# Vincent Cavez

## Curriculum Vitae

## Education

- Since 2021 PhD Student, Inria Saclay, Paris-Saclay University, France.
  - Thesis: Post-WIMP Interactive Data Manipulation Advisors: Emmanuel Pietriga and Caroline Appert
  - 2020 **Master's Degree**, Paris-Descartes University, France. *Mathematical Engineering and Biostatistics with high honours*
  - 2019 **University Degree**, Paris-Saclay University, France. *Creation and Development of Innovative Start-ups*
  - 2018 **Bachelor's Degree**, Paris-Saclay University, France. *Mathematics Modelization Specialization*

#### Research

- 2024 Vincent Cavez, Catherine Letondal, Emmanuel Pietriga, and Caroline Appert. 2024.
- CHI Challenges of Music Score Writing and the Potentials of Interactive Surfaces. Proceedings of the international conference on Human factors in computing systems, 16 pages, ACM, 2024. https://doi.org/10.1145/3613904.3642079
- Vincent Cavez, Caroline Appert, and Emmanuel Pietriga. 2024. **Spreadsheets on Interactive**TOCHI **Surfaces: Breaking through the Grid with the Pen.** ACM Trans. Comput.-Hum. Interact. 31, 2, Article 16 (April 2024), 33 pages. https://doi.org/10.1145/3630097
- 2020 Vincent Cavez. Supervisors : Oscar De La Cruz and Antonin Goude. **Contributions to the**Master's **development of an embedded object finder for the visually impaired.** INGIMA France.
  Thesis

## Advisorship

- 02/2024– **Itinerary-driven Interaction for Map Navigation**, *ILDA Team*, Paris-Saclay University, 08/2024 France.
- MSc Student: Noémie Hanus

# Teaching

- 2022–2024 **Teaching Assistant Winter School**, *M1 HCI*, Paris-Saclay University, France. Class of M1 students where they develop the skills to read, criticize and summarize research publications.
  - 01/2016- Teaching Assistant Mathematics, 7th to 9th Grade, Mondétour Middle School, France.
  - 07/2017 Observation of teaching methods, preparation of Mathematics lessons and quizzes, dispensing of lessons, correction of quizzes, individual support throughout the school year.

#### Outreach

- 02/2024 Meetup of Junior Women in Maths and Computer Science, *Animator*. https://filles-et-maths.fr/rjmi/
- 12/2023 **2024 3MT® Paris-Saclay University Competition**, *Finalist*. https://www.universite-paris-saclay.fr/three-minute-thesis-competition-3mtr#home200832

- 10/2023 **PreVis '23**, Speaker (Demo).
  - https://www.aviz.fr/Events/Previs2023
- 02/2023 L3 Students Lab Visit, Speaker (Demo).
- 12/2022 **Lab Day**, *Speaker*.
- 08/2022 L2 Students Lab Visit, Speaker (Demo).
- 06/2022 Ph.D. Days, Organizer, Speaker.

## Service

- 03/2024 Paris-Saclay University Council of the Doctoral School, *Elected Representative*.
- 03/2024 Paris-Saclay University Pole Committee of the Doctoral School, *Elected Representative*.
- 02/2024 Inria Saclay Center Committee, Elected Representative.
- 09/2023 CHI 2024, Reviewer.

#### Extra-Curricular Activities

- Since 05/2023 **Logosfer:** I am working with rhetoric experts to design and develop an interface for the interactive annotation of debate videos.
- Since 03/2023 **Alcurve:** I worked on a comprehensive mathematical model for the prediction of blood alcohol concentration. I am now developing a mobile application to visualize the BAC of the user in real-time for educational and prevention purposes.
  - 07/2022 **Creartathon22:** I participated in a creative hackathon within a multi-disciplinary team of five students to design a creative, intelligent and interactive artifact. https://creartathon.com/
  - 03/2021 **Cryptics:** I developed an R library for real-time cryptocurrency analysis. https://github.com/VincentKV/Cryptics
  - 2017–2019 **Student's Union Treasurer:** I managed the bookkeeping and budget forecasting of the union and took part in the organization of events for graduate and undergraduate students.
  - Since 2010 **Music Composition:** I make electronic and orchestral music that I occasionally play live. I also compose movie soundtracks.

    https://lordaaron.bandcamp.com/

#### Online Certificates

- 10/2021 Information Visualization: Programming with D3.js, New York University.
- 02/2021 Data Manipulation at Scale: Systems and Algorithms, University of Washington.
- 04/2019 Machine Learning, Stanford University.

#### Technical Skills

- Programming JavaScript (D3.js, React Native, Bootstrap), HTML, Python (OpenCV, TensorFlow, Scikit-Languages learn), R (Tidyverse, rvest, devtools), Swift
  - Creative Logic Pro X, Ableton Live, Adobe Premiere Pro, Adobe Illustrator, Blender Software
  - Operating Mac OS, Windows, Linux, RaspberryPi OS, Arduino OS Systems

#### Languages

- French Native
- English Fluent