Dr. Ross A. Chiquet

University of Louisiana at Lafayette Department of Mathematics Lafayette, LA 70504-1010

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Education

Ph.D. in Mathematics	December 2009
University of Louisiana, Lafayette	December 2009
Advisor: Azmy Ackleh	
M.S. in Mathematics	May 2002
University of Nebraska, Lincoln	
B.S. in Mathematics	December 1999
Northwestern State University	
Professional Experience	
Assistant Department Head	Aug. 2013 – present
Department of Mathematics	
University of Louisiana, Lafayette	
Assistant Professor of Practice	Jan. 2016 – present
Department of Mathematics	
University of Louisiana, Lafayette	
Acting Department Head	Summer 2012, 2013, 201
Department of Mathematics	2016, 2018
University of Louisiana, Lafayette	
Director of Freshman Mathematics	Aug. 2011 – Aug. 2013
Department of Mathematics	
University of Louisiana, Lafayette	
Master Instructor of Mathematics	Jan. 2012 – Jan. 2016
Department of Mathematics	
University of Louisiana, Lafayette	
Instructor of Mathematics	Aug. 2003 – Jan. 2012
Department of Mathematics	
University of Louisiana, Lafayette	
Instructor of Mathematics	Aug. 2002 – Aug. 2003
Department of Mathematics	
Nicholls State University	
Research Assistant	Summer 2001, 2002
Department of Mathematics	
University of Nebraska, Lincoln	

Graduate Teaching Assistant

Department of Mathematics University of Nebraska, Lincoln Aug. 2000 – May 2002

Courses Taught

Developmental Mathematics, College Alebra, Finite Mathematics, Technical Mathematics, Trigonometry, Precalculus, Business Calculus, Calculus I, II, and III, Differential Equations, Foundations of Mathematics, Linear Algebra, Advanced Calculus, Advanced Differential Equations, Undergraduate Research

Advisor Positions

Faculty Advisor UL Math Society University of Louisiana, Lafayette	Aug. 2012 – present
Faculty Advisor for mathematics majors Department of Mathematics University of Louisiana, Lafayette	May 2012 – present
Undergraduate Research Advisor and Honors Thesis Advisor (Chair) Student: Logan Perry University of Louisiana, Lafayette	Aug. 2011 – May 2013
Mentor for LS-LAMP program Student: Brandy Thibodeaux University of Louisiana, Lafayette	Aug. 2010 – May 2013
Undergraduate Research Advisor Department of Mathematics University of Louisiana, Lafayette	June 2010 – present
Research Advisor for the Biomathematics Program	Summer 2010
Faculty Advisor Sigma Alpha Lambda Honor Society University of Louisiana, Lafayette	Aug. 2007 – present
Faculty Advisor Ragin' Cajun Hockey Club Team University of Louisiana, Lafayette	Nov. 2007 – present

Refereed Publications

Sensitivity analysis of the recovery time for a population under the impact of an environment disturbance (with A. S. Ackleh, H. Caswell, A. Veprauskas, and T. Tang), *Natural Resource Modeling*, (2018): e12166.

Modeling as a complementary tool to acoustic data for understanding the impact of environmental disasters on marine mammals (with A. S. Ackleh, H. Caswell, A. Veprauskas, T. Tang, H. Caswell, N. Sidorovskaia and B. Ma), *The Journal of the Acoustical Society of America*, **142** (2017), 2533.

Analysis of lethal and sublethal impacts of environmental disasters on sperm whales using stochastic modeling (with Ackleh A.S., Ma B, Tang T, Caswell H, Veprauskas A, Sidorovskaia N), Ecotoxicology, 2017 May 12. doi: 10.1007/s10646-017-1813-4.

Picard's Iterative Method for Caputo Fractional Differential Equations with Numerical Results, (with R. Lyons (grad student) and A.S. Vatsala), Mathematics, **2017**, 5, 65; doi:10.3390/math5040065.

A Matrix Population Model of Beaked Whales (with Tyler Montgomery, Baoling Ma, and Azmy S. Ackleh), *Neural, Parallel and Scientific Computations*, **23** (2015) 179-192.

Approximate Solutions of Abel's Equation using Rational Inversion of the Laplace Transform (with Patricio Jara, and Kevin W. Zitio), Neural, Parallel, and Scientific Computations, 23 (2015) 169-178.

Chaos in a Two-stage Discrete Model with Strong Nonlinearities (with L. Perry), *Dynamic Systems and Applications*, **23** (2014), 619-634.

Demographic Analysis of Sperm Whales Using Matrix Population Models (with B. Ma, A.S. Ackleh, N. Pal, and N. Sidorovskaia), *Ecological Modeling*, **248** (2013), 71-79.

A Discrete Dispersal Model with Constant and Periodic Environments (with A.S. Ackleh and P. Zhang), *Journal of Biological Dynamics*, **5** (2011), 563-578.

