

Youssef Rizkalla

COMPUTER SCIENCE · SOFTWARE DEVELOPER

✉ rizkally@mcmaster.ca | 🏠 johnwinter13.github.io | 📺 JohnWinter13 | 📺 youssef-rizkalla

Experience

Fullstack Android Developer

Mississauga, ON

FATHER MICHAEL GOETZ SECONDARY SCHOOL

May 2018 - July 2018

- Developed a mobile app using Xamarin and C# to assist students in managing their school life
- Wrote a Windows Form program using C# to create and maintain a graph database of the school, mapping rooms in the school's building and connecting them with paths
- Integrated data-base into the mobile app and built a navigation system using a path-finding algorithm, which finds the shortest paths between two rooms on the same or different floors
- Connected a database to map Wi-Fi access points to rooms in the school's building, allowing the app to automatically detect the user's location and update it in real-time
- Technologies used: C# // AXML // Xamarin // Windows Forms

Personal Projects

The Perpetuator

github.com/JohnWinter13/Ninja

UNREAL ENGINE 4 GAME

Oct. 2017 - Dec. 2017

- Developed a 3D / 2D perspective shift game in Unreal Engine for a board-wide game design competition
- Designed a combat system in 2D, allowing the player to use different skills and weapons
- Implemented an inventory and shop system; allows the player to collect coins and purchase items in the 3D world which they can then use in the 2D world to gain the upper hand in combat
- Placed 1st for the best 3D game category
- Technologies used: Unreal Engine 4.17 // Unreal Blueprints

Contest Programming

github.com/JohnWinter13/CPLibrary

ALGORITHMS AND DATA STRUCTURES IMPLEMENTATIONS

Nov. 2017 - Mar. 2018

- Showcases a collection of contest solutions on online judges
- Implemented algorithms and data structures pertaining to topics such as graph theory and dynamic programming
- Technologies used: C++ // C# // Java

Honors & Awards

Mar. 2018 **4th Place**, ECOO Round 1 Programming Contest

Mississauga, ON

Feb. 2018 **Certificate of Distinction**, Canadian Computing Competition Senior Division

Waterloo, ON

Dec. 2017 **1st Place**, Dufferin-Peel School Board Game Design Competition

Toronto, ON

Dec. 2016 **3rd Place**, Dufferin-Peel School Board Game Design Competition

Mississauga, ON

Skills

Languages C# // C++ // Java // Javascript // Haskell

Frameworks Xamarin // Windows Presentation Foundation // Windows Forms // GatsbyJS

Front-End XAML // HTML5 // CSS3 // React // Material UI

Other Git // Unreal Engine 4

Education

B.A.Sc in Computer Science

Hamilton, ON

McMASTER UNIVERSITY

2018 - Exp. 2022

- President's Entrance Scholarship Recipient