include “Measuring Conservation Effectiveness;” “Alternative Energies;” “Invasive Species Economic Perspectives” and “Ecosystem Services in Hawaii.” For more details on the program and how to register visit their web site: <http://www.hawaiiconservation.org/activities.asp>

Save the Date: Faculty Orientation– Thursday, August 16, 2007

CTAHR’s Office of Academic and Student Affairs is planning Faculty Orientation Session on Thursday, August 16, 2007. Stay tuned for more details but mark your calendars now.

Save the Date: A Taste of the Hawaiian Range/ Mealani Forage Field Day – September 28-29, 2007

Please mark September 28-29, 2007 on your calendar. The 12th Annual “A Taste of the Hawaiian Range” Food Festival is scheduled for Friday, September 28, 2007 at the Hilton Waikoloa Village. The food festival features not only forage-finished meats, outstanding culinary talents and fantastic food, but is a celebration of Big Island agriculture. This year’s Mealani Forage Field Day will include educational programs at the Hilton Waikoloa Village on Friday afternoon prior to the “Taste” followed by a field day at CTAHR’s Mealani Station in Kamuela on Saturday, September 29, 2007. The Mealani Forage Field Day is an annual outreach program to provide information on forage-based livestock production targeting Hawaii’s livestock producers. For more information, see the

memo from Mark Thorne available here: http://www.ctahr.hawaii.edu/vincent/2007_Mealani_Taste_Invitation.pdf

Save the Date – Grant Writing Workshop, Denver, CO – October 2-3, 2007

Colorado State University, University of Wyoming, Western Association of Agricultural Experiment Station Directors and USDA CSREES are hosting a grant writing workshop on October 2-3, 2007 at the Holiday Inn Denver International Airport, Denver, CO. The October 2nd Grantsmanship Workshop will be on USDA-CSREES Funding Opportunities with emphasis on the National Research Initiative Competitive Grants Program (NRICGP), Higher Education, Multicultural Alliances and International Programs, Integrated Research, Education and Extension Programs, Social Sciences Programs, Microbial Programs, Natural Resources and Environment Programs, Agricultural Research Enhancement Awards and Small Business Innovation Research Programs (SBIR). The October 3rd workshop on “Writing Winning Grants” will provide participants with the tools needed to be successful in the grant writing process. The workshop will emphasize the process of developing a successful grant submission including developing a personal strategic plan, participating in the review process, proposal organization, development of integrated team proposals, and avoiding common proposal writing errors. Both workshops are designed for an audience of researchers, extension specialists, educators and administrators. Participants should expect gain a complete understanding of the grant writing process.

Travel grants will be awarded to faculty from minority-serving institutions to partially offset the cost of attending these workshops. Travel grant application information is available on the Workshop web sites at the links below.

Complete registration, lodging, workshop schedules, travel grant applications, and other details are available at <http://www.colostate.edu/Depts/AES/csrees/>

Full conference registration fee is \$310 (\$375 for after September 10, 2007). Single registration is \$170 for October 2, 2007 and \$140 for October 3, 2007. (Both are higher after September 10, 2007).

Save the Date – Hawaii Pacific Kava Festival – October 6-7, 2007

CTAHR will be hosting the Hawaii Pacific Kava Festival on Saturday and Sunday, October 6-7, 2007. On Saturday, October 6, 2007 from 12:00 noon to 8 pm, come celebrate kava (‘awa) in modern Hawaii, through music, hula, kava tasting, crafts and exhibits; on the McCarthy Mall on the UH-Manoa Campus. On Sunday, October 7, 2007, presentations on kava research will occur in room 010, St. John Plant Sciences Bldg, from 9:00 am – 1:00 pm. Contact H.C. “Skip” Bittenbender, hcbitt@hawaii.edu for more information or see the web site: <http://www.kavafestival.org> for more information.

