

UCLA College

Center for Education Innovation & Learning in the Sciences (CEILS)

CEILS Events

STEM Education Research Journal Club

Fridays, Winter Quarter 2016

2:00 - 3:00 PM

1100 Terasaki Life Science Building (TLSB)

CEILS members explore relevant education literature in more depth and develop greater understanding of assessment techniques and data analysis. Presenters will select a paper and lead a discussion about how education researchers have documented the relationship between effective teaching practices and their impact on student learning, knowledge retention, and persistence in STEM majors. Faculty, graduate students, and post-docs are welcome to participate! Join us on **Fridays from 2:00 – 3:00 PM in 1100 TSLB** for these enriching discussions.

Upcoming Presenters in Winter 2016:

January 29 | Heather Tienson, Lecturer in the Department of Chemistry and Biochemistry, will present the following paper: Loertscher et al. 2014; Identification of Threshold Concepts for Biochemistry. CBE-Life Sci Educ 13: 516-528.

February 5, 2016 | **Ira Clark**, Academic Administrator for the Biomedical Research Minor, will present the work of he and his colleagues in Life Sciences surrounding development and assessment of key courses in the Minor, with context provided from the following paper: Clark et al. 2009, “Deconstructing” Scientific Research: A Practical and Scalable Tool to Provide Evidence-Based Science Instruction. *PLoS Biol.* 7(12): e1000264.

February 12, 2016 | **Shanna Shaked**, Lecturer in the Department of Physics & Astronomy, will present the following paper: Miler, Schell, Ho, Lukoff, and Mazur (2015) Response switching and self-efficacy in Peer Instruction Classrooms. *Phys. Educ. Res.* 11, 010104.

If you need an electronic copy (PDF) of the paper or handouts for this talk, please see the [Journal Club](#) tab on the CEILS website.

On-campus Events

120th UCLA Faculty Research Lecture : “How We Learn Versus How We Think We Learn” by Robert A. Bjork

Wednesday, February 17, 2016; 3pm

Schoenberg Hall, UCLA Schoenberg Music Building

For more information, please see: <http://specialevents.ucla.edu/faculty-research-lecture/invitation.html>

RSVP for the reception that immediately follows the lecture by February 10, 2016 at:

specialevents@support.ucla.edu

Science on Screen: A Panel and Networking Event

Meet the scientists behind Breaking Bad, The Big Bang Theory, The Last Ship, Battlestar Galactica, and Gravity!

Wednesday, February 17, 2016; 6pm

CNSI Auditorium, UCLA

To see more information and *reserve your tickets, please see: <http://scicommhub.com/science-on-screen>

*Graduate students are eligible to apply for free tickets

Off-campus Events

Byte of Science: Science and Beer! “Will Synthetic Vitamins Make Me Explode?!”

Wednesday, January 27, 2016; 6:30-9p

Barney’s Westwood

Byte of Science is an awesome monthly event where a scientist gives an informal research talk to the public, at a bar. It's a chance for everyone to practice speaking about science to the public. For more information, please see: <http://www.hamedmirzaei.org/events>

CIRTLCast Series: Assessing What Students are Learning Effective Grading: The Art of Providing Useful (and Used) Feedback

January 27, 2016 | 10am PT | Online

Information for joining online session: <http://www.cirtl.net/Upcoming-CIRTLcasts>

First Fridays

Friday, February 5, 2016; 5-10p

Natural History Museum

Explore one of LA's coolest science museums after hours! Don't miss this awesome event with guided museum tours, moderated discussions with scientists about the science behind superheroes like Antman and Spiderman, live music, and a DJ lounge. Tickets are \$18. SciComm Hub @ UCLA will be gathering a

group to attend together, so if you are interested, please also fill out the Google survey.

More Info: <http://www.nhm.org/site/activities-programs/first-fridays/february-2016>

Buy Tickets: [Buy First Friday Tickets](#)

Let us know you're coming: <http://goo.gl/forms/HEoST9Hzp>

8th Conference on Understanding Interventions

February 26-28, 2016

Philadelphia, Pennsylvania

This conference was established to facilitate dissemination and exchange of hypothesis-based research on interventions and initiatives that broaden participation in science and engineering research careers. The conference is designed to create a dialogue among behavioral/social science and education researchers, evaluators, and faculty in STEM (science, technology, engineering, and mathematics) fields who participate in intervention programs.

Visit the [conference website](#) to learn more.

2016 Southern California PKAL Regional Network Annual Meeting

Integrating Teaching, Assessment, & Education Research to Enhance Student Learning in STEM

February 27, 2016

University of California, Irvine

Over the past decade, STEM education reports (e.g. “Engage to Excel”, “Vision and Change”, and “Reaching Students: What Research Says about Effective Instruction in Undergraduate Science and Engineering”) have highlighted the importance of evidence-based instructional practices. This trend is further manifested in the increased emphasis by funding agencies, professional societies, and our own institutions on using assessment to improve teaching and learning. Event organizers are soliciting proposals for professional development workshops that will support meeting participants in learning about the practical aspects of conducting classroom assessment and education research. The goal of these workshops is to empower meeting participants to engage in discipline-based education research (DBER) and to increase the rigor of assessments conducted at local institutions. **Workshop proposals and poster abstracts are due December 10, 2015.** For guidelines and additional event information, please visit the [website](#).

