SHELA QIU

shela.qiu@uwaterloo.ca | 647-530-9896 | github.com/shelaq | linkedin.com/in/shelaqiu

EDUCATION

UNIVERSITY OF WATERLOO Candidate for Bachelor of Software Engineering 2021

- 3.7 GPA, Dean's Honours List

LANGUAGES

LANGUAGES Java, Python, JavaScript, SQL, C++ FRAMEWORKS Spring MVC, JUnit, React, Pyramid

EXPERIENCE

BACKEND DEVELOPER INTERN Cognite
September 2018 – December 2018 | Oslo, Norway

- Reconfigured GeoMesa integration from HBase onto Bigtable to enable queries over time and space
- Architected a microservice using MVC framework (Java, Jetty). Deployed using Docker, Kubernetes
- Organized an internal company hackathon, and Girls' Geeks data science workshop for Pattern Search
- Built a QA app for company all-hands: React. Mentored a teammate to build a Django backend

SOFTWARE DEVELOPER INTERN Tesla
January 2018 – April 2018 | Palo Alto, CA

- Python, Pyramid, React : developed web application used by service technicians for car diagnostics
- Redesigned and built the customer support system to triage 200 emails/month
- Decreased by 10x the number of support cases handled by the service engineering team, by architecting a multi-level escalation system

SOFTWARE DEVELOPER INTERN Loblaw Digital
May 2017 – August 2017 | Toronto, ON

- Optimized API endpoint logic for the Click N' Collect platform in Java
- Generated mock data for vouchers and weekly flyers to be used by automation testing
- Implemented extensive software tests with JUnit

SOFTWARE DEVELOPER INTERN Biomarker Imaging Research Lab (Sunnybrook Research Institute)
Summer 2015, Summer 2016 | Toronto, ON

- Sped up front-end development time by 75% by automating JavaScript UI form element layout
- Optimized data migration and validation processes by 50% using VBA macros and SQL

PROJECTS

UOMI github.com/shelaq/hackthe6ix-project

- Designed the software architecture and RESTful API for a debt manager web app
- Implemented a back-end using Flask-PyMongo and MongoDB

WIND TUNNEL

- Developed real-time computational software in Java to analyze lift, drag and wind speed
- Used Ardulink to interface between the GUI and Arduino input from pressure sensors

ACTIVITIES

TECHNICAL PROJECT LEAD Plastics for Change (UW Blueprint)
January 2018 – present

- Mentoring developers, guiding architectural decisions, code reviews, building team camaraderie

LOGISTICS COORDINATOR (TRAVEL) Hack the North
March 2017 – October 2018

- Collaborated with a team of 30 organizers to plan Canada's biggest hackathon
- Organized 8 local and international bus routes for 600+ participants
- Collected information from multiple stakeholders to design a QR scanning application for the event
- Developed a Python application to find flight prices for international participants

AWARDS

National AP Scholar with Honor, College Board
2nd Place Fifth Annual Operations Research Challenge, University of Toronto