Marin Petković

Curriculum Vitae

University of Utah
Department of Mathematics
155 South 1400 East
Salt Lake City UT 84112
✉ *petkovic@math.utah.edu*
🖥 *www.math.utah.edu/~petkovic/*

Education

2015-2022   **Doctoral Candidate, Mathematics**, *University of Utah*, Salt Lake City.
Advisor: Prof. Aaron Bertram

2013-2015   **M.A., Mathematics**, *University of Zagreb*, Zagreb, Croatia.
Thesis: *Divisors on Algebraic Curves* (in Croatian). Advisor: Prof. Goran Muić

2010-2013   **B.A., Mathematics**, *University of Zagreb*, Zagreb, Croatia.

Research Interests

Algebraic geometry, Derived categories, Bridgeland's stability conditions, Moduli spaces, Mirror symmetry

Preprints

2020   *A note on the Kuznetsov component of the Veronese double cone*, with Franco Rota, preprint arXiv:2007.05555.

2019   *Moduli spaces on the Kuznetsov component of Fano threefolds of index 2*, with Matteo Altavilla and Franco Rota, preprint arxiv:1908.10986.

Talks

Dec. 2020   *Stability on Kuznetsov component of the Veronese double cone*, Algebraic geometry seminar, University of Utah

Dec. 2019   *Moduli spaces on Kuznetsov component of Fano threefolds of index 2*, FRG Workshop on Stability, Moduli Spaces and Applications, UIC, Chicago

At the University of Utah

Feb. 2022   *Moduli spaces via exceptional collections*, Algebraic Geometry student seminar

Oct. 2021   *Constructing moduli spaces of sheaves*, Algebraic Geometry student seminar

Mar. 2021   *Stability conditions on projective spaces*, Algebraic Geometry student seminar

Sep. 2020   *Kuznetsov component of the Veronese double cone*, Algebraic Geometry student seminar

Jan. 2020   *Linear spaces contained in two quadrics and vector bundles on curves*, Algebraic Geometry student seminar

Sep. 2019	*Matrix factorizations and Orlov's theorem*, Algebraic Geometry student seminar
Feb. 2018	*Tropical Brill-Noether theorem*, Algebraic Geometry student seminar
Sep. 2017	*Stability conditions and Brill-Noether*, Algebraic Geometry student seminar
Sep. 2016	*Embeddings of Curves and Syzygies*, Algebraic Geometry student seminar
Nov. 2015	*Secant varieties and Waring rank*, Algebraic Geometry student seminar

Conferences and Workshops Attended

Spring 2020	RTG Mini-conference: Riemann surfaces and their moduli spaces, University of Utah
Fall 2019	FRG Workshop on Stability, Moduli Spaces and Applications, UIC
	WAGS, University of Utah
Summer 2019	Workshop: Graduate Summer School on Homological Algebra of Mirror Symmetry, The Fields Institute
Spring 2019	Workshop: Recent Progress in Moduli Theory, MSRI
	WAGS, UC Berkeley
Fall 2018	FRG Workshop on Moduli Spaces of sheaves and Bridgeland Stability, UIC
	WAGS, Oregon State University
	Yamabe symposium, UMN, Minneapolis
Summer 2018	Workshop: Summer Graduate School on Derived Categories, MSRI
Spring 2018	Crossing the walls in enumerative geometry, Snowbird
	Workshop: semiorthogonal decompositions, stability conditions and sheaves of categories, Toulouse
Fall 2017	Moduli of sheaves and strange duality, Penn State University
	WAGS, UCLA, Los Angeles
Spring 2017	Geometry of moduli spaces, San Diego
Spring 2016	Complex algebraic geometry in San Diego, UCSD, La Jolla

Teaching

University of Utah

Spring 2022	Instructor, *Introduction to Quantitative Reasoning*, MATH 1030
Fall 2021	Instructor, *Introduction to Quantitative Reasoning*, MATH 1030
Summer 2021	Instructor, *Calculus III*, Math 2210
Spring 2021	Instructor, *Introduction to Quantitative Reasoning*, MATH 1030
Fall 2020	Instructor, *Introduction to Quantitative Reasoning*, MATH 1030
Summer 2020	Instructor, *Calculus I*, MATH 1210
Spring 2020	Instructor, *Online Calculus I*, MATH 1210

Fall 2019	Instructor, *Introduction to Quantitative Reasoning*, MATH 1030
Summer 2019	Instructor, *Business Calculus*, MATH 1100
Spring 2019	Instructor, *Online Calculus I*, MATH 1210
Fall 2018	Instructor, *Calculus I*, MATH 1210
Spring 2018	Instructor, *Business Calculus*, MATH 1100
Fall 2017	Instructor, *Trigonometry*, MATH 1060
Summer 2017	Instructor, *Business Calculus*, MATH 1100
Spring 2017	Teaching Assistant, *Accel. Eng. Calculus II*, MATH 1321
Fall 2016	Instructor, *Trigonometry*, MATH 1060
Spring 2016	Teaching Assistant, *Engineering Calculus II*, MATH 1320
Fall 2015	Teaching Assistant, *Accelerated Engineering Calculus II*, MATH 1321

Selected Awards and Fellowships

2014	International Mathematical Competition (IMC), Blagoevgrad, Bulgaria – First Prize
2010	International Mathematical Olympiad (IMO) – Bronze medal
2010	American Computer Science League (ACSL) – second place

Service - Outreach

2019 - 2020	Mentoring for incoming PhD students, University of Utah Math department, Algebraic Geometry mentor

Programming skills

Basic	html, Java, R
Intermediate	LaTeX, C/C++, Python, Macaulay2, Mathematica

Languages

Croatian (native), English (intermediate)