Mihai Cosmin Rosu

Computer Science Student

Phone 0722502985

E-mail mihaicosminrosu@yahoo.com

LinkedIn https://www.linkedin.com/in/mihai-cosmin-rosu/ **GitHub** https://github.com/mehigh8

Education

2020-09 - Current

Bachelor of Science: Computer Science

Faculty of Automatic Control And Computer Science - Bucharest, Romania

- Expected graduation year: 2024
- Average grade in the first two years: 9.35 out of 10.00
- Relevant coursework: Operating Systems Usage (Bash), Data Structures (C),
 Object-Oriented Programming (Java), Algorithm Analysis, Numerical Methods
 (MATLAB), Computer Programming (C), Algorithm Design, Programming
 Paradigms (Racket, Haskell, Prolog), Parallel and Distributed Algorithms (C, Java,
 MPI/C), Computer Graphics (OpenGL/C++).

Relevant Projects

May 2022

Halite 2016 Bot

- Project: https://github.com/mehigh8/HaliteBot_FirstForce
- Implemented a **Java** bot based on the Halite starter package. It uses a **greedy** approach to determine the best way to expand on the two dimensional grid by calculating every tile's worth value taking into consideration the current state of the map.
- Finished 4th in the 2022 University competition.

April 2022

Unity/C# Android App

- Project and APK: https://github.com/mehigh8/Gyroscope
- Developed an application using **Unity Game Engine** that rotates the camera inside the scene by using the phone's built-in **gyroscope**.
- <u>Documentation</u> describing the details behind the project.

December 2021

Comparison between Hashtable and Treap

- Project: https://github.com/mehigh8/HashtableTreapComparison
- Implemented both data structures in C, and generated tests of varying sizes.
- Ran said tests on each of them and compared the results to determine which one
 is more time efficient when there are applied various operations such as inserting,
 removing or modifying.
- <u>Six-page documentation</u> explaining the project step by step.

March 2021

Load Balancer

- Project: https://github.com/mehigh8/LoadBalancer
- Implemented in **C** using consistent **hashing**.
- Based on a **hash ring**, which has multiple servers (can add or delete servers) that store tasks by using the load balancer so that the workload is evenly distributed.

Extracurricular Activities and Awards

- Game Development Competitions/Jams, improved teamwork and critical thinking, developed a theme based game using Unity in 72 hours together with 2/3 other people; 2020,2022
- Certified with Baccalaureate level by ECDL, during my last year of high school, 2020
- Great results in the County Computer Science Olympiad, Top 30% in 2017, Top 25% in 2018, enhanced my problem solving skills.

Skills

- Programming languages:
 - o Intermediate: C, C++, C#, Java
 - o Beginner: Racket, Haskell, Prolog, Python, MATLAB, Assembly, Bash
- Communication languages:
 - o English: Fluent