Adam Fowles

adamfowles22@gmail.com | 860.416.7468

EDUCATION

ROCHESTER INSTITUTE OF TECHNOLOGY

MS in Computer Science
May 2017 | Rochester, NY

Domain: Parallel and Distributed Systems

BS in Computer Science
May 2016 | Rochester, NY

Minor: Communication

SKILLS

PROGRAMMING

Extremely comfortable:
C++ • Golang
Comfortable:
Python • Javascript
Familiar:
Java • C#

ARCHITECTURE

AWS Cloudformation • MIRO • UML Diagraming: Sequence, Class • LaTeX • Doxygen

AGILE

JIRA • Confluence

TECHNOLOGIES

Artifactory • AWS: DynamoDB, ECS, EC2, EKS, Lambda, Step, SNS, SQS • Boost C++ • CMake • Curl • Docker • Git • Jenkins • Kubernetes • Mapbox • OpenCV • React • Rollbar • RPM • Vim

LINKS

Github:// **afowles**
LinkedIn:// **adamfowles**

EXPERIENCE

EAGLEVIEW | Solution Architect

Jan. 2021 - Present | Rochester, NY

Aerial imagery, data analytics, property data, and GIS solutions.

- Architecting solutions for a business unit tasked with the capture, processing, and displaying of imagery.
- Designing and implementing modern Kubernetes based services on top of AWS.
- Describing solutions and high level architecture to a wide audience of product and technical personnel. Documenting and diagramming architecture for a large group of teams.

Jan. 2020 - Jan. 2021 | Sr. Specialist Engineer

- Integrated an image factory which produced over 200 million images in 2020 with a warehouse for storing imagery. Implemented Golang microservices built on top of AWS. Architected AWS systems using DynamoDB, ECS, Lambda, SQS, and SNS.
- Governed an image factory codebase of 100K+ lines of modern C++ (17/20, GCC 10+) including application and library code built on the latest Fedora operating systems. Managed complex code dependencies and build systems utilizing Docker, Artifactory, and Jenkins.
- Architected services across verticals in a global engineering organization. Collaborated with teams in Bengaluru, Perth, and Bellevue.

Apr. 2019 - Jan. 2020 | Specialist Engineer

- Designed and developed scalable applications for extracting and developing raw imagery from an aerial capture system. Built on top of AWS using EC2.
- Utilized Jenkins for continuous integration with Docker for building and deploying applications and libraries. Wrote unit tests using google test with lcov/gcov code coverage tools.

Apr. 2018 - Apr. 2019 | Software Engineer II

- Supported an image processing R&D team on scaling and building cloud-based solutions for new aerial image pipelines.
- Implemented a library for writing a custom image format that efficiently displayed tiled imagery at multiple resolution levels.

Aug. 2016 - Apr. 2018 | Software Engineer

- Maintained a legacy capture platform for producing aerially triangulated imagery while building next generation software solutions.
- Ported algorithms for developing and demosaicing imagery from MFC C++ desktop applications to cross-platform modern C++ libraries.

LOCKHEED MARTIN | Software Engineering Intern

Jun. 2015 - Aug. 2015 | MST - Syracuse, NY

- Worked on tracker software for the TPQ53 radar system, implemented features to allow for better range accuracy when tracking projectiles.

Jun. 2014 - Aug. 2014 | MST - Syracuse, NY

- Worked with the Non-Propulsion Electronics team on a ship control system for Seawolf-class submarines.

Held a United States government security clearance at the Secret level.

GE AVIATION | Software Engineering Co-op

Aug. 2014 – Dec. 2014 | Grand Rapids, MI