ANDREW M. SACKMAN

Washington and Lee University
204 W. Washington Street
Lexington, VA 24450

Cell: 727-656-9503
asackman@wlu.edu
andrewsackman.wordpress.com

EDUCATION

Florida State University, Tallahassee, FL
Ph.D., Ecology and Evolution, Department of Biological Science
Advisor: Darin R. Rokyta
August 2010 – May 2017

Washington and Lee University, Lexington, VA
B.S., Biology
Advisors: John Knox and David Marsh
August 2006 – May 2010

APPOINTMENTS

Visiting Assistant Professor, Department of Biology, Washington and Lee University, July 2019 – present.

Postdoctoral Research Associate, Jeffrey Jensen Lab, Center for Evolution and Medicine, Arizona State University, 2017 – 2019

Development and implementation of population genetic inference for time-series population genomic data in influenza and HCMV.

Adjunct Faculty, Biological Sciences Division, Chandler Gilbert Community College, Spring, 2018

Instructor of record for BIO 181, General Biology I with lab.

Graduate Research Assistant, Darin R. Rokyta Lab, Department of Biological Science, Florida State University, 2013 – 2017

Epistasis, pleiotropy, and the genetics of adaptation studied through experimental evolution of bacteriophages.

Graduate Teaching Assistant, Department of Biological Science, Florida State University, 2010 – 2013

Designed and delivered lectures, led lab exercises for eight sections of Animal Diversity Lab courses; Assisted in writing exams, organized help sessions, guest lectured for two Evolution courses.

R. E. Lee Summer Undergraduate Research Assistant, Department of Biology, Washington and Lee University, 2009

Population genetics of *Plethodon sherando.*

COURSES TAUGHT

BIOL 187**,** Introduction to Data Science in Python, Washington and Lee University, Winter 2020.

BIOL 201, Statistics for Biology and Medicine, Washington and Lee University, Fall 2019, Winter 2020.

BIO 181, General Biology I (with lab), Chandler Gilbert Communty College, Spring 2018.

BSC 2011L, Animal Diversity Lab, Florida State University, Fall 2010, Fall 2011, Fall 2012, Spring 2013. (Teaching assistant).

PCB 4674, Evolution, Florida State University, Spring, Summer 2012. (Teaching assistant).

UNDERGRADS MENTORED

Danielle Reed, Anneliese Morrison, Jessica Pierce, Jeremy Anisman, Stephanie Sanderbeck, Cayla Newman, Diana Lacatusu, Hunter Hamilton, Brooks Johnson, Ellen Lovelace, Kellen Riall.

TRAINING & PARTICIPATION

Howard Hughes Medical Institute SEA-PHAGES Workshop, 2019.

Mudd Center for Ethics Faculty Fellow, Washington & Lee, 2019—2020.

Genetics Society of America Peer Review Training Program, 2018.

Arizona Computing Postdoc Best Practices Fellow, 2017—2018.

PUBLICATIONS

Sackman AM, Rokyta DR. 2019. No cost of complexity in bacteriophages adapting to a complex environment. *Genetics,* 212 (1): 267-276. (Corresponding author, article selected as issue highlight).

Sackman AM, Harris RB, Jensen JD. 2019. Inferring demography and selection in organisms characterized by skewed offspring distributions. *Genetics* 211(3): 1019-1028. (Corresponding author).

Harris RB(*), Sackman AM(*), Jensen JD. 2018. On the unfounded enthusiasm for soft selective sweeps II: exmaining recent evidence from humans, flies, and viruses. *PLoS Genetics* 14(12): e1007859. (*) Co-first authors

Sackman AM, Rokyta DR. 2018. Additive phenotypes underlie epistasis of fitness effects. *Genetics* 208(1): 339-348.

Sackman AM, Pfeifer SP, Kowalik TF, Jensen JD. 2018. On the demographic and selective forces shaping patterns of human cytomegalovirus variation within hosts. *Pathogens* 7(1): 16.

