



HMSC Currents

Newsletter of the Hatfield Marine Science Center Community - Newport OR

Summer of research begins for undergraduate interns

For the third summer in a row, HMSC is hosting a group of students from all over the country for the 10-week Research Experience for Undergraduates (REU) program. Selected from a pool of over 100 applicants, the students bring a diversity of backgrounds and interests to their summer internships at HMSC.

Paul Sikkel is coordinating this year's REU program, with the participation of a dozen faculty mentors who will help the students design and implement research projects to be completed by mid-August.

During the first week, REU students will spend time putting together their research proposals, while getting to know their mentors, lab mates, and each other. They will also benefit from attending the Markham Symposium, getting an early glimpse of the types of research projects undertaken by students at the graduate level.

Thursday afternoon seminars during the summer are geared towards the REU interns, with presentations by HMSC graduate students, post docs and other researchers exhibiting the broad range of disciplines and research interests represented in marine science.

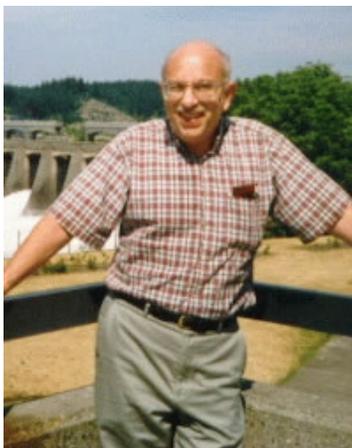
At the end of the program, REU students will present the results of their own research projects in a mini-symposium, to which the HMSC community is invited.

Welcome to HMSC!



REU 2007 program participants: *back row, left to right:* Rose Kormanyos, Whitman College (mentor: Bryan Black); Alexandra Cwalina, Stony Brook University (mentor: Kip Sherman); Christian Andresen, Univ. of Texas at El Paso (mentor: Michael Banks); Ethan Herget, Portland State University (mentor: Shawn Rowe); Alexandra Penny, Brown University (mentors: Steve Parker, Bob Hannah); Stefanie Gera, College of William & Mary (mentors: Jessica Miller, Ric Brodeur); *front row:* Lauren Woods, Ohio Wesleyan University (mentor: John Chapman); Angie Sremba, Kalamazoo College (mentor: Bill Peterson); Kate Ruck, James Madison University (mentor: Bill Peterson); Joel Scheingross, UC Berkeley (mentor: Tom Hurst); Lillian Tuttle, Centre College (mentor: Kym Jacobson). Not pictured: Patrick Luke, Oregon State University (mentors: Brett Dumbauld, Tony d'Andrea)

HMSC Distinguished Lecturer series welcomes Arthur N. Popper on June 26



Art Popper is a Professor of Biology at the University of Maryland and co-Director of the Center for Comparative and Evolutionary Biology of Hearing.

The HMSC Distinguished Lecturer series returns on June 26 with a seminar by Dr. Arthur N. Popper on the auditory mechanisms of fishes.

Dr. Popper's research is directed towards understanding basic structure and function of the auditory system in vertebrates, with particular interest in the ear of fishes and its sensory hair cells.

Using a variety of different behavioral paradigms, Dr. Popper and his colleagues have determined the range of sounds fish can hear, as well as their ability to discriminate signals. American shad, for example, are able to detect ultrasound (up to 180 kHz), in contrast with most other species of fish that can detect sounds to only 1 - 3 kHz, and there is evidence to suggest that American shad have evolved ultrasound detection to avoid one of their primary predators by echolocating dolphins.

continued on p. 3

Submarine Ring of Fire 2006 Expedition

Bob Embley and Bill Chadwick

The 2006 Submarine Ring of Fire expedition (April 18-May 13) was the third in a series of explorations of the submarine volcanoes lying along the Mariana Arc, extending from south of the island of Guam northward more

continued on next page



A degassing event at Brimstone Pit at NW Rota-1 volcano released an extraordinary number of bubbles (probably carbon dioxide). The yellow parts of the plume in the background contain tiny droplets of molten sulfur. Image courtesy of Submarine Ring of Fire 2006 Exploration, NOAA Vents Program.

