Summer institute targets computer science teaching [1]

While computer science graduates may be reaping rewards with among the highest job offer rates of any degree holders, there remains a decline in the participation of women and minority students interested in the field. The leaders of the 2012 Scalable Game Design Summer Institute[2] hope to present new teaching techniques for the field, with the idea that teachers will use them to create new enthusiasm for computer science in their classrooms.

“We have seen a withering pipeline showing a significant loss of students going into computer science,” said School of Education Assistant Professor David Webb. “We need to study computer science education and the ways teachers use a range of instructional methods to support student learning.”

At the 2012 Scalable Game Design Summer Institute on the CU-Boulder campus June 4-10, middle school teachers and school administrators will gain hands-on experience in game design and how this approach to learning enhances Science, Technology, Engineering and Mathematics (STEM) education. Participants will learn teaching techniques employing AgentSheets[3] and AgentCubes[4] software. These tools are especially geared as cascading teaching methods that allow novice users to experience game design and simulation while also leading to more complicated tasks involving much higher-level skills and knowledge to bolster student learning.

The researchers leading the institute, Computer Science Professor Alexander Repenning, who is the lead investigator, and co-principal investigators Webb and School of Education Professor Kris Gutiérrez, have received significant National Science Foundation funding to research viable curricula and teaching techniques geared specifically for computer science and STEM education. Initially funded as part of a 3-year study called iDREAMS, the new 3-year, $1.5 million NSF grant involves more intensified research and teacher training under a project called Computational Thinking for Teaching Computing.

The new project integrates computational thinking to further analyze how video game design aids student reasoning and STEM content learning. The data will continue to enhance the Scalable Game Design curriculum and professional development available for teachers.

“This research validates a theory of broadening participation in computer science education and at the heart of that theory is the concept that ‘instruction matters,’” Webb said. “We have discovered marked differences in student motivation, for instance, with gender disparities in reactions to lessons in classrooms. Women are less motivated when the learning approach is like a lockstep recipe. This hyper-mediated style is less conducive to them than is a ‘guided discovery’ method.

“What educators learn at the Scalable Game Design Summer Institute is how to interact with students to teach them how to design games and science simulations. What the students in the schools discover is that they, too, can design games and simulations — that their computer is more than a tool for writing documents and posting on Facebook, that they can use their computer to design for entertainment or for math or science applications. Students can learn to see themselves as designers of software rather than users of software. This makes a big impact on their own identity and potential career path. It’s important at a young age to at least have these opportunities to jump into computer programming and see if it’s a good fit.”

Anschutz Medical Campus faculty, staff deliver latest arts journal[5]

[6]
The Human Touch, the literary and arts anthology of the University of Colorado Anschutz Medical Campus, is now available for free at the information desk of the campus bookstore, Building 500, first floor.

The journal strives to develop and nurture skills of observation, analysis, empathy and self-reflection to promote

humane medical care by offering an outlet for creative expression of the connections among patients, family and health care professionals. The works foster an understanding of cultural and social contexts of the experiences of illness and the way medicine is practiced.

Writings and artworks are juried anonymously. Editors are students in the School of Medicine, staff and faculty of the Anschutz Medical Campus. Authors and artists are students, staff, health professionals, and patients from the CU community.

The publication is being offered free to members of the community through the generous support of the School of Medicine. The Human Touch is produced by the Art and Humanities in Health Care Program (Therese Jones, Ph.D., director, and H.N. Claman, M.D., associate director) of the Anschutz Medical Campus Center for Bioethics and Humanities.

A copy of the anthology also is available for checkout at the Health Sciences Library, in the Drs. Henry and Janet Claman Medical Humanities Collection. The collection is located in the Third Floor Special Collections Room, call number WZ 350 U58h. An electronic copy will be available in the Digital Collections of Colorado, at http://goo.gl/8WEcS[7].

Lineberger to serve on National Science Board's executive committee[8]

Lineberger

Carl Lineberger, the E.U. Condon Distinguished Professor of Chemistry and Biochemistry at the University of Colorado Boulder, has been elected to serve on the National Science Board's (NSB) executive committee.

Lineberger's work is primarily experimental, using a wide variety of laser-based techniques to study structure and reactivity of gas phase ions. Lineberger has published 250 papers in major scientific journals, and his graduate students and postdoctoral associates hold major research-related positions throughout the world. He was appointed to the Board in 2011, and currently serves on the National Research Council (NRC) Report Review Committee. He has previously chaired the NSF Advisory Committees on Mathematical and Physical Sciences and on the Science and Technology Centers. He recently completed service on the NAS Council, the NAS/NRC Committee on Science, Engineering and Public Policy, the NRC Governing Board, and the DOE Committee on New Science for a Secure and Sustainable Energy Future. Lineberger received his bachelor's, master's and doctoral degrees in electrical engineering from the Georgia Institute of Technology.

The NSB is made up of 25 members appointed by the president and confirmed by the senate. The National Science Foundation director is an ex officio member. Members serve six-year terms.

Five questions for Rhonda Williams[10]

Rhonda Willliams in India.

Years ago, if a young girl was bullied by female peers, parental advice would more than likely be to "ignore" the perpetrators.

It's what Rhonda Williams' mother told her.

