Daniel Litt

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Current position

2015-   NSF Postdoctoral Fellow, Columbia University

Area of specialization

Algebraic Geometry

Education

2015   PhD in Mathematics, Stanford University
        Thesis advisor: Ravi Vakil
        Thesis title: Non-Abelian Lefschetz Hyperplane Theorems
2010   BA in Mathematics, Harvard University, Magna Cum Laude

Grants, honors & awards

2015-2018   NSF Mathematical Sciences Postdoctoral Research Fellowship, Columbia University
2013-2015   Achievement Rewards for College Scientists (ARCS) Fellowship
9-12/2014   Stanford-Princeton Exchange Scholar
7/2014   US Junior Oberwolfach Fellow, Classical Algebraic Geometry Workshop
2010-2013   NSF Graduate Research Fellowship

Articles & talks

Preprints

2016   Litt, Daniel, "Arithmetic Restrictions on Geometric Monodromy," (preprint available
        on the ArXiv: https://arxiv.org/abs/1607.05740).
2016   Lesieutre, John; Litt, Daniel, "Dynamical Mordell-Lang and Automorphisms of Blow-Ups,"

(submitted, preprint available on the ArXiv: https://arxiv.org/abs/1604.08216).

2015   Litt, Daniel, "Non-Abelian Lefschetz Hyperplane Theorems ," (submitted, preprint available on the ArXiv: http://arxiv.org/abs/1601.07914).

Accepted Articles

2016   Litt, Daniel, "Manifolds Containing an Ample $\mathbb{P}^1$-bundle," (accepted to Manuscripta Mathematica, preprint available on the ArXiv: http://arxiv.org/abs/1602.00716).

2014   Litt, Daniel, "Zeta Functions of Curves With No Rational Points," Michigan Math Journal (preprint available: http://arxiv.org/abs/1405.7380).

2013   Litt, Daniel, "Symmetric Powers Do Not Stabilize," published August 15, 2014 in Proceedings of the American Mathematical Society (preprint available: http://arxiv.org/abs/1209.4708).

2010   Abel, Zachary; Kominers, Scott; Litt, Daniel, "A Categorical Construction of Ultrafilters," Rocky Mountain J. Math. Volume 40, Number 5, 1611-1617.

Invited Talks

2016   Arithmetic Restrictions on Geometric Monodromy, Columbia Algebraic Geometry Seminar

2016   Arithmetic Restrictions on Geometric Monodromy, University of Pennsylvania Algebraic Geometry Seminar

2016   Arithmetic Restrictions on Geometric Monodromy, Stanford Number Theory Seminar

2016   Arithmetic Restrictions on Geometric Monodromy, Topological Approaches to Algebra and Arithmetic Geometry, University of Georgia

2016   Arithmetic Restrictions on Geometric Monodromy, University of Georgia Number Theory Seminar

2016   Arithmetic Restrictions on Geometric Monodromy, Emory University Number Theory Seminar

2016   Arithmetic Restrictions on Geometric Monodromy, Oberwolfach Workshop on Arithmetic Geometry

2016   Automorphisms of Blowups, AMS Sectional Meeting, University of Utah

2016   Non-Abelian Lefschetz Hyperplane Theorems, Conference on Equivariant Algebraic Geometry and Algebraic Stacks, ANU Kioloa Campus, Australia

