

Biological Sciences

April 3rd, 2017 AY 16-17 #161

Announcements

BioSci in the news! Earlier this month Heather Patisaul and Scott Belcher were interviewed by NC State News about their intriguing studies on the use and effects of EDCs (Endocrine Disrupting Compounds). Also highlighted in the article is the publication of their new book, [Endocrine Disruptors, Brain and Behavior](#), which will be published in April by Oxford University Press.

Check out the full interview [here](#).

On Friday last week NC State News also asked our Head, Jerry LeBlanc, to be the first guest writer in a series of posts from NC State researchers. The guest posts will, “address the value of science, technology, engineering and mathematics,” highlighting the ways in which these core studies contribute to society. Read Jerry’s compelling post [here](#).

We are pleased to report that ONE NC State nominee for the 2017 Goldwater Scholarship competition has been named as a Goldwater Scholar, and he is BioSci!

Our Goldwater Scholar is:

Connor McKenney, Junior, Genetics major, with minors in Statistics and Biotechnology, University Scholars Program, 2016 DAAD RISE Grant Recipient, 2016 FAO Super-curricular SEED Grant Recipient

Connor intends to pursue a Ph.D. in Genomics and conduct research in cancer genomics as a principle investigator of a cancer research organization.

Faculty/Research Mentors: Dr. Betty Gardner, Director of the NC State Program in Genetics and Associate Professor, Dr. Stephanie Curtis, Professor of Biological Sciences, and Dr. David Aylor, Assistant Professor of Biological Sciences. THREE nominees have been named as Honorable Mention.

This raises the total number of Goldwater Scholars at NC State to 50!

In addition, one of the three honorable mentions is also BioSci:

Evan C. Brooks, Junior, Biological Sciences major, with minors in Spanish and Genetics, Park Scholar, University Scholars Program

Evan intends to pursue a Ph.D. in developmental and degenerative biology and conduct research on the molecular mechanisms of organ morphogenesis and regeneration.

Faculty/Research Mentors: Dr. Miriam Ferzli, Teaching Associate Professor of Biological Sciences (NC State), Dr. Nanette Nascone-Yoder, Associate Professor of Developmental Biology (NC State), and Dr. Pamela Yelick, Professor of Oral Pathology (Tufts)

This year, 470 colleges and universities nominated 1286 students for the 2017 competition. 240 Scholars were named and 307 Honorable Mentions were awarded. The one and two year scholarships will cover the cost of tuition, fees, books and room and board for up to a maximum of \$7,500 per year. Goldwater Scholars have very impressive academic qualifications that have garnered the attention of prestigious post-graduate fellowship programs.

In fact, recent Goldwater Scholars have been awarded 89 Rhodes Scholarships, 127 Marshall Awards, 145 Churchill Scholarships, and numerous other distinguished fellowships such as the National Science Foundation Graduate Research Fellowship. Congratulations to Connor and Evan on this achievement! Click [here](#) to learn more about the Goldwater Scholarship program.

Congratulations:

Congratulations to Dr. Jun Ninomiya-Tsuji, college nominee for the University's Outstanding Global Engagement Award. Jun will be recognized for her achievements in the globalization of research and training at the Global Engagement Exposition to be held April 18th at Talley Student Union.

Congratulations are in order for Biological Sciences Post-Doc, Elena Schroeter! Elena is a 2017 recipient of the prestigious Beckman Institute Postdoctoral Fellowship. Read about the program [here](#). Way to go, Elena!

We are excited to announce this year's Outstanding Senior Award nominees for the Biological Sciences Department! While the quality of all nominees made this a truly difficult decision, the following departmental awardees were selected for their exceptional achievements:

The Outstanding Research Award: Ashlyn Johnson

The Outstanding Scholarship Award: Khadijah Ewais

The Yusor Abu-Salha Award for Outstanding Community Engagement: Sameula Fernandes

These candidates have been submitted for consideration by the College of Sciences for the COS Outstanding Senior Awards. Departmental and college awardees will be honored at a celebration on Wednesday, April 19th from 12pm to 2pm in Talley Student Union.