2016 PKAL Summer Leadership Institute for STEM Faculty

Application Deadline: February 24, 2016

Adamstown, MD

July 12, 2016 to July 31, 2016

- **Institute I: July 12 – July 17, 2016**

- **Institute II: July 19 – July 24, 2016**
- **Institute III: July 26 – July 31, 2016**

The PKAL Summer Leadership Institute is designed for both early and mid-career STEM faculty engaged in leading projects aimed at transforming undergraduate STEM education in their classrooms, departments, and institutions. The five-day intensive Institute provides faculty participants with the theory and practice required to effectively manage the politics of such change and contribute to the national STEM higher education reform effort.

Teaching and Learning Technology Conference 2016 - Registration Open

Butler-Carlton Hall; Rolla, Missouri

Thursday and Friday, March 17-18, 2016

Registration for the Teaching and Learning Technology Conference 2016 on March 19 and 18, 2016 is now open but will **close at midnight on Friday, March 11, 2016!** The theme this year is “Learning to Learn” and will feature keynote speakers:

Linda B. Nilson, Ph.D. - Founding Director of the Office of Teaching Effectiveness and Innovation at Clemson University, Presenting “Self-Regulated Learning: Way Beyond Study Skills” and

Anthony Petrov, Ph.D. - Assistant Vice Chancellor of Global Learning at Missouri S&T

For more information and how to register, please see: <http://tlt.mst.edu/>

2016 Teaching Professor Conference

June 3-5, 2016

Washington, DC

If you’re serious about teaching and want to learn how to stay sharp, effective, and confident, you’ll be joining the ranks at The Teaching Professor Conference. This three-day conference, June 3-5, 2016, offers hands-on workshops, plenary sessions with captivating keynote presenters, dozens of concurrent sessions, and emerging research poster presentations.

If you are interested, please see the tentative [schedule](#), and [register to attend](#)!

National Academies Summer Institutes on Undergraduate Education

West Coast Site (details coming soon)

The National Academies Summer Institutes on Undergraduate Education have benefited from generous support of talented individuals, institutions, and organizations. Established in 2004 under the leadership of Jo Handelsman and Bill Wood, the Summer Institutes (SIs) have received sponsorship and funding from the Howard Hughes Medical Institute (HHMI), the National Science Foundation (NSF), the National Academy of Sciences (NAS), and Yale University.

Professor Jo Handelsman's regional expansion award from HHMI concluded in 2015, and the team led by Dr. Jennifer Frederick, Executive Director of the Yale Center for Teaching and Learning, has secured new funding from HHMI and the Helmsley Charitable Trust.

There will be a total of five regional SIs in 2016. Of the two HHMI-funded programs, which will target faculty from research-intensive institutions, one will take place at the University of Chicago (August 7-12), and the other will take place on a West Coast site yet to be determined.

More information about the institutional-based SIs will be uploaded as it becomes available. Please see the official website for details: <http://www.nasummerinstitutes.org/>

Newsworthy

Neil Garg named 2015 Carnegie Foundation for the Advancement of Teaching California Professor of the Year

Neil Garg, professor and vice chair for education in UCLA's department of chemistry and biochemistry, has been selected as the 2015 [Carnegie Foundation for the Advancement of Teaching](#) California Professor of the Year. He was honored at the U.S. Professors of the Year awards banquet and congressional reception in Washington, D.C. in November.

Garg's [innovative teaching techniques](#) help his students to master difficult concepts and solve complex problems. [Learn more about his teaching in the UCLA newsroom article.](#)

Barriers and Opportunities for 2-Year and 4-Year STEM Degrees Published by The National Academy Press

The National Academies has released *Barriers and Opportunities for 2-Year and 4-Year STEM Degrees*

This report reviews research on the roles that people, processes, and institutions play in 2-and 4-year STEM degree production. This study pays special attention to the factors that influence students' decisions to enter, stay in, or leave STEM majors—quality of instruction, grading policies, course sequences, undergraduate learning environments, student supports, co-curricular activities, students' general academic preparedness and competence in science, family background, and governmental and institutional policies that affect STEM educational pathways.

► [More Information](#)

<http://www.nap.edu/catalog/21739/barriers-and-opportunities-for-2-year-and-4-year-stem-degrees>

Transforming Institutions: Undergraduate STEM Education for the 21st Century

This [book](#) provides an overview of the context and challenges in STEM higher education, contributed chapters describing program and research in this area, and a reflection and summary of the lessons from the many authors' viewpoints, leading to suggested next steps in the path toward transformation.

