Alex Shevchuk

shevlrex in

+1 778 533 2241

shevrlex@gmail.com



<u>alxshev</u>

DEST Git

Skills

C Python Java JavaScript Machine Learning REST Git

C++ SQL MATLAB React Arduino

Education

Major in Physics & Computer Science | UBC

Courses in Physics & Computer Science | University of Toronto

June 2020 – now, GPA TBD Sep 2019 – April 2020, GPA 4.0

Software Developer | U of T Neurotech Club

Jan 2019 - May 2020

- Worked with *Python* server software used to process signals from EEG headset and make inferences for use by other applications (typing keys on a keyboard, namely).
- Learned various *machine learning* techniques used to extract results from EEG data (neural networks, CNNs, SVMs, PCA analysis, K-means clustering, logistic regression)
- Implemented ML algorithms above using Python and MATLAB

Liquid Rocket Propulsion Developer | U of T Aerospace Team

Sep 2019 - May 2020

- Developed module analyzing fuel pressure drop across rocket piping systems with 98% accuracy using scientific computing Python libraries (NumPy, SciPy, MatPlotLib) and *MATLAB*
- Extended and tested large scale propulsion simulation software using *Git/GitHub* for collaboration

Software Developer Intern | UVIC Innovation Centre

June 2018 – Sep 2019

- Developed front & back end for system managing business competitions using *WordPress* plugins and working with *REST APIs*
- Created city-wide network website connecting 80+ entrepreneurs with mentors using PHP, MySQL, and React
- Worked in *UNIX* environments, wrote *bash* scripts for Linux servers, and developed REST web services for a *Google Cloud* machine

Personal Projects

Robot Alarm System | Arduino, Raspberry Pi, Python/C

- Got a top place in a hackathon with 50+ teams by building from scratch a Roomba-style alarm system in a team of 4 engineers
- Developed and tested breadboard digital electronic circuits involving sensors, actuators, motors, and input devices
- Programmed *Arduino* microcontroller which used *I2C* communication.
- Wrote voice control interface for robot using Python, a *Raspberry Pi*, and Google's Speech Recognition API

Connect the Dots Mobile App | Java, Android Studio

- Developed Piano Tiles-style native Android app in Android Studio using *Java*
- Gained experience with multithreading and concurrency