

## JAYADEV SIDDHANTA ATHREYA

### PERSONAL INFORMATION

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**Citizenship:** USA

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### EMPLOYMENT

**August 2010-current:** Assistant Professor, University of Illinois, Department of Mathematics.

**August 2011-current:** Founder and Director, Illinois Geometry Lab.

**July 2008-July 2010:** Gibbs Instructor, Yale University, Department of Mathematics.

**July 2007-June 2008:** Instructor, Princeton University, Department of Mathematics.

**July 2006-June 2007:** Lecturer, Yale University, Department of Mathematics.

### DEGREES

**Ph.D:** Mathematics, University of Chicago, under Prof. Alex Eskin, June 2006.

**M.Sc:** Mathematics, University of Chicago, December 2001

**B.Sc:** Mathematics, Iowa State University, with Honors and Distinction, May 2000

### GRANTS AND AWARDS

**NSF CAREER Grant:** DMS 1351853, Summer 2014-Summer 2019, \$450,000.

**NSF PI grant:** DMS 1069153, Summer 2011- Summer 2014, \$149,702.

**Center for Advanced Study Fellowship:** University of Illinois, Spring 2013.

**Public Engagement Grant:** University of Illinois, Spring 2013 and Spring 2014.

**Interdisciplinary Innovation Initiative:** University of Illinois, with Shen Dillon, John Lambros and Ioannis Chasiotis, College of Engineering, 2012-13.

**N. Tenney Peck Teaching Award:** Department of Mathematics, University of Illinois, Spring 2012.

**Campus Research Board:** University of Illinois, Fall 2011-Spring 2012 and Spring-Fall 2014.

**NSF Postdoctoral Fellowship:** June 2006-June 2009. Grant number: DMS 0603636.

**London Mathematical Society:** Visiting Fellowship, May-June 2009.

## PUBLICATIONS

- Athreya, Jayadev S.; Cobeli, Cristian; Zaharescu, Alexandru. Radial density in Apollonian packings, to appear, *International Math Research Notices*.
- Athreya, Jayadev S.; Random Affine Lattices, to appear, *Contemporary Mathematics*.
- Athreya, Jayadev S.; Ghosh, Anish; Tseng, Jimmy. Spherical averages of Siegel transforms and spiraling of lattice approximations, to appear, *Journal of London Mathematical Society*.
- Athreya, Jayadev S.; Chaika, Jon; Lelievre, Samuel. Gap distribution for saddle connections in the golden L, to appear, *Contemporary Mathematics*.
- Athreya, Jayadev S.; Eskin, Alex; Zorich, Anton. Counting generalized Jenkins-Strebel differentials. *Geometriae Dedicata*, Volume 170, 195-217, 2014.
- Athreya, Jayadev S.; Gap distributions and homogeneous dynamics, to appear, *Proceedings of the ICM Satellite conference on Geometry, Topology, and Dynamics in Negative Curvature (London Mathematical Society Lecture Notes Series)*.
- Athreya, Jayadev S.; Paulin, Frederic. Logarithm laws for strong unstable foliations in negative curvature and non-Archimedean Diophantine approximation, *Groups, Geometry, and Dynamics*, Volume 8, Issue 2, 285-309, 2014.
- Athreya, Jayadev S.; Cheung, Yitwah. A Poincaré section for horocycle flow on the space of lattices, *International Math Research Notices*, Issue 10, 2643-2690, 2014.
- Athreya, Jayadev S.; Ghosh, Anish; Prasad, Amritanshu. Buildings, Extensions, and Volume Growth Entropy, *New York Journal of Mathematics*, Volume 19 (2013) 1-11.
- Athreya, Jayadev S.; Boshernitzan, Michael. Ergodic properties of compositions of Interval Exchange Maps and Rotations, *Nonlinearity* 26 (2013) 417-423.
- Athreya, Jayadev S.; Cusp excursions on parameter spaces, *Journal of London Math Society*, Volume 87, Issue 3, 741-765, 2013.
- Athreya, Jayadev S.; Chaika, Jon. The distribution of gaps for saddle connection directions, *Geometric and Functional Analysis*, Volume 22, Issue 6 (2012), 1491-1516.
- Athreya, Jayadev S.; Bufetov, Alexander; Eskin, Alex; Mirzakhani, Maryam. Lattice Point Asymptotics and Volume Growth on Teichmuller space, *Duke Math. J.* Volume 161, Number 6 (2012), 1055-1111.
- Athreya, Jayadev S.; Ghosh, Anish; Prasad, Amritanshu, Ultrametric Logarithm Laws II, *Monat. Math.*, Volume 167, Issue 3 (2012), Page 333-356
- Athreya, Jayadev S.; Margulis, Gregory. Logarithm laws for unipotent flows, I. *Journal of Modern Dynamics*, volume 3, Number 3 (2009), 359-378
- Athreya, Jayadev S.; Ghosh, Anish; Prasad, Amritanshu. Ultrametric Logarithm Laws I, *Discrete and Continuous Dynamical Systems-S*, v. 2, no. 2, 337-348, 2009.
- Athreya, Jayadev S. Logarithm laws and shrinking target properties, *Proceedings of Indian Academy of Sciences (Math. Sci.)*, Vol. 119, No. 4, September 2009, pp. 541-557.
- Athreya, Jayadev S.; Forni, Giovanni. Deviation for rational-angled billiards, *Duke Math. J.* Volume 144, Number 2 (2008), 285-319.
- Athreya, Jayadev S. Quantitative recurrence and large deviations for Teichmuller geodesic flow, *Geometriae Dedicata* (2006), v. 119, 121-140.
- Athreya, Jayadev S.; Sethuraman, Sunder. On the asymptotics of discrete order statistics. *Statist. Probab. Lett.* 54 (2001), no. 3, 243-249
- Athreya, Jayadev S.; Fidkowski, Lukasz M. Number theory, balls in boxes, and the asymptotic uniqueness of maximal discrete order statistics. *Integers* (2000), A3, 5 pp. (electronic).