Hatfield Marine Science Center
2030 SE Marine Science Drive
Newport, OR 97365
541-867-0212
www.hmhc.oregonstate.edu

The HMSC Currents Newsletter is published 5 times a year. Your comments and submissions are welcomed! Deadline for next issue is October 8th Send to: ken.hall@oregonstate.edu

Research Programs News

Michael Banks tapped to lead CIMRS

Dr. Michael A. Banks was named the new director of the Cooperative Institute for Marine Resources Studies (CIMRS). Established in 1982 to foster collaborative research between NOAA and OSU researchers, CIMRS has sponsored research in fisheries ecosystems, aquaculture, oceanography, marine resource technology and related fields.

Michael takes over the helm of CIMRS from Clare Reimers, who resigned after 5+ years as director to focus on her own research, which investigates the harnessing of energy from decaying marine plankton and other organic material.

Born and raised in South Africa, Michael received his Masters degree in Zoology, Physiology and Aquaculture from Louisiana Tech/University of Texas Marine

Science Institute and his PhD in 1994 from the University of California Davis/Bodega Marine Laboratory in population genetics. In early 2001, he joined the faculty at OSU with an appointment in the Coastal Oregon Marine Experiment Station (COMES) and the Department of Fisheries and Wildlife.

Since joining OSU, Michael has established an internationally recognized and well funded program in fish genetics and ecological diversity. The COMES Marine Fisheries Genetics program includes an excellent group of international research associates and graduate students with support from NSF, Sea Grant, COMES, Pacific Salmon Commission and US Fish and Wildlife Service.

Michael says he is keen to put his best efforts towards realizing re-



search excellence in combining expertise at OSU and HMSC with associated state and federal programs. "These are fine jewels that I am delighted to help make known to the world."

Congratulations, Michael!

Marine Experiment Station Faculty Growing

The Coastal Oregon Marine Experiment Station (COMES) has added three new faculty members to its ranks at the HMSC in the past six months. Jessica Miller arrived in January 2006 as the new salmon ecologist (profiled in the last issue of Currents). On June 1st, Markus Horning of Texas A&M University came on board as the new pinniped ecologist. And on July 1st, Scott Baker arrives from the University of Auckland in New Zealand to be the new cetacean biologist and Associate Director of

the Marine Mammal Program. These two most recent hires are jointly supported through the Marine Mammal Endowment Program and the College of Agricultural Science. They will not only help build out the Marine Mammal Program as a unique center for marine mammal research but will also provide unique faculty expertise in COMES and HMSC given their respective skills in biotelemetry, which is Markus' skill area, and population genetics, which is Scott's area of emphasis.

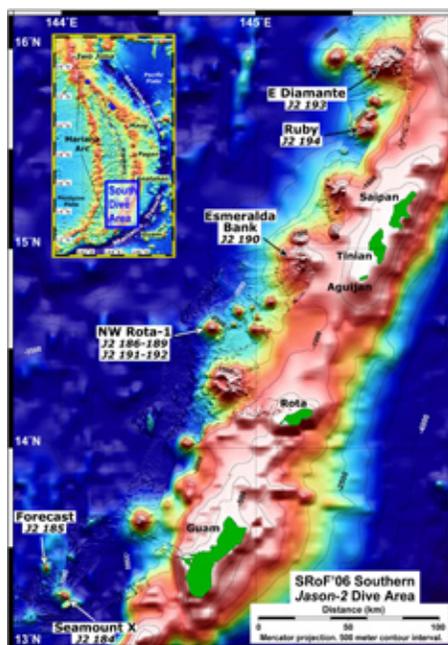
Markus's knowledge of telemetry builds out on Bruce Mate's expertise on tagging and tracking using remote sensing technology to track and measure marine mammals and their interaction with the environment. Scott's strength in the area of genetics build out our expertise at HMSC and COMES in marine genetics and generates a critical mass of research here, helping HMSC to become a center for genetic research.

Submarine Ring of Fire

continued from p. 1

than 800 nautical miles (1450 km). We have discovered some amazing places during these cruises, including an erupting volcano (NW Rota-1), liquid CO₂ venting (NW Eifuku), pools of liquid sulfur (Daikoku at Nikko), and the shallowest known "black smoker" chimneys (East Diamante). All of us came away from the 2006 expedition with a lingering sense of awe that such amazing places remain undiscovered on Earth.

The ongoing eruption of NW Rota-1 volcano (after more than two years!) was obviously the highlight of the cruise. The video taken during our dives here became well known throughout the world in the weeks following our expedition, both on the internet and on various television broad-



casts. When we drove into the crater of Brimstone Pit on April 23rd, the activity appeared to have almost ceased, but over the next few days the activity built until it was a full-scale eruption - more active than on either of our previous two expeditions. The volcano was belching glowing red lava and bursts of gas and ash particles that, at times, enveloped the vehicle.