But she knows that today's youngsters need more than placating; they need to learn how to deal with bullying incidents, which have become more volatile, more viral and more violent than ever.

People who know her now would never guess that she was "a follower and oftentimes was a target of bullying" in junior high school. "I remember to this day what I was wearing and what I felt. I'm a woman of 59 and I can still remember it," she said. She also was the victim of sexual harassment. "There's a time to stand up and say, 'I'm not going to take it.' I found myself having to learn how to empower me. Then it became a mission of how to empower other women, too."

Williams is associate professor of counseling and human services in the College of Education at the University of Colorado Colorado Springs. Before returning in 2001 to UCCS – where she previously earned a master's in counseling -- she spent 11 years as a teacher in different school districts and 15 years as a school counselor, mostly in Colorado schools.

Along with her research on bullying and adolescent girls, Williams is heavily involved in the Smart Girl program, which teaches young girls about bullying and sexual harassment and how to effectively deal with those issues in personally comfortable ways. In addition she's a community activist, and is writing about and researching mental health in rural America.

During a sabbatical last year, she and her husband traveled around the world, visiting 12 countries. Williams said the trip was enlightening: She loved Costa Rica for the relaxation; South Africa for the beauty, the animals and the wine; Ghana for its people; and she found India's poverty to be intense and its temples from 700 B.C., amazing.

1. **How are you involved with Smart Girl and why is the program important?**

The program for adolescent girls is about building confident, self-reliant, empowered young women. Through my encouragement, a program for boys has been developed, too. Through activities, participants learn how to problem-solve and communicate better, how to manage moods, how to work as a team, and understand what you have control over, what you don't have control over. We also talk about sexual harassment, which is another area of research I'm doing. If you don't teach them how to resolve these issues or how to refuse peer pressure, then how are they supposed to learn it?

Most research is about teaching individual girls, mentoring them one-on-one, but this program mentors adolescents in groups. I train the guides and coaches, and they, in turn, mentor a group of 10 to 12 girls. It's wonderful to watch these little girls blossom. There is evidence that the program supports change in young girls and supports career decision-making. The program started in Denver in 1999; I've been with them since 2002.

2. How does bullying by girls and boys differ and how can it be combated?

Boy bullying typically is overt, in-your-face, physical and aggressive. Girl bullying is subversive. Usually those that bully are very attractive and popular and they have a lot of power and control over that dynamic. They pick on girls who might not be as assertive or attractive. Boys bully one-on-one. Girls bully collectively: "Oh, can you believe she wore that to school today?" It manifests into destructive behaviors, social aggression and relational aggression, and it creates relational divides. I feel sorry for the little girl that's been sick for a week because she comes back to school and doesn't know who her friends are going to be because so much has changed.

Williams with her husband, Ben, in Morocco during their 12-country traveling adventure last year.

Our Smart Girl curriculum includes activities to understand bullying and what to do about it. More than 80 percent of adolescents see bullying on a regular basis – daily or weekly. They see it but don't know what to do about it. Not every kid is empowered or assertive enough to say "stop it." We give them several options through the acronym A.C.T.I.O.N. "A" stands for "assert yourself." In middle school I could not have been assertive but I could do "C," which stands for

"create a distraction." We teach them to be an "upstander" not a "bystander" by standing up for bullied kids in a way that is comfortable for them. We give them skills rather than assume they are going to pick them up along the way.

Bullying is more prevalent, especially cyber-bullying because people can do it anonymously. Adults are more aggressive on the phone than when face-to-face with another person, and our research has found that kids are replicating some of the same behaviors.

3. Bullying is about power. Hasn't some form of bullying been around for ages and is it possible to change human nature?

I totally believe in the ability to create change or I wouldn't be a counselor. What we've seen in girls is pretty powerful. I've seen it in myself. I've heard over and over from the girls who are guides and coaches that because they teach it, they start living it. When they live it, they embrace the concept of non-bullying.

American culture has a lot of impact, and that's why I'm so compelled to push adolescent social and emotional intelligence. If they can grow up with social and emotional intelligence – as opposed to the way I grew up and others grew up by going along to get along – think how much power they would have through these skills and it then becomes part of who they are.

4. What are the other girl issues you've studied and what have you found?

Another aspect is sexual harassment bullying. Girls always are surprised to find out that while 86 percent of girls have been bullied, 79 percent of boys say they have bullied. Girls bully boys, and more importantly, boys bully boys, especially using homophobic language.

The whole concept of body image is hugely impactful for girls. We're seeing many more girls with disordered eating, if not eating disorders. In our activities, we approach body image carefully. Girls can say positive things about what's on the inside, but they can't compliment themselves physically. Our theory is that the younger we teach them, the better chance they have to be strong, confident and empowered.

5. Earlier in your career, you received "middle school counselor of the year" awards, and very recently, you received the Counselor Educator of the Year award from the American School Counselor Association. What are some important lessons you hope to impart?

When I won the middle school counselor of the year award, I did an interview with a newspaper and they asked, "What's next for you?" I remember thinking it was a good question. At the time, I said that I wanted to get my doctorate so I could teach people to do what I did. I've done that. The award inspired me to take the next step. As a counselor educator, you get to work with those who soon will be in your profession. I'm passionate about teaching because I want to model for them what they can do for kids.

