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I have been a web developer and operations engineer for more than 8 years, and have expertise with a variety of tools and frameworks at every level of the stack.

EXPERIENCE

Data & Operations Engineer

Environmental Defense Fund,
Contract
Dec 2018 – Mar 2020
Remote

For this project, I built much of the data-related infrastructure for the [Air Quality Data Commons](#). This included:

- A generalized air quality data pipeline, capable of ingesting a wide swath of air quality data formats
This included a highly flexible normalization and validation modules, orchestration and ETL modules, and various internal tools for managing air quality data projects and [table schemas](#).
- A superset resource and [dashboard](#) generator for exposing and visualizing secure bigquery resources automatically.
- APIs for managing and [exploring](#) data projects
- Google Cloud infrastructure management, deployments, and scripting

► As well as a large amounts of high quality technical writing

Freelance Fullstack Developer

Various Contracts
Aug 2014

As a contractor, I usually wear multiple hats, often managing AWS deployments, writing server and frontend logic, and integrating external services for the client as needed. Some specific solutions include:

- An interactive ETL pipeline builder written in Clojure
- Dockerized python microservices deployed to AWS
- A [peerassets crypto wallet](#) built with react-native

As well as a number of web applications built with Python and/or Javascript.

Data Analyst

BuzzPoints
Dec 2013 – May 2014
Austin, TX, USA

- Categorized millions of unlabeled records with PostgreSQL functions and modules
- Scraped large and varying third party data sets and synthesized it with internal data
- Analyzed potential client data, providing market and profit analysis for data-driven sales

- Managed and reported on financial data for 20+ banks and 3,000+ merchants
- Implemented PCI compliant ETL systems for sensitive, non-standardized client data

Operations Engineer

BuzzPoints, Internship
Dec 2012 – Dec 2013
Austin, TX, USA

In addition to typical deployments and systems administration work, this role involved implementing:

- Data integrity and ETL testing
- Data reporting and visualization tools (Python, PostGIS)
- A raw text tokenization and labeling pipeline (Apache Camel, Elasticsearch)

Web Developer

BuzzPoints, Internship
Jun 2012 – Dec 2012
Austin, TX, USA

- Implemented Application features with Java/Spring
- Automated browser testing with Java Selenium

EDUCATION

Machine Learning Self Study

2017 – Present

I completed [the Andrew Ng Coursera course](#) with a 95.7%. I've also watched the [Ludobods Lectures](#) on Evolutionary Robotics, as well the [Oxford DeepNLP lectures](#).

The University of Texas at Austin

Computer Science Junior
2012 – 2013

CS courses included Data structures, Logic, Matrices, Computer Architecture, and automata Theory. Other coursework included Multivariable Calculus and Enlightenment Philosophy.

PROJECTS

graphql-flutter

Oct 2018

A graphql client for the dart language and flutter, to which I am one of the top [contributors](#). I'll highlight my [Optimistic Cache Updates PR](#), as a decent sample of my technical communication

I have also created a few related projects, such as the [graphql-to-dart](#) code generator, and it's in-development rewrite [built-graphql](#)

live-neat

Jul 2017 – Nov 2017

A rtNEAT neuroevolution engine written in typescript. While it functions offline, the goal was to make a distributed, embeddable solution. Thus this project is incomplete.

polypacker

Feb 2016 – Mar 2017

A universal javascript build and distribution tool built on top of webpack. Included sub-projects such as [jargon-parser](#), a JSON schema driven argument parser, with recursive expressivity.

bufflehead

Feb 2016 – Jun 2016

A proof-of-concept domain driven fullstack framework with a plugin architecture. Included sub-projects such as [strictduck](#), a retroactive inheritance system for javascript, as well as fullstack plugins for express, couchdb, and react.

type-quotes

Dec 2013

My oldest still-used project, a Unix utility for feeding quotes to gtypist to type over. Comes prepackaged with The Art of War and The Dhammapada

PROFICIENCIES

- Javascript and Typescript
- Dart / Flutter
- Python
- Operations Engineering
- Machine Learning
- React.js, React Native
- Django, Flask, Bottle.py
- Amazon Web Services (AWS)
- Postgres
- GraphQL

References available upon request