

Derek Avery

Computer Science Student

Personal Info

Email

averyderek1@gmail.com

Phone

(206) 778-8948

LinkedIn

<https://www.linkedin.com/in/averydl>

GitHub

<https://github.com/averydl>

Website

<http://averydl.com>

Languages

Proficient Using:

- Java
- C++
- Python
- SQL

Experience With:

- MATLAB
- R
- XML, JSON
- Bash
- HTML, CSS

Software

- Git, GitHub
- MySQL
- Vim
- Make
- Wireshark
- IntelliJ, NetBeans

Education

Bellevue College

Graduation: Jun 2020

- Computer Science (BS)

University of Washington

Sep 2013 – Jun 2017

- Civil Engineering (BSCE)
- Chemistry (BS)
- Biochemistry (BA)

Coursework

Bellevue College

- CS 210/211 - Fundamentals of CS I/II (Java)
- CS 300 - Data Structures (C++)
- CS 331 - Database Systems (SQL, Java)
- CS 341 - Computer Networks (Java)
- CS 351 - Computer Architecture (ARM Assembly, C++)
- CS 401 - Algorithms (Java)

University of Washington

- AMATH 301 - Applied Computing (MATLAB)
- STAT 390 - Statistical Methods in Engineering & Science (R)

Projects

Trading Card Web-Scraper (Python)

Implemented python script which:

- Downloads webpages from a list of URL's stored in a local text file modified by the user
- Extracts relevant trading card information (name, price) from downloaded webpages using regular expressions
- Writes results to text file/sends results in an email using SMTP; directory path and email/authentication credentials are read from the user-modified configuration file

Rainfall Data Processing (Python)

Implemented python module with functions to:

- Preprocess space-delimited weather data files with missing dates to add placeholder 'null' values
- Combine weather data from multiple files w/ overlapping time periods, storing the maximum rainfall from each unique date
- Reformat line-by-line rainfall data into a user-readable, monthly format for interpretation or further analysis using Excel

Experience

Civil Design Engineer - MKA (Jun 2017 - Sep 2018)

- Implemented programs and scripts for engineering calculation and data analysis using Python, VBA and SQL
- Coordinated with numerous project stakeholders during multiple stages of project development
- Verified conformance with specifications under tight deadlines

Project Scientist – Clear Water Services (Jun 2016 – Dec 2016)

- Engaged in troubleshooting of existing VBA code used for automated data collection from remote sites
- Designed Microsoft Access reports to summarize relevant water quality data for active project sites