Communities of Transformation and their Work Scaling STEM Reform

Adrianna Kezar and Sean Gehrke recently [published their findings](#) from examining four STEM communities in order to better understand the communities roles in scaling STEM education reform.

Science-Diversity Efforts Connect Grad Students With Mentors by Vimal Patel, [Published](#) in The Chronicle of Higher Ed

This article showcases national efforts to match graduate students with researchers and scientists as mentors, intended as a compliment to the traditional advisor role. A \$21-million grant from the National Institutes of Health aims to create a national database (as part of the [National Research Mentoring Network](#)) of potential mentors for minority graduate students and others, primarily in the biomedical sciences and related fields.

Professional Development Opportunities for STEM Graduate Students & Post-docs

“Interview Success Secrets” -- Complimentary eBook!

Paul Healy, Director, International Healthcare Recruitment [IHR]

If you're applying for jobs and want an edge in the interview stage, this book is for you. Download it today: http://sciencegroup.tradepub.com/free/w_humao6/prgm.cgi

UCLA PhD Training Grant in Genomic Analysis and Interpretation

Application deadline for the 2016-17 academic year: Friday, January 29, 2016.

The purpose of the program is to insure that students obtain an adequate biological, computational, and statistical foundation to succeed in this important interdisciplinary field. The grant provides its trainees with stipends and funding for academic fees, support for travel, and research expenses.

The program is open to continuing UCLA PhD students and incoming UCLA 2016-17 PhD applicants. Incoming students are welcome to apply prior to receiving an offer letter from UCLA. Funding is contingent upon being admitted and attending a UCLA PhD program in Fall 2016. Applicant must be US citizens or permanent residents.

To learn more about the program and application process, please visit our website:

www.genetics.ucla.edu/GATG

or email:

Jeanette Papp

Co-Director, UCLA Genomic Analysis Training Program

Professor, Dept of Human Genetics

jcpapp@ucla.edu

SciComm Hub

SciComm Hub represents an on-campus community of graduate students and post-docs across the Life and Physical Sciences who are interested in science education, outreach, and communication. This organization hosts a variety of events that are designed to help individuals improve their science communication skills. A complete program announcement can be found on the SciComm Hub [website](#). Please consider joining this growing UCLA community!

- **Announcing SciComm Slam!** This thesis-style video submission contest gives you an opportunity to talk about research and potentially win \$100. **Submission deadline for SciComm Slam is January 30, 2016.**

CIRTL Network

Spring 2016 Courses have begun!

CIRTL has offered four free online courses in the spring, designed to reinforce pedagogical cornerstones, and three of those courses have started on the week of January 25-29!

CIRTL MOOC (New!)

- Advancing Learning through Evidence-Based STEM Teaching

*Join our MOOC and learn about evidence-based STEM teaching at your own pace
Open for registration in Early 2016.*

Visit the [website](#) for a detailed description of this course, offered starting in the Spring of 2016. Registration date has not yet been set.

Job Opportunities in STEM

Assistant Professor Position in Biochemistry and Molecular Biology

Oklahoma State University

Application Deadline: February 19, 2016

[please click on [link](#) and see attached job description with application instructions]

Staff Associate Position

Association of Public and Land-grant Universities; Washington, DC

In the Office of Research, Innovation, and STEM Policy

[please click on [link](#) and see attached job description with application instructions]

Full-time Tenure-track Position as Associate Director for Learning Sciences

Kennesaw State University

In the Center for Excellence in Teaching & Learning (CETL)

Application Deadline: February 1, 2016

[please click on [link](#) and see attached job description with application instructions]

Program Assessment Analyst

University of Maryland, College Park

In the Learning Transformation Center (TLTC) and Office of Institutional Research, Planning, and Assessment (IRPA)

Application Deadline February 8, 2016

[please click on [link](#) and see attached job description with application instructions]

Two Open-rank Tenure-track Positions in Mathematics Education and Science Education

University of Utah

In the College of Education in collaboration with the College of Science

Application Deadline: Open Until Filled

[please click on [link](#) and see attached job description with application instructions]

Academic Assessment Principal Analyst

UC-San Diego

In the Center for Engaged Teaching (CET)

Application Review Starting: December 10, 2015 | Open Until Filled

[please click on [link](#) and see attached job description with application instructions]

Full-time Tenure-track Science Education Faculty Position

Washington State University Spokane

In the WSU Health Science STEM Education Research Center
Application Review Starting: December 14, 2015 | Open Until Filled
[please click on [link](#) and see attached job description with application instructions]

For more information about CEILS events and resources, including a list of STEM education events from previous mailers, please visit the CEILS website at www.ceils.ucla.edu or stop by the CEILS office in Hershey Hall Room 126.

If you wish to be added to the CEILS mailing list, please send your request to media@ceils.ucla.edu. Thanks!