

CONTACT INFORMATION	Mathematics Department University of California, Santa Cruz	Email: bdeewang@ucsc.edu Website: bdeewang.com
EDUCATION	University of California, Santa Cruz PH.D. IN MATHEMATICS Advisor: <i>Martin Weissman</i> M.A. IN MATHEMATICS Higher School of Economics M.SC. IN MATHEMATICS Advisor: <i>Vadim Vologodsky</i> Shiv Nadar University B.SC. (RESEARCH) IN MATHEMATICS Specialisation in Applied Algebra	California, USA Sep 2019 – present Aug 2020 Moscow, Russia Jun 2019 Uttar Pradesh, India May 2016
INVITED TALKS	Frobenius Trace Distributions informed by Angle Rank <i>Joint Mathematics Meetings, Boston, MA</i>	Jan 2023
INTERNAL TALKS	A Point is Worth a Shape: Introducing Moduli Spaces <i>Undergraduate Student Colloquium, University of California, Santa Cruz</i>	Feb 2023
REMOTE	Angle Ranks and Frobenius Distributions <i>Graduate Student Colloquium, University of California, Santa Cruz</i>	Nov 2022
	L^AT_EX Workshop <i>Undergraduate Student Colloquium, University of California, Santa Cruz</i>	Oct 2022
	Some Invariants of Abelian Varieties over Finite Fields <i>Graduate Student Colloquium, University of California, Santa Cruz</i>	Oct 2022
	L^AT_EX Workshop, Parts I & II <i>Undergraduate Student Colloquium, University of California, Santa Cruz</i>	Apr 2022
	Cohomology on Sites* <i>Graduate Student Colloquium, University of California, Santa Cruz</i>	Jan 2022
	Fundamental Groups: Topological, Étale, Tannakian* <i>Graduate Student Colloquium, University of California, Santa Cruz</i>	Oct 2021
	Demystifying the p-adics* <i>Graduate Student Colloquium, University of California, Santa Cruz</i>	Nov 2020
	A First Introduction to Motivic Integration <i>Geometric Structures on Manifolds Seminar, Higher School of Economics</i>	Jun 2019
	p-adic Integration and Betti Numbers of Calabi-Yau Varieties <i>Geometric Structures on Manifolds Seminar, Higher School of Economics</i>	Dec 2018
	Mordell's Theorem <i>Graduate Student Seminar, Higher School of Economics</i>	May 2018

EXTERNAL TALKS	What is... a scheme?*		Oct 2021
	What is... a seminar?		
*REMOTE	A Non-Archimedean Volume of Hilbert Scheme of Points The Mathematics Society Seminar, Shiv Nadar University		Aug 2019
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PROGRAMMES, WORKSHOPS & CONFERENCES (selected)	Introductory Workshop: Diophantine Geometry MSRI/SLMath, Berkeley, USA		Feb 2023
	Joint Mathematics Meetings Boston, USA		Jan 2023
	Rethinking Number Theory* Project Leader: Maria Fox		Jun – Jul 2022
	Automorphic Forms Beyond GL_2 , Arizona Winter School University of Arizona, Tuscon, USA		Mar 2022
	PCMI Graduate Summer School* Number Theory Informed by Computation (Week 3) Motivic Homotopy Theory (Week 1) IAS/PCMI, Park City, Utah, USA		Jul 2021
	Rethinking Number Theory* Project Leader: Soumya Sankar		Jul 2021
	Sparsity of Algebraic Points, MSRI Summer Graduate School* MSRI, Berkeley, USA		Jun 2021
	Rational Points and Galois Representations* University of Pittsburgh, USA		May 2021
	Unlikely intersections, Diophantine geometry, and related fields* University of Reading, UK		Apr 2021
	Connecticut Summer School in Number Theory (CTNT)* University of Connecticut, Connecticut, USA		Jun 2020
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TEACHING	UNIVERSITY OF CALIFORNIA, SANTA CRUZ		
REMOTE	Instructor of Record	MATH 11B – Calculus with Applications MATH 100 – Introduction to Proof and Problem Solving MATH 103A – Complex Analysis MATH 110 – Introduction to Number Theory MATH 110 – Introduction to Number Theory MATH 105A – Real Analysis MATH 3 – Precalculus	Summer 2022 Summer 2022* Spring 2022 Fall 2021 Summer 2021* Fall 2020* Summer 2020*
	Teaching Assistant	MATH 288B – Pedagogy of Mathematics (GSI) MATH 19A – Calculus for Sci., Eng., and Math. MATH 11A – Calculus with Applications MATH 111T – Algebra (Fellowship under SEMILLA Teach) MATH 100 – Introduction to Proof and Problem Solving (Fellowship under SEMILLA Teach) MATH 3 – Precalculus MATH 181 – History of Mathematics MATH 3 – Precalculus	Winter 2023 Fall 2022 Winter 2022 Spring 2021* Winter 2021* Spring 2020* Winter 2020 Fall 2019

