Graduate Student Award

2012 winners

UF-HHMI SCIENCE FOR LIFE
Laura Adamson is a PhD candidate in the Department of Psychiatry and is part of the Immunology/Microbiology Concentration in the Interdisciplinary PhD Program (IDP) in the College of Medicine. She received her B.S. degree in Genetics from Iowa State University in 2008. Her doctoral thesis is guided by Dr. Jacqueline Hobbs, studying the interaction of Parvovirus B19 in autoimmune disorders and cancers, particularly thyroid cancers. She is receiving her HHMI-GSA award for her research with undergraduate students Monica Polcz and Reva Datar identifying other tissues and organs were Parvovirus B19 may be present, resulting in the publication “Detection of Parvovirus B19 Capsid Proteins in Testicular Tissues” in the Urology Journal. Laura and the Hobbs’ laboratory continue to unravel the extent of Parvovirus B19 persistence outside of the bone marrow.

Harsimran Baweja is a doctoral candidate in Motor Control (College of Health and Human Performance, University of Florida). He is a physical therapist from India and has worked under the mentorship of Dr. Evangelos Christou since Jan 2008. He serves as a reviewer for four international scientific journals, namely: Journal of Motor Behavior, Research Quarterly in Exercise and Sports, Neuroscience Methods, and Archives of Physical Medicine and Rehabilitation. He received the HHMI-GSA award for his work with undergrads Julie Vu (now P.T.), Hillary Lindheim (now O.T.) and many others who have worked with him to understand the interaction of visual feedback manipulations on neural mechanisms of force control in humans. He published 2 papers featured in Experimental Brain Research and European Journal of Applied Physiology with Ms. Vu and one paper featured in European Journal of Applied Physiology with Ms. Lindheim in collaboration with Dr. Neto, a post-doc in Dr. Christou’s lab. He presently has 8 peer reviewed publications in scientific journals including Journal of Motor Behavior, Muscle and Nerve, and Human Movement Science, and over 28 National and International presentations. His dissertation is focused on the Influence of visual feedback magnification on movement control and learning in older adults.
Kristine Callis

Kristine Callis is a PhD candidate in the Department of Biology advised by Dr. Doug Levey. Her dissertation focuses on plant-insect interactions and examines the role of silica as a plant defense and its impact on herbivory rates across a latitudinal gradient. Kristine participated in the HHMI-GATOR program, learning valuable undergraduate mentorship skills and meeting Shaji Faisal. Under Kristine’s guidance, Shaji designed a project to evaluate the affect of transpiration rates on silica uptake in cucumber plants, which he wrote up in the paper “Both active and passive processes contribute to silica accumulation in Cucumber (Cucumis sativus)”. Kristine has taken these mentoring skills and used them to expand her research program -- starting two new undergraduate students each semester and working with them to develop independent research projects during their first year in the lab. In addition to encouraging her students to publish their results, Kristine also emphasizes scientific communication in the form of posters and presentations at conferences and has had 4 students present posters at either regional or national conferences.

Wendy Carcamo

Wendy Carcamo is a PhD candidate in the Department of Oral Biology under the mentorship of Dr. Edward Chan. She received her B.S. in Microbiology and Cell Science from the University of Florida in 2008. Her dissertation focuses on a novel cytoplasmic rod and ring (RR) structure that was identified by human autoantibodies. She received the HHMI-GS award based on her study with the undergraduate student Stephanie Tamayo, a University Scholars recipient. The study resulted in a publication in PLoS One in December 2011 entitled “Induction of Cytoplasmic Rods and Rings Structures by Inhibition of the CTP and GTP Synthetic Pathway in Mammalian Cells.” The study identified two components within the novel structure and identified that Hepatitis C (HCV) patients produce autoantibodies that recognize the structures. It has led to the further investigation and understanding of the clinical correlation between patient response to HCV treatment and production of anti-RR autoantibodies. She plans on attending medical school in fall 2012 and strives to become a successful and passionate physician scientist.
Brian Collisson

Brian Collisson is a doctoral student in social psychology under the advisement of Dr. John Chambers. Brian's research focuses on how the self colors perceptions of our social world. That is, when forming impressions of other people, how does information people have about themselves influence their perceptions of others? Some of Brian's recent projects include the impressions people form of likable and dislikable people, rival political groups, religious agents, and potential relationship partners. In addition to conducting research, Brian is passionate about teaching. He enjoys being in front of a classroom and telling painfully corny jokes for the amusement of his students. Brian also prides himself on being a mentor. He has spoken at national conferences in regard to engaging students in the research process. Many of his students have entered doctoral programs in psychology, published journal articles, and received awards for presenting research. After graduating, Brian plans to continue teaching and mentoring students as a college professor.

