RICARDO MARGALHAU

margalhau.ricardo@gmail.com \(\phi \) github.com/xploitedd \(\phi \) linkedin.com/in/rmargalhau

EDUCATION

NOVA School of Science and Technology

MSc. in Computer Science

September 2021 - Present Monte da Caparica, Portugal

Instituto Superior de Engenharia de Lisboa

BSc. in Computer Science and Engineering

September 2018 - August 2021 Lisbon, Portugal

WORK EXPERIENCE

Celfocus

August 2021

Software Developer Intern

Lisbon, Portugal

- \cdot Developed a strategy for asynchronous communication between two microservices with **Spring Batch** and **RabbitMQ**
- · Improved the existing **Jenkins** pipeline to build, test and deploy the microservices with **Helm** and **Kubernetes**

RE-USE October 2020

Freelance Full-stack Developer

Lisbon, Portugal

- · Developed RE-USE website using **Vue.js** as the frontend framework and **tailwind.css** as the stylesheet framework
- · Deployment and configuration of the web server and domain names

ISEL Formula Student

September 2019 - September 2020

Driverless Technical Director

Lisbon, Portugal

- · Founded the driverless technical team that has the goal of developing and maintaining an autonomous formula student car
- · As part of the foundation process, there was a recruitment process targeted at ISEL students with some programming experience
- · Explored the State of the Art including, but not limited, to the AMZ driverless car design and implementation process

ISEL Formula Student

October 2018 - September 2019

Telemetry Software Developer

Lisbon, Portugal

- · Implemented a new telemetry system to replace the old one
- · Used Arduino for radio communication between the car and the on-track base station
- · The base station manager was implemented in Java, but a Kotlin alternative was prototyped
- · Received data was later stored on a time-series database for later visualization with Grafana

PROJECTS

i-on Project 2021

Contributer

https://github.com/i-on-project

- · The main goal of the project is to improve the academic life for both students and teachers
- · Worked mainly on the Core system of the project, with Kotlin and Typescript
- · Design and Implemented an overhaul of the Deployment and Infrastructure provisioning system, based on **Docker**, **Docker-Compose** and **Ansible**
- · Implemented support for User Authentication with the institutional email

 \cdot Implemented a **REST** API for user preference management

Draw and Guess Android Game

· Implemented in the context of the Mobile Device Programming class

- · Developed an Android drawing ang guessing game based on the broken telephone game, in Kotlin
- \cdot Used $\bf Firestore$ for match making and game status management

TECHNICAL SKILLS

Languages Java, Kotlin, Python, C, C++, C#, PHP, LaTeX, SQL, JavaScript, TypeScript

Tools Docker, Git, Ansible, Jenkins

Web skills HTML5, CSS, React, Vue.js, Tailwind, Bootstrap

INTERESTS

Gaming	Reverse Engineering	Algorithms and Data structures	Automation	Penetra-
tion Testing				

2020