Shaurya Madan

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Skills Summary

- **Languages:** Django, Python, C/C++, Android Studio (Java), Bash
- **Tools:** Heroku, Amazon Web Services, Linux CLI, Vagrant, PostgreSQL, Git, Subversion
- **Proficiencies:** Linux Systems Programming, HTTP, TCP/IP, UDP, Geographic Information Systems

Work Experience

SOFTWARE DEVELOPER, PYTHON| Avenza Systems Inc | May - Aug 2019

- Maintained and updated web pages and transactions for the Avenza MapStore, using Django
- Created and updated models for the MapStore's PostgreSQL database using the Django Queryset API
- Worked on a proof of concept to extract GIS metadata from maps using the GDAL C++ library
- Created a tool to populate test databases that simplified unit testing and streamlined development
- Set up virtual machines for development using Vagrant, and deployed and maintained to Heroku

SOFTWARE DEVELOPER, EXSTREAM PRODUCT| OpenText Corporation | Sep - Dec 2018

- Developed Python scripts to automate regression testing of the OpenText Exstream software suite
- Expanded the Exstream PYFT automation framework built on top of pywinauto
- Wrote unit tests that extensively used Python's built-in test frameworks
- Used SVN when editing or adding to the codebase

PRODUCT VERIFICATION SPECIALIST | Evertz Microsystems Limited | Jan - Apr 2018

- Tested bugs and performance issues on current and upcoming builds of the Evertz DreamCatcher system
- Developed a Python tool to create artificial latency in a network by delaying data packets sent to an ethernet port or IP address, used for performance testing and real-world simulations
- Created a basic user interface with Bash for this network tool

Personal Projects

Ocra | August 2019

- Created Android app that would scan price tags and find the product at a cheaper price in other stores
- Stored images in Amazon S3, used Lambda to call Textract for OCR, and ran web scrapers on EC2

Education

CANDIDATE, BACHELOR OF APPLIED SCIENCE, COMPUTER ENGINEERING | UNIVERSITY OF WATERLOO | 2022

- Relevant coursework: C/C++ programming, Linux systems programming, data structures and algorithms, digital circuits and computers, discrete math and logic, economics.