A small hydrophone we deployed nearby recorded the sounds of a seafloor eruption for the first time concurrent with visual observations. However, what was perhaps the most amazing part of the experience was the fact that we could actually observe it from so close! It is unlikely that a similar eruption on land could have been observed and sampled as

continued on next page

Submarine Ring of Fire

continued from p. 2

thoroughly as we were able to do underwater.

The next big surprise came at Daikoku, a volcano that was not thought to be particularly active during the previous relatively brief visits in 2004 and 2005. However, this time we discovered a continuously undulating pond of molten sulfur pond, a sight that was truly extraordinary. It provided us with a unique window into what we now believe is an extensive subsurface infiltration of molten sulfur within many of the active arc volcanoes.

We hope we will get the chance to return to the Mariana arc to continue our explorations of this fascinating submarine environment. Additional images and video clips from the cruise are available on the NOAA Ocean Exploration web site: <http://oceanexplorer.noaa.gov/explorations/06fire/>



Submarine Ring of Fire 2006 science party explorers:
Front row (left to right): **Susan Merle**, **Andra Bobbitt**, **Leigh Evans**; 2nd row: Lori Savage, Ko-ichi Nakamura, Julie Huber, Sharon Walker; 3rd row kneeling: Ron Greene, John Dower; 4th row: Verena Tunnicliffe, Joe Resing, **Bob Embley**, Dave Butterfield, Sheryl Bolton, Cornel de Ronde, **Bill Chadwick**; Back row: Boku Takano, Ben Larson, Rick Davis, Nick Deardorff, Nathan Buck

EPA Pacific Coastal Ecology Branch hosts visiting scientists

Carolyn Hammer

B.S Environmental Science (Ecotoxicology & Risk Assessment) from Western Washington University; Master of Environmental Management (MEM) – Duke University. Before coming to the northwest, Carolyn worked at the US EPA, ORD, Office of Science Policy. She is currently on detail to PCEB of EPA (ORD) to perform data analysis to access the link between epiphytes and eelgrass growth. Hobbies and interests include; playing outside as much as possible, biking, camping, hiking and walking, as well as reading and being a volunteer tutor. She was born and raised near Chicago, IL, and is currently living at Hatfield. She moved here from Washington, DC. Family includes an adorable 7 month old niece.



William McCredden

B.S. Biology, William is expected to be at PCEB for four months. He was born in NeuUlm, Germany and raised in Sparta, Wisconsin. He is currently living in Loveland, Colorado and previously lived in San Antonio, Texas. William's family includes Melissa (wife) and Leah, Sarah (daughters).

Dan Roelke

Ph.D. Texas A&M University, Dept. Oceanography. Dan is here on sabbatical until the end of July, he is an Associate professor at Texas A&M. Currently working on hypoxia issues in the Northern Gulf of Mexico with Peter Eldridge. Other interests include; plankton ecology, harmful algal blooms, working in Israel, Venezuela and Antarctica as well as the U.S. Hobbies and interests include; tidal pooling, searching for agates and hiking. The wildlife in Oregon is way better than Texas! Dan was born in York, PA and currently resides in Bryan, TX (two hours outside Houston). Family includes; Lynn (wife) the glue that contains the chaos! Sam (10 years old) loves wildlife, truly a budding zoologist. Abby (6 years old) loves life! Horses and dance rank high on her list. Dan would also like to state that "you guys live in a spectacular region of the planet – don't ever take it for granted!"

Distinguished lecturer Art Popper

continued from page 1

Questions of sensory hair cell structure and evolution have been a focal point of much current research in Dr. Popper's lab. The discovery of multiple types of hair cells in fishes helps explain how the fish ear functions and also has implications for our understanding of when multiple hair cell types evolved in vertebrates. Considerable work has also been directed at questions of hair cell addition, development, and regeneration.

Another area of research interest is the proliferation of human-generated sounds in the marine environment, and their impact on fishes and invertebrates. While there has been great

concern about the effects of such sounds on marine mammals, it is believed that fish could also suffer impacts including death, damage to sensory cells, or stress-related changes. Less overt, but equally significant, impact could result from long-term changes in behavior that could alter reproductive potential.

Dr. Popper's seminar, entitled "Auditory Mechanisms of Fishes", is scheduled for **10am on June 26th** in the Hennings Auditorium. Thanks to Cliff Ryer and the NOAA Alaska Fisheries Science Center for hosting and coordinating Dr. Popper's visit.

