Thomas Zacharis PhD

contact

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personal website

thwmakos.xyz

linkdedin profile

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/thomas-zacharis

github profile

github.com/thwmakos

programming

C++23, matlab,
Mathematica, Python,
C#, Rust, HTML, CSS,
LaTeX

short bio

Recent PhD graduate in mathematics with a specialisation in infinite dimensional dynamics, combining advanced analytical skills with a strong programming background. Proven ability to tackle complex problems, innovate solutions, and apply mathematical concepts in diverse domains, seeking a challenging position that leverages both mathematical expertise and programming proficiency.

reasearch skills

- effective communication: able to communicate complex ideas clearly and concisely to both technical and non-technical audiences
- collaborative mindset: experienced in working effectively in a team environment, with a strong ability to collaborate and contribute to open-source projects
- adaptability and flexibility: quick to adapt to changing project requirements and priorities
- prioritisation organisation: skilled in managing multiple projects and deadlines, with a strong ability to prioritise tasks and maintain a high level of productivity
- critical thinking and problem-solving: able to approach problems from multiple angles, think critically, and develop creative solutions
- resilience and perseverance: strong ability to work through challenges and setbacks, with a commitment to finding solutions and overcoming obstacles
- continuous learning and improvement: committed to ongoing learning and professional development, with a strong desire to stay up-to-date with the latest technologies and methodologies

knowledge areas

software strong knowledge of C++23, matlab, Mathematica, Python (numpy, scipy, pandas, sage, Selenium), Rust, HTML/CSS, C#, website hosting & web app deployment on Linux VPS

technical scientific computing, data structures & related algorithms, linear and nonlinear optimisation algorithms, numerical analysis, partial differential equations simulation, inverse problems, data assimilation

education & professional experience

2019–2024	**Teaching assistant & programming instructor** Tutor in theoretical, applied, computational mathematics) and programming (algorithms, optimisation, numerical and symbolic computation in Python)	University of Edinburgh
2018 – 2023	**PhD** in Mathematics September 2018 – July 2023, funded by Maxwell Institute	University of Edinburgh
2017–2018	**MSc** in Computational Applied Mathematics Scholarship from University of Edinburgh	University of Edinburgh
2012–2017	**BSc** in Mathematics Admission award for exceptional students	University of Athens