Katrina Cuddy

Katrina Cuddy is second year PhD student under the supervision of Dr. David Oppenheimer in the Department of Biology. As a previous HHMI Science for Life fellow, she earned her Bachelor's of Science in Botany at the University of Florida in 2010. Her research interests lie in the study of actin dynamics and trichome cell shape in the model organism Arabidopsis thaliana. Specifically, Katrina's dissertation focuses on understanding the regulation of actin depolymerizing factor and how the depolymerization of actin filaments affects membrane trafficking in plants. Katrina was awarded the HHMI Graduate Student Award through her research with undergraduate Alexander Hwang, also an HHMI Science for Life fellow. Together, Alex and Katrina study cell shape in terms of Endoplasmic Reticulum and Golgi body dynamics in plant trichomes. Alex earned a first authorship for their publication in the Journal of Visualized Experiments titled "Pouring and Running a Protein Gel by Reusing Commercial Cassettes." This manuscript introduces a novel procedure visualized by Dr. Oppenheimer that provides for an economical and environmentally favorable alternative to purchasing commercial polyacrylamide gels. Katrina is excited to continue to develop her mentoring skills with Undergraduate students in both the classroom and laboratory settings.
Andrea Knowlton is a doctoral candidate in the laboratory of Dr. Scott Grieshaber in the Department of Oral Biology. Her work focuses on the pathogenesis of the obligate intracellular bacteria Chlamydia trachomatis. Chlamydia has been epidemiologically linked to cervical cancer, and Andrea’s investigation has shown chlamydial infection induces detrimental cellular defects that are likely to contribute to the development of cervical cancer. Andrea received the UF-HHMI Graduate Student Award for her research with undergraduate student Rahul Patel. Andrea has mentored Rahul for the past five years and his time in the lab has resulted in a co-authored publication entitled “Chlamydia trachomatis infection causes mitotic spindle pole defects independently from its effects on centrosome amplification”, as well as an invitation to present his research at the 2011 Meeting of the Chlamydia Basic Research Society, in California. Andrea is currently working with Rahul on second publication to be submitted in the next few months. Andrea enjoys spending time with students and teaching them how to use the lab’s confocal microscope.

Cory Krediet is a Ph.D. candidate in Interdisciplinary Ecology in the School of Natural Resources and Environment (SNRE) under the mentorship of Dr. Max Teplitski. His dissertation research focuses on mechanisms that pathogenic bacteria use to infect corals and their interactions with native coral-associated bacteria. Cory’s research is primarily lab-based, but he conducts fieldwork and sample collection on coral reefs in the Florida Keys and in Belize. Cory collaborated with undergraduate Ali Alagely, a UF-CALS University Scholar, to study potential interference of virulence traits in coral pathogens by native coral bacteria. The article, entitled “Utilization of mucus from the coral Acropora palmata by environmental and pathogenic isolates of Serratia marcescens,” was published in the Journal of Applied Environmental Microbiology. Their work also resulted in an article, entitled “Signaling-mediated cross-talk modulates swarming and biofilm formation in a coral pathogen Serratia marcescens,” published in the International Society for Microbial Ecology (ISME) Journal. This was the first description of coral-associated bacteria slowing down or inhibiting the progression of disease in a polyp model. Cory’s research aims to understand how native coral bacteria interact with coral pathogens and how these behaviors can be harnessed to limit the success of invading pathogenic bacteria.
Mike Parent

Mike Parent is a PhD candidate in the Counseling Psychology program in the Department of Psychology. He received his BA from the University of Manitoba. At UF, with the mentorship of his adviser, Dr. Bonnie Moradi, his research focuses on intersections of gender, sexuality, and behavioral health. He received his HHMI award for his mentorship of Matthew S. Michaels, an undergraduate student in psychology. Mike supervised Matthew’s senior thesis, and experimental investigation of the impact of objectified images of men across heterosexual and non-heterosexual men; this thesis has been accepted for publication in Psychology of Men and Masculinity. As well, Matthew was an author paper Mike recently published in the Journal of Counseling Psychology on men’s gender role conformity and HIV testing, which can inform advertising and public health campaigns to encourage HIV testing among men who have sex with men. Mike’s mentee Matthew has been accepted to the PhD program in clinical psychology at FSU.

Hannah Vander Zanden

Hannah Vander Zanden is mentored by Karen Bjorndal and is finishing her PhD in the Department of Biology. Her research has focused on examining the foraging patterns in loggerhead and green sea turtles in the Atlantic Ocean and Greater Caribbean. She employs a chemical method to analyze tissue samples of turtles to identify the diet and habitat where the turtles forage. Nicole Frankel, an undergraduate student, worked with Hannah to determine if the chemical fingerprints of loggerhead hatchlings match those of their mothers. Working with loggerheads from Wassaw, Georgia, they found that samples of hatchlings can be used as a proxy for their mothers when females are missed on the nesting beach. This study, published in Endangered Species Research, can aid in understanding the foraging habits of this threatened species.