
Summer
Research
Symposium
2011



ALLEGHENY
COLLEGE

Summer Research Symposium 2011 Student Poster Presentations

Engaging Community and Transforming Place: Arts-based Community Development

*Teresa Bensel, Paula Frisch, Emma Cook,
Adrienne Nelson, Amara Geffen*

Research Site: Allegheny College - Center for
Economic and Environmental Development

Mentor: Amara Geffen

Major/Minor of first author: Art and Technology

Funding: National Endowment for the Humanities
Fund

Building Better Drugs: Developing HDAC Inhibitors with Higher Efficacy for Expanding the Renal Progenitor Cell Field

*Amy Biery, Natasha Goldberg, Lisa Antoszewski,
Lee McDermott, Neil Hukriede*

Research Site: University of Pittsburgh School of
Medicine

Mentor: Neil Hukriede

Major/Minor of first author: Biology/Dance and
Movement Studies

Funding: National Institutes of Health

Modeling the Channel Flow of Granular Materials

*Tamás Börzsönyi, Andrew Jockers,
Balazs Szabo, David Statman*

Research Site: Budapest, Hungary

Mentor: David Statman

Major/Minor of presenter: Physics Minor/Religious
Studies

Funding: National Science Foundation/International
Research Experience for Students

The Role of mTOR in Central Angiotensin Signaling

*Ryan C. Brindle, Ly Q. Hung-Brown,
Charles Lang, Sean D. Stocker*

Research Site: Pennsylvania State University Hershey
Medical Center

Mentor: Sean D. Stocker

Majors of first author: Neuroscience and Psychology

Funding: American Heart Association

Tumor Draining Lymph Node Culture Methods for Adoptive Immunotherapy

*Kevin Caja, Anthony Visioni, Hallie Graor,
Mei Zhang, Julian Kim Novel*

Research Site: University Hospitals Case Medical Center

Mentor: Julian Kim

Major/Minor of first author: Biology/Psychology

Funding: National Institutes of Health

Integrated Aquaculture Agriculture (IAA) Waste Management for Sustainable Development in Bosnia and Herzegovina

Erin Cavagnero and Thomas Eatmon

Research Site: Raup Fisheries; Conneautville, PA

Mentor: Thomas Eatmon

Major/Minor of first author: Environmental Science/
Economics

Funding: Keystone Innovation Zone Fund

Characterization/Isolation of lignocellulose- degrading microorganisms from South Dakota's Homestake Mine

Colleen Friel and Bruce Bleakley

Research Site: South Dakota State University

Mentor: Bruce Bleakley

Major/Minor of first author: Biochemistry Economics

Funding: National Science Foundation

The Roles of Two *Dictyostelium* Protein Homologues in Cell-Type Proportioning

Elizabeth M. Frick, Kristy. J. McGough, Chelsea L. DiNinno, Rebecca J. Beichner, and Margaret K. Nelson

Research Site: Allegheny College

Mentor: Margaret Nelson

Major/Minor of first author: Biology/History

Funding: Shanbrom Fund

Quantification of cholinergic inputs onto neurochemically defined hippocampal interneuron subpopulations

Tavita Garrett, Vaishali Satpute, Emily Stone, Ben Holloway, Josh Lawrence

Research Site: University of Montana

Mentor: Josh Lawrence

Majors of first author: Neuroscience and Psychology

Funding: National Institutes of Health

Quantifying Windthrow within Riparian Buffers Adjacent to Alearcuts on Proximal and Distal Moraine Outwash Soils in the Yakutat Forelands, AK