I've had 26 years of experience in counseling and mental health. Every class I teach, I see the potential to help them become the best they can be as a school counselor and in mental health work. That's exciting because I want other people to continue to make a difference. My passion gets them going and they think, "Ah, I see how I can use this; I see how this has value." The desire to make a difference and create change continues to trickle down to the kids that need it the most.

Fertility specialist Trout earns appointment[13]

Trout

Colorado Reproductive Endocrinology physician **Susan Trout** has been named an associate clinical professor by the

University of Colorado. This appointment will further allow Trout to pursue her goal of educating CU medical students by working with them first-hand in class and with clinical procedures.

“I am delighted that the residents I teach, and the CU medical staff, has given me this tip of the hat,” Trout said. “I love being a teaching doctor, so this appointment means the world to me, and I look forward to building on the teaching work I have already done.”

The fertility doctor personally has experienced the heartache of not being able to have a baby of her own, which she said gives her a more personal connection with her patients. Trout is board-certified in reproductive endocrinology and infertility, as well as obstetrics and gynecology. In addition to writing research papers, Trout has at times been a regular contributor to Fertility and Sterility, the journal of the American Society for Reproductive Medicine.

Connections begins summer publication schedule[15]

Beginning with today’s issue, CU Connections begins its summer schedule of biweekly publication. The next new issue will appear June 7.

No new issues will appear on the following dates (subject to change): May 31, June 14 and 28, July 12 and 26.

Even if you’re away from your campus for any of the summer, you can stay up to date on happenings across the University of Colorado system by connecting with CU Connections. Throughout the season, the site will be updated with news should events warrant.

If you’re sending postcards from your vacation, be sure to keep us in the loop, too. We always welcome Letters to the Editor on topics of interest to current and retired CU faculty and staff. Please send submissions to newsletter@cu.edu [16]. And if you have a news item or story suggestion you’d like to pass along, please send it to Jay.Dedrick@cu.edu[17].

Deadline for submissions is noon Friday prior to the Thursday publication.

Open Enrollment ends at 5 p.m. Friday[18]

[19]

Open Enrollment (OE) ends at 5 p.m. Friday, May 25. It is the one time each year when University of Colorado faculty and staff may make changes to benefits plans.

The 2012-13 OE is a positive enrollment for all medical and dental benefits-eligible employees, which means you must take action for medical and dental benefits, even if you waived coverage for FY 2011-12. The only exception will be for Medicare-eligible retirees and surviving spouses/same gender domestic partners.

For more information about plans and plan changes, final rates, how to enroll and what happens if you choose to take no action during open enrollment, go to www.cu.edu/openenrollment[20].

Important OE Reminders

Positive Enrollment – This year’s OE is a positive enrollment, meaning you must take action.

Dependent Eligibility Verification – If you are adding new dependents for coverage effective July 1, 2012, you must verify their eligibility with PBS during the open enrollment period and have required documents submitted by 5 p.m. Friday. There is no guarantee of dependent coverage if required documents are not received by the due date.

Cafeteria Plans – You must re-enroll and actively elect your annual contributions for Health Care and Dependent Care flexible spending accounts each year at open enrollment.

University Optional Term Life Insurance – If you and/or your spouse, common law spouse or SGDP are non-tobacco users, meaning that you have not used tobacco products within the past 12 months, you are eligible for a discounted rate in the Optional Term Life/AD&D Insurance Plan. Complete the appropriate section on the Benefits Enrollment/Change Form or online web application to receive the discounted rate. Enrollment in the discounted rate is allowed only during the OE period.

ID card -- Everyone enrolling in a CU Health Plan will receive a new insurance ID card by mid-June.

Tweeting OE

A live Twitter feed can be found on the OE website. Follow us @CUOE to get the latest information about OE and to ask questions.

Grinspoon tapped for prestigious post at Library of Congress[21]

Grinspoon

David H. Grinspoon, an adjunct professor of astrophysical and planetary science at the University of Colorado Boulder and curator of astrobiology in the Department of Space Sciences at the Denver Museum of Nature and Science, has been named the Baruch S. Blumberg NASA/Library of Congress Chair in Astrobiology in the John W. Kluge Center at the Library of Congress.

The chair is a joint project between the NASA Astrobiology Institute and the Kluge Center.

Grinspoon is a researcher in planetary science and is the author of “Lonely Planets: The Natural Philosophy of Alien Life” and “Venus Revealed.” In the application for the one-year appointment, he detailed a book he wants to write about the Anthropocene Era, a series of workshops he wants to run, and a panel discussion to which the public would be invited at the Library of Congress.

Grinspoon is an adviser to NASA on space exploration strategy and serves as Interdisciplinary Scientist on Venus Express, the European Space Agency’s first mission to Venus. In 2006, the American Astronomical Society awarded him the Carl Sagan Medal for excellence in public communication of planetary science.

Limerick honored with Bonfils-Stanton Award[23]

Limerick

Patricia Limerick, professor of history and faculty director and chair of the board of the Center of the American West

at the University of Colorado Boulder, has been honored with a Bonfils-Stanton Award. The annual awards recognize outstanding Coloradans for contributions made to enhance the quality of life for residents of Colorado in the fields of art and humanities, community service, science and medicine.