We would also like to acknowledge the rest of our Department Nominees for their excellent accomplishments:

Community Engagement: Megan McNeil

Research: Maura Schwartz

Thanks to all our nominees for serving as sterling representatives of the Department of Biological Sciences, as well as those who took the time to recognize and nominate them!

Save-the-Date

2017 B.B. BRANDT LECTURE

**From
Mouse to
Molecule**



the genetic basis of evolutionary change

Dr. Hopi Hoekstra

Alexander Agassiz Professor of Zoology, Harvard University
Curator of Mammals, Museum of Comparative Zoology

April 6 | 3:30 PM | David Clark Labs 101

Sponsored by: B.B. Brandt Lecture | Applied Ecology | Biological Sciences

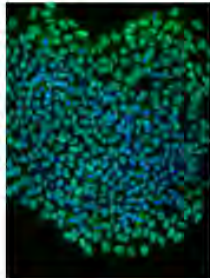
CHHE and CMI joint seminar

“Genome editing and stem cell engineering for disease modeling”

Adriana Beltran, Ph.D.
Director, Human Pluripotent Stem Cell Core
UNC Chapel Hill School of Medicine

You are invited to learn about the services offered
by the core to help your research!
All faculty, staff, postdocs and students are welcome

Thursday, April 13, 3:30pm-4:30pm
Toxicology Building, Auditorium Room 2104
Centennial Campus, NC State University



The Core aims to facilitate studies in human stem cell biology by providing relevant expertise and services, including:

- Generation of iPS cells
- Differentiation of ES and iPS cells
- Genome editing with TALEN/CRISPR
- Gene regulation and chromatin remodeling with ZFP, TALEN and CRISPR technologies

The heat, air conditioning and secondary power will be disconnected at Thomas Hall all of 1st and 2nd floors, part of 3rd and 4th floors on 4/10/17 beginning at 7:00 AM and ending on 4/14/17 at 4:00 PM. The disconnect is necessary in order to replace the VFD for the AHU in room 1573. We are also replacing the MCC panel in this room. The power will only be off in the mechanical room 1573 to the air handlers during this time.

Triangle Chapter
Society for Neuroscience

Register Now-
www.TriangleSfN.org

3rd Annual Spring Conference

Plan to Participate!

- Network with local neuroscientists
- Present a poster
- Attend "ask a grad student" panel
- **Attendance is free!!!**

Featured Speakers-



Dr. David Anderson
California Institute of Technology



Dr. Serena Dudek
National Institute of Environmental Health Sciences



Dr. Leslie Sombers
North Carolina State University



Dr. Michael Nader
Wake Forest University



April 13, 2017

10:00 am - 5:30 pm

Embassy Suites

201 Harrison Oaks Blvd, Cary, NC

20TH ANNUAL NIEHS BIOMEDICAL CAREER SYMPOSIUM



Friday, April 21, 2017

7:45 a.m. – 5:00 p.m.

EPA Campus, Building C

109 TW Alexander Drive • Research Triangle Park, N.C.

Keynote Address

How Economics Shapes the Early Careers of Scientists

Paula Stephan, Ph.D.



**Professor of Economics,
Georgia State University,
and Research Associate,
National Bureau of
Economic Research**

*Author of the book
"How Economics Shapes Science"
Selected as Science Careers first
Person of the Year in 2012 for her
contributions to the welfare
of early-career scientists*

Career-Specific Discussions

- Entrepreneurship and Biotech Startups
- Academia
- Science Outreach
- Scientific Review Officer/ Grants Management
- Non-Profit Organizations
- Consulting
- Medical Writing and Scientific Writing
- Contract Organizations (CDMO/CRO)
- How to Be a Competitive Applicant: Ask Human Resources

