

Alvin Walker

Zürich (Switzerland)
☎ (+41) 78 709 46 26
✉ alvinsamuel.walker@uzh.ch

Education

- 09.24 – now **University of Zürich, MSc in Biostatistics, Switzerland,**
Personal focus: Bayesian Statistics.
 - Thesis: "Bayesian joint modelling of scores and ranks to reduce uncertainty in grant proposal quality assessment".
 - End in December 2026
- 09.21 – 08.24 **ETH Zürich, BSc in Health Science and Technology, Switzerland,**
Personal focus: Molecular biology and statistics.
- 09.16 – 08.19 **Gymnase de Renens, High School Diploma, Switzerland and UK,**
Major: Mathematics and Physics.
 - Bilingual program with one year exchange in York.

Research Experience

- 05.26 – now **Research Assistant - University of Zürich, Switzerland, 20%,**
Research group: Credibility of biostatistical methods – PD Dr. Roos.
 - Preparation and submission of a manuscript as first author on design stage recruitment analysis.
 - Design and coding of a web-application in the R programming language for recruitment predictions at the design stage of control trials.
- 09.25 – 03.26 **Research internship - Swiss Institute of Aquatic Science, Switzerland, 100%,**
Research group: Solid waste management – Dr. Zurbrügg.
 - Preparation and submission of a conference oral presentation as first author.
 - Designing and applying statistical methods to optimize insect waste treatment facilities in low and middle income countries.
 - Collecting data and maintaining relationships with stakeholders in Africa, Europe and America.

Work Experience

- 2023 – now **Teaching assistant - ETH Zürich, Switzerland,**
Classes: Statistics II, Imaging and Computing in Medicine.
 - Preparation and giving of exercise sessions for groups of 10 to 15 undergraduate students.
 - Simplifying and explaining statistical methods, machine learning and image processing, and their applications using R and Python.
- 2024 – now **Instructor & Module Designer - TechSpark, Switzerland, UK, summer job,**
Summer school teacher in Zurich and in Oxford for students ages 13 to 16.
 - Coaching and training new instructors.
 - Designing curricula and creating course material on Python programming, machine learning and AI.
 - Giving two week long course sessions using the prepared material.
- 2019 – 2021 **Military Service - Staff Officer, Switzerland,**
Function: Quarter-master (first lieutenant).
 - Main person responsible for accounting, rations, and lodging at the battalion level (for approx. 800 people).
 - Coaching and commanding of subordinates in technical fields, organising and conducting team meetings.
 - Planning complex logistic operational strategies in coordination with other staff officers, participation in staff meetings.

Technical Competences

- R Proficient, advanced plotting, shiny web-application programming
- LaTeX Proficient, dynamical reporting tools with integrated R code
- git Proficient, resolving merge-conflicts, gitignore, readme and documentation
- Python Comfortable (experience with PyTorch, Scipy, Scikit-learn, NumPy and seaborn)
- Linux Comfortable (experience with Debian-based distributions)

Languages

- French Native
- English Native
- German Fluent, C1

Conferences and Talks

- June 2026 **Insects to Feed the World 2026**, *Torino, Italy*,
Oral presentation: Bringing order to complexity: performance monitoring at Black Soldier Fly reproduction units (*best oral presentation award*).

Interests & Hobbies

I spend most of my free time practicing ballroom dancing. When I'm not dancing, I spend my time puzzling, reading fantasy books and playing board games. I also teach children's swimming classes for 4 to 6 year-olds once a week.