Limerick, who won the art and humanities award, is a celebrated scholar and prominent author, co-founded the Center of the American West in 1986. Under her leadership, the center has published books on compelling Western issues and received national recognition as a forum for exploration of important and often contentious public issues.

Limerick's understanding of the American West as a place formed by distinct ethnic, political and environmental factors has led to a profound reinterpretation of Western American history. She has explored how the West's vast federal lands, boom-and-bust economy, and diverse ethnic groups have defined its unique history. By challenging the prevailing view that Western American history ended with the frontier, she reveals the many connections between the past and issues facing America today.

Honored with the community service award was Robert "Bob" Tointon, an accomplished business leader, community builder, champion for educational quality, and philanthropist. The science and medicine award was given to Temple Grandin, animal scientist, professor at Colorado State University, best-selling author and respected consultant to the national and international livestock industry.

Faculty researchers compare notes on teaching, learning[25]

Lauren Scharff, director for the U.S. Air Force Academy's Scholarship of Teaching and Learning program, spoke on the collaborative relationship between CU and USAFA and encouraged those involved with teaching and learning to attend the USAFA's poster session, Sept. 12. (Photo by Cathy Beuten)

The CU President's Teaching and Learning Collaborative (PTLC) on Monday hosted its second annual poster session, featuring research topics as wide-ranging as Clickers and delusion.

The collaborative offers faculty from all campuses an opportunity for professional development and the experience and intellectual practice of work in two scholarly endeavors: teaching and research. It also assists university faculty in developing scholarly research projects on teaching and learning intended for refereed publication.

PTLC Director Mary Ann Shea welcomed participating faculty researchers and presenters:
Marylou Robinson, CU Anschutz Medical Campus College of Nursing Sonja Braun-Sand, UCCS Department of Chemistry and Biochemistry Ronica Rooks, CU Denver Department of Health and Behavioral Sciences Farah A. Ibrahim, CU Denver School of Education and Human Development Alison Hicks, CU-Boulder University Libraries John B. Basey and Anastasia Maines, CU-Boulder Department of Ecology and Evolutionary Biology Cory Christiansen, Elaine Cheesman and Mary Jane Rapport, CU Anschutz Medical Campus School of Medicine Kari L. Franson and Christopher J. Turner, Kathleen McCartney, Shaun Berning and Jennifer Trujillo, CU Anschutz Medical Campus Skaggs School of Pharmacy and Pharmaceutical Sciences Radu Cascaval, UCCS Department of Mathematics Robert Gist, UCCS Department of Physics Lupita Montoya, CU-Boulder Department of Civil, Environmental and Architectural Engineering
Initiated in 2006, the collaborative promotes the practice of inquiry in teaching and measuring student learning, known nationally as the scholarship of teaching and learning (SoTL). This year's session at CU Anschutz Medical Campus also welcomed guests from the U.S. Air Force Academy (USAFA), including Lauren Scharff, director for the Scholarship of Teaching and Learning program. The USAFA and PTLC have built a collaborative relationship.

Boardman receives Early Achievement Award[27]

Boardman

Jason D. Boardman has received the first Population Association of America (PAA) Early Achievement Award. The award is given to promising scholars who, as members of the PAA, have made distinguished contributions to population research in the first 10 years of their careers after receiving their doctorate.

Boardman is an associate professor of sociology and a faculty research associate at the Institute of Behavioral Science, as well as the associate director of the CU Population Center, which is funded by the National Institutes of Health's Eunice Kennedy Shriver National Institute of Child Health and Human Development.

He received his doctorate in sociology in 2002 from the University of Texas and has been studying the various social environments in which genetic factors are muted to a certain degree in terms of their influence on behavioral traits such as smoking or weight gain. Boardman explains that their understanding is still fairly limited as to the mechanisms responsible for this association.

"The next goal," he says, "is to understand the very complex physiological chain of events that may link environmental factors such as social norms regarding smoking to observed differences in the influence of specific genetic polymorphisms." Genetic polymorphisms are instances where an individual's genetic makeup determines which morph of the phenotype is displayed.

Boardman plans to work with **Matt McQueen** in the Department of Integrative Physiology and the Institute for Behavioral Genetics to develop statistical methods for observing interactions between genes and the environment across the human genome. Currently, he is working with researchers at the University of North Carolina to study genome-wide gene-environment interactions that pertain to an individual's risk for obesity by using data from the National Longitudinal Study of Adolescent Health.

Benson honored by Denver Zoo[29]

The Denver Zoo's Craig Piper with Marcy Benson and Bruce Benson.

CU faculty and staff are likely to come across a familiar name while exploring the wilds of the African Savannah at the Denver Zoo[31]. The zoo on Monday renamed its award-winning exhibit that features lions, hyenas and African wild dogs the Bruce D. Benson Predator Ridge, in honor of the CU president and longtime Denver Zoo advocate.

"Bruce Benson has had a profound impact on Denver Zoo's innovative leadership in education, conservation and exhibits," said Katie Schoelzel, chairman of the zoo's board of trustees. "He also is a dedicated philanthropist who has made tremendous investments in Denver Zoo and so many other worthy organizations in our community."

