# Wenbin Luo

Postdoc

#### Research interests

Arakelov geometry, diophantine approximation, dynamical systems and birational geometry

# Working experience

Jul. 2023- Postdoc at Beijing International Center for Mathematical Research under the su-Now pervision of Prof. Xinyi Yuan

#### Education

- Apr. 2020 **Department of Mathematics, Graduate School of Science, Kyoto University, Japan**
- Mar. 2023 PhD under the supervision of Prof. Atsushi Moriwaki
  - Research Fellowship for Young Scientists(DC1) of Japan Society for the Promotion of Science
- Apr. 2018 Department of Mathematics, Graduate School of Science, Kyoto University, Japan
- Mar. 2020 Master under the supervision of Prof. Atsushi Moriwaki
  - Scholarships or Awards:
    - Asian Future Leadership Scholarship
- Sep. 2013 Department of Mathematics, Fudan University, China
- to Jun. 2017 o Bachelor
  - Member of Talents Project

#### **Publications**

W. Luo, Slope boundedness and equidistribution theorem, Int. Math. Res. Not. Volume 2024, Issue 12, June 2024, https://doi.org/10.1093/imrn/rnae057

### **Preprints**

W. Luo, Arithmetic over trivially valued field and its applications, 2020. [Online]. Available: https://arxiv.org/abs/2009.08663

—, The continuity of  $\chi$ -volume functions over adelic curves, 2020. [Online]. Available: https://arxiv.org/abs/2003.09837

- —, A relative bigness inequality and equidistribution theorem over function fields, 2021. Available: https://arxiv.org/abs/2112.13206
- —, Continuous extension and birational invariance of  $\chi$ -volume Over an Adelic Curve, 2023. Available: https://arxiv.org/abs/2303.01604
- —, J. Song, Arithmetic degrees over fields of characteristic 0, 2024. Available: https://arxiv.org/abs/2401.11982
- —, Y. Fan, B. Qu, Height Filtrations and Base Loci on Flag Bundles over a Curve, 2024. Available: https://arxiv.org/abs/2403.06808

#### Talks and seminars

21/08/2020 2nd Kyoto-Hefei Workshop on Arithmetic Geometry

 $\circ$  Title: The continuity of  $\chi$ -volume over adelic curves

07/03/2022 Seminar - New adic and algebraic directions in motivic homotopy theory

 Title: A relative bigness inequality and equidistribution theorem over function fields

15/09/2022 Intercity Seminar on Arakelov Geometry 2022

 Title: A relative bigness inequality and equidistribution theorem over function fields

19/10/2022 Kinosaki Symposium on Algebraic Geometry 2022

• Title: A relative bigness inequality over function fields

09/01/2023 NCTS East Asia Core Doctoral Forum in Mathematics

• Title: Arithmetic Hilbert-Samuel and equidistribution theorems

## Teaching Experience

Apr. 2020 - Teaching assistant in Basics of Modern Mathematics A

. Jun. 2020

Oct. 2020 - Teaching assistant in Algebra II

Jan. 2021

Apr. 2021 - Teaching assistant in Basics of Modern Mathematics A

Jun. 2021

Oct. 2021 - Teaching assistant in Algebra II

Jan. 2022

Oct. 2022 - Teaching assistant in Algebra II

Jan. 2023