Academic Programs News

Spring marine biology course wraps with research symposium

The culmination of a term's worth of intense marine biological investigations by undergraduate students from OSU's College of Science was on display June 8th at a research symposium held in the Hennings Auditorium. Students presented to the HMSC community the results of independent research projects that they designed and carried out in the final three weeks of the term.

During the first six weeks of the course, students participated in lectures, discussion, field trips and lab work, with instructors from OSU and HMSC covering subject areas from oceanography, coastal geology, and natural history to more in-depth study of marine invertebrates, algae, fishes, marine ecology, and marine conservation and policy.

The end-of-term research projects

explored a diverse range of topics, from the behavioral effects of female sex pheromones on the male European Green Crab to the variability of *Upogebia pugettensis* parasitism in Yaquina Bay. Students examined the biodiversity profiles of local communities in the intertidal zone, of mussel beds found along the Yaquina jetty, and even the seawater discharge system at HMSC.

Students in the marine biology program often cite the spring term BI 450 course at HMSC as one of the highlights of their undergraduate experience, in spite the relatively long hours and heavy workload. Living and working together in a field station environment fosters a unique learning experience and allows students to get to know each other in a way that is qualitatively different than the norm.



Students in the 2006 marine biology class mingle with instructors in the HMSC courtyard during a break at the end-of-term symposium (above). Students collecting samples from tidepools during a field trip during the second week of the term (below).



HMSC summer course offerings

Courses and workshops covering a diverse range of topics aim to attract a mix of undergraduates, graduate students, and professionals to HMSC this summer. Marketed through Oregon State University Extended Campus / Summer Sessions as the Marine and Environmental Studies Program at HMSC, courses in the program are hands-on, intensive one- and two-week formats for three or four credits each; or two weekend workshops for one credit each.

"These courses are designed to be inclusive, for science and non-science majors alike, and open to students in the early stages of their undergraduate career," said Paul Sikkel, academic programs coordinator at HMSC. "And they are unique – we are trying to create an integrative, liberal arts environment by offering courses not normally found at other marine labs."

Course titles include: Behavior of Fish/Aquatic Organisms; Biology and

Conservation of Marine Mammals; Integral Ecology; Aquatic Biological Invasions; Understanding Free-Choice Learning; Marine/Estuarine Invertebrates; Writing about Sea and Shore; and Making a Living on the Estuary (Native American Uses of Natural Resources).

The summer program at HMSC offers unique opportunities for students, including field research, lab experience, and one-on-one collaboration with scientists at the center through internships and independent studies arrangements.

As part of OSU Summer Session, in-state tuition rates apply, making the courses an attractive option even for non Oregon residents. Some courses may also be taken as professional development workshops at a reduced cost.

Most courses in the program begin June 26. Some housing scholarships are available. Check the website for specific course dates and housing details:

<http://summer.oregonstate.edu/courses/hatfield/>. For more information, contact Paul Sikkel at HMSC, 541-867-0380, Paul.Sikkel@oregonstate.edu or Summer Session at 800-375-9359, summer.session@oregonstate.edu.



News from Oregon Sea Grant

Saturday, July 8 is *Las OLAS Day*

On July 8 from 10am-2pm Oregon Sea Grant is hosting its first *Las OLAS* (ocean learning activities in Spanish) *Day* at HMSC. This is an educational outreach event aimed at Latino elementary and middle school students and their families, and an excellent opportunity for scientists at HMSC to connect with this community.

“Speaking Spanish is helpful, but NOT necessary for this event,” explains Sea Grant educational programs coordinator Melissa Feldberg, “since almost all of the kids and many of their parents speak English.”

The event will be held outdoors, on the lawn in front of the Visitor Center and will feature a range of fun hands-on science activities for the participants. If you are interested in participating, please contact Melissa Feldberg at 541-737-2758 or by email: melissa.feldberg@oregonstate.edu



Educational component of AmeriCorps service-learning project on temporary display in Visitor Center



AmeriCorps*NCCC volunteers produced an informational display explaining the invasive plant species removal work they did as part of a month-long habitat restoration project at several sites along the central Oregon coast. The panel is on temporary display in the Visitor Center, next to the Invasion of the Habitat Snatchers exhibit.

Visitor Center ready for summer

Check out the Visitor Center’s schedule of activities for the summer season, which begins on June 26 and runs through Monday, September 4 (Labor Day).