Sackman AM, McGee LW, Pierce J, Anisman J, Sanderbeck S, Newman C, Rokyta DR. 2017. Mutation driven parallel evolution during viral adaptation. *Molecular Biology and Evolution* 34(12): 3243-3253.

McGee LW, Sackman AM, Morrison AJ, Pierce J, Anisman J, Rokyta DR. 2016. Synergistic pleiotropy overrides the costs of complexity in viral adaptation. *Genetics* 202:285-295.

Sackman AM, Rokyta DR. 2015. Intergenic incompatiblities reduce fitness in closely related bacteriophages. *PeerJ* 3: e1320.

Sackman AM, Rokyta DR. 2014. The adaptive potential of hybridization demonstrated with bacteriophages. *Journal of Molecular Evolution* 77: 221-230.

Bayer CSO, Sackman AM, Bezold K, Cabe PR, Marsh DM. 2012. Conservation genetics of an endemic mountaintop salamander with an extremely limited range. *Conservation Genetics* 13: 443-454.

PRESENTATIONS

Society for Molecular Biology and Evolution Annual Meeting, Manchester, UK. Population genetic inference in populations with skewed progeny distributions, 2019. (Poster)

AZ PopGroup Meeting of Arizona Population Genetics Groups Fall Meeting: MMC-ABC: Inference of population genetic paramters from time-sampled polymorphism data under sweepstakes reproduction, 2018. (Talk)

Society for Molecular Biology and Evolution Annual Meeting, Yokohama, Japan. MMC-ABC: Inference of population genetic paramters from time-sampled polymorphism data under sweepstakes reproduction, 2018. (Talk)

Viroholics Virology Seminar Series, Arizona State University, Tempe, AZ: The genetics of adaptation in Microvirid bacteriophages, 2018. (Invited talk)

AZ PopGroup Meeting of Arizona Population Genetics Groups Spring Meeting: Additive Phenotypes underly epistasis of fitness effects, 2018. (Talk)

Clinically Relevant Populations Genetics Workshop at Arizona State University: Mutation-Driven Parallel Evolution in Viruses, 2017. (Contributed talk)

Ecology and Evolution Seminar Series, Department of Biological Science at Florida State University, Tallahassee, FL: The genetics of adaptation of ssDNA viruses, 2017. (Talk)

Department of Biology at Washington and Lee University, Lexington, VA: The genetics of adaptation: Evolutionary constraints imposed by epistasis and pleiotropy, 2016. (Invited talk)

Society for the Study of Evolution annual meeting, Austin TX: The evolutionary consequences of pleiotropy in bacteriophages under thermal stress, 2016. (Talk)

Natural Sciences Graduate Symposium, Florida State University, Tallahassee, FL. The adaptive potential of hybridization demonstrated with bacteriophages, 2014. (Talk)

Society for the Study of Evolution annual meetings, Raleigh, NC: The adaptive potential of hybridization demonstrated with bacteriophages, 2014. (Talk)

Southeastern Ecology and Evolution Conference, University of Central Florida, Orlando, FL: The adaptive potential of hybridization demonstrated with bacteriophages, 2013. (Talk)

Gordon Research Conference in Microbial Population Biology, Andover, NH: Evolution in reverse: Dehybridizing ssDNA bacteriophages, 2011. (Poster)

MANUSCRIPT REVIEW

Genetics
Virology
Journal of Molecular Evolution
PeerJ

REFERENCES

Dr. Darin Rokyta
Associate Professor
Department of Biological Science
Florida State University
Office: 850-645-8812
drokyta@bio.fsu.edu

Dr. Jeffrey Jensen
Professor
School of Life Sciences
Center for Evolution and Medicine
Arizona State University
jeffrey.d.jensen@asu.edu

Dr. Susanne Pfeifer
Assistant Professor
School of Life Sciences
Center for Mechanisms of Evolution
Arizona State University
Office: 480-965-4027
Susanne.Pfeifer@asu.edu