PBARC opens new laboratory facility

By Doug Vincent
Special Program Director for Grants and Contracts

The USDA ARS Pacific Basin Agricultural Research Center (PBARC) dedicated and opened its Phase I Laboratory in Hilo on Tuesday, May 29, 2007. Wayne Nishijima, Doug Vincent and Kelvin Sewake represented the CTAHR administration at the dedication ceremony. A large number of CTAHR faculty and staff also joined our colleagues at PBARC to celebrate the opening of the new laboratory and office facility. Joining PBARC Director, Dr. Dennis Gonsalves on this special day as guest speakers were: Dwayne Buxton, USDA ARS Pacific West Area Director; Antoinette Betschart, USDA ARS Associate Administrator; USDA REE Deputy Undersecretary, Merle Pierson; Third District State House Representative Clifton Tsuji, Hawaii State House; Rose Tseng, Chancellor, UH-Hilo; Harry Kim, Mayor, Hawaii County; Sandra Lee Kunimoto, Chairperson, Hawaii Department of Agriculture. Kahu Daniel Akaka, Jr. conducted the blessing. The keynote speaker was the Honorable U.S. Senator, Daniel K. Inouye. Other notables present were Jim Gaines, UH Interim Vice President for Research; State Senator Lorraine Inouye; Bruce Anderson, Director, Oceanic Institute, and current CTAHR Board of Advisors member and CARET representative, Herbert "Monty" Richards. The completion and opening of the Phase I Laboratory consolidates Hawaii Island PBARC staff in a central location. Expansion is planned for a Phase II with additional laboratory space, offices, and greenhouses. The facility is impressive and we congratulate Dr. Dennis Gonsalves and our colleagues in PBARC on the completion of Phase I. CTAHR looks forward to a strong, continuing and fruitful partnership with our colleagues at PBARC.

The new PBARC facility, located mauka of Komohana Street in Hilo is a short drive from CTAHR's Komohana Agriculture Complex.



Senator Daniel K. Inouye (left) talks with Herbert "Monty" Richards at the PBARC opening.



Senator Daniel K. Inouye (right) and Dennis Gonsalves (back right) greet visitors at the PBARC opening.



Summer grant writing project coming along?

By Doug Vincent
Special Program Director for Grants and Contracts

In the April issue of *CTAHR Research News*, I suggested that you write grants as your summer project. Summer officially arrived on June 21, 2007, so there's still time to get after it. The loss of our Congressional earmarks from our FY 2007 budget is now having an impact on our budgets and our programs. The budget process for the FY 2008 federal budget is underway in the Congress. **But based upon informal conversations close to the situation, there is a strong likelihood that our earmarks will NOT be restored in FY 2008.** If the earmarks don't return, do you have a "plan B?" Are you preparing for the eventuality that funding might not be available for the current personnel on your projects

– non-tenure track faculty, APTs, graduate assistants? We all need to be pro-active to seek additional funding to support what we do and do well. The opportunities listed below are just a few of the opportunities available. We're nearly the end of grant cycle for this year and a new one with new opportunities awaits us. Set your mind to the task and plan on submitting one or two big grant proposals this coming year. I admit that success rates are low for the amount of effort required but as the former hockey great, Wayne Gretsky, once said, "You miss 100% of the shots you never take." Take the shot! As always, our office is here to assist you in your efforts.

CHS Foundation
Rural Youth and Leadership Development
Proposal Deadline: rolling – applications accepted year round
<http://www.chsfoundation.org/programs/ryld.htm>

Conservation, Food and Health Foundation
Grants directed conservation, food and health in the Developing World
Concept Applications Due: July 1, 2007, February 1, 2008
<http://www.grantsmanagement.com/cfhguide.html>

CHS Foundation
Returning Value to Rural Communities
Proposal Deadline: rolling – applications accepted year round
<http://www.chsfoundation.org/programs/rvrc.htm>

American Orchid Society
Research Grants
Proposal Deadline: July 1, 2007; January 1, 2008
<http://aos.org/aos/uploadedfiles/docs/guidelinesgrants.pdf>

Office of Hawaiian Affairs
Kauhale and Kaiaulu Grants
Proposal Deadline: June 30, 2007
http://www.oha.org/index.php?option=com_content&task=view&id=304&Itemid=161

Hawaii Community Foundation
Fred Baldwin Memorial Foundation (funds Maui projects)
Proposal Deadline: July 2, 2007
http://www.hawaiicommunityfoundation.org/doc_bin/grant_rfps/2007/Baldwin_2007_guidelines.pdf

International Foundation for Science
Sustainable Management, Conservation of Biological or Water Resources
Proposal Deadline: June 30, 2007, December 31, 2007
<http://www.ifs.se/>

U.S. Department of Labor
YouthBuild
Proposal Deadline: July 3, 2007
<http://www.doleta.gov/sga/sga.cfm>

Home Depot Foundation
Affordable Housing Projects
Letter of Inquiry Due: July 1, 2007
http://www.homedepotfoundation.org/support_housing_apply.html