Aquariums, touch tanks and interactive exhibits educate and entertain from 10:00 a.m. to 5:00 p.m. every day. Daily educator-guided programs include:

11:00 a.m. Estuary Walk - Join an interpretive guide on this 1/2 mile walk to learn about life in and around the Yaquina Bay Estuary. Families welcome! Approximately 1 hour

1:30 p.m. OceanQuest 2006 - Come to this multi-media presentation to learn the latest on deep-sea exploration. See stunning videos of undersea eruptions and exotic deep-sea life. Approximately 1 hour



A week of specialized training is being provided to Visitor Center volunteers and interns during the week of June 26 to help prepare them for the many types of interactions they will have with the thousands of visitors who come through the HMSC’s doors over the summer. Please call Bill Hanshumaker at 867-0167 for details and meeting locations.

Monday, June 26 (low tide@7:41 (-1.6))
 7:00-8:30 Sea Rock Intertidal Zone (meet at the front of HMSC)
 9:30 -11:00 Intern Orientation- summer schedule/student projects
 11:00 – 12:30 Estuary Walk training
 1:30-4:00 OceanQuest auditorium presentation training

Tuesday, June 27 (low tide@8:21 (-1.4))
 7:30-10:00 Rocky tidepools at Yaquina Head with OPRD/BLM
 “The School of the Tidepool” and “Intertidal Ecology”
 11:00 – 12:30 Estuary Walk training
 1:30-2:30 OceanQuest auditorium presentation training
 2:45-4:00 Aquarist orientation training (Michael)

Wednesday, June 28 (low tide@9:00 (-1.0))
 8:00-10:00 Yaquina Bay mudflats with Dr. John Chapman
 11:00-12:00 Estuary Walk training
 1:30-2:30 OceanQuest auditorium presentation training
 2:45-4:00 Research Gallery interpretive training

Thursday, June 29 (low tide@9:37 (-0.6))
 9:00-10:30 Opening/closing & maintenance procedures (Kath)
 11:00-12:00 Estuary Walk training
 1:30-2:30 OceanQuest auditorium presentation training
 2:45-4:45 Dock Walk training (Kaety Hildebrand)

Friday, June 30 (low tide@10:13 (-0.1))
 9:00-11:00 Yaquina Bay mudflats
 11:00-12:00 Estuary Walk training
 1:30-2:30 OceanQuest auditorium presentation training

Guin Library News

Recent publications by OSU and HMSC authors:

Long-term eruptive activity at a submarine arc volcano
Embley, RW; Chadwick, WW; Baker, ET; Butterfield, DA; Resing, JA; De Ronde, CEJ; Tunnicliffe, V; Lupton, JE; Juniper, SK; Rubin, KH; Stern, RJ; Lebon, GT; Nakamura, K; Merle, SG; Hein, JR; Wiens, DA; Tamura, Y
NATURE 441 (7092): 494-497 MAY 25 2006

Climate controls on US West Coast erosion processes
Allan, JC; Komar, PD
JOURNAL OF COASTAL RESEARCH 22 (3): 511-529 MAY 2006

Site-specific effects on productivity of an upper trophic-level marine predator: Bottom-up, top-down, and mismatch effects on reproduction in a colonial seabird
Suryan, RM; Irons, DB; Brown, ED; Jodice, PGR; Roby, DD
PROGRESS IN OCEANOGRAPHY 68 (2-4): 303-328 2006

Specific pathogen free culture of the Pacific oyster (*Crassostrea gigas*) in a breeding research program: Effect of water treatment on growth and survival
Matson, SE; Langdon, CJ; Evans, S
AQUACULTURE 253 (1-4): 475-484 MAR 31 2006

Benthic oxygen consumption and organic matter turnover in organic-poor, permeable shelf sands
Rusch, A; Huettel, M; Wild, C; Reimers, CE
AQUATIC GEOCHEMISTRY 12 (1): 1-19 MAR 2006

Can selective breeding reduce the heavy metals content of pacific oysters (*Crassostrea gigas*), and are there trade-offs with growth

or survival?
Camara, MD; Griffith, SM; Evans, S
JOURNAL OF SHELLFISH RESEARCH 24 (4): 979-986 DEC 2005

The evaluation of spray-dried microalgae in diets for juvenile Manila clam, *Tapes philippinarum*
Onal, E; Langdon, C; Onal, U
JOURNAL OF SHELLFISH RESEARCH 24 (4): 1061-1065 DEC 2005

New books available through Guin

Before you head off on summer vacation, check out the list of new book titles available through Guin Library, posted for your browsing pleasure at: <http://osulibrary.oregonstate.edu/guin/booklist.php>

If you click on the call numbers, you can move into the library catalog and put holds on any desired material. As the books come off of the New Books Shelf, any requested items will be sent to you.

