

# JOYCE KE

647-961-6161  
j6ke@uwaterloo.ca  
www.linkedin.com/in/joyce-ke/  
github.com/JoyceKe  
joyceke.com

## Education

University of Waterloo

Mechatronics Engineering, Honours

Co-Op B.A.Sc. Candidate, 2019 – 2024

## Skills

Languages

C++ · Java · HTML · CSS · JavaScript · XML · SQL · Shell Script · RobotC · Arduino · Python · QBasic

Technical Skills

Git · Jenkins · UrbanCode Deploy · HashiCorp Vault · Red Hat OpenShift Container Platform · Pivotal Cloud Foundry · Linux · Dynatrace · Splunk · AutoCAD · SolidWorks · Postman · SoapUI · DbVisualizer · Adobe CC · Microsoft Office · Spring Boot

Professional Skills

Teamwork · Problem-Solving · Communication · Time-Management

## Courses

Intro to containers, Kubernetes, and Red Hat OpenShift (DO180)

## Interests

Music

First violinist in the Mississauga River Orchestra and member of multiple school bands

Travelling

Visited 9 different countries to learn about cultures, histories, and foods

## Work Experience

**Royal Bank of Canada Developer** · Jan 2020 – Apr 2020

- Created 2 Java Spring Boot RESTful APIs with 75% coverage and deployed to Pivotal Cloud Foundry
- Worked with team to migrate 57 services from IBM Bluemix to Red Hat OpenShift Container Platform through coding configurations and using various DevOps tools
- Updated a UI from Angular 5 to Angular 9 for PoC project and used SQL to conduct performance testing in DbVisualizer
- Tested services using Postman and SoapUI in various environments
- Monitored traffic and health of applications using Dynatrace and Splunk
- Created 7 BPMN architectural diagrams to keep track of and drive team's progress

**Inspiration Learning Centre Intern** · Apr 2019 – Aug 2019

- Developed a data processing and tracking module for a Warehouse Management System using C++
- Tested and debugged application on site
- Maintained database for warehouse inventory

**ProWise Engineering Inc. Mechanical Intern** · Jun 2019 – Aug 2019

- Created, modified, and revised mechanical drawings (i.e., plumbing, HVAC, etc.) using AutoCAD
- Researched and provided equipment model recommendations based on required specifications
- Travelled to physical client sites to survey mechanical features to create accurate floor plans
- Edited various images using Adobe Photoshop

## Projects

**myStocks** · 2019 – Present

- Built web scraper in Java and performed sentiment analysis on scraped data using Text Analytics API from Microsoft Azure
- Developed website from scratch using JavaScript, CSS, and HTML
- Set up Firebase accounts to store data for individual users

**Good Doggo** · 2020

- Constructed a dog running toy using a microcontroller, two geared DC motors, an ultrasonic sensor and an accelerometer
- Used Arduino IDE to produce all code to control robot's motions and functions

**Encryption and Decryption Robot** · 2019

- Coded a robot that takes a file and physically writes out the encrypted or decrypted message using RobotC
- Constructed robot and 3D printed components using SolidWorks

**Card Memory Game** · 2017

- Developed a card-matching memory game using QuickBasic
- Independently researched and created intricate card designs