Ilya Losev

Losevilya14@gmail.com +44 7415 097148

Education

University of Cambridge

PhD in Mathematics of Information

St. Petersburg State University

Master in Mathematics; GPA: 5/5

University of Geneva, SwissMAP Master Class

Master in Mathematical Physics; GPA: 5.9/6

St. Petersburg State University

Bachelor in Mathematics; GPA: 5/5

October 2021 – Present

Supervisor: James Norris

September 2019 – June 2021

Supervisor: Yurii Belov

September 2019 – August 2020

Supervisor: Stanislav Smirnov

September 2015 – June 2019

Supervisor: Yurii Belov

Job experience

Research Assistant

November 2017 – September 2021

Chebyshev Laboratory, St. Petersburg State University

Organizer of St. Petersburg Math Olympiad

September 2016 – May 2018

Mathematics Olympiad Committee, St. Petersburg

Teaching Assistant

September 2015 - August 2019

Physics and Mathematics Lyceum 239, St. Petersburg

Research interests

My research is mainly focused on problems related to probability theory, statistical physics and quantum field theories. I am studying probabilistic models that come from mathematical physics, and I am interested in questions related to the description of their large-scale or large-time (for stochastic processes) behaviour.

Research papers

Ilya Losev; Large Deviations of the Schwarzian Field Theory, arXiv:2406.17069, 2024

Ilya Losev; Probabilistic derivation of the correlation functions of the Schwarzian Field Theory, arXiv:2406.17071, 2024

Roland Bauerschmidt, Ilya Losev, Peter Wildemann; Probabilistic Definition of the Schwarzian Field Theory, arXiv:2406.17068, 2024

Ilya Losev, Stanislav Smirnov; How long are the arms in DBM?, arXiv:2307.14931, 2023

Ilya Losev; Jacobi matrices with lacunary spectrum, Journal of Mathematical Analysis and Applications, Volume 503, Issue 1, 2021

Awards

Edouard Gans Prize	2020
Best Master's Thesis in Mathematics, University of Geneva	
International Mathematics Competition, Gold Medal	2017

R

University Level Competition

How long are the arms in DBM?

How long are the arms in DBM?

SwissMAP Site Visit

Research talks and posters	
Sapienza Probability Seminar How long are the arms in DBM?	Rome, Italy; March 2024 Seminar Talk
Cambridge Probability Seminar How long are the arms in DBM?	Cambridge, UK; October 2023 Seminar Talk
Phase Transitions and Correlated Random Processes Schwarzian Field Theory	Cambridge, UK; May 2023 Short Talk
Probability and Mathematical Physics Conference How long are the arms in DBM?	Helsinki, Finland; July 2022 Poster
7th SwissMAP General Meeting	Gstaad, Switzerland; August 2020

Poster

Poster

Online; June 2020

Emergent Trends in Complex Function Theory Workshop Jacobi matrices with lacunary spectrum

Barcelona, Spain; October 2019

Short Talk

Spectral Function Theory
International Spring School
Jacobi matrices with lacunary spectrum

St. Petersburg, Russia; April 2019

Short Talk

Other research visits

Oberwolfach Arbeitsgemeinschaft QFT and Stochastic PDEs

Oberwolfach, Germany; December 2023

Reading Group

SwissMAP Research Station Short Research Stay Les Diablerets, Switzerland; August 2023

Research Visit