Ted Koller, Ben Heermans, Bill Lucey, Denise Wiltse, Rich Bowden

Research Site: Yakutat Forelands, Alaska

Mentor: Rich Bowden

Major/Minor of first author: Environmental Science/
Religious Studies

Funding: United States Fish and Wildlife Service

Fungal Endophyte-Grass Interactions in a Restored Meadow

Gabrielle Lamoreaux, Andrew Allstadt

Research Site: Blandy Experimental Farm, Boyce, VA

Mentor: Andrew Allstadt

Major/Minor of first author: Biology/Art and Art History

Funding: National Science Foundation

Team Centegheny: Fighting Fires with Robotics and Parallel Programming

*Kathryn P. Hardey, Molly L. Mattis, Mark H. Goadrich,
Matthew C. Jadud*

Research Sites: Allegheny College and Centenary College of Louisiana

Mentor: Matthew C. Jadud (Allegheny) and Mark H. Goadrich (Centenary)

Major/Minor of presenter: Computer/Economics

Funding: National Science Foundation

Jumping Kinematics in the Plethodontidae: Performance, Morphological Variables, and Tail Loss Effect

Anthony Hessel, William Ryerson, Lisa Whitenack

Research Site: Allegheny College

Mentor: Lisa Whitenack

Major/Minor of first author: Biology/Political Science and History

Funding: Christine Scott Nelson Faculty Support Fund

Does the spvB virulence plasmid exclude other large plasmids in *Salmonella enterica*?

Erin Nawrocki, Mopelola Oluwadare, John Maurer

Research Site: University of Georgia

Mentor: John Maurer

Major/Minor of first author: Biology/American Studies

Funding: National Science Foundation

Water on a Hydrophobic Surface

Caitlyn Neidig, Vivien Zhou, Ryan Scruggs, Adele Poynor

Research Site: Allegheny College

Mentor: Adele Poynor

Major/Minor of first author: Physics/Writing

Funding: Richard Cook and Teresa Lahti Research Fund, Shanbrom Fund, and Louis Jefferson Long Fund

The Culture of Railfanning

Nicholas Ozorak, Darren Miller

Research Sites: Western Pennsylvania, Eastern Ohio, Rock Island Illinois

Mentor: Darren Miller

Major/Minor of first author: Communication Arts/
Psychology

Funding: National Endowment for the Humanities
Fund

Testing the Effects of Detritivore Density on Nutrient Release in Montaigne Ponds

Marieke Perchik, Scott Wissinger

Research Site: Rocky Mountain Biological Laboratory

Mentor: Scott Wissinger

Major/Minor of first author: Environmental Science/
English

Funding: Shanbrom Fund and ACCEL

A Comparison of Commercial Aquaponics Facilities Across the US Rustbelt

Elyse Schmitt and Thomas Eatmon

Research Sites: Meadville, Chicago, Milwaukee

Mentor: Thomas Eatmon

Major/Minor of first author: Environmental Studies/
Economics and Communication Arts

Funding: Northwest PA College Business Plan
Competition and Andrew W. Mellon Foundation

The Art of Evolution and the Evolution of Art

Patricia Kobak, Robert Roos

Research Site: Allegheny College

Mentor: Robert Roos

Major and Minor of first author: undecided

Funding: Shanbrom Fund

Light Emitting Diodes (LEDs) as Energy Efficient Alternatives for Indoor Aquaponic Systems

David Schuster, Edin Nikovic, Thomas Eatmon

Research Site: Raup Fisheries; Conneautville, PA

Mentor: Thomas Eatmon

Major/Minor of first author: Environmental Studies/
Communications Arts

Funding: Keystone Innovation Zone Fund

Preliminary Assessment of the Genetic diversity of Carp at the Pymatuning Spillway

Samantha L. Tucker, Kristen M. Webb

Research Site: Allegheny College

Mentor: Kristen M. Webb

Major/Minor of first author: Biology/Psychology

Funding: Keystone Innovation Zone Fund

The Stages and Rate of Salamander Forelimb Regeneration: Establishing a Timeline

Cathrine E. Youngs, Lisa Whitnack

Research Site: Allegheny College

Mentor: Lisa Whitenack

Major/Minor of first author: Biology/History and
Psychology

Funding: Shanbrom Fund

Did You Know?

75 students conducted research on the Allegheny College campus during the Summer of 2011.
