Dewell Guerand

Belgium | guerand22004@gmail.com | +32 476 82 08 04

github.com/DewellGuerand

Education

UCLouvain, BS in Engineering

• Major: Applied Mathematics, Minor: Computer Science

• Graduated Cum Laude: 14.26/20

Lycée de Berlaymont

• Graduated with honors

Sept 2022 – June 2025

Sept 2016 - June 2022

Experience

Bartender, Belgium Sept 2023 - Jan 2022

• Managed drink inventory and ensured stock availability.

• Delivered under high-pressure conditions.

Private Tutor, Belgium From September 2023

• Provided mathematics and science lessons for middle school students.

Intern, Engie June 2022

• Organized and classified work disability files for improved physician accessibility.

Projects

GUI github.com/SteedStone

- Developed an API who can be downloaded to compute the payment needed by the bank for a loan
- Tools: Python (Tkinter library)

Energy Optimisation

- Designed a model to determine optimal wind turbine placements for precise energy production targets
- Tools: Python

Memory management

- Implemented a custom malloc in C for memory management based on specific allocation policies
- Tools: C, bash

Flight optimisation

- Created an API and the backend to compute the minimal distance required to reach a certain destination based on preference of the passenger
- Tools: Python, Flutter (Dart)

Full-stack e-commerce platform

- Full-stack e-commerce platform for French artisanal bakeries, built with Next.js, TypeScript, and PostgreSQL, featuring online ordering, real-time inventory management, and multi-location support
- Tools: Next.js, TypeScript, PostgreSQL, Prisma

Tracking a Lorenz particle

- Estimated the position of a Lorenz attractor particle over time using a particle filter for stochastic process analysis
- Tools: Python

Finite element project

- Developed a complete finite element analysis application for solving 2D linear elasticity problems in engineering structures with mesh generation, solver, and visualization components
- Tools: C, Python

Technical Skills

Languages: C, Java, Python, Oz, Assembly, Erlang, Bash, Dart

Software's: Git, Overleaf, MATLAB

Interests

Camp cook Managed meal preparation and food logistics for a large scout unit.

Hockey: Played hockey for over 15 years, balancing sports with academic responsibilities.

Langage levels

• French : C2 (Native speakers)

English : C1Dutsh : B2