Upcoming Diversity Book Club events

The next Diversity Book Club meeting will be at noon, Wednesday, June 21 in NAL 104 (where we met last time). This month's book is "The Kite Runner." If you are curious about the group, or if you would like to discuss this fascinating story of one Afghan family, please consider joining us for an hour of good conversation. The next book is "Race Matters" by Cornel West, which should be an interesting read. For more information, contact Susan Gilmont in the library.

Facilities Update

The facilities crew has been kept very busy this spring with renovations of office space and labs to accommodate HMSC's growing research and education programs. In the education wing, improvements to Room 30/32 include new tables, chairs, and a recently installed computer and projection system.

A reconfiguration of space on the 2nd floor of the ed wing has made room for a second grad loft and a multimedia comput-

ing lab. Thanks to Randy's crew and to Dann Cutter for helping these facilities improvements make it from concept to reality.

Outdoor area improvements have also not escaped notice, with the landscaping work that Todd Cross has done through the spring months. Planters have come to life with fragrant herbs and colorful flowers, and Todd's green touch can be seen throughout the HMSC campus.



Wave energy presentation draws a crowd

A standing-room-only crowd filled the Hennings Auditorium on May 26th to hear OSU Engineering Professor Annette von Jouanne's presentation on "The Future of Wave Power". The evening lecture was sponsored by the Friends of HMSC, in cooperation with the Economic Development Alliance of Lincoln County and the Yaquina Bay Economic Foundation.



Professor Annette von Jouanne stands with some of the OSU engineering students who designed and built the wave energy display for the HMSC Visitor Center.

A new Wave Energy exhibit designed and constructed by a group of OSU engineering students was installed in the HMSC Visitor Center the same week. However, some of its components did not stand up to the rough handling of some school groups that have recently come through the Visitor Center. Bill Hanshmaker reports that he has removed the broken parts and is working with the students to make the repairs. He expects partial re-installation within a couple of weeks.



HMSC facilities crew helps unload the new wave energy display

Relay for Life

August 11-12, 2006
Newport High School

You can help us fund the American Cancer Society and help in the fight against cancer in many ways!

~Become a HMSC Team member!

Team members fund raise and sign up to walk a specific time slot during the Relay. Forms can be picked up from Nikki in rm 122 of the Barry Fisher Building, or by contacting her at nikki.atkins@noaa.gov If you want to make sure that you have the t-shirt size you want, please sign up by 5pm Monday June 19th. You can sign up after that date, but your t-shirt size isn't guaranteed.

~Donate directly to the HMSC Team's fundraising efforts.

Contact Nikki or any other team member to donate or purchase a Lumina for the Candlelight Walk.

~Take advantage of the HMSC Team's fundraising events.

A number of ideas are in the works. We're planning a soup kitchen for a Wednesday in July - volunteers to bring in soup and breads are needed. We're also planning a raffle, and items to raffle off are needed as well. Keep an eye on the hmhc_community e-mail for information. If you're not part of that e-mail list, contact Nikki and she'll make sure to let you know when things are happening. Contact Nikki Atkins for more information. Email: nikki.atkins@noaa.gov ; Tel. 867-0507

**Mark your
calendars!**



HMSC Picnic Saturday, September 9

Don't miss the feast and fun being planned for the HMSC picnic on September 9th at Moonshine Park. A beautiful site has been reserved along the banks of the Siletz River for everyone in the HMSC community to enjoy a day of family fun activities and celebrate the end of summer. Make a weekend of it by camping out at Moonshine Park the night before or after the picnic!

If you can help with advance planning (or on the day of the event), please contact Ken Hall at 867-0234 or email: ken.hall@oregonstate.edu





2006 Markham Symposium highlights graduate students' research

2006 Anja Robinson Fellowship recipient Sean Matson (left photo) and Markham Award recipient Margot-Hessing Lewis (right) answer questions about their research during the poster session at the Markham Symposium on June 14th.



Personnel News and Notes

Daniel Gomez-Uchida completed his doctoral degree in fisheries genetics and has gotten a postdoc fellowship in marine conservation genetics at Dalhousie University, where he'll be working with Daniel Ruzzante.