Competitive Exclusion in a Discrete Juvenile-Adult Model with Continuous and Seasonal Reproduction (with A.S. Ackleh), *Journal of Difference Equations and Applications*, 17 (2011), 955-975.

The Global Dynamics of a Discrete Juvenile-Adult Model with Continuous and Seasonal Reproduction (with A.S. Ackleh), *Journal of Biological Dynamics*, 3(2009), 101-115.

Referee Activities

Referee for the Journal of Mathematical Biology, Methods in Ecology and Evolution, and Endangered Species Research, Bulletin of Mathematical Biology, Mathematical Biosciences and Engineering journals and also for the USGS.

Conference Presentations

Invited Speaker January 2017
Analysis of Lethal and Sublethal Impacts of Environmental Disasters on Sperm Whales
Using Stochastic Modeling
AMS MAA Joint meetings, Atlanta, GA

Invited Speaker Sept. 2016

Assessing the Impact of Environmental Disasters on Population Dynamics Using Stochastic Matrix Models

Gulf of Mexico Oil Spill Conference, Tampa, FL

Speaker Feb. 2016

Accessing the Impact of Environmental Disasters on Population Dynamics Using Stochastic Matrix Models

LA/MS Regional MAA Meeting, Louisiana State University, Shreveport

Invited Speaker May 2015

Demographic Analysis Of Sperm Whales Using Deterministic And Stochastic Models

Seventh International Conference on Dynamic Systems and Applications, Atlanta, GA

Invited Speaker May 2015

Coexistence and Competitive Exclusion in a Discrete Juvenile-Adult Model

9th International Conference on Differential Equations and Dynamical Systems

Invited Speaker Jan. 2015

Chaos in a Two-Stage Discrete Model with Periodic Birthrates

Joint Mathematics Meetings, San Antonio, Texas

Speaker March 2014

Chaos and Persistence in a Two Stage Ecological Model LA/MS Regional MAA Meeting, Louisiana State University

Invited Speaker March 2013

Chaos in a Two-stage Ecological Model

New Trends in Differential and Difference Equations, University of Tennessee at Chattanooga

Speaker March 2013

Coexistence and Competitive Exclusion in a Discrete Juvenile-Adult Model LA/MS Regional MAA Meeting, University of Southern Mississippi

Speaker January 2012

Demographic Analysis of Sperm Whales Using Matrix Population Models LA/MS Regional MAA Meeting, Northwestern State University

Invited Speaker October 2011

Competitive Exclusion in a Discrete Juvenile-Adult Model

3rd International Conference on Math Modeling & Analysis, San Antonio, Texas.

Invited Speaker May 2011

Competitive Exclusion in a Discrete Juvenile-Adult Model

6th International conference on Dynamic Systems and Applications, Morehouse College

Speaker January 2011

Competitive Exclusion in a Discrete Juvenile-Adult Model with Continuous and Seasonal Reproduction AMS MAA Joint meetings, New Orleans, LA

Speaker March 2010

Competitive Exclusion in a Discrete Juvenile-Adult Model with Continuous and Seasonal Reproduction LA/MS Regional MAA Meeting, Southeastern State University

Speaker March 2009

Mathematics Department and University Service

Departmental Committees Served: College Algebra, High School Relations, Placement and Testing, Newsletter, Sophomore Mathematics, Rhodes Outstanding Teaching Award, Building and Facilities, Calculus, English Proficiency, Exam Booklet, Precalculus, Assessment, Scholarships

Departmental Committees Chaired: College Algebra, Placement and Testing, Exam Booklet, Precalculus, Assessment, Calculus, Scholarships

Appointed and server on the Universty Assessment Council 2014-present

Appointed and server on the Distance Learning Leadership Council 2014-present

Admissions by Committee committee 2011-pressent

Scholarships Appeals committee 2012-present

Honors Scholarships committee 2012-present

General Education Committee for the University.

Served on the Science Fair Committee from 2004-2011, director from 2009-2011

University Committee on Retention, Freshman Subcommittee

Judge for the Regional Science Fair from 2004-present

Monitor for the Literary Rally from 2004-2007

Dean's committee to develop and implement the new University 100 and 200 classes for the College of Sciences

Graduate student teaching mentor and advisor 2011-2013

Coordinate the Math Tutoring Lab 2011-2013

Awards and Honors

Outstanding University Advisor Award March 2016

Dr. Ray P. Authement Excellence in Teaching Award for the university April 2015

Ray P. Authement College of Sciences Outstanding Teacher Award, March 2014

Summer Research Fellowship, University of Nebraska, Lincoln, May 2002, May 2001

Teaching Assistantship, University of Nebraska, Lincoln, Aug 2000

References

Dr. Azmy Ackleh Ph.D. Advsior

Dean of the College of Science University of Louisiana at Lafayette

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Dr. Keng Deng

Professor

Department of Mathematics

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