

EDUCATION

- **Indiana University Bloomington, USA** 2022 - present
PhD, *Mathematics*
 - *Advisor: Dylan P. Thurston*
- **Institute of Mathematics and Applications, India** (*Affiliated to the Utkal University*) 2019 - 2021
MA/MSc, *Mathematics with Data Science*
 - *Advisor: Manas R. Mohapatra*
- **Ewing Christian College, India** (*Affiliated to the University of Allahabad*) 2015 - 2018
BSc, *Major in Mathematics & Physics*

RESEARCH INTERESTS

Low-dimensional topology and hyperbolic geometry, focusing on Floer homology invariants of links, 3- and 4-manifolds, and hyperbolic knot theory.

TALKS

- Indiana University Bloomington, USA
 - Heegaard Floer Homology and Knots, Graduate Student Seminar 2025
 - Basic Knot Theory and Jones Polynomial, TQFT Learning Seminar 2025
 - On the Non-Genericity of Hyperbolic Knots (2 talks), Knot Theory Learning Seminar 2025
 - Introduction to Heegaard Floer Homology (2 talks), Topology and Friends Graduate Student Seminar 2025
 - Introduction to Hyperbolic Knot Theory, Graduate Student Seminar 2024
 - Hyperbolic Structures on the Knot Complements, Topology and Friends Graduate Student Seminar 2024
 - Mirzakhani's Generalization of the McShane's Identity, Teichmüller Theory Seminar (3 talks) 2024

CONFERENCES AND WORKSHOPS (* ONLINE)

- Midwest Panorama of Geometry and Topology Conference, *University of Iowa, USA* 2025
- Mapping Class Groups and Beyond, *Middle East Technical University, Turkey* 2025
- Graduate Student Topology and Geometry Conference, *Indiana University Bloomington, USA* 2025
- Tech Topology Conference, *Georgia Institute of Technology, USA* 2024
- Summer School in Mathematics: Low-dimensional Topology, *Institut Fourier, France* 2024
- Georgia Topology Summer School and Conference, *University of Georgia, USA* 2024
- Graduate Student Topology and Geometry Conference, *Michigan State University, USA* 2024
- 66th Texas Geometry and Topology Conference, *Rice University, USA* 2023
- Midwest Topology Seminar, *University of Illinois Urbana-Champaign, USA* 2023
- Graduate Student Topology and Geometry Conference, *Harvard University, USA* * 2023
- The Unity of Mathematics: A Conference in Honour of Sir Michael Atiyah, *University of Cambridge, UK* * 2021
- International Conference on Discrete Groups, Geometry and Arithmetic, *NCM and TIFR, India* * 2021
- 48th Annual Conference of Odisha Mathematical Society, *IMA, India* 2021
- 36th Annual Ramanujan Mathematical Society Conference, *Amrita Vishwa Vidyapeetham, India* * 2021
- Orthogonal Polynomials, Special Functions and Operator Theory and Applications, *ICMS and LMS, UK* * 2021
- International Workshop on Mathematics Meets the World: Recent Trends and Developments, *VIT, India* 2020
- Groups In Galway 2020 International Conference, *NUI and IMS, Ireland* * 2020
- 35th Annual Conference of Ramanujan Mathematical Society, *Central University of Rajasthan, India* * 2020

TEACHING

- Indiana University Bloomington, USA
 - Teach: D116 Introduction to Finite Math I *Fall 2025*
 - Recitation: M106 Math of Decision and Beauty *Su '23, F '23, S '24, S '25, Su '25*
 - Recitation: M212 Calculus II *Fall 2024*
 - Grade: M343 Differential Equations with Applications *Summer 2024*
 - Grade: M415 Complex Variables *Spring 2023*
 - Grade: M301 Linear Algebra and Applications *Fall 2022*
- Part-time Teaching Assistant, *Uma Coaching Institute, India* *2016 - 2017*

AWARDS AND ACHIEVEMENTS

- Co-organizer, Peer Mentoring Initiative (PMI), *Indiana University Bloomington, USA* *2025-26*
- Co-organizer, Graduate Student Topology and Geometry Conference, *Indiana University Bloomington, USA* *2025*
- Glen Schober Memorial Travel Award, *Indiana University Bloomington, USA* *2023 & 2024*
- Hazel King Thompson Fellowship, *Indiana University Bloomington, USA* *2023*
- Volunteer, 48th Annual Conference of Odisha Mathematical Society *IMA, India* *2021*
- All India Rank 4, *IMA MA/MSc Entrance Examination, India* *2019*
- Deputy Co-editor of Tarun Mitra, *Tarun Shanti Sena, Ewing Christian College, India* *2018*
- Winner of Mathematics Exhibition, *Maharishi Regional Cultural Celebration, India* *2014*

REFERENCES

- Dylan P. Thurston, *Boston College, USA*
- Manas R. Mohapatra, *Kalinga Institute of Industrial Technology, India*
- Sudhansu S. Rout, *National Institute of Technology Calicut, India*