

John S.G. Purviance

johnpurviance.com

jpurviance@vt.edu

Full-Time Software Engineering Position

Education **Virginia Polytechnic Institute and State University**, Blacksburg VA
B.S. in Computer Science, Expected Graduation in May 2017
Minors in Economics and Math
Computer Science GPA: 3.53/4.0 University GPA: 3.23/4.0

Employment **Data Engineer (Intern), Capital One**
Dallas TX, June 2016 — August 2016

- Developed REST API for tracking and serving log files with Node.js on AWS.
- Built application dashboard for visualizing system utilization and job tracking.

Software Engineer (Intern), Reinventing Geospatial, Inc.
Fairfax VA, June 2015 — August 2015

- Removed security vulnerability in REST web application API.
- Built and utilized web API's to simplify user workflows for establishing, managing and accelerating Maps and GIS services.

Software Engineer (Co-Op), Reinventing Geospatial, Inc.
Fairfax VA, January 2015 — May 2015

- Designed Python command line tools for administrators to manage GIS Services.
- Configured RHEL servers for accelerating Maps on Apache.

Teaching Assistant, Introduction to Floral Design
Virginia Tech, January 2016 — May 2016

Human Resources Intern, Stansley Industries, Sylvania OH, Summer 2013

Personal Projects **CafeConnect**, Capital One Hackathon, July 2016

- **Mobile / Web App Winner** for creating an iOS and Web App for facilitating interaction between Capital One customers and banking ambassadors.
- Designed and developed Node.js REST API for application hosting and customer request management.

Flex, Budget Management Application, VTHacks III February 2016

- **Microsoft API Winner** for use of Azure and Microsoft's Public APIs.
- Designed Python REST API for interfacing with Capital One user accounts.

Hardware Cache Simulation and Algorithm Analysis

- Developed Java based cache simulation application for Direct Mapped, Set Associative and Fully Associative Caches.
- Analyzes algorithms to track effective usage of hardware caches.

Research **NSF/REU - LEWAS Lab**, Virginia Tech, September 2013 — January 2015

- Designed a Raspberry Pi based autonomous environmental monitoring system.

Skills **Python, Java, JavaScript, C, HTML, CSS, Git, AWS and Node.js**

Leadership Experience **VT Computer Science Mentor Club**, Spring 2014 and 2016
Vice President, Hawthorn House, Residential College at West Ambler Johnston Virginia Tech, August 2013 — May 2014