University of Puerto Rico-Cayey

Numerical Analysis
Abstract Algebra I
Abstract Algebra II
Complex Analysis (Capstone)
Calculus I
Precalculus
College Algebra
Remedial Mathematics

DEPARTAMENTAL SERVICE

University of South Florida

Calculus I coordinator, 2017

University of Puerto Rico-R o Piedras

Member of the Advisory Committee, 2015
Developer of the Business Calculus Laboratory on MyMathLab (Pearson), 2015
Advanced Calculus for Business students Syllabus Reviewer, 2014

University of Puerto Rico-Cayey

Numerical Analysis Syllabus Reviewer, 2013
College Algebra and Precalculus Coordinator, 2012-2013
Professional Development Committee, 2010-2013
Mathematics Week Committee, 2010-2013
Organizing Committee of the 2013 Calculus Olympiad, exam writer and corrector
Organizing Committee of the 2012 Calculus Olympiad, corrector
Organizing Committee of the 2011 Pre-calculus Olympiad, exam writer and corrector

EXTRACURRICULAR UNIVERSITY SERVICE

University of Puerto Rico-R o Piedras FOPI (Fondos Para la Investigacion) proposal reviewer, 2014

University of Puerto Rico-Cayey Mathematics Circle Mentor, 2010-2013
Member of the Inter University Seminar on Mathematical Sciences Research Permanent Committee, 2013-2015

OTHER PROFESSIONAL EXPERIENCE

Member of the Puerto Rico College Board Committee of Examiners (PEAU), 2014-2015
Puerto Rico Department of Education educational workshop facilitator, 2012-2015

AWARDS

2011 Graduate Alliance for Education in Louisiana (GAELA) Dissertation Writing Fellowship
2009-2010 Experimental Program to Stimulate Competitive Research (EPSCoR-NSF) Research Assistant
2006-2007, 2008-2009 Graduate Teaching Assistant
2003-2005, 2007-2008 Vertical Integration of Research and Education (VIGRE-NSF) Fellowship
2003 The Graduate Alliance for Education in Louisiana (GAELA) Fellowship

INVITED TALKS

2012 Modeling Flows Across Permeable Membranes, University of Puerto Rico-R o Piedras
2011 Stokes Flow Across Permeable Membranes, XXVI Inter University Seminar on Mathematical Sciences Research (SIDIM). Humacao, PR
2010 A Method to Model Membrane Permeability, Society for Industrial and Applied Mathematics (SIAM) Conference. Pittsburgh, PA

SKILLS AND INTERESTS

Research Interests

Applied Mathematics, Partial Di erential Equations, Scienti c Computation, Numerical Analysis, Computational Fluid Dynamics

Computer Languages

Beginner: Fortran, Python
Intermediate: R, C++ and Java

Other Programming Tools

Intermediate: Maple and Mathematica
Expert: LaTeX, Matlab and Scilab

LANGUAGES

Spanish (Native)
English (Fluent)