# Valentin Dumitru

♥ Valthermond, Netherlands | ■ valentindmtr115@gmail.com | → +31 610971413

Portfolio: valydumitru01.github.io/ValentinDumitrusPortfolio/

🗖 @valentin-dumitru | 🞧 @valydumitru01

#### **About Me**

Passionate and driven software engineer specializing in graphics programming, real-time systems, and high-performance software. With deep expertise in C++, OpenGL, and software architecture, I thrive in solving complex technical challenges from the ground up. My creativity and problem solving skills allow me to optimize performance and deliver high-quality solutions.

#### **Education**

# Bachelor's Degree in Software Engineering and Computer Science

Oviedo, Spain

University of Oviedo

**Sep.** 2019 – Jun. 2024

Studying software engineering has shaped my disciplined approach and commitment to quality development. I extended my studies by one year to complete an extensive final degree project. 240 ECTS. Spanish Average Grade: 7.4/10.

## Experience

#### C++ Soft-switch Developer

Rohill B.V.

NetherlandsDec. 2024 − Present

I am currently working as a C++ developer and engineer in a critical mission telecommunications company. Responsibilities include documenting, architecting, and developing a full-stack website using Angular and C++ and the software of critical mission soft switches developed in C++. I overhauled one of their systems, drastically improving performance, maintainability, and efficiency.

#### Game Engine "GLESC"

Personal Passion Project

♥ Oviedo, Spain
■ Jun. 2021 – Jul. 2024

See [Projects > Personal Game Engine "GLESC"] section for more details.

#### **Internship at Inetum**

Inetum

♥ Oviedo, Spain
➡ Feb. 2023 – Apr. 2023

Performed full stack development to create an e-commerce website on the Out-systems low-code platform. Designed, documented and developed the site as part of the degree program.

## **Projects**

# Game Engine "GLESC"

Oviedo, Spain

Personal Passion Project

**i** Jun. 2021 – Feb. 2023

- Developed a custom C++ game engine using SDL and OpenGL with a modular ECS architecture.
- Implemented a custom math library and graphics API abstraction to ensure cross-platform performance.
- Invested 3500+ hours focusing on optimization, maintainability, and high code quality.
- Comprehensive documentation provided via Doxygen, a 300+ page PDF (in Spanish), and detailed analysis reports.
- Links: GitHub Repository | Doxygen Documentation | CppDepend Output | Full PDF Documentation in Spanish

I have more but they don't fit here. To see all my projects, I highly recommend checking my portfolio: click here!

## **Skills**

- Real-Time Development: High-performance C++ using optimized memory access and parallelism.
- Web Development: Full-stack expertise (vanilla JS/CSS/HTML, Angular, Bootstrap, SpringBoot).
- Documentation: Proficient with Doxygen, Compodoc, Mermaid, Draw.io, Microsoft Office, and MTEX.
- **Debugging & Analysis:** Skilled with IDEs (VS, CLion, VS Code), GDB, static analysis tools (CppDepend, Codalyzer, ESLint), and runtime profilers (NSight, MVS). Expert in unit testing, integration testing, and E2E testing.
- Performance & Optimization: Expert in optimizing performance, memory usage, and maintainability.