# **Omar Shabana**

☐ (416) 720 4872 • ☑ omarwshabana@gmail.com • ☑ oshabana.github.io/Portfolio/github.com/oshabana

# **Education**

#### University of Toronto

Toronto, ON

Honours Bachelor of Science,

Expected: May 2021

**Major:** Geographic Information Systems **Minors:** Computer Science and Mathematics

**Related Coursework:** Software Development, Algorithm Design, Web Development, Data Structures, Theory of Computation, Software Tools and Systems Programming

# **Skills**

**Languages:** JavaScript(ES6), TypeScript, HTML5, CSS3, Python, C, Java, C# **Frameworks/Libraries:** React.js, Node.js, Express.js, Bootstrap, Ajax, Jest, Puppeteer

Tools: Git, Linux, MongoDB, SQL, Docker, Debugging, Unit Testing

# **Software Projects**

## Covid-19 Shopping App | Website, Code

A web app designed to assist people who are at risk with grocery shopping via their local community

- o Constructed with React.js, Bootstrap, Node.js, Express.js and MongoDB
- o Collaborated with a team to build a full-stack app
- o Participated in using industry software engineering practices like creating design documents and scrum meetings
- o Added user authentication that involved multiple tiers such as user, group administrator and server administrator
- o Implemented features like synced grocery lists between user groups and an administrator panel for database manipulation

#### 2D Front-End Game Engine | Website, Code

A retro style game engine which allows users to develop their own arcade style shooters

- Used a minimalist tech stack of HTML, CSS and JavaScript
- o Developed a 2D game engine with features like movement, projectiles, and user interface elements
- o Focused on making interactive 2D retro games easier to develop in as few lines of code as possible

### Asset Portfolio Tracker | Code

A stock portfolio tracker which calculates asset and portfolio values throughout the day

- o Built with a solo full-stack app with React.js, Node.js and MongoDB
- o Integrated libraries like react-cookie, mongoose, axios, as well as bcrypt to mange authentication and user state
- Designed a REST API to assist the front-end with displaying user portfolios
- o Recruited the help of an external API to retrieve stock data and then parsed JSON objects to extract relevant data

## **3D Foraging Game** | Code

A game focused on harvesting materials to create equipment and improve skills

- Created a game using C# and Unity
- o Implemented camera controls like zoom in and out
- o Included user interface elements like a backpack and an object identifier
- Added player controls and abilities such as mining and woodcutting

# Work/Leadership

# **Supervisor** *Tim Hortons.*

Mississauga, ON

September 2014 - December 2018

o Oversaw all store operations when present

- Solved problems quickly in a fast paced, high stress environment
- o Created and implemented a system to improve drive-thru service times by over 30% during peak hours