

Ernest van Wijland

✉ ernest.vanwijland@irif.fr • [github.io](https://github.com/ernest-vanwijland)

Education

- **PhD Computer Science** **IRIF, Université Paris-Cité**
2024 – Present
Paris, France
 - PhD student under Claire Mathieu and Vincent Cohen-Addad's supervision.
- **MSc Computer Science, BSc Mathematics** **École Normale Supérieure**
2020 – 2024
Paris, France
 - Graduated both the MSc (MPRI) and the BSc (double major in Mathematics and Computer Science) with highest honors.
- **Preparatory Class** **Lycée Louis-le-Grand**
2018 – 2020
Paris, France

Publications

- **An Improved Greedy Approximation for (Metric) k -Means** **FOCS**
2025
Charikar, Cohen-Addad, Gao, Grandoni, Lee, Van Wijland
- **Faster Approximation Scheme for Euclidean k -TSP** **SoCG**
2024
Ernest van Wijland, Hang Zhou
- **Maximizing Nash Social Welfare in 2-Value Instances: Delineating Tractability** **MOR**
2023
Akrami et al.
- **Maximizing Nash Social Welfare in 2-Value Instances** **AAAI**
2022
Akrami et al.

Research experience

- **Approximation Algorithms for Clustering** **IRIF (Université Paris-Cité)**
2024 – Present
Paris, France

Currently working under Claire Mathieu and Vincent Cohen-Addad's supervision at IRIF on finding approximation algorithms for clustering problems.
- **Approximating TSP generalizations** **IRIF (Université Paris-Cité)**
2023 – 2024
Paris, France

Worked for a year under Claire Mathieu and Hang Zhou's supervision at IRIF on finding fast approximation schemes for generalizations of the TSP, in Euclidean spaces and general metric spaces.
- **Euclidean CVRP, k -TSP** **LIX (Polytechnique)**
2023
Palaiseau, France

Worked for a semester under Hang Zhou's supervision in Polytechnique on finding faster approximation schemes for the Euclidean CVRP and k -TSP.
- **Approximating 2-WECS** **THL (EPFL)**
2022
Lausanne, Switzerland

Worked for a semester under Ola Svensson's supervision in the Combinatorial Optimization team at EPFL on finding a better than 2 approximation for 2-WECS.
- **Fair Division for additive instances** **AGT (Max Planck Institut)**
2021
Sarrebruck, Germany

Worked for two months under Kurt Mehlhorn's supervision in the Algorithmic Game Theory team of the MPII on the Fair Division problem for additive instances.

Spectrum of heavy-tailed random matrices

DMA (École Normale Supérieure)

- *Paris, France*

2021

Worked under Laure Dumaz' supervision on a paper by Ben Arous and Guionnet.

Academic achievements

MasterDev Best French Developer Contest 5th place finisher

- *Paris, France*

2023

- French national contest in Computer Science, with thousands of participants from every major IT company
- awarded the 5000€ Genius prize as a high scoring student

International Olympiad in Informatics Bronze medalist

- *Tsukuba, Japan*

2018

Dutch National Olympiad in Informatics winner

- *Utrecht, Netherlands*

2018

Innopolis University Olympiad in Informatics finalist

- *Innopolis, Russia*

2018

International Olympiad in Informatics participant

- *Tehran, Iran*

2017

As part of the top 4 High-School students in the Dutch National Olympiad in Informatics.

Outreach

Member of the France-IOI association

- *France*

2018 – Present

I am involved in organizing the Castor and Algoréa contests, in which more than 600 000 students from elementary school to high-school participate every year. I am also involved in selecting and training the best students that participate in the Informatics Olympiad.

Member of the Netherlands-IO association

- *Netherlands*

2018 – Present

I am involved with the computer science outreach campaign towards Dutch high-school girls and preparing the Dutch girls team for the European Girls Olympiad in Informatics.

Lecturer at the Moroccan Olympiad in Informatics training camp

- *Morocco*

2019

Gave algorithms lectures to Moroccan middle-school and high-school students.

Other interests

- Active Judo black belt and Tennis player.
- Practicing piano for the past 15 years, part of the chamber music club in the ENS. Founder of the Early Music section.
- Graduated from the Juvisy Music Conservatory in Music Theory, Piano and Ensemble Playing (2018).
- Minoring in Musicology at ENS.