

PETER STEELE

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EMPLOYMENT

Software Engineer L5 **Amazon – AWS Lambda Sandbox Assignment** **June 2022 - Present**

- Design & Lead automatic NodeLoadShed mitigation project, reducing NodeLoadShed requests by 80% and eliminating manual heat management.
- Build out Lambda Sandbox Assignment Control Plane in five AWS regions
- Implemented control-plane optimizations to improve the speed of data-plane recovery during AZ weigh-in by prioritizing least provisioned partitions
- Implemented Available Zone Weigh-Away components in Lambda Sandbox Assignment Control Plane

Software Engineer L5 **Amazon – Cornerstone Ad Infra** **February 2021 - March 2022**

- Cornerstone Ad-Server Lead/Liaison for Thursday Night Football 2021.
 - Collaborated with upstream teams to establish requirements & expectations for Cornerstone team.
 - Scaled ad-servers & load-balancers to support 1.5 million concurrent viewers & cross-region failover.
 - Communicated with developers from services within cornerstone to ensure availability & low-latency.
- Planned & lead scaling efforts for Black Friday / Cyber Monday peak events across ad-server workloads.
 - Zero high-severity incidents during 2021 peak events.
 - Allocated over 100,000 CPU cores to ad-server workloads.
- A few recent interesting work items:
 - Optimized live pipeline templates build time from 4+ hours to <30 minutes, improving productivity of the team when creating new infrastructure cells.
 - Upgraded ad-server load-balancers to AWS ALB's, resulting in an 8x increase in maximum bandwidth from 4gbps to 33gbps on each endpoint.
 - Migrated ad-programs to next-generation programmable adserver from monolithic adserver.

Software Engineer I / II **Microsoft – Azure Storage** **June 2018 - January 2021**

- Scoped, implemented, and deployed an OS image deduplication system for Premium Azure Storage that reduced disk usage by 64PiB, resulting in \$10million/month of premium storage savings.
 - Successful cross-team collaboration with GC team to atomically swap data pointers for zero data loss.
- Mentored intern & guided design direction for “Calculation of Duplicate Data Size” project.
- Designed & implemented build-validation-test prioritization system.

Software Engineering Intern **Facebook** **May 2017 - August 2017**

- Designed and built an internal tool to preview and customize news feed items.

EDUCATION

Blacksburg, VA **Virginia Tech** **Fall 2014 - Spring 2018**

- **Majors: B.S. in Computer Science, Math, Data Science (CMDA), Economics**
- GPA: 3.53

RESEARCH, AWARDS, CONTESTS

- 1st place at Virginia Tech Undergraduate Research in Computer Science Spring Symposium 2017 (Capstone Award)
- 2nd place at Virginia Tech Undergraduate Research in Computer Science Spring Symposium 2016 (Faculty Choice)
- **Two-time International Collegiate Programming Contest (ICPC) World Finalist (2016 & 2017)**

LEADERSHIP

- **President of Programming Team Offseason (Spring 2017/2018):** Lectured on a variety of data structures & algorithms topics to 30+ students, attracted Bloomberg as corporate sponsor.
- **Virginia Tech Programming Team Co-coach (Spring 2018):** Lead team to qualify for ICPC World Finals 2018
- **Undergraduate Teaching Assistant for CS4104 (Data and Algorithm Analysis) (Spring 2017/2018)**

LANGUAGES

- C++, Java, GoLang, Hack/PHP