

SKILLS

Languages, Frameworks and Tools: Ruby (Rails, RSpec, Cucumber), JavaScript (TypeScript, React, Redux, Next.js, Node.js), Python (TensorFlow, Pandas, scikit-learn), C# (.NET), SQL (PostgreSQL, MySQL), Java (Maven), Go, R, HTML, CSS, GraphQL.

Cloud and DevOps: Kubernetes, Docker, Amazon Web Services (RDS, SQS, S3, ECS, EC2, EKS, MSK, SSM and more), Google Firebase, Prometheus, OpenTelemetry, Sumologic, Terraform.

Software Architecture: Microservices Architecture, Software System Design, Arc42 Architecture Standard, C4 Diagramming Model, Mermaid Diagramming Language.

EXPERIENCE

Staff Applications Engineer

Medidata Solutions, a Dassault Systèmes company

April 2023 - Present

- *Team leader of 5 other engineers building a new Java-based, Kafka-integrated service on a deadline
- *Implemented two APIs in C#/.NET in the oldest and most important app at the company
- *Organized design discussions across departments to deliver a new service supporting 2 important apps
- *Created designs and architecture documentation using Arc42 conventions and the C4 model
- *Coordinated implementation in 3 languages (Ruby, C#, Java) across 6 repositories and 3 departments
- *Mentored 3 junior engineers and collaborated with two senior engineers via code review and pairing
- *Added Prometheus metrics to a Go service and contributed to three Go repositories via code review
- *Conducted a proof of concept for a Lambda-based approach to handle a high-volume Kafka stream, involving pricing and throughput estimates, creation of Terraform IAC templates, and networking

Senior Applications Engineer, Medidata Solutions

April 2021 - April 2023

- *Trained a deep neural network on a dataset on the order of 10,000 data points, based on production customer data, and achieved strong precision, recall and F1 scores for 7 separate predictors
- *Wrote Python scripts using Pandas and scikit-learn to do EDA and to train the model
- *Created synthetic features based on an analysis of the data and exploration of available features
- *Led procurement effort of a Feature Flagging tool: RFP, POCs, pricing negotiations, executive presentations
- *Decreased feature enablement or disablement time from 20-60 minutes to under ten seconds
- *Spearheaded the rollout of the tool across dozens of teams, including writing internal helper functions
- *Created a ruby gem for container autoscaling based on application metrics and deployed it to production

Applications Engineer, Medidata Solutions

April 2019 - April 2021

- *Designed and implemented custom AWS ECS auto-scaling in an application serving >1 million users
- *Worked with a team of 4 engineers to maintain, develop, and deploy three RoR codebases
- *Used TDD (RSpec) and BDD (Cucumber) methodologies to write automated tests in a Rails app

EDUCATION

Harvard Extension School, Cambridge, MA (attended online).

Spring 2023

Relevant Coursework: Discrete Mathematics for Computer Science (Grade: A, [Transcript](#))

Coursera Online

2020-2022

[Mathematics for Machine Learning](#) (3 courses), [Machine Learning](#) (3 courses).

App Academy, New York, NY.

Nov 2018 — April 2019

Bennington College (BA), Bennington, VT. Concentrations: Psychology & Drama

2008 - 2013