

Curriculum Vitae

PEYAM RYAN TABRIZIAN

Office Address: Department of Mathematics

University of California, Berkeley

970 Evans Hall Box 3840

Berkeley, CA 94720–3840

Date of Birth: September 29, 1987 (MA, USA)

Phone: (510) 229–7765

Email Address: peyam@math.berkeley.edu

Homepage: <http://math.berkeley.edu/~peyam>

Date of CV: October 2015

Education/Employment

2016 Ph.D. University of California, Berkeley, Mathematics (advisor: Lawrence C. Evans)

2010 A.B. University of California, Berkeley, Mathematics (Highest Honors in Mathematics)

2006 GED Lycée Français de New York, Baccalauréat Général Série Scientifique, Mention Très Bien avec Félicitations du Jury

Awards

2013 Teaching Effectiveness Award: ‘The advantages of rearranging the topics organized in a course’ (Graduate Student Teaching and Achievement Center, UC Berkeley)

2012 Outstanding Graduate Student Instructor Award (Graduate Student Teaching and Achievement Center, UC Berkeley)

2010 Dorothea Klumpke Roberts Undergraduate Prize (Berkeley Math Department)

Research interests

Partial Differential Equations, Calculus of Variations

Publications

2016 *Asymptotics for the Kramers-Smoluchowski Equation* (joint paper with Prof. Lawrence C. Evans, to appear in SIAM Journal of Analysis)

2016 *Asymptotic PDE Models for Chemical Reactions* (PhD Thesis, UC Berkeley)

Expository Papers

2010 *Shifts as Dynamical Systems* (under the supervision of Prof. Maciej Zworski, UC Berkeley)

2009 *Regularity of Weakly Harmonic Maps of Surfaces* (under the supervision of Prof. Daniel Tataru, UC Berkeley)

2008 *Homoclinic Orbits and Chaotic Behavior in Classical Mechanics* (under the supervision of Prof. Eric Séré, Ecole Polytechnique)

Seminar Talks

2015 Student PDE Seminar: Reaction-Diffusion and Propagation in Inhomogeneous Media

2015 Student PDE Seminar: Introduction to Degree Theory

2015 Student PDE Seminar: Periodic Solutions of the Forced Relativistic Pendulum

2014 Student PDE Seminar: PDE Models for Chemical Reactions and Diffusion Limits

2013 Student PDE Seminar: Chemical Reactions and Diffusions

2013 Student PDE Seminar: The De Giorgi-Moser-Nash Estimates

2012 Student PDE Seminar: Chemical Reactions and Diffusions

Conferences/Summer Schools attended (and Study Abroad)

2015 Jun. Eighth Summer School in Analysis and Applied Mathematics, Università di Roma, Rome, Italy

2015 Jun. Thirteenth Workshop on Interactions between Dynamical Systems and PDE, Universitat Politècnica de Catalunya, Barcelona, Spain

- 2014 Jun. CIME Summer School in Partial Differential Equations and Geometric Measure Theory, Cetraro, Italy
- 2013 May. CNA Summer School: Topics in Nonlinear PDEs and Calculus of Variations, and Applications in Material Science, Carnegie-Mellon University, Pittsburgh, PA, USA
- 2009 Jul. Princeton Summer Program in Analysis and Geometry, Princeton University, Princeton, NJ, USA
- 2008 Sep. Study abroad at the Ecole Polytechnique, Programme M1 en Mathématiques, Palaiseau, France

Courses taught at UC Berkeley

- 2016 Spring Teaching Workshop (Math 375, Main Instructor)
- 2015 Fall Teaching Workshop (Math 375, TA)
- 2015 Spring Linear Algebra and Differential Equations (Math 54, TA)
- 2014 Fall Linear Algebra and Differential Equations (Math 54, TA)
- 2013 Fall Calculus I (Math 1A, TA)
- 2013 Spring (Upper-Division) Linear Algebra (Math 110, TA)
- 2012 Summer Linear Algebra and Differential Equations (Math 54, Main Instructor)
- 2011 Fall Linear Algebra and Differential Equations (Math 54, TA)
- 2011 Summer Calculus I (Math 1A, Main Instructor)
- 2011 Spring Calculus I (Math 1A, TA)
- 2010 Fall Calculus I (Math 1A, TA)

Programming Skills

- MATLAB 1 year experience, took Math 128A (Undergraduate Numerical Analysis) and Math 228A (Numerical Solutions of Differential Equations) at UC Berkeley
- R 6 months-experience, took Stat 200B (Introduction to Statistics at an Advanced Level) at UC Berkeley
- Scheme (a dialect of LISP): 1 year experience, took CS 3 (Introduction to Symbolic Programming) and CS 61A (The Structure and Interpretation of Computer Programs) at UC Berkeley

Languages Spoken

- German (mother-tongue)
- Farsi (mother-tongue)
- French (native speaker)
- English (native speaker)
- Spanish (2 years-experience)
- Arabic (2 years-experience)

References

Lawrence C. Evans
Department of Mathematics
University of California, Berkeley
Berkeley, CA 94720-3840
evans@math.berkeley.edu

Fraydoun Rezakhanlou
Department of Mathematics
University of California, Berkeley
Berkeley, CA 94720-3840
rezakhan@math.berkeley.edu

Kenneth A. Ribet
Department of Mathematics
University of California, Berkeley
Berkeley, CA 94720-3840
ribet@math.berkeley.edu

Maciej Zworski
Department of Mathematics
University of California, Berkeley
Berkeley, CA 94720-3840
zworski@math.berkeley.edu