Tommy Huang

1B CS Student at the University of Waterloo

github.com/tommyhuang-dev

tommyhuang.net

(647) 609-7078

t98huang@edu.uwaterloo.ca

Skills and Technologies (Listed with most proficient first)

Languages: Python, Java, Racket, C++, HTML, CSS,

Technologies: Git, Arduino, Autodesk Inventor, Valve Hammer Editor, Shotcut

Projects

Shape Defense (Python, Pygame)

- Utilized Pygame, a module for Python, to create a video game where players can build, upgrade, and construct mazes to defend themselves from enemies
- Learned about pathfinding algorithms, graphical user interfaces, and reading/storing information about maps and entities
- Project started in August of 2018, with regular, ongoing development

SprayZ (C#, Unity)

- Helped create an app that allows the user to digitally spray-paint on real world surfaces through a smartphone camera by using Augmented Reality (AR)
- It used Unity 3D's AR to detect walls and floors
- Created during the hackathon *Hack the North 2019*

Line following car (C++, Arduino)

- Designed a small car that used Arduino and IR sensors to follow a black line or tape
- Could navigate turns, both gradual and sudden (i.e. 90-degree intersection), as well as stop, based on the path created

Experience

Highschool Robotics Team (Head of Design)

- 3-D Modelled and assembled intricate components of a robot using Autodesk Inventor
- Organized and subdivided tasks to the rest of the team
- Communicated with other teams to ensure models stayed up-to-date and accurate

Waterloo Rocketry Team (Member of Electrical Team)

- Engineered a prototype that utilizes magnets and a hall effect sensor to detect if a tank is full
- Will soon help incorporate the prototype into the final design of the rocket