

# António Silva

COMPUTER ENGINEER

Braga, Braga

☎ (+351) 968780666

✉ antoniofcsilva2003@gmail.com

🐙 AntonioSilva03

🌐 António Silva

## Education

### Escola EB 2,3 de Gualtar

Braga  
2013 - 2018

### Escola Secundária Carlos Amarante

SCIENCE AND TECHNOLOGY COURSE

FINAL AVERAGE OF 18.22 VALUES

Braga  
2018 - 2021

### Universidade do Minho

DEGREE IN COMPUTER ENGINEERING

Braga  
2021 - 2024

## Certifications

### Academic Merit (x8)

AGRUPAMENTO DE ESCOLAS CARLOS AMARANTE

Braga  
2013-2021

### Certificate in Advanced English (C1)

CAMBRIDGE ASSESSMENT ENGLISH

Braga  
december 2020

## Projects

### Online auction platform

UNIVERSIDADE DO MINHO - COMPUTER LABS IV

🐙 AntonioSilva03/Projeto-LI4  
september 2023 - january 2024

- Platform for creating auctions containing skins from the Counter-Strike game
- Platform composed of 3 layers: Database, Business Logic and User Interface
- Basic authentication with email and password, with which each user can create auctions, bid on auctions and view their auction history
- Admin Dashboard
- Tools - Blazor, Microsoft SQL Server, HTML, CSS

### Curricular Units Site Generator

UNIVERSIDADE DO MINHO - WEB ENGINEERING

🐙 AntonioSilva03/Projeto-EngWeb  
may 2024 - june 2024

- Platform to generate web pages that support curricular units
- Three types of users (student, teacher, admin)
- In this app, CU teachers can make files available and post information about the CU (evaluation, timetables, teaching team).
- All of this content can be consulted by students who enter the UC.
- Architecture divided into 3 layers: interface, authentication server, API and database
- Authentication with JWT
- Tools - Express, MongoDB, JWT, Docker

### 3D Engine

UNIVERSIDADE DO MINHO - COMPUTER GRAPHICS

🐙 AntonioSilva03/Projeto-CG  
february 2024 - june 2024

- In this project, a 3D engine was developed based on 3D mini-figure graphics.
- It was divided into four phases and, in each phase, a set of configuration XML files was provided for testing and evaluation purposes.
- It was possible to create 3D scenes, such as the creation of a cube, a plane, a sphere, a cone, a cylinder and even a solar system, with realistic planet rotation.
- A system of manually geometric transformations, a camera system and a lighting system were implemented.
- Tools - OpenGL, C++.

## Task orchestration service on a computer

UNIVERSIDADE DO MINHO - OPERATING SYSTEMS

 AntonioSilva03/Projeto-SO

march 2024 - june 2024

- The server runs infinitely, persistently waiting for client requests.
- The client can request a task execution, a program pipeline or a server status.
- The server can run with two scheduling policies that must be passed as an argument.
- You can test the execution times of multiple policies with the same tasks
- Tools - C

## Development of a system interface

UNIVERSIDADE DO MINHO - PERSON-MACHINE INTERFACE

 AntonioSilva03/Projeto-IPM

march 2024 - june 2024

- Interface for mechanics at a service station
- Multiple states for a service
- Possibility to change details
- Pinia was used to implement the application state
- Backend implemented with json-server
- Tools - Vue

## Service station management systems

UNIVERSIDADE DO MINHO - SOFTWARE SYSTEMS DEVELOPMENT

 AntonioSilva03/Projeto-DSS

september 2023 - january 2024

- This system helps the operation of an E.S.Ideal station.
- Various diagrams to help understand the system
- Provides its customers with various car booking and maintenance services.
- Two types of users: manager and mechanic
- Architecture implemented using a database.
- Tools - Java, SQL Server and Visual Paradigm.

## Database of a fictitious Hospital

UNIVERSIDADE DO MINHO - DATABASE

 AntonioSilva03/Projeto-BD

february 2022 - june 2023

- Definition of a hospital's information system and human resources
- Requirements Gathering and Analysis
- Conceptual and logical modeling of the database
- Physical implementation of the database and a database management system
- Data Analysis Panel System
- Tools - SQL, PowerBI, brModelo

## Peer-to-Peer file transfer service

UNIVERSIDADE DO MINHO - COMPUTER COMMUNICATIONS

 AntonioSilva03/Projeto-CC

october 2023 - december 2023

- A peer-to-peer file transfer service allows clients to more efficiently transfer data from multiple nodes (seeders) by transferring different parts of packets in parallel.
- There is a central entity that handles connections and controls which files each node has
- It is also possible to consult the files that are being shared at that moment directly in the program, as well as delete files.
- Use of TCP and UDP
- Tools - Java

## Learning and decision models

UNIVERSIDADE DO MINHO - SMART LEARNING AND DECISION

 AntonioSilva03/Projeto-ADI

march 2024 - june 2024

- This project is divided into two separate tasks. The first task consists of querying, exploring, analyzing and preparing a dataset chosen by us. The second task consists of the same basis, but this time on a dataset chosen by the teachers.
- As the dataset chosen by the teachers normally demonstrated a Classification problem, the dataset we decided to choose normally demonstrated a Regression problem.
- All models in detail as well as results and analysis can be found in one report.
- Tools - KNIME

## Messaging services

AntonioSilva03/SSI2324

UNIVERSIDADE DO MINHO - COMPUTER SYSTEMS SECURITY

february 2024 - june 2024

- Repository with all practical work carried out in the IT Systems Security course and laboratory guides.
- TP1: encrypted message exchange service that uses the Diffie-Hellman protocol. x503 certificates and the Station-to-Station protocol are also used.
- TP2: Concordia application. Message exchange service that works with users and groups on the Linux system. It is possible to send messages to a single user or to a group made up of several users.
- Tools - Python, C

## Forth Compiler

AntonioSilva03/Projeto-PL

UNIVERSIDADE DO MINHO - LANGUAGE PROCESSING

may 2024 - june 2024

- Compiler for the Forth language that generates code for a virtual machine
- Translator grammar based on PLY-Yacc
- Lexical analyzer implemented with PLY-Lex
- Tools - Python

## Skills

---

**Programming languages** C++, C, C#, Python, Java, JavaScript, Haskell, HTML, CSS

**Frameworks** Vue, Blazor, Express

**Tools** Git, Docker, MongoDB, SQL Server

**Spoken Languages** Portuguese, English

**Soft-skills** Teamwork, Communication, Time Management, Troubleshooting, Adaptability, Bug finding