Hawaii Department of Land and Natural Resources
Division of Forestry and Wildlife
Koa Salvage and Reforestation Project
Hilo Forest Reserve, Island of Hawaii
Proposal Deadline: July 3, 2007
<http://www.state.hi.us/dlnr/dofaw/announcements/Hilo%20koa%20salvage%20RFP%20-%2006.01.07%20final.pdf>

Department of Health and Human Services
National Institute of Health
Long-Term Weight Maintenance: Basic and Clinical Studies
(R01)
Proposal Deadline: July 5, 2007, November 5, 2007
<http://grants.nih.gov/grants/guide/pa-files/PA-07-053.html>

Department of Health and Human Services
National Institute of Health
Retirement Economics (R01)
Proposal Deadline: July 5, 2007, November 5, 2007
<http://grants.nih.gov/grants/guide/pa-files/PA-07-075.html>

Department of Health and Human Services
National Institute of Health
Parenting Capacities and Health Outcomes in Youth and
Adolescents (R01)
Proposal Deadline: July 5, 2007, November 5, 2007
<http://grants.nih.gov/grants/guide/pa-files/PA-07-061.html>

U.S. Department of Agriculture
CSREES – Rangeland Research
Proposal Deadline: July 9, 2007
http://www.csrees.usda.gov/funding/rfas/pdfs/07_rangelands.pdf
<http://www.csrees.usda.gov/fo/rangelandresearchprogram.cfm>

U.S. Environmental Protection Agency
National Center for Environmental Research
Development and Evaluation of Innovative Approaches
for the Quantitative Assessment of Pathogens and
Cyanobacteria and their Toxins in Drinking Water
Proposal Deadline: July 10, 2007
http://es.epa.gov/ncer/rfa/2007/2007_star_drinkingwater.html

U.S. Department of Health and Human Services
Administration on Children and Families
Compassion Capital Fund Communities Empowering
Youth Program
Proposal Deadline: July 10, 2007
<http://www.acf.hhs.gov/grants/open/HHS-2007-ACF-OCS-IC-0141.html>

U.S. Department of Agriculture/Energy
Rural Development Agency
Biomass Research and Development Grant
Proposal Deadline: July 11, 2007
<http://www.rurdev.usda.gov/rbs/>
<http://www.brdisolutions.com/default.aspx>

U.S. Department of Health and Human Services
Office of Public Health and Science
2007 Community Partnerships to Eliminate Health
Disparities
Proposal Deadline: July 11, 2007
<https://www.grantsolutions.gov/gs/preaward/previewPublicAnnouncement.do?cancelMapping=cancelToAnnouncements&id=8245>

Robert Wood Johnson Foundation
Fresh Ideas: Improving the Health of Immigrant and
Refugee Communities
Proposal Deadline: July 13, 2007
<http://www.rwjf.org/applications/solicited/cfp.jsp?ID=19480>

Organic Farming Research Foundation
Proposal Deadline: July 16, 2007
<http://ofrf.org/grants/apply.html>

Hawaii Community Foundation
Annie Sinclair Knudsen Memorial Fund/Kauai Community
Grants Program
Proposal Deadline: July 16, 2007
http://www.hawaiicommunityfoundation.org/doc_bin/grant_rfps/2007/Knudsen_2007_RFP.pdf

U.S. Environmental Protection Agency
Climate Economic Workshops
Proposal Deadline: July 23, 2007
<http://www.epa.gov/air/grants/07-06.pdf>

U.S. Department of Agriculture
Rural Development Agency
Small, Minority Producer Grants
Proposal Deadline: July 30, 2007
<http://www.rurdev.usda.gov/rbs/coops/smpg/smpg.htm>

Ray Solem Foundation
Grants to Help Immigrants Learn English in Innovative
Ways
Proposal Deadline: July 31, 2007
<http://www.raysolemfund.org/grants.html>

Council of International Exchange of Scholars
Fulbright Scholar Program
Proposal Deadline: August 1, 2007
http://www.cies.org/us_scholars/us_awards/

Council of International Exchange of Scholars
Fulbright Border Program
Proposal Deadline: August 1, 2007
http://www.cies.org/award_book/award2008/award/Ful8585.htm

Staples Foundation for Learning®
Teach – Train – Inspire ®
Proposal Deadlines: August 3, 2007, December, 7, 2007
<http://www.staplesfoundation.org/foundhome.html>