Daniel, Celia, and Amalia will be leaving the US in early December and will spend the holidays with his family in Chile before leaving for Halifax. In the meantime, Daniel says he is getting used to his new full-time job as a dad. Regarding fatherhood, Daniel reports: "It is TOUGH, but lots of fun seeing Amalia growing so quickly and learning new things. Now she discovered she has legs and feet, and keeps bringing them to her hands! Very Cool!"

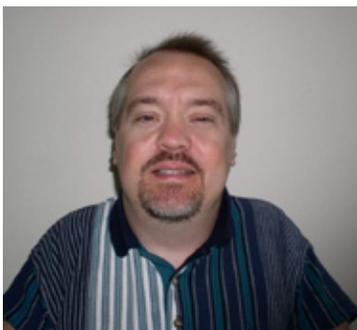
Congratulations and good luck, Daniel!

Kelly and **Casey Deckard** have just welcomed home their new daughter McKenna Skye Deckard! She was born Tuesday, June 13th @ 4:30 in Corvallis, weighing 7 lbs, 2 oz. Parents and baby all are doing well...

Ethan Clemons notes that Casey may have escaped the awareness of many HMSC folks; he's been a hard-working, quiet guy in the ODFW wing for the past 3 years. Congratulations, Casey!

New faces around HMSC

David Bradford is an Entry Point intern in the NOAA – Northwest Fisheries Science Center at HMSC. He will be working in the Fisheries Resource Analysis and Monitoring (FRAM) division for 10 weeks this summer. David was born in Bremerton, WA and has lived in various places around the world. He graduated from high school in the Dalles, OR and went to OSU to study geology. He is currently working towards a Master's in Geography



at OSU, and is interested in GIS, information technology, and marine applications. His hobbies and interests outside of work are animals, fantasy sports, poker, and other games.

Betsy Brewer is an intern from Davidson College in North Carolina, working under the supervision of Bill Hanshumaker in the Visitor Center this summer. With a passion for environmental education, Betsy designed her own major in that subject at Davidson, and eventually hopes to work as an environmental education in a free-choice learning science education venue. She is looking forward to interacting with visitors and working on the development of a project that utilizes an ROV to look for invasive species under water. She hopes to integrate her experiences from this summer into her senior thesis project, which is the design of a middle school environmental science curriculum. Betsy loves the outdoors, hiking, photography, and reading.



Steven J Brown is a student in OCCC's Aquarium Science Program and the newest aquarist in the Visitor Center. He previously worked as a student librarian in the Guin Library. Steven was born and raised in Ohio, and moved to the Oregon coast last June. With some prior college and tech training through the military, Steven is entering a new phase in his education and is excited about the learning opportunities he is finding through OCCC and HMSC. He is considering going to OSU to study marine biology and hopes to one day work in a large world class aquarium with reef systems, or perhaps have his own aquarium maintenance business and work on propagating corals for the ornamental trade to help take the demand off the reefs. He currently lives in Waldport's Bay Shore community with his wife Elizabeth. His hobbies are fishing and metal detecting (treasure hunting) and of course taking care of his private aquariums.

New faces around HMSC *(continued)*



Pat Clinton was hired as a geographer at EPA's Pacific Coastal Ecology Branch in May of 2006. In this position, Pat will be specializing in estuarine Geographic Information Systems (GIS) projects, including aerial photo mapping and bathymetry. Pat is no stranger to the EPA; he has been working

there in other capacities -- as a grantee, cooperator, and contractor, since 1993.

Amanda Gladics is an AmeriCorps volunteer, serving as a Coastal Wildlife Education Specialist with the US Fish and Wildlife Service in Oregon. She was born in Arkansas, but raised mostly near Portland, Oregon. She attended Reed College for a year, then embarked

on a year-long study abroad trip to England, Tanzania, India, New Zealand, and Mexico, comparing conservation issues and strategies and studying environmental and economic policy in those countries. After returning to the US,



she worked and took courses in Outdoor Education at Antioch College in Yellow Springs, Ohio. Amanda hopes to use her time here at USFWS to explore career paths in environmental education, policy making and natural resource management. She enjoys birding, yoga, hiking, travel, sauna construction, and getting to know the HMSC community.