Benson spearheaded the 1999 Zoo Improvement Bond Campaign that enabled the development of the zoo's parking garage as well as exhibits including Predator Ridge. He successfully led efforts to update the zoological foundation's cooperative operating agreement with the city and county of Denver and helped form the Colorado Zoological Trust that manages the zoo's endowment, among other contributions.

An Honorary Life Trustee of the Denver Zoological Foundation, Benson served as chairman of the board from 1997-2000 and on the executive committee for 15 years. He continues to serve as counsel and adviser to the foundation's board of trustees.

“Bruce helped us accomplish tremendous things in support of our mission to secure a better future for both wildlife and people by encouraging our board and staff to think creatively and act boldly,” said Denver Zoo President and CEO Craig Piper.

The new name was unveiled with Benson, his wife, Marcy, their family and close friends attending, as well as CU regents Steve Bosley, Sue Sharkey, Michael Carrigan and Irene Griego, CU-Boulder Chancellor Phil DiStefano and Rick Lawrence, president of the CU Foundation.

For more photos from the event, click here[32].

Christensen feted at celebration of teaching[33]

Tom Christensen, left, talks with Carolyn Fox and Gary Reynolds of Facilities Services during a reception that honored Christensen and showed off a new renovations at the Heller Center.

About 100 members of the UCCS campus community turned out to honor Tom Christensen, dean of the College of Letters, Arts and Sciences (LAS), and wish him well on his return to full-time teaching. A clear blue sky and late afternoon sunshine enhanced the May 15 reception at the Heller Center for the Arts and Humanities.

Christensen, who served as LAS dean since 2005, announced his plan last March to retire as dean and re-join the Department of Physics and Energy Science in July as a teacher and researcher.

“One of the wonderful things about serving as dean is getting to work with so many great people,” he said. “It is the people that really make UCCS a special place to work. I hope to continue to work with many of the people I have gotten to know while serving as dean when I am back in the faculty.”

Whether guests were there for Christensen or to inspect the Heller Center might be a matter for speculation. For many of them, it was the first visit to the property since major renovations were made. And while the party centered around the main house and the outdoor buffet, there was a great deal of foot traffic to the Heller guest house, just opened after 9 months of restoration efforts.

But this was part of the plan. Christensen was always a major advocate for the center and the plans to make it a showcase for Colorado’s natural beauty, the region’s artistic heritage, and the unique academic style and commitment of UCCS.

The reception offered the university community a prime opportunity for a visit many would not otherwise make. Fresh air, singing birds and comfortable temperatures highlighted an enjoyable social gathering.

“I am deeply touched by all of the wonderful people who joined us for this event,” Christensen said.

Online Symposium showcases student engagement[35]

Jeff Borden of Pearson eCollege delivers the keynote address at the CU Online Spring Symposium.

If your classroom is like Pong, your students are bored. If it's like Pac-Man, which has 25,000 routes in which Pac-Man

can travel to escape the ghosts, they will likely tune in.

Jeff Borden, vice president of instruction and academic strategy at Pearson eCollege, used this videogame example to illustrate how education must adapt to changing technology and learning patterns in order to serve the students of tomorrow. These are Generation M students – multitasker, media, multimodal, multinodal – and they want their education to happen anytime, anywhere and certainly not to be confined to the traditional classrooms and rote teaching styles of yore, he said.

Borden was the keynote speaker at last week's CU Online Spring Symposium. About 100 faculty and staff from the University of Colorado Denver | Anschutz Medical Campus attended the all-day, 11th annual event at Tivoli Turnhalle.

Because Pac-Man involved strategic, not just reactionary, challenges for the player, it opened the floodgates to videogame design, said Borden, whose talk centered on the future of the technology-enabled classroom.

"There's a reason a new game is released every 2 1/2 hours," Borden said. "People need new things to stay engaged, to stay motivated. If your classroom is the same every day, your classroom is the equivalent of Pong. ... People need newness. They need things that are different and differentiated to stay engaged."

Driving his point further, he mixed music, video clips, audience participation and singing -- along with sobering statistics -- into his presentation. Among the statistics:
In 2011, the average student lived 78 miles from their college or university; in 1980, they lived 5 miles away. Online course enrollment is growing an average 30 percent a year.
Borden noted that students are effectively learning about welding, cars, microscopes, cadavers, architectural software, bridge construction, foreign languages and many other subjects through low-cost web-based classes.

"Our students are requiring this," he said of online options. "Our students are starting to say, 'You know, if you don't have what I need I'll find it somewhere else.'"

Creativity and innovation are the most sought-after skills in the workplace, he said, but they get short shrift in the classroom. Teaching the traditional core competencies is no longer good enough, he said. Universities must deliver cultural, communication and technological competencies so that students can "connect the dots" between academia and the real world.

Borden said education must also:
Stop ignoring research Offer cross-curricular courses Use real-life assessments Deliver personalized learning
A condensed way to look at it, he said, is "create, consume, remix, share." "This is what the experts say we've got to get through in order to fix education," Borden said. "If we can get our students doing that in a multimodal, multinodal way we are going to be successful."