Youth Service America Venture Program
Proposal Deadline: August 13, 2007
<http://www.genv.net/en-us/region/ysa>

U.S. Department of Agriculture
CSREES – National Research Initiative-Competitive Grants Program
Animal Protection and Biosecurity (C): Animal Biosecurity Coordinated Agricultural Products (CAP)
Proposal Deadline: August 14, 2007
<http://www.csrees.usda.gov/fo/fundview.cfm?fonum=1522>

Open Meadows Foundation
Projects Benefiting Women and Girls
Proposal Deadline: August 15, 2007
<http://www.openmeadows.org/>

Hawaii Community Foundation
Medical Research
Proposal Deadline: August 15, 2007
http://hawaiicommunityfoundation.org/doc_bin/grant_rfps/2007/MedRes_2007_RFP.pdf

Smithsonian Tropical Research Institute
Short Term Fellowships Programs
Proposal Deadlines: August 15, 2007, November 15, 2007, February 15, 2008, May 15, 2009
http://www.stri.org/english/education_fellowships/fellowships/stri_programs.php

U.S. Department of Health and Human Services
National Institutes of Health
High-End Instrumentation Grant Program (S10)
Letter of Intent Due: August 17, 2007, Proposal due: September 17, 2007
<http://grants.nih.gov/grants/guide/pa-files/PAR-07-383.html>

U.S. Department of Agriculture
Foreign Agriculture Service
International Agricultural Internship Program
Application Deadlines: August 18, 2007, November 15, 2007, April 3, 2008
<http://www.fas.usda.gov/admin/student/iaip/index.htm>

U.S. Office of Naval Research
Defense University Research Instrumentation Program (DURIP)
Proposal Deadline: August 21, 2007
http://www.onr.navy.mil/02/baa/docs/AFOSR-BAA-2007-09_durip_08_baa_v4a.pdf

Hawaii Community Foundation
The Rev. Takie Okumura Family Fund
Youth Children and Youth Grantmaking Program
Proposal Deadline: August 31, 2007
http://hawaiicommunityfoundation.org/doc_bin/grant_rfps/2007/Okumura_2007.pdf

United States – Israel
Binational Agricultural Research and Development Fund
Proposal Deadline: September 1, 2007 (pending)
<http://www.bard-isus.com/>

Social Science Research Council
Abe Fellowship Program
Proposals accepted for 1) global issues, 2) industrialization and 3) Japan-US relationships
Proposal Deadline: September 1, 2007
<http://fellowships.ssrc.org/abe/>

National Science Foundation
Instrument Development for Biological Research
Proposal Deadlines: September 12, 2007; August 29, 2008
<http://www.nsf.gov/pubs/2007/nsf07568/nsf07568.pdf>

National Science Foundation
Environmental Engineering
Proposal Deadlines: September 15, 2007
http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=501029

National Science Foundation
Environmental Sustainability
Proposal Deadlines: September 15, 2007
http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=501027

National Science Foundation
Environmental Technology
Proposal Deadlines: September 15, 2007
http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=501030

National Science Foundation
Energy for Sustainability
Proposal Deadlines: September 15, 2007
http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=501026

National Science Foundation
Biotechnology (BTEC)
Proposal Deadlines: September 15, 2007
http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=501029

U.S. Environmental Protection Agency
Interpretation of Biomarkers Using Physiologically Based
Pharmacokinetic Modeling
Proposal Deadline: September 18, 2007
http://es.epa.gov/ncer/rfa/2007/2007_star_biomarkers.html#SUMMARY

U.S. Environment Protection Agency
Development of Environmental Health Outcome Indicators
Proposal Deadline: September 19, 2007
http://es.epa.gov/ncer/rfa/2007/2007_star_health_indicators.html

Borchard Foundation Center on Law & Aging
Academic Research Grant Program
Proposal Deadline: September 30, 2007
http://www.borchardcenter.org/argp_rfp.html

U.S. Department of Defense
United States Army Medical Research & Materiel
Command
Broad Agency Announcement
Proposal Deadline: September 30, 2007
<http://www.usamraa.army.mil/pages/index.cfm>

U.S. Department of Health and Human Services
National Institutes of Health
Improving Diet and Physical Activity Assessment (RO1)
Letters of Intent Due: September 5, 2007; May 5, 2008
Proposal Deadline: October 5, 2007; June 5, 2008
<http://grants.nih.gov/grants/guide/pa-files/PAR-07-259.html>