2016   Automorphisms of Blowups, ANU Canberra Algebraic Geometry Seminar

2016   Automorphisms of Blowups, Princeton Algebraic Geometry Seminar

2015   Non-Abelian Lefschetz Hyperplane Theorems, University of Utah Algebraic Geometry Seminar

2015   Non-Abelian Lefschetz Hyperplane Theorems, Yale Algebraic Geometry Seminar

2015   Hyperbolicity of Moduli Spaces and Arithmetic of Function Fields, Columbia Number Theory Seminar

2015   Non-Abelian Lefschetz Hyperplane Theorems, Stony Brook Algebraic Geometry Seminar

2015   Non-Abelian Lefschetz Hyperplane Theorems, Courant Algebraic Geometry Seminar

2015   Non-Abelian Lefschetz Hyperplane Theorems, Columbia University Algebraic Geometry Seminar

2015	Geometric Lefschetz Hyperplane Theorems, Bay Area Algebraic Number Theory and Arithmetic Geometry Day
2014	Non-Abelian Lefschetz Hyperplane Theorems, University of Michigan Algebraic Geometry Seminar
2014	Non-Abelian Lefschetz Hyperplane Theorems, Harvard Algebraic Geometry Seminar
2014	Non-Abelian Lefschetz Hyperplane Theorems, UIC Algebraic Geometry Seminar
2014	Non-Abelian Lefschetz Hyperplane Theorems, AMS Section Meeting, SFSU, Special Session on Algebraic Geometry
2014	Non-Abelian Lefschetz Hyperplane Theorems, Oberwolfach Classical Algebraic Geometry Workshop, 5 minute talk
2014	Non-Abelian Lefschetz Hyperplane Theorems, Berkeley Student Algebraic Geometry Seminar
2013	Motivic Analytic Number Theory, Graduate Workshop on Geometry of Hilbert Schemes, Simons Center for Geometry and Physics
2013	Zeta Functions in Geometry and Topology, Geometry and Topology: Berkeley and Stanford Icebreaker Conference
2013	Motivic Analytic Number Theory, GAeL XXI, KTH Royal Institute of Technology
2013	Motivic Analytic Number Theory, Columbia University Algebraic Geometry Seminar
2013	Motivic Analytic Number Theory, AMS Sectional Meetings, UC Boulder, Special Session on Algebraic Geometry
2012	Motivic Analytic Number Theory, UC Irvine Number Theory Seminar
2012	Line Bundles on Plane Curves, UC Berkeley Research Training Group (RTG) Workshop on Tensors and Their Geometry
2012	The Cotangent Complex, University of Michigan RTG Workshop on Derived Algebraic Geometry (expository)
2012	Introduction to the Landscape of Generalized Euler Characteristics, UC Berkeley Commutative Algebra and Algebraic Geometry Seminar
2012	Introduction to the Landscape of Generalized Euler Characteristics, Stanford Algebraic Geometry Seminar

Professional Service, Teaching & Seminars

Professional Service

2016-	Undergraduate research mentor (2 students currently)
2016	REU mentor, Columbia University: Properties of Random Varieties
2013-2015	US Organizer, GAeL XXII & XXIII
2013-	Referee for de Gruyter, Cambridge University Press, International Mathematics Research Notices, Journal of Pure and Applied Algebra, etc.
2012-2014	Stanford Math Circle: The Music of the Spheres, The Fundamental Theorem of Algebra, Tiling Problems
2012-2013	Stanford Undergraduate Research in Mathematics Mentor: Zeroes of Linear Recurrences, Class Numbers of Imaginary Quadratic Number Fields
2011-2013	Stanford SUMO Speaker Series: The Music of the Spheres, Zeroes of Integer Linear

	Recurrences, Morse Theory, Stratifications, and Euler Characteristic, Tiling Problems
2011-2013	Stanford SPLASH: The Music of the Spheres, How Do We Know What We Know?
2013	Stanford Undergraduate Mathematics Organization (SUMO) Math Tournament, trained student participants in problem solving, etc.
2010	Boston Math Circle: Ramsey Theory,
2009	MIT Splash: Ramsey Theory

Seminars Organized:

2015	The Tate Conjecture (co-organized with Johan de Jong, Yiwei She, and Aanand Deopurkar);
2014	Applications of the Langlands Philosophy (Princeton, co-organized with Lucia Mocz);
2012-2013	Classics Reading in Algebraic Geometry;
2011-2013	Student/Special Algebraic Geometry Seminar;
2011-2012	Hodge Theory Learning Seminar;
2010-2011	Secret Cassels-Fröhlich Seminar

Teaching

2016	Calculus III, Columbia, Fall Semester
2014	Math 51 (Linear Algebra and Multivariable Calculus) TA, Stanford, Winter Quarter
2013	Math 210C (Compact Lie Groups) Course Assistant, Stanford
2007	Course Assistant, Math 25, Harvard University