The symposium included breakout sessions by faculty and staff on subjects including online lecture alternatives, the iPad as a teaching tool, and data analytics in higher education. It also featured, as has become custom, an entertaining student-produced video conveying the digital transformation of education.

Bob Tolsma, assistant vice chancellor for Academic Technology and Extended Learning[37], gave the symposium's opening remarks, highlighting the growth of open educational resources and online courses nationwide. He noted that a "massively open online course (MOOC)" offered by a Stanford University professor had 100,000 students enrolled worldwide.

With universities across the country developing online programs -- including all the Ivy League institutions -- online programs no longer struggle to earn legitimacy and respect, Tolsma said.

With events such as the CU Online Symposium, "there's kind of a celebratory thing that what you're doing is important," Tolsma said. "You don't have to worry about being thought of, online, as a second-class citizen."

For the second consecutive year, the symposium presented its CU Online Innovation Award. This year's winner is

Brian Yuhnke, former instructional technology and web media production coordinator at CU Denver | Anschutz Medical Campus. Yuhnke, who now works at Case Western Reserve University, was cited for his creativity and ability to make learning compelling.

Mehler recognized for lifetime of service[38]

Mehler

Philip S. Mehler, the Glassman Professor of Medicine at the School of Medicine, Chief Medical Officer at Denver Health Medical Center and founder and medical director of the ACUTE Center for Eating Disorders at Denver Health, recently received the 2012 Outstanding Clinician Award from the Academy of Eating Disorders. The award provides international recognition for a lifetime of service and outstanding clinical contributions to the field.

Mehler has dedicated the past 25 years of his career to the research and medical care of patients suffering from the most severe eating disorders. He is a member and Fellow of the Academy of Eating Disorders as well as the Eating Disorders Research Society. He has lectured extensively on a national and international level on the topic. He also has been recognized as one of the Best Doctors in America for 13 years and multiple times by 5280 Magazine as Top Internist in Denver.

College of Nursing, School of Medicine reach out to homeless[40]

[41]
It is difficult to tell who gets more out of a partnership between the University of Colorado College of Nursing[42], University of Colorado School of Medicine[43] and Urban Peak[44] – the volunteers or the young people who receive services in the Urban Peak health clinic.

Urban Peak helps homeless youth and youth at risk of becoming homeless overcome real life challenges. It provides essential services and a supportive community, empowering them to become self-sufficient adults. The organization's shelter gives young people a safe place to sleep and offers case management, GED classes, job training and placement programs. Each of the young people in the program also has access to health care.

That's where the CU College of Nursing and CU School of Medicine come in. Each person who comes through the clinic receives a physical examination that includes several health-screening tests – including HIV and tuberculosis. Residents from the CU School of Medicine rotate through each semester under the supervision of Christine Gilroy, M.D., MSPH, associate professor in adolescent medicine and medical director at Urban Peak.

Thanks to the efforts of Scott Harpin, Ph.D., MPH, APRN-BC, assistant professor in the CU College of Nursing, student nurse volunteers also are pitching in at the clinic one day a week. Harpin undertook similar work in Minnesota and moved to Colorado about a year ago.

Harpin said Urban Peak, the clinic and Gilroy, specifically, have a reputation for providing appropriate, respectful health care.

"I'm still learning the scene here in Denver. But often, health care services for the homeless youth population are scattered and piecemeal. So having a central location is important for the best delivery to the young people," Harpin said. "I heard about Christine and her leadership. We had coffee and I told her I would love to get nursing students

involved in the clinic. We made it happen, and it worked out quickly."

Gilroy said the clinic runs more efficiently with the CU College of Nursing volunteers, most days doubling the number of patients they can see in a half day to 10. And after 16 years at Urban Peak, she said the interaction with the young people is rewarding. "I can see someone who says their knee hurts and test them for HIV and sexually transmitted diseases and talk to them about risky behaviors that may not be top of mind."

Harpin and the student volunteers set up a Facebook page for students who want to learn more about the volunteer effort at Urban Peak. Jesse Francomano is one of the student leaders.

"The kids here are motivated to move on. If I can help in any way, shape or form – I am happy to do so," Francomano said. As for the clinical experience - he called it invaluable. Due in part to his experience at Urban Peak, Francomano wants to work in adolescent health when he graduates in May 2013.

Marcoulier to lead Small Business Development Center[45]

Marcoulier

Aikta Marcoulier, former director of partnership marketing for Professional Bull Riders Inc., will serve as the new director of the Colorado Springs Small Business Development Center at the University of Colorado Colorado Springs.

Venkat Reddy, dean of the College of Business, announced Marcoulier's selection May 15 after reviewing more than 100 applicants during a six-month search. Since 2004, Marcoulier worked in marketing positions for Professional Bull Riders in Pueblo, most recently as director of partnership marketing. Previously, she worked as a project manager for the Native American Sports Council, Colorado Springs.

"Aikta stood out as one who truly understands how the SBDC can be a major contributor to the economic vitality of our region," Reddy said. "She is passionate about partnership marketing and its possibilities, and we look forward to assisting her as she develops the organization to its full potential."

Marcoulier holds a master's degree in global management from the University of Phoenix and undergraduate degrees in economics and psychology from the University of Iowa.

