

# TONY ZHANG

## SKILLS

- Languages include Java, Kotlin, Elixir, Python, C++, Go
- Understanding of common data structures, algorithms, OOP
- Industry experience in feature engineering, backend infrastructure; a team player with strong communication & mentorship skills

## EDUCATION

University of Waterloo & Wilfrid Laurier University

August 2016

- Bachelor of Computer Science (UW) & Business Administration (WLU) Double Degree

## EXPERIENCE

Senior Software Engineer - Brex, *Remote*

Feb. 2020 - Jan. 2024

- Implemented periodic customer communications automation within Financials system, removing unnecessary toil from both internal Operations & customers on daily basis
- Designed & implemented backend service architecture for FICO-based underwriting, which allowed Brex to serve tens of thousands of traditional Small Businesses, onboarding them within seconds
- Collaborated cross-functionally with Banking Infrastructure to remodel Financials microservice for global reimbursement pipeline, enabling Brex to expand to multinational customers such as Coinbase
- Led the team to design & integrate multiple external vendors for customer financial data aggregation & ingestion, which improved limit stability for 2000+ customers, automated ~1000 hours of monthly manual workload for internal Underwriters, and enabled Brex to scale up underwriting with large-profile customer growth
- Took a leading engineer role on the Financials/Underwriting team; mentored growth of team engineers promoting to senior levels

SRE Software Engineer - Google, *Sunnyvale, CA.*

May 2017 - Feb. 2020

- Iterated features on internal machine management automation system, which handles machine lifecycle
- Implemented small-failure-domain drainer service in Go, increasing fleet management efficiency by enabling automation for rack-level production machine maintenance across data centers
- Worked on services around Borg (large scale cluster-management system) as a Borg SRE

Software Engineer - Uber, *San Francisco, CA.*

Nov. 2016 - Jan. 2017

- Made improvements to existing money transaction flow and reduced erroneous transaction records
- Implemented gift card transaction flow within new payment system (under development) in Java
- Integrated Prometheus metrics collection system to transaction settlements in Python

Software Engineering Intern - Bloomberg, *London, UK.*

Sep. - Dec. 2015

- Built Bloomberg terminal app YUNS for company-wide internal crash management
- Created database schema and frontend for YUNS, implemented services & UI in JavaScript
- Wrote custom Python script to retrieve, compute, and update backend data for terminal apps nightly

Software Engineering Intern - Facebook, *Seattle, WA.*

Jan. - Apr. 2015

- Created front-end layer browse edges for various scoped keyword search in PHP
- Implemented search query rewriting for Group, Page, and Timeline search in C++
- Added data-based features to rank resulting query contents, and improved data acquisition model for post search products