## Zhi-Feng Wei

CONTACT Information Department of Mathematics Indiana University 831 East Third Street Bloomington, IN 47401, USA

Mobile: +1 (812)391-0426 Email: zfwei@iu.edu

Homepage: zf-wei.github.io

RESEARCH INTERESTS

Probability, and Graph Theory.

EDUCATION

#### Department of Mathematics, Indiana University (IU)

Ph.D. in Mathematics (expected May 2024)

• Advisor: Prof. Russell Lyons

• Minor in Statistics

#### School of Mathematical Sciences, Beijing Normal University (BNU)

M.S. in Mathematics, June 2018

• Advisor: Prof. Mu-Fa Chen

• Graduation with Honor: Excellence Award from Beijing Municipality & BNU

#### Beijing International Center for Mathematical Research, Peking University

Visiting Student,  $7^{\rm th}$  Enhanced Program for Graduate Study, Spring 2015 Courses: Functional Analysis, Riemannian Geometry

## Cuiying Honors College, Lanzhou University (LZU)

B.S. in Mathematics, June 2015

• Advisor: Prof. Heping Zhang

# Publications & Preprints

- (1) Sharp Bounds on Eigenvalues via Spectral Embedding Based on Signless Laplacians, arXiv: 2111.08777.
- (2) Inverse Problems for Ergodicity of Markov Chains, J. Math. Anal. Appl., **505(2)**(2022), Article 125483.
- (3) Number of Matchings of Low Order in (4,6)-Fullerene Graphs, (with H. Zhang) MATCH Commun. Math. Comput. Chem., 77(3)(2017), 707–724.

# INVITED PRESENTATIONS

(1) Bound Return Probabilities via Spectral Embedding Method, 20<sup>th</sup> Northeast Probability Seminar, CUNY (Zoom talk), Nov 2021.

Awards					
&	Funding				

2022	Research Assistant Supported by NSF grant DMS-1954086			
2021	Research Assistant Supported by NSF grant DMS-1954086			
2019	James Williams Memorial Award,			
	Department of Mathemtics, IU			
2018	College of Arts and Sciences Graduate Fellowship, IU			
2016	National Merit Scholarship of China			
2016	Excellent Teaching Assistant Award, BNU			
2014	Cuiying Student Innovation Fund, LZU			
2012 - 14	Outstanding Student Scholarship, LZU			
2012	Scholarship for Outstanding Mathematics Majors,			
	School of Mathematics & Statistics, LZU			

Teaching	Fall	2021	Recitation, Math-M211: Calculus I
EXPERIENCE	Summer	2021	Preparation Session for Math Qualifying Exam in Analysis
	Spring	2021	Co-Teaching, Math-M106: Mathematics of Decision and Beauty
	Fall	2020	Grading, Math-M463: Intro to Probability Theory I
	Spring	2020	Grading, Math-M464: Intro to Probability Theory II
	Fall	2019	Grading, Math-M463: Intro to Probability Theory I
	Summer	2019	Co-Teaching, Math-M106: Mathematics of Decision and Beauty
	Fall	2018	Grading, Math-M365: Intro to Probability and Statistics
	Fall	2016	Teaching Assistant, Linear Algebra

LANGUAGES Chinese: Native

English: Fluent
French: Elementary

Professional Affiliation

References

American Mathematical Society

Russell Lyons,

James H. Rudy Professor of Mathematics, Indiana University,

(812)855-1645, rdlyons@indiana.edu