The SBDC[47] operates as a part of the College of Business and offers business consulting and training that assists small businesses in El Paso and Teller County.

Boulder Faculty Assembly honors 12 with Excellence Awards[48]

The Boulder Faculty Assembly (BFA) recently recognized 12 faculty members with Excellence Awards. Honorees each receive $3,000 and a plaque to commemorate the award.

This year's recipients are:

Excellence in Service: **Angela Bielefeldt,** Civil, Environmental and Architectural Engineering; **Brian Argrow,** Aerospace Engineering

Excellence in Teaching: **Oliver DeWolfe,** Physics; **Myles Osborne,** History; **Hanspeter Schaub,** Aerospace Engineering; **Harihar Rajaram,** Civil, Environmental and Architectural Engineering

Excellence in Research, Scholarly and Creative Work: **Susan Kent**, History; **Michael Radelet**, Sociology; **Matt Sponheimer**, Anthropology

For photos from the event, visit the BFA's Facebook page[49].

Boulder Staff Council elects representatives[50]

The Boulder Campus Staff Council recently elected area representatives. Three-year terms begin July 1:

Area I - **Philip Bradley, Angela Greenwald, Zahra Crowley**

Area II - **Denise Thomas**

Area III - **Morgan Bays**

Area IV - **Mary Alford**

Area V - **Rachel Keener Killam**

Area VI - **Christian Dino**

Area VII - **Bradley Albus, Nicholas O'Connor**

Area VIII - **Bradley Mathers**

At-Large - **Omaira Bankston**

Five CU-based companies selected for state grants[51]

Five CU licensees recently were selected to receive matching grants through Colorado's Bioscience Discovery Evaluation Grant Program (BDEG-Co[52]). The state of Colorado Office of Economic Development and International Trade began the BDEG program in 2007, providing early stage matching "seed" grants to enable the development and commercial validation of technologies that are licensed from Colorado research institutions by Colorado based start-up companies (as well as proof-of-concept grants to move promising CU biotechnologies closer to market readiness).

CU-based companies slated to receive funding in this round:

Amide Bio[53] – provides research reagents and clinical products for a diverse array of research and commercial targets. The company's proprietary technology platform, based on the work of CU-Boulder associate professor Michael Stowell[54], identifies critical molecular targets in finding therapies for Alzheimer's disease.

Flashback Technologies[55] – using machine learning to enable fast, non-invasive detection of acute blood loss volume and prediction of cardiovascular collapse in emergency situations. Based on work by CU School of Medicine professor and surgeon Steven Moulton[56] and former CU-Boulder computer science researcher Greg Grudic, the company received BDEG funding in fall of 2009, in addition to this year's grant.

OnKure – a company developing novel compounds that inhibit cancer cell growth and metastasis, based on the work of CU-Boulder professor Xuedong Liu[57].

Shape Ophthalmics – developing shape memory polymer (SMP[58])-based devices for the delivery of medication to the surface of the eye, for the treatment of eye diseases. Based on work by CU School of Medicine faculty members Malik Kahook[59] and Naresh Mandava[60], and CU Denver/CU-Boulder professor Robin Shandas[61].

Suvica[62] – an early-stage cancer drug discovery and development company, developing compounds that enhance the efficacy of standard cancer treatments. Based on the work of CU-Boulder professor Tin Tin Su[63], Suvica also received BDEG funding in spring of 2011.

“These are high-potential, Colorado-based companies that have emerged from CU research laboratories and are making their way forward into the commercial world,” commented David N. Allen, CU’s Associate Vice President for Technology Transfer. “We would like to thank all the legislators and others who have supported this program, which has helped these and numerous other companies become a part of the growing Colorado bioscience sector."

In addition to these companies, in fall 2011 two other CU licensee companies received funding through this program: Crestone Inc. (developing novel antibacterial compounds) and Sophono Inc. (implantable bone anchored hearing devices).

Young faculty honored with science grants[64]

Aaron Bradley

Robert McLeod

Li Shang

Sriram Sankaranarayanan

Rebecca Flowers

Hang (Hubert) Yin

Six University of Colorado at Boulder faculty have been selected to receive National Science Foundation CAREER Awards.

Aaron Bradley, Robert McLeod, and **Li Shang** in the department of electrical, computer and energy engineering were selected to receive awards, along with **Sriram Sankaranarayanan** of computer science, **Rebecca Flowers** of geological sciences, and **Hang (Hubert) Yin** in the department of chemistry and biochemistry.

All are assistant professors. McLeod joined the CU-Boulder faculty in 2003, Flowers and Yin in 2007, Bradley and Shang in 2008 and Sankaranarayanan in 2009.

The NSF's Faculty Early Career Development Program, or CAREER, is one of the nation's most prestigious honors directed toward young faculty. The 2010 awards, which come with a five-year grant ranging from $400,000 to $530,000, help to establish integrated research and educational activities while addressing areas of important need.

Bradley's award is aimed at developing a new model-checking technique for analyzing the properties of computational systems to achieve increased performance on multi-core and networked computers.

Flowers' research will use recent advances in thermochronological tools to investigate what is causing the uplift and erosion of the southern African Plateau, a large and elevated region of the continent's interior.

McLeod's research is focused on developing new fabrication techniques for next-generation electronic chips by breaking the existing limits on minimum feature size in optical lithography.

