Danish Dua

dandua.com | **danish@dandua.com**

EDUCATION

University of Alberta
BSc in Computer Engineering
Sep 2016 - Apr 2021

LINKS

GitHub:// **dandua98**
LinkedIn:// **dandua98**
Twitter:// **dandua98**
Medium:// **dandua98**

SKILLS

Languages
Go • Python • Scala • C++ • Rust • Java • JavaScript • TypeScript

Infrastructure
AWS • Azure • GCP • Kubernetes • Docker

Full Stack
React • Vue • WebAssembly • NodeJS • iOS • Android

PROJECTS

MapReduce
C++
Multithreaded MapReduce library using a pthreads threadpool implementation.

EXPERIENCE

Databricks | Software Engineer - Observability
July 2021 - Present | Toronto, ON

- Working on observability at Databricks.

Snapchat | Software Engineering Intern - Bitmoji
October 2020 - January 2021 | Remote / Toronto, ON

- Developed usage reporting endpoints for Bitmoji Direct partner integrations API.
- Migrated sticker template scoring and ranking pipeline from AWS Kinesis to Snapchat Airflow deployment and BigQuery.
- Designed a spark job to parse daily sticker rendering logs for Bitmoji SDK DAU/MAU, views and per client render analytics collection.

Google | Software Engineering Intern - Golang
July 2020 - October 2020 | Remote / New York City, NY

- Designed and developed incoming and outgoing calls hierarchy support for function calls, definitions and literals in Gopls, the official Language Server for Go.
- Implemented package clause completions. Added import path completions with suggestions by import directory depth to improve discoverability.
- Redesigned deep completion to traverse golang types breadth first instead of depth first. Resulted in improved completions in the same time budget for large packages.
- Improved type-checking for source files to only check the most relevant package variant. Led to 50% decrease in time and memory consumption for multiple editor functions.

Facebook | Software Engineering Intern - Core Health
May 2020 - July 2020 | Remote / Menlo Park, CA

- Implemented debug symbol lookup for mobile build analysis to attribute sizes for apps using link time optimization. Led to a 90%+ decrease in unattributed size info, resulting in more actionable build reports.
- Added support to subscribe to notifications for long running mobile build analysis jobs, eliminating dev hours spent monitoring builds.
- Updated mobile build pipeline to store and show demangled C++ symbols in build reports.
- Added event and performance logging for build size monitoring and app size regression tools and scripts. Implemented dashboards to track errors and performance regressions.

Honey | Software Engineering Intern - Core Systems
May 2019 - August 2019 | Los Angeles, CA

- Designed audit logging middleware for internal tools and dashboards to help teams track usage analytics.
- Developed a GraphQL API for user role group management, reducing time required for employee authorization management tasks by more than 80%.
- Implemented an Internal Dashboard Notification system working across 35+ individual dashboards deployed as microservices.

Microsoft | Software Engineering Intern - Web Template Studio
January 2019 - April 2019 | Vancouver, BC

- Converted Azure deployments to resource management templates for Web Template Studio extension for VSCode, improving deployment speed and reliability and increasing end user visibility into deployments.
- Designed and developed a REST interface for Core Template Studio, a code generation and merging library used behind Web and Windows Template Studios.
- Developed Azure Functions deployment and integration workflows with the extension to support serverless development.