Sylvia Graham is an AmeriCorps volunteer with the US Fish & Wildlife Service working primarily on environmental education, visiting elementary schools from Bandon to Astoria, teaching kids about shorebirds, wetland habitats, and conservation. Born in Minneapolis and raised in southern California, Sylvia went to college at the University of Washington, majoring in biology. Before coming to Oregon, she worked for Salish Sea Expeditions leading school groups out on overnight trips to conduct marine science experiments and learn how to sail. She plans to head back to school next year to get a Masters of Marine and Estuarine Science at Western Washington University. Sylvia loves the Oregon coast and enjoys hiking, surfing, and walking along the beach watching the coastal wildlife.



Erik Loboschefskey is a graduate student in Civil & Environmental Engineering at UC Davis, currently at HMSC to do field research with Mary Arkoosh's group in the Environmental Conservation division of NOAA. His main research is looking at the heterogeneity of antibody molecules in juvenile salmon exposed to contaminants

such as DDT (pesticides), PHA and PCB's commonly found in large river systems like the Columbia. The running theory is that exposure to these contaminants (or one contaminate) in the juvenile stage of development contributes to delayed mortality in the salmon by inhibiting the production of a diverse mix of antibodies in the salmon's immune system, thereby making it difficult for the salmon to fight off common pathogens. Erik is originally from Park City, Utah. Not surprisingly, he enjoys skiing, running, biking, swimming, rowing and says he's looking forward to learning how to surf this summer.



Frank Loge is a contractor assisting in research under the direction of Mary Arkoosh in NOAA's Environmental Conservation Division through 2009. He is currently living between Newport OR, Davis CA, and New Haven CT. Frank has a Ph.D. Civil and Environmental Engineering and a wide range of research interests, including human and ecological

risk assessment, water and wastewater treatment, population life-cycle models, policy development, green engineering and sustainability. In his spare time, he enjoys surfing, running, and eating.

Eric Robbins is working as a research assistant for John Chapman this summer, analyzing water samples for various zooplankton species and helping organize data from other surveys. He was born in Washington and has lived in more than a dozen places in his 18 years. He currently lives in Waldport with his parents and two younger brothers. Eric enjoys



math and statistics, and hopes to one day become an actuary or an engineer. For fun, he likes playing football, computer games, and math-related activities. Eric just graduated from Waldport High School and will be starting at OSU in the fall, majoring in math.

New faces around HMSC *(continued)*

Nicolas Taris is a post-doc in Mark Camara's USDA-funded aquaculture genetics research program. Nicolas is from Bordeaux, France. He studied at the University of Paris VI, earning a Master in Genetics and Conservation Biology, and spent the last three years working on his PhD, entitled "Genetic consequences of intensive production on Pacific oyster larval stage: drift and selective pressures due to rearing practices".



Nicolas did most of this work at the genetic and pathology laboratory IFREMER (French Research Institute for Exploitation of the Sea), connected to the University of La Rochelle. Over the next 2 years, Nicolas will be working on a project to identify genetic polymorphisms useful for marker-assisted selection for resistance to summer mortality of oysters by examining genome-wide patterns of expression (transcriptome profiling). In his spare time, he enjoys soccer, ultimate Frisbee and surfing.

Other News and Notes

Summer is for bicycling...

Late spring and summer are prime seasons for bicycling in Newport, with long daylight hours and generally nice weather. Jim Colbert regularly bikes to HMSC (he works in the NOAA Barry Fisher Bldg.) and occasionally organizes pleasure rides for anyone interested. If you have an idea for a ride or any questions about bicycle commuting or cycling safety, drop him an email at: jjcolbert@charter.net



Also, each Saturday at 1:00 PM the Newport Bike Store (on NE 6th, behind the Newport Cafe on US-101) sponsors a road ride and each Wednesday evening at 6:00 PM they sponsor a mountain bike ride. All of their rides start and end at the store. They can assist you with any cycling needs. Thanks for the tip, Jim!



... and for playing Ultimate Frisbee!

All are welcome to join in playing Frisbee on Mondays and Thursdays at 5:30 at the Sam Case Elementary School on NE 12th street (right by the pool).

"We've been getting together after work for this fun sport for years and have enjoyed playing with people from all over the world with all different skill

levels," says Mitch Vance, of ODFW.

Give him a call (867-0300 x233) or send him an email (mitch.vance@state.or.us) if you have any questions or would like more detailed directions. Spread the word!

The Back Page



Recently spotted:

A perfect circle of mushrooms that mysteriously appeared in the middle of the HMSC courtyard one day...

... and "wildlife" on the loose in the mailroom.

What is going on around here?