U.S. Department of Interior
U.S. Fish and Wildlife Service
Coastal Program
Proposal Deadline: September 30, 2007
<http://www.fws.gov/coastal/CoastalProgram/>
http://www.fws.gov/pacificislands/worg/orghc_coastal.html

U.S. Department of Defense
National Biodefense Analysis and Countermeasures Center
Broad Agency Announcement
Proposal Deadline: September 30, 2007
<http://www.usamraa.army.mil/pages/index.cfm>

Organisation for Economic Co-operation and Development
Biological Resource Management for Sustainable
Agricultural Systems
Research Fellowship – 2008
Proposal Deadline: September 30, 2007
http://www.oecd.org/departement/0,2688,en_2649_33903_1_1_1_1_1,00.html

Women's Fund of Hawaii
Proposal Deadline: October 1, 2007
<http://www.womensfundhawaii.org/guidelines.doc>
<http://www.womensfundhawaii.org/index.htm>

National Gardening Association
Youth Garden Grants Program
Proposal Deadline: October 1, 2007
<http://www.kidsgardening.com/YGG.asp>

CHS Foundation
2008 Cooperative Education Grants Program
Proposal Deadline: October 1, 2007
<http://www.chsfoundation.org/programs/ce.htm>

U.S. Department of Agriculture
Agricultural Marketing Service
Specialty Crop Block Grant Program
Proposal Deadline: October 11, 2007
<http://www.ams.usda.gov/fv/scbgp.html>

Council for International Exchange of Scholars
Scholar-In-Residence Program
Proposal Deadline: October 15, 2007
<http://www.cies.org/Institutions/>

Council for International Exchange of Scholars
European Union Scholar-in Residence Program
Proposal Deadline: October 15, 2007
<http://www.cies.org/sir/eusir/>

National Gardening Association
Healthy Sprouts Awards
Proposal Deadline: October 15, 2007
<http://www.kidsgardening.com/healthysprouts.asp>

National Institutes of Health
Institutional Clinical and Translational Science Award (U54)
Letter of Intent due: September 24, 2007
Proposal Deadline: October 24, 2007
<http://grants.nih.gov/grants/guide/rfa-files/RFA-RM-07-007.html>

U.S. Department of Agriculture
Western Regional Sustainable Agriculture Research and
Education
Professional Development Grants
Proposal Deadline: November 1, 2007
http://wsare.usu.edu/grants/docs/req_pd_08.pdf

Fund for Wild Nature
Proposal Deadline: November 2, 2007
<http://www.fundwildnature.org/proposal.html>

U.S. Department of Agriculture
Western Regional Sustainable Agriculture Research and
Education
Professional + Producer Grants
Proposal Deadline: December 7, 2007
http://wsare.usu.edu/grants/docs/req_pp_08.pdf

U.S. Department of Agriculture
Western Regional Sustainable Agriculture Research and
Education
Farmer-Rancher Grants
Proposal Deadline: December 7, 2007
http://wsare.usu.edu/grants/docs/req_fr_08.pdf

National Science Foundation
Research Initiation Grants and Career Advancement
Awards to Broaden Participation in Biology
Proposal Deadline: January 14, 2008
http://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf07560

Binational Agricultural Research and Development Fund
Senior Research Fellowship Grants
Proposal Deadline: January 15, 2008
http://www.bard-isus.com/ResFellguide_07.pdf

Binational Agricultural Research and Development Fund
Workshop Grants
Proposal Deadline: February 1, 2008
http://www.bard-isus.com/Workshop_07.pdf

A very good year for CTAHR

By Doug Vincent
Special Program Director for Grants and Contracts

As we close out the FY 2007 state fiscal year, we can look back and say that CTAHR had a very good year in obtaining extramural grants and contracts. As of June 21, 2007, CTAHR has received 170 awards for \$23,295,765. This amount represents the second best year in CTAHR's history, just short of the \$24,153,326 in extramural grants and contracts received in FY 2004. We may get a few more awards to our credit in the remaining few days of the fiscal year. We are also \$3.43 million ahead of our FY 2006 amount of \$19,860,322. Thanks to all the clever and dedicated faculty and staff who made the effort to seek out this funding. My enthusiasm and excitement is tempered by the fact that we received three very large grants (>\$1 million each) in FY 2007 that won't be continued into the next year and that we will not feel the impacts of the loss of our Congressional earmarks until the FY 2008 state fiscal year. So I suspect that I will not be so enthusiastic next year at this time. (Please, prove me wrong!)