SHIV NADAR UNIVERSITY

<i>Teaching Assistant</i>	MAT260 – Linear Algebra	Fall 2015
<i>Tutor, LASC</i>	MAT260 – Linear Algebra	Spring 2015
	MAT284 – Probability and Statistics	Spring 2015
	MAT101 – Calculus I	Fall 2014
LASC = Learning & Academic Support Centre		

**SERVICE &
ORGANISING****UNIVERSITY OF CALIFORNIA, SANTA CRUZ**

Head TA, for mentorship and support Jul 2022 – *present*
Head TA Team, Mathematics Department

Directed Reading Program

Organiser, co-organising with David Rubinstein Aug 2021 – Jun 2024

Association for Women in Mathematics Chapter

President Sep 2022 – Aug 2023
General Secretary Nov 2020 – Aug 2022

Mathematics Department Peer Support Program

Organiser, co-organising with Jennifer Guerrero, David Rubinstein, Ryan Pugh Aug 2021 – Jun 2023

Graduate Student Colloquium, Mathematics Department

Organiser, co-organised with David Rubinstein Dec 2020 – Jun 2022

Category Theory Learning Seminar

Organiser, co-organised with Vaibhav Sutrave, David Rubinstein Winter – Spring 2022

Reading Groups, *Organiser*

- **Topological Data Analysis** Winter 2023
co-organised with David Rubinstein
- **Stacks** Fall 2022
- **Étale Cohomology** Fall 2021
co-organised with Shane Kennerly, Malachi Alexander
- **Étale Homological Algebra** Spring 2021
co-organised with Vaibhav Sutrave, Malachi Alexander
- **A Course in Arithmetic by J.-P.Serre** Winter, Summer 2020

Mathematics Department DEI Committee

Graduate Student Member Oct 2020 – Jun 2022

OUTREACH**UNIVERSITY OF CALIFORNIA, SANTA CRUZ****Directed Reading Program**

- *Mentor*, Brooke Zhang Fall 2022
COMBINATORIAL DESIGNS
- *Mentor* (with David Rubinstein), Kenneth Gee Summer – Fall 2022
THE (CURRY–HOWARD–)LAMBEK CORRESPONDENCE
- *Mentor*, Miles Mitchell Spring 2022
AFFINE ALGEBRAIC GROUPS AND HOPF ALGEBRAS
- *Mentor*, Morea Lee Winter 2022
GALOIS THEORY OVER \mathbb{Q}
- *Mentor*, Yijia Sun Fall 2021
LINEAR ERROR CORRECTION CODES

- *Mentor*, Anna Yoon
ELLIPTIC CURVE CRYPTOGRAPHY Winter 2020

Panelist, *The Roles and Contributions of TAs*
Graduate Preparation Program Aug 2022, 2021

Twoples

- *Mentor*, Lillian Frey (Binghamton University)
INTRODUCTION TO CODING THEORY: LINEAR CODES Sep – Dec 2022
- *Mentor*, Lalit Mohan Sharma (University of Delhi)
NUMBER THEORY OF NUMBER FIELDS: CLASS GROUPS Jan – Apr 2022
INTRODUCTION TO ALGEBRAIC GEOMETRY: VARIETIES Aug – Dec 2021
- *Mentor*, Bowen Li (Carleton College)
JOURNEY THROUGH CATEGORY THEORY Jan – Apr 2022

Panelist, *Graduate Student Perspectives: A Year in Review*
Lunch in the Time of COVID May 2021

PEDAGOGICAL & PROFESSIONAL DEVELOPMENT

UNIVERSITY OF CALIFORNIA, SANTA CRUZ

Equity-Minded Mentoring for Graduate Students Certificate Program
Center for Innovations in Teaching and Learning Spring 2023

Graduate Student Researcher, *Redesigning Calculus in the Life Sciences*
Mathematics Department & Center for Innovations in Teaching and Learning Summer 2021
Fellowship under the GANAS-Career Pathways grant

Summer Graduate Student Instructor Peer Support Team
Center for Innovations in Teaching and Learning Spring – Summer 2021

Preparing for Inclusive Teaching
Center for Innovations in Teaching and Learning Sep 2020, 2019

Integrated Course Design for Remote Instruction
Online Education (OE) Spring 2020

Course Design & Delivery Certificate Program
Center for Innovations in Teaching and Learning Spring 2020

Teaching for Equity Certificate Program
Center for Innovations in Teaching and Learning Spring 2020

AWARDS, GRANTS & SCHOLARSHIPS

State Funded Scholarship, Higher School of Economics 2017 – 2019

Full Merit Scholarship, Shiv Nadar University 2012 – 2016

MEMBERSHIPS

Association for Women in Mathematics Feb 2021 – *present*

American Mathematical Society Oct 2019 – *present*

LANGUAGES

English, Hindi (Hindustani), Telugu, Japanese (Beginner)