

Victor Kobayashi

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Skills

Languages: Python, NodeJS, TypeScript, SQL, Go, C++, C, Java, Bash
Frameworks: PyTorch, Keras, Flask, React, Git, AWS, GCP, Travis-CI, Docker, Kubernetes

Experience

Data Scientist | [Shopify](#)

Sep - Dec 2021

- Developed a report to analyze marketing channel GMV by user device types
- Coordinated with product team to create a dashboard to measure the impact of beta feature
- Modified data job to pull data from the new payment processing api while remaining backwards compatible with the old api

Machine Learning Engineer | [Zynga](#)

Jan - Apr 2021

- Efficiently streamed event data into **AWS Kinesis** by integrating **fluent-bit** into project microservices
- Provisioned and automated microservice deployments to **EKS** development clusters
- Designed a dynamic event filter to process event data based on real time adjustable filter criteria
- Maintained and monitored **reinforcement learning** pipeline to ensure optimal delivery of over **5000** push notifications per day

Machine Learning Engineer | [PerkinElmer](#)

May - Aug 2020

- Developed a custom tabular data loader and cut down model training time by **37%**
- Researched **GAN** evaluation metrics and designed a **PCA** based metric to assess synthetic data quality
- Introduced test driven development to the AI Research Team and built out an automated unit testing suite
- Conducted research and proposed the use of **Cramer GANs** for synthetic data generation
- Created an image augmentation module to boost image masking performance in low performing areas

Software Developer | [ROSS Intelligence](#)

Sep - Dec 2019

- Trained **SpaCy** model to detect citations in legal cases at a higher accuracy than existing models
- Developed sign-up free trials to enable prospective clients to try ROSS while maintaining data privacy
- Created an **AWS Lambda** service to apply event tracking to over **2000** outbound emails per month
- Automated Serverless function deployments with **Travis-CI** to minimize deployment errors

Software Engineer | [Snapcommerce](#)

Jan - Apr 2019

- Boosted application Lighthouse performance score over **400%** by making UI components SSR compatible
- Developed an internal tool with **Flask** to simplify and audit bidding on multiple meta-channels
- Built an interface with **Flask** and **Redis** to enable hotel pricing adjustments without developer assistance
- Created Google ads landing page variants for A/B testing in **React**
- Modernized the A/B testing dashboard and implemented auto-expiring experiments

Projects

Name That Genre 🎧

Dec 2019

- **Embedding + CNN** model that classifies a song's genre based on the song's lyrics
- Model was developed with **Keras** and achieved **F1 scores** of up to **0.79**

Beat 📄

Jan 2018

- Received the **Best UI/UX Hack** award and ranked in the Top 10 hacks at PennApps Retro
- Designed the UI and contributed to the **Ionic** implementation

Education

University of Waterloo | Cheriton School of Computer Science

2017 - 2022

- Bachelors of Computer Science with Distinction