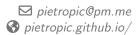
Pietro Mesquita Piccione

Résumé





Education

- 2022 2025 **PhD in Mathematics**, *Institut des mathématiques de Jussieu*, Sorbonne Université, Paris, France Advisors: Sébastien Boucksom and Tat Dat Tô
- 2021 2022 **Master's Degree in Mathematics**, *Institut des mathématiques de Jussieu*, Sorbonne Université, Paris, France
- 2017 2021 **Bachelor's degree in Mathematics**, *Universidade de São Paulo*, USP, São Paulo, Brazil Prize for outstanding performance.

Research projects and grants

- 2022 2025 **MathInParis2020**, *Scholarship for a PhD in Paris*, Cofunded by Marie Sklodowska-Curie Actions, FSMP
- 2021 2022 **PGSM Scholarship**, *Scholarship for a Master's degree in Paris*, Fondation Sciences mathématiques de Paris
- 2020 2021 **Morse Theory**, *Undergraduate Research Project*, FAPESP Grant FAPESP 2020/04871-0

Articles

2024 A non-archimedean theory of complex spaces and the csc-K problem, preprint, arXiv:2409.06221

Talks

The non-archimdean approach of the Yau-Tian-Donaldson conjecture

- 2024 Any Complex Geometry Seminar, University of California Berkeley, US
- 2024 Graduate Student Seminar Series, SLMath, Berkeley, US
- 2024 Séminaire des Thésards, IMJ-PRG, Université Paris Cité, France
- 2024 **Demi-Journée des doctorant.e.s de l'équipe TGA 2024**, IMJ-PRG, Sorbonne Université, France A counterexample for the periodic orbit conjeture
- 2022 Groupe de Travail: Dynamiques Sauvages, IMJ-PRG, Sorbonne Universite, France
- 2022 **A5 seminar**, Instituto de Matemática e Estatística, Universidade de São Paulo, Brasil To the general public
- 2021 A Tale of Geometry, S4, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
- 2020 **Morse Theory in 15 Minutes**, Senior Thesis Presentation, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
- 2020 **Is the Earth flat? A talk about curvature**, *S4*, *Instituto de Matemática e Estatística*, Universidade de São Paulo, Brazil
- 2020 **How to solve any equation, with some conditions**, *S4*, *Instituto de Matemática e Estatística*, Universidade de São Paulo, Brazil

Professional

Visits

2024 **Special Geometric Structures and Analysis**, *SLMath*, Berkeley Two months visit to the program.

Events attended

- 2024 Summer school on Complex Geometry and canonical metrics, CRM, Montréal, Canada
- 2023 **Global invariants of arithmetic varieties**, *CIRM*, Luminy, France
- 2023 Summer School and Worskhop "Advances in special Kähler metrics", Le Croisic, France
- 2023 Complex analysis and geometry: celebrating the 70+1th birthday of László Lempert, Rényi Institute, Budapest, Hungary
- 2022 Géométrie : échanges et perspectives, Insitut Henri Poincaré, Paris, France
- 2021 Géométrie : échanges et perspectives, Insitut Henri Poincaré, Paris, France
- 2019 **32nd Brazilian Mathematics Colloquium**, *IMPA*, Rio de Janeiro, Brazil
- 2018 ICM 2018, International Congress of Mathematicians, Rio de Janeiro, Brazil

Events Organized

- 2022 MaThematical Days: Paul Erdös, Universidade de São Paulo, São Paulo, Brazil
- 2021 MaThematical Days: Emmy Noether, Universidade de São Paulo, São Paulo, Brazil
- 2021 MaThematical Days: Élie Cartan, Universidade de São Paulo, São Paulo, Brazil

Teaching Assistantships

- 2025/1 Introduction to Riemann Surfaces, Campus Pierre et Marie Curie, Sorbonne Université, France
- 2024/2 Topology and Differentiable Calculus I, Campus Pierre et Marie Curie, Sorbonne Université, France
- 2024/1 Functional Analysis, Campus Pierre et Marie Curie, Sorbonne Université, France
- 2023/2 Topology and Differentiable Calculus I, Campus Pierre et Marie Curie, Sorbonne Université, France
- 2020/2 Introduction to Algebraic Topology, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
- 2019/2 Introduction to Analysis, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
- 2019/1 Differentiable functions and series, Instituto de Matemática e Estatística, Universidade de São Paulo,
- 2018/2 **Calculus II**, Escola Politecnica, Universidade de São Paulo, Brazil

Academic Services

- 2021 Organizer of the A5 Group, A student runned academic group, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
 - Over 25 weekly seminars organized
- 2019 Deputy Student Representative in the Mathematics Department Council, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil
- 2018 Deputy Student Representative in the Mathematics Department Council, Instituto de Matemática e Estatística, Universidade de São Paulo, Brazil

Other Writings

- 2022 L² techniques in Complex Geometry, Master Thesis, Sorbonne Université
- 2021 Morse Theory, Undergraduate Thesis, Universidade de São Paulo

Other Info

Related Activities

- 2021 2022 Reading Seminar on Wild Dynamics, Groupe De Travail Dynamiques Sauvages, IMJ-PRG, Sorbonne Université
 - 2021 Summer IMPA, Differential topology graduate course, IMPA, Rio de Janeiro, Brazil Online

2020 **Summer IMPA**, Functional Analysis graduate course, IMPA, Rio de Janeiro, Brazil with financial support

2018 Summer IMPA, Real Analysis, IMPA, Rio de Janeiro, Brazil

with financial support

Languages

Portuguese Native Speaker

Italian Native Speaker

English Fluent

Spanish Fluent

French Fluent

Catalan Intermediate

Links

Lattes http://lattes.cnpq.br/7822745238118143

Orcid https://orcid.org/0000-0002-1626-0726

References

Reference I Sébastien Boucksom

Reference II Tat Dat Tô

Reference III Tamás Darvas