Career Development Workshops

- How to Avoid Self-Sabotage and Win at Salary Negotiations
- Articulating Your Accomplishments: Tips for Creating a High-Impact Job Application
- Starting Your Own Lab
- Overview of the Industry Career Landscape
- Interviewing with Confidence
- Networking: A Tool for Exploring Careers and Building Professional Relationships
- Foundations of Good Grantsmanship
- The Government Job Application Process: Navigating USAJOBS.gov
- A Practical Approach to Managing Conflict and Preparing for Difficult Conversations
- Building an Online Presence Using Free Internet Tools

Networking Opportunities

- Informal Networking Lunch
- Afternoon Reception
- Exhibitor Browsing – Local Organizations Focused on Biomedical Research
- Meet With HR Company Representatives

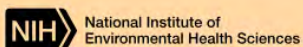
One-on-One CV/Resume Consultations With Professionals From Academia, Industry, and Government

For more information, visit

<https://tools.niehs.nih.gov/careerfair>

Email: NIEHSCareerSymposium@niehs.nih.gov

Sponsored by the NIEHS Trainees Assembly



**TOXICOLOGY PROGRAM
SPRING 2017 SEMINAR SCHEDULE**

Tuesdays @ 4:00 PM Toxicology Building Room 2104, Centennial Campus

*Co-sponsored by Center for Human Health and the Environment

DATE	SPEAKER <i>Affiliation</i>	TITLE
1/10	Jason Richardson <i>Northeast Ohio Medical University</i>	Gene-environment interactions in neurological disorders
1/17	Russell Thomas <i>EPA</i>	Too many chemicals, so little time
1/24	Darryl Zeldin* <i>NIEHS</i>	Thromboxane (TXA2) Attenuates Th9 Cell Differentiation and Function During Allergic Lung Inflammation
1/31	Christopher Sistrunk <i>Alumni Speaker City of Hope</i>	Hiding in Plain Sight: How Morphologically Normal Breast Tissues Display Biochemically Cancerous Phenotypes in High Risk Women
2/7	Hazel Nichols <i>UNC Gillings School of Global Public Health</i>	Cancer and pregnancy
2/14	John Brock <i>UNC Asheville</i>	Human and Wildlife Exposure to Phthalates: Discovery and Future Directions
2/21	Katherine Franz <i>Duke University</i>	Designing molecules to mine for copper along the host-pathogen interface
2/28	Mark Zylka <i>UNC School of Medicine</i>	Genetic and environmental risks for autism
3/7	No Seminar	SPRING BREAK
3/14	No Seminar	Society of Toxicology Meeting
3/21	Humphrey Hung-Chang Yao* <i>NIEHS</i>	Sex, Arsenic, and Hedgehog: Mouse Models of Fetal Origins of Adult Diseases
3/28	Serena Dudek <i>NIEHS</i>	New insights into regulating synaptic plasticity from an unexpected place: Hippocampal Area CA2
4/4	TBD	
4/11	Antony Williams <i>EPA</i>	The EPA CompTox Chemistry Dashboard – A Data Integration Hub for Environmental Chemists and Toxicologists
4/18	Allison Camp <i>NCSU, PhD Student Advisor: Gerald LeBlanc</i> & Stephanie Eytcheson <i>NCSU, PhD Student Advisor: Gerald LeBlanc</i>	<i>TBD</i> <i>Hemoglobin Levels Modulate Toxicity to Nitrate</i>
4/25	Rick Woychik* <i>NIEHS</i>	Research Strategies for Exploring the Landscape of Environmental Health

Time: 1:30 pm

Location: Stephens Room, 3503 Thomas Hall



January 23
Dr. Steven Benner,
 Foundation for Applied Molecular Evolution
 (Hosted by Dr. Jeff Thorne)



February 6
Dr. Karl Broman
 University of Wisconsin
 (Hosted by the Genetics Graduate Students)



February 20
Dr. Chao-Qiang Lai
 Alumnus Seminar
 USDA, Tufts University
 (Hosted by Dr. Trudy Mackay)



March 13
Dr. Susan McCouch
 Cornell University
 Hosted by the Genetics Graduate Students)



