# ALEX ZHAO

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#### **EDUCATION**

## University of California, Berkeley

Expected May 2021

B.S. Electrical Engineering & Computer Science/B.S. Business Administration || GPA: 3.77/4.00

Management, Entrepreneurship, & Technology Program

Honors: Regent's & Chancellors' Scholar, Dean's List from 2018-19

#### **EXPERIENCE**

RISELab August 2019 - present Research Intern Berkeley, CA

- Perform research on robust adversarial learning to identify fault-tolerant features resistant to malicious attackers.
- · Develop online evaluation metrics for recommendation engines as part of Professor Michael Jordan's lab.

Zalando Research Engineering Intern June 2019 - August 2019 Berlin, Germany

- · Applied sequence transduction models to customize size and fit recommendations for customers.
- · Wrote transformer model in PyTorch based on recent deep learning publications on encoder-decoder architectures and attention-based natural language processing (Vasiwani et al., 2017).
- · Finetuned hyperparameters and parallelize algorithm to run across multiple GPUs.
- · Conducted research on word embeddings and neural network architectures for weekly presentations to team leads.

National Geographic Data Science Intern

September 2018 - December 2018 Washington, D.C.

- · Analyzed 14 terabytes of session data on over a million National Geographic customers using Google BigQuery, Apache Spark, and Python libraries such as pandas and scikit-learn.
- Constructed and cross-validated random forests, feed-forward networks, and logistic regression to develop customer segmentation and increase customer retention rates.
- · Built collaborative filtering model to recommend articles, outperforming the current baseline in production.

**Pivotal Software** Software Engineering Intern May 2018 - August 2018 San Francisco, CA

- · Pair-programmed daily with small team for 12 weeks on Cloud Foundry, an open source multi-cloud platform.
- · Updated & integrated command line interface written in Golang to support new Cloud Controller API.
- · Released 3 new command line interface versions (v6.37.0-6.39.0) for general deployment with over a million downloads.
- · Gained experience in distributed architecture, test-driven development, and continuous deployment to AWS and GCP.
- · Developed continuous integration pipelines to enable agile rapid deployment at scale for component teams.

### CAMPUS ACTIVITIES

Berkeley Consulting Internal Vice President September 2017 - present Berkeley, CA

Student-run consulting firm working with Fortune 500 companies, startups, and non-profits

- · Designed and built public-facing website for national non-profit lobbying for CO2 removal.
- · Created data visualizations for client's presentation to Senate Environment & Public Works Committee in April 2018.
- · Provided recommendations to HSBC's Head of International Banking on customer acquisition and market entry.

## **SKILLS**

Computer Languages Interests Tools

Python, Golang, Java, C/C++, SQL, Lisp

philosophy (ethics & language), hiking, Roman history, paddle-boarding, and teaching debate git, PyTorch, test-driven development, tensorflow, Linux, AWS/GCP, Apache Spark, test-driven development, continuous integration & development