

Eden Prywes

Princeton University, Mathematics Department
304 Fine Hall - Washington Road
Princeton, NJ 085444

Email: eprywes@princeton.edu
Phone: 201.663.5448
Website: www.math.princeton.edu/~eprywes

Education

- University of California, Los Angeles** August 2013-June 2019
Ph.D. in Mathematics
Research Area: Analysis and Geometry
Advisor: Mario Bonk
- University of California, Los Angeles** June 2015
Master of Arts in Mathematics
- Columbia University, New York, NY** September 2009-June 2013
Bachelors of Arts with departmental honors in Mathematics, Concentration in Physics

Work Experience

- Princeton University** September 2020-Present
Postdoctoral Research Associate
- Princeton University** September 2019-September 2020
Simons Foundation Research Fellow
- University of California, Los Angeles** September 2013-June 2019
Teaching Assistant
- Columbia University Business School, New York, NY** Summer 2012
Summer Research Intern
- Columbia University Mathematics Department, New York, NY** September 2012-June 2013
Teaching Assistant
- Mathematics REU at Columbia University, New York, NY** Summer 2011
Researcher

Invited Conference Talks

- Special Session on Analysis in Metric Spaces, Joint Mathematics Meetings, 2022.
- Special Session on Non-Smooth Analysis and Geometry, AMS Spring Central Sectional Meeting, University of Cincinnati 2021.
- Simons Semester on Geometry and Analysis in Function and Mapping Theory, IMPAN, 2021
- Special Session on Topics at the Interface of Analysis and Geometry, AMS Spring Central and

- Western Joint Sectional Meeting, University of Hawaii 2019.
- Plenary Speaker, Rickman Memorial Conference, University of Helsinki 2018.
- New Developments in Complex Analysis and Function Theory, University of Heraklion 2018.
- Geometric Function Theory in Fluid Mechanics, University of Barcelona 2018.

Invited Seminar Talks

- Analysis and Geometric Analysis Seminar, Cornell University, 2022.
- Geometric Analysis and Topology Seminar, New York University, 2022.
- Analysis Seminar, Stony Brook University, 2022.
- Geometry and Topology Seminar, University of Waterloo, 2022.
- Joint Princeton and Rutgers Differential Geometry Seminar, 2021.
- Analysis Seminar, University of Tennessee, Knoxville, 2021.
- Quasiworld Seminar, University of California, Los Angeles, 2021.
- Analysis Seminar, Tel Aviv University, 2020.
- Simons Collaboration on Algorithms and Geometry, Simons Foundation, 2020.
- Simons Semester on Geometry and Analysis, IMPAN, 2019.
- Geometric Analysis Seminar, Rutgers University, 2019.
- Graduate Research Prize Presentation, University of California, Los Angeles, 2019.
- Differential Geometry and Geometric Analysis Seminar, Princeton 2019
- Analysis Seminar, Caltech 2018.
- Geometric Analysis and Topology Seminar, New York University 2018.
- Workshop on Analysis and Probability, University of Washington 2018.
- Analysis Seminar, University of Jyväskylä 2017.
- Workshop on Analysis and Probability, Montana State University 2017.
- Graduate Student Seminar, University of Helsinki 2017.
- Workshop on Complex Analysis and Probability, Montana State University 2016.
- Analysis Seminar, Aalto University 2015.
- Analysis Seminar, University of Helsinki 2015
- Workshop on Trees in Dynamics and Probability, Montana State University 2015.
- Various talks given at the UCLA analysis seminar 2014-2019.
 - Topics: *Isoperimetric Dimension, Orbifold Uniformization Theorem, Koebe's Continuity Method, Gaussian Free Field, Complex Dynamics, Rough Path Theory, Phases of SLE, Foliations on Riemann Surfaces, and Quasiregular Maps.*
- Presented Mathematics REU work at Joint Mathematics Meetings in Boston, MA, 2012.

Conferences and Meetings

- Mathematics Research Communities, Analysis in Metric Spaces, AMS 2021.
- AMS Spring Central Sectional Meeting, University of Cincinnati 2021.
- Latest in Geometric Analysis, Pekka Koskela 59th Birthday Conference, IMPAN, Bedlewo, 2019.
- AMS Spring Central and Western Joint Sectional Meeting, University of Hawaii 2019.

- Workshop on Complex Analysis and Probability, University of Washington, August 2018.
- Geometric Function Theory in Fluid Mechanics, University of Barcelona, July 2018.
- New Developments in Complex Analysis and Function Theory, University of Heraklion, July 2018.
- Rickman Memorial Conference, University of Helsinki, June 2018.
- Workshop on Complex Analysis and Probability, Montana State University, August 2017.
- New Trends on Analysis and Geometry in Metric Spaces, CIME-CIRM, June 2017.
- The 23rd Rolf Nevanlinna Colloquium, ETH Zürich, June 2017.
- Geometry in May, University of Helsinki, May 2017.
- Workshop on Complex Analysis and Probability, Montana State University, August 2016.
- Quasiweekend II, University of Helsinki, December 2015.
- Workshop on Complex Analysis and Probability, Montana State University, August 2015.
- Joint Mathematics Meetings, Boston, MA, 2012.

Teaching

Princeton University

2019–Present

Instructor for Mathematics and Astronomy, Single Variable Analysis with and Introduction to Proofs, Introduction to Real Analysis, Calculus II and Multivariable Calculus.

University of California, Los Angeles

2013-2019

Teaching Assistant for Single and Multivariable Calculus, Linear Algebra, Algebra, Analysis, Stochastic Processes, Probability, Differential Equations, Financial Mathematics and Complex Analysis.

2019

Graduate Student Instructor for Introduction to Discrete Mathematics

2018-2019

Directed Reading Program Mentor

Columbia University

2012-2013

Teaching Assistant for Complex Variables and Linear Algebra

Publications and Preprints

- *On the Moduli of Lipschitz Homology Classes* (joint work with Ilmari Kangasniemi), arXiv:2208.14517, (2022), submitted.
- *Quasiregular Curves of Small Distortion in Product Manifolds* (joint work with Susanna Hekkilä and Pekka Pankka), J. Geom. Anal. (To Appear), arXiv:2106.11871.
- *Quasiconformal Flows on non-Conformally Flat Spheres* (joint work with Sun-Yung Alice Chang and Paul Yang), Adv. Math., 404, (2022).
- *On the Schwartz Equivalence of Quasidisks and Other Planar Domains* (joint work with Ary Shaviv), Math. Z., 301, (2022), 3641-3669.

- *Open and Discrete Maps with Piecewise Linear Branch Set Images are Piecewise Linear Maps* (joint work with Rami Luisto), *J. London Math. Soc.*, 103, (2021), 1186-1207.
- *A Bound on the Cohomology of Quasiregularly Elliptic Manifolds*, *Ann. of Math. (2)*, 189 (2019), 863–883.
- *The Hodge Star Operator and the Beltrami Equation*, *Complex Anal. Synerg.*, 8, (2022).

Awards and Fellowships

- Pacific Journal of Mathematics Dissertation Prize, 2019.
- UCLA Mathematics Graduate Research Presentation Prize, 2019.
- National Science Foundation, Mathematical Sciences Postdoctoral Research Fellowship, 2019 (Declined).