March 27
Dr. Kirk Wilhelmsen
 UNC-Chapel Hill
 (Hosted by Dr. Robert Anholt)



April 10
Dr. Charles Aquadro
 Cornell University
 (Hosted by the Genetics Graduate Students)



April 24
Dr. Craig Montell
 University of California at Santa Barbara
 (Hosted by Dr. Robert Anholt)



January 30
Dr. William Jeffery
 University of Maryland
 (Hosted by the Genetics Graduate Students)



February 13
Dr. Brian Wiegmann
 Charles Darwin Lecture
 NC State University
 (Hosted by the Dr. Trudy Mackay)



February 27
Dr. Eric Gaucher
 Georgia Tech
 (Hosted by Dr. Jeff Thorne)



March 20
Dr. Logan Everett
 NC State University
 (Hosted by Dr. Trudy Mackay)



April 3
Dr. Mariana Wolfner
 Cornell University
 (Hosted by Dr. Robert Anholt)



April 17
Dr. Philip Benfey
 Duke University
 (Hosted by Dr. José Alonso)

W. M. Keck Center for Behavioral Biology

Distinguished Speaker Series

Spring 2017

January 26 John McGann

*Department of Psychology
Rutgers University*

***Beyond Bottom-Up Sensory Processing: Learning and Expectation
Can Shape Sensory Input to the Mouse Brain***

3:30 pm - 101DCL



February 9 Karen Carleton

*Department of Biology
University of Maryland, College Park*

QTL and Gene Regulatory Networks for Seeing Through the Eyes of a Fish

3:30 pm – 3503 Thomas Hall



March 9 Marlene Zuk

*College of Biological Sciences
University of Minnesota*

Rapid Evolution in Silence: Adaptive Signal Loss in the Pacific Field Cricket

3:30 pm – 3503 Thomas Hall



March 16 Jon Kaas

*Vanderbilt Brain Institute
Vanderbilt University*

The Evolution of the Human Brain

3:30 pm – 3503 Thomas Hall

*7:30 pm – Daily Planet Café
NC Museum of Natural Sciences*



April 24 Craig Montell

*Molecular, Cellular and Developmental Biology
University of California at Santa Barbara*

Decoding the Receptors Controlling Animal Behavior in Drosophila

1:30 pm – 3503 Thomas Hall



Spring 2017 Neuro Events

Neurogroup meets 3rd Thursday Stephens room 3rd floor Thomas Hall 11:30-1:00

Neurojournal club meets once a month in room 139 of David Clark Labs 11:00-12:00

January 19 Neuro-group

March 24 Neurojournal

February 3 Neurojournal

April 13 Triangle Society for Neuroscience
<http://trianglesfn.org/springmeeting/>

February 16 Neuro-group

April 20 Neuro-group

March 3 Neurojournal

April 20 Neuro-group

Brain Awareness Day

March 16

April 21 Neurojournal

Neuro-group 11:30

Dr. Alex Marshall High Point University

Jon Kaas seminar 3:30

May 18 Neuro-group

NCMNS event 6:30

**Duke Women in Science & Engineering &
Graduate Women in Science
Research Triangle Chapter**

A Celebration of Women in Science

Free Research Symposium
Saturday, May 20, 2017
Love Auditorium at Duke University

- 1:00 PM - Welcome
- 1:15 PM - Keynote Address
Dr. Patricia Jensen
National Institute of Environmental
Health Sciences
“Diverse Origins in Science”
- 2:30 PM - Short Talks
- 3:30 - 5:00 PM - Poster Session,
Reception With Refreshments



- ★ Register for a short talk by **April 25, 2017**
Talks selected by GWIS and Duke WISE officers - notification May 1, 2017
- ★ General registration open until **May 1, 2017**
- ★ Register: gwisresearchtriangle.org/women-in-science-symposium/



More Information
sites.duke.edu/wise/
gwisresearchtriangle.org

Follow us on Twitter and Facebook!

 NCSU Biological Sciences

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