

Lathiena A. Manning

Mark Peifer Laboratory

Department of Biological Sciences

University of North Carolina at Chapel Hill, 521 Fordham Hall Chapel Hill, NC 27599

(302)740-0531* lmanning@unc.edu

EDUCATION

University of Maryland Baltimore County (UMBC)

Ph.D., Developmental Biology

Baltimore, MD

May 2015

Bowie State University

B.S., Biological Sciences

Bowie, MD

May 2004

RESEARCH EXPERIENCE

Postdoctoral Fellow

University of North Carolina at Chapel Hill

Postdoctoral research advisor: Dr. Mark Peifer

Characterizing *Drosophila* Canoe regulation of cell shape changes and its interactions between the actomyosin contractile forces during dorsal closure

Chapel Hill, NC

June 2015-Present

Doctoral Research

University of Maryland Baltimore County (UMBC)

Graduate research advisor: Dr. Michelle Starz-Gaiano

Establishing the influence of tissue architecture on cell fate decisions and cell migration dynamics in *Drosophila* egg development

Baltimore, MD

Jan 2009- May 2015

PUBLICATIONS

LA. Manning and M. Starz-Gaiano. Upright Imaging of *Drosophila* Egg Chambers. *J Vis Exp*. 2015 Mar 13;(97). doi: 10.3791/52636.

LA. Manning, AM .Weideman, B. Moiz, B. Percy and M. Starz-Gaiano. Tissue landscape alters adjacent cell fates during *Drosophila* egg development. *Nat Commun*. 2015 Jun 17;6:7356. doi: 10.1038/ncomms8356

LA. Manning and M. Starz-Gaiano. Culturing *Drosophila* Egg Chambers and Investigating Developmental Processes through Live Imaging. *Methods Mol Biol*. 2015;1328:73-88. doi: 10.1007/978-1-4939-2851-4_5

DP. Stonko, **LA. Manning**, M. Starz-Gaiano, B. Percy. A mathematical model of collective cell migration in a three-dimensional, heterogenous environment. *PLoS One*. 2015 Apr 13;10(4):e0122799. doi: 10.1371/journal.pone.0122799. eCollection 2015

CONFERENCE AND PLATFORM PRESENTATIONS

Manning , L.A., Weidman, A.M., Moiz, B., Percy, B., Starz-Gaiano, M. *Asymmetric response to a morphogen specifying motile cells in Drosophila* . American Society for Cell Biology Annual Meeting, New Orleans LA, December 2013

POSTER PRESENTATIONS

Manning , L.A., Starz-Gaiano, M. *Spatial activation of cell motility in Drosophila oogenesis*. 2013 Mid-Atlantic Society for Developmental Biology Annual Meeting, Williamsburg VA, April 2013

Manning , L.A., Starz-Gaiano, M. *A novel calcyphosine-like protein facilitates border cell migration during oogenesis*. 54th Annual *Drosophila* Research Conference, Washington DC, April 2013. 2013 Graduate Association of Biological Sciences Symposium, Baltimore MD, March 2013

Manning , L.A., Starz-Gaiano, M. *Characterization of a calcyphosine-like protein required for proper border cell migration during oogenesis*. 53rd Annual Drosophila Research Conference, Chicago IL, March 2012. 2012 Graduate Association of Biological Sciences Symposium, Baltimore MD, March 2012

Manning , L.A., Starz-Gaiano, M. *Molecular changes that enable cell rearrangement and detachment from the ovarian epithelium*. 52nd Annual Drosophila Research Conference, San Diego CA, March 2011

Manning , L.A., Starz-Gaiano, M. *Characterization of cell adhesion changes that promote detachment from the ovarian epithelium*. 2011 Graduate Association of Biological Sciences Symposium, Baltimore MD, March 2011

FELLOWSHIPS AND AWARDS

NIH Seeding Postdoctoral Innovators in Research and Education (SPIRE) Fellowship, August 2015-Present
 Graduate Assistants in Areas of National Need (GAANN) Fellowship, August 2013- May 2015
 IMSD Meyerhoff Graduate Fellowship, June 2008-May 2015

TEACHING EXPERIENCE

University of Maryland Baltimore County (UMBC)

Baltimore, MD

Teaching assistant - Developmental Biology Laboratory

Jan 2013-May 2013

Assist professor with supervision of laboratory projects. Lead weekly laboratory sections and lectured on Drosophila oogenesis. Mentored a group of four undergraduate students on an independent project on cell adhesion's role in collective cell migration

Jan 2014-Present

Teaching assistant - Cell Biology (Lecture)

Aug 2013-Dec 2013

Designed weekly quizzes and problem sets for the discussion section of the lecture course. Led review sessions for each lecture exam.

Teaching assistant - Molecular and General Genetics Laboratory

Jan 2010- May 2012

Led weekly laboratory sections and lectured on the background information necessary to complete procedure. Created weekly quizzes.

Teaching assistant - Cell Biology Laboratory

Aug 2009- Dec 2009

Led weekly laboratory sections and lectured on the background information necessary to complete procedure. Created weekly quizzes.

Bowie State University

Bowie, MD

Adjunct Professor - Introduction to Biology

June 2005-Aug 2005

Taught and planned all lessons of Biology topics for the Science Engineering and Mathematics (SEM) Summer Academy. The SEM Summer Academy program is tailored to increasing retention of minority students majoring in STEM fields. Students take their introductory class for their major the summer prior to matriculating in the fall.

St. Elizabeth High School Wilmington, DE

Teacher - Biology

Taught and planned all lessons of Biology topics for 10th grade students using interactive lessons and activities. Utilized many student-centered learning techniques, including demonstrations, molecular model building, and weekly discovery labs. Designed semester long research projects to connect biological concepts learned in class to human disease.

Wilmington, DE

June 2004-June 2005

PROFESSIONAL DEVELOPMENT

UMBC's Department of Biological Sciences Teaching Circle: Monthly meetings to discuss teaching strategies, pedagogy and issues faced with teaching at the undergraduate level.

UMBC Promise AGEP Professor in Training (PROF-it) Workshops: Training program with monthly workshops tailored to prepare graduate students to enter academia and learn hands on teaching skills. Most recent workshops include but not limited to:

- Writing a teaching philosophy
- How to deal with the difficulties of teaching
- Course development and design
- Developing a syllabus

PROFESSIONAL AFFILIATIONS

American Society for Cell Biology (ASCB) Society of Developmental Biology (SDB)
Genetics Society of America (GSA)
Graduate Association of Biological Sciences
Graduate Chapter of Women in Science and Engineering (GWISE)