Sankaranarayanan is investigating automatic verification techniques for finding defects or bugs in embedded computer systems that monitor and control physical processes, such as are increasingly common in automobiles, avionics, medical devices and power-distribution systems.

Shang is investigating new communication technologies and system designs for emerging "many-core" computer systems, which have been the key performance bottleneck in massive-parallel computer systems.

Yin will use his award to advance the integrative chemical biology program at CU-Boulder by focusing on cutting-edge technologies to advance understanding of molecular recognition in cell membranes.

Links
[1] https://connections.cu.edu/stories/summer-institute-targets-computer-science-teaching[2] http://scalablegamedesign.cs.colorado.edu/[3] http://www.agentsheets.com/[4] http://www.agentsheets.com/agentcubes/[5] https://connections.cu.edu/stories/anschutz-medical-campus-faculty-staff-deliver-latest-arts-journal[6] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/dyk_thehumantouch.png[7] http://goo.gl/8WEcS[8] https://connections.cu.edu/people/lineberger-serve-national-science-board%E2%80%99s-executive-committee[9] https://connections.cu.edu/wp-content/uploads/2012/05/lineberger.png[10] https://connections.cu.edu/stories/five-questions-rhonda-williams[11] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/williams1.png[12] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/williams2.png[13] https://connections.cu.edu/people/fertility-specialist-trout-earns-appointment[14] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/trout.png[15] https://connections.cu.edu/stories/connections-begins-summer-publication-schedule-0[16] mailto:newsletter@cu.edu[17] mailto:Jay.Dedrick@cu.edu[18] https://connections.cu.edu/stories/open-enrollment-ends-5-pm-friday[19] https://connections.cu.edu/wp-content/uploads/2012/04/oe.png[20] http://www.cu.edu/openenrollment[21] https://connections.cu.edu/people/grinspoon-tapped-prestigious-post-library-congress[22] https://connections.cu.edu/wp-content/uploads/2012/05/grinspoon.png[23] https://connections.cu.edu/people/limerick-honored-bonfils-stanton-award[24] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/limerick.png[25] https://connections.cu.edu/stories/faculty-researchers-compare-notes-teaching-learning[26] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/ptlc2.png[27] https://connections.cu.edu/people/boardman-receives-early-achievement-award[28] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/boardman.png[29] https://connections.cu.edu/stories/benson-honored-denver-zoo[30] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/zoo-1.png[31] http://www.denverzoo.org/[32] http://www.flickr.com/photos/cu-office-of-the-president/sets/72157629866220668/[33] https://connections.cu.edu/stories/christensen-feted-celebration-teaching[34] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/uccs_dean-farewell.png[35] https://connections.cu.edu/stories/online-symposium-showcases-student-engagement[36] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/ucd_borden.png[37]

[38] https://connections.cu.edu/people/mehler-recognized-lifetime-service[39]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/mehler.png[40]
https://connections.cu.edu/stories/college-nursing-school-medicine-reach-out-homeless[41]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/nursing-homeless-outreach.png[42]
http://www.ucdenver.edu/academics/colleges/nursing/Pages/default.aspx[43]
http://www.ucdenver.edu/academics/colleges/medicalschool/Pages/somWelcome.aspx[44]
http://www.urbanpeak.org/[45] https://connections.cu.edu/people/marcoulier-lead-small-business-development-center
[46] https://connections.cu.edu/sites/default/files/wp-content/uploads/2012/05/Marcoulier.png[47]
http://cssbdc.org/site/component/option,com_frontpage/Itemid,1/[48] https://connections.cu.edu/people/boulder-faculty-assembly-honors-12-excellence-awards[49]
http://www.facebook.com/media/set/?set=a.463070780376553.124634.252271371456496&type=1[50]
https://connections.cu.edu/people/boulder-staff-council-elects-representatives[51]
https://connections.cu.edu/stories/five-cu-based-companies-selected-state-grants[52]
https://www.cu.edu/techtransfer/proof/BDEG_co.html[53] http://www.amidebio.com/[54]
http://dosequis.colorado.edu/[55] http://www.flashbacktechnologies.com/[56]
http://www.childrenscolorado.org/about/doctor/detail.aspx?doctorID=312889[57] http://chem.colorado.edu/index.php?option=com_content&view=article&id=269:xuedong-liu&catid=41:faculty&Itemid=93[58]
http://en.wikipedia.org/wiki/Shape-memory_polymer[59]
ht
tp://www.ucdenver.edu/academics/colleges/medicalschool/departments/Ophthalmology/faculty/Pages/Kahook.aspx[60]

[61] http://www.ucdenver.edu/academics/colleges/Engineering/Programs/bioengineering/FacultyandStaff/Pages/RobinShandas.aspx[62] http://suvica.com/[63] http://www.colorado.edu/MCDB/sulab/[64]
https://connections.cu.edu/people/young-faculty-honored-science-grants[65]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_bradley.jpg[66]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_mcleod.jpg[67]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_shang.jpg[68]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_sankaranarayanan.jpg[69]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_flowers.jpg[70]
https://connections.cu.edu/sites/default/files/wp-content/uploads/2014/01/people_yi.jpg