Since we last reported to you in the April edition of *CRN*, we have received 21 awards for \$2,560,909. Excellent work!! Please congratulate your colleagues on their considerable efforts to seek and receive this funding. It takes time and dedication to succeed in the grants "game" but these folks have shown that it is not impossible. Thanks to you all.

CTAHR grant winners as reported from 4/19/07 - 6/21/07.

First name	Last name/dept	Project name	Funder	Amount
Gregory	Bruland (NREM)	Innovations in Stream Phytoremediation and Erosion Control of Degraded Stream Banks	Sustainable Resources Group International	\$63,502
Carl I	Evensen (NREM)	Implementation of Local Action Strategy to Address Land-based Pollution Threats to Hawaii's Coral Reefs	DLNR-Division of Aquatic Resources	\$45,000
Grace	Fong (FCS)	Learning to Grow 2007-2008	Hawaii-Dept of Human Services	\$601,213
J Kenneth	Grace (PEPS)	2007 -- Funding for Research of Mutual Interest - Amendment #1	DA-Dept of Agriculture	\$9,100
Arnold H	Hara (PEPS)	Implementing Quarantine Heat Treatments for the Coqui Frog and Other Invasive Species Impacting the Hawaiian Nursery Industry	Hawaii-Dept of Agriculture	\$200,000
Cerruti R R	Hooks (PEPS)	Sustainable Pest Management in Vegetable Agro-ecosystems	Univ of Hawaii Foundation	\$2,564
Carol S	Ikeda (FCS)	Networking, Collaborating, and Partnering for Effective Family & Community Programs	DA-Dept of Agriculture	\$124,000
Naomi A	Kanehiro (HNFAS)	Nutrition Consultation and Review	Hawaii-Dept of Human Services	\$100,000
Naomi A	Kanehiro (HNFAS)	Nutrition Service for Older Adults	Hawaii-Executive Office on Aging	\$50,000
Russell H	Messing (PEPS)	Biological Control, Invasive Species, and Public Policy	DA-Dept of Agriculture	\$112,009
Charles	Nagamine (PEPS)	Hawaii Pesticide Applicator Training 2007/2008 Work Plan	Hawaii-Dept of Agriculture	\$24,990
Robert E	Paull (TPSS)	Control of Natural Flowering of Pineapple	Hawaii-Dept of Agriculture	\$28,142
Daniel	Rubinoff (PEPS)	The Ecology, Systematics and Conservation of Hawaii's Remarkable Aquatic Moths (Hyposmocoma Cosmopteridgidae)	Hawaii-Dept of Land & Natural Resources	\$5,000
Wei-Wen W	Su (MBBE)	Ultrasensitive Immunoassays Using a Novel Phage-Mediated Signal-Amplification System	HCF-G.F. Straub Trust	\$50,000
C Alan	Titchenal (HNFAS)	Supplement to Initial Proposal: Assessment of the Effectiveness of the Online Bodybugg™ Calorie Monitoring System for Long-term Weight Control	APEX Fitness & Nutrition Analysis Systems	\$126,684
Goro	Uehara (TPSS)	Terrestrial Oil crops for Biodiesel Production	Hawaii-Dept of Agriculture	\$150,000
Mark G	Wright (PEPS)	Sustainable Management of Corn Ear Worm (<i>Helicoverpa zea</i>) on Seed Corn in Hawaii Using Augmentative Biological Control	Hawaii-Dept of Agriculture	\$25,358
Lorien	Yancura (FCS)	Educating Family Caregivers on Healthcare Fraud	Hawaii-Executive Office on Aging	\$25,000
Lorien	Yancura (FCS)	Research on Grandparents Raising Grandchildren in Hawaii	Hawaii-Executive Office on Aging	\$23,997
Sylvia H L	Yuen (CoF)	Memorandum of Agreement Relating to Quality Care for Home-Based and Center-Based Child Care Providers	Hawaii-Dept of Human Services	\$646,787
Sylvia H L	Yuen (CoF)	Services to Evaluation and Monitor Substance Abuse Service Outcomes and Process Evaluation activities of the Alcohol and Drug Abuse Division Funded	DOH-Alcohol & Drug Abuse Division	\$147,563

Source: Office of Research Services.

New faculty publications

James Brewbaker (TPSS)

Brewbaker, J. L. 2006. Hawaiian Supersweet Silver. *HortSci* 41(6): 1508-1509 (c:\jlb\pubs\hortscience.pdf)

Brewbaker, J. L., I. F. Martin and Taweesak Pulam. 2006. Development of supersweet maize adapted to the tropics. In "Breeding for Success; Diversity in Action," C.F. Mercer (ed). Proc. 13th Australasian Plant Breeding Conference, Christchurch, New Zealand, April 2006. pp. 44-49.

Brewbaker, J. L. 2007. Registration of 27 maize parental inbred lines resistant to maize mosaic virus. *CropSci*. 47(1): 459-461.

Ken Grace (PEPS)

Grace, J.K. 2006. When invasives meet: *Coptotermes formosanus* and *Coptotermes vastator* in the Pacific. *Proceedings of the 2006 National Conference on Urban Entomology*. Raleigh-Durham, North Carolina; 21-24 May 2006. Pp. 92-94.

Gentz, M.C. and J.K. Grace. 2006. The response of the Formosan subterranean termite to different borate salts. *Proceedings of the 2006 National Conference on Urban Entomology*. Raleigh-Durham, North Carolina; 21-24 May, 2006. Pp. 11-12.

Campora, C. E. and J. K. Grace. 2007. Foraging behavior of the Formosan subterranean termite (Isoptera: Rhinotermitidae) in response to borate treated wood. *International Research Group on Wood Preservation*. Stockholm, Sweden. IRG Document No. IRG/WP 07-10605. 13 pp.

Gentz, M. C. and J. K. Grace. 2007. The response of the Formosan subterranean termite (*Coptotermes formosanus*) to different boron compounds. *International Research Group on Wood Preservation*. Stockholm, Sweden. IRG Document No. IRG/WP 07-10609. 8 pp.

Yong Li (HNFAS)

Wang L.X., Li Y., and Mustapha, A. 2007. Rapid and simultaneous quantitation of *Escherichia coli* O157:H7, Salmonella, and Shigella in ground beef using real-time multiplex PCR and IMS. *Journal of Food Protection* 70:1366-1372.

Zhu, S.S., Liu, X.L., Liu, P.F., Li, Y., Li, J.Q., Wang, H.M., Yuan, S.K., and Si, N.G. 2007. Flumorph is a novel fungicide that disrupts microfilament organization in *Phytophthora melonis*. *Phytopathology* 97: 643-649.

Russell Messing (PEPS)

Bokonon-Ganta, A. H., M. Ramadan and R. H. Messing. 2007. Reproductive biology of *Fopius ceratitivorus* (Hymenoptera: Braconidae), an egg-larval parasitoid of the Mediterranean fruit fly, *Ceratitidis capitata* (Diptera: Tephritidae). *Biological Control* 41: 361-367.

Messing, R.H., M. N. Tremblay, E. B. Mondor, R. G. Footitt & K. S. Pike. 2007. Invasive aphids attack native Hawaiian plants. *Biological Invasions* 9: 601-607

Bokonon-Ganta, A.H., McQuate, G.T., Messing, R.H. 2007. Natural establishment of a parasitoid complex on *Bactrocera latifrons* (Diptera: Tephritidae) in Hawaii. *Biological Control* [online]: [doi: 10.1016/j.biocontrol.2007.05.019](https://doi.org/10.1016/j.biocontrol.2007.05.019)

Sime, K.R., K. M. Daane, J. W. Andrews, K. Hoelmer, C. H. Pickett, H. Nadel, M. W. Johnson, R. H. Messing. 2006. The biology of *Bracon celer* as a parasitoid of the olive fruit fly. *BioControl* 51: 553-56.

Wang, X. G. & R. H. Messing. 2006. Potential host range of the newly introduced aphid parasitoid *Aphidius transcaspicus* (Hymenoptera: Braconidae) in Hawaii. *Proceedings of the Hawaiian Entomological Society* 38: 81-86.

Dan Rubinoff (PEPS)

Rubinoff, D. 2006. Snail-Eating Caterpillar. McGraw-Hill Yearbook in *Science*. pp.225-227.

Great work everyone, thanks!

Can you identify this building?



It is the College of Applied Sciences's (one of the early names of our college) nutrition laboratory, on the UHM campus, 1930.