

Employment

TA **UC Berkeley** **Fall 2014 - Present**

- TA for CS10 “Beauty and Joy of Computing”. Teach 4 hours of lab and 1 hour of discussion.
- Topics include: foundations of programming, higher order functions, basic algorithms, Python.

Developer Experience Engineer **Braintree** **Summer 2016 - Present**

- Develop iOS and Android SDKs, Braintree’s products to allow developers to accept payments.
- Experience the pairing cycle used at Braintree, collaborate with all team members.

Mobile App Developer **Packd** **Summer 2015 - Present**

- Building the Packd iOS application, available on the App Store.
- Contribute solutions to technical problems as one of the four founding members.

Education

Computer Science **UC Berkeley** **Fall 2013 - May 2017**

- B.A. in Computer Science in progress (2017) GPA: 3.63
- Undergrad courses: Machine Learning, Algorithms, Software Engineering (SaaS), Linear Algebra, AI, Data Structures, iOS, Machine Structures, Discrete Math

Projects

Packd iOS App - packd.org, [search “Packd” on the App Store](#)

- Swift app that shows current occupancy and weekly trend data for various locations around the UC.
- Designed and built UI from scratch. Application written with Xcode.

Neural Network

- My favorite project; derived and written from scratch. Has achieved 97.9% accuracy on MNIST.
- Input, output, hidden layer size, and number of hidden layers completely configurable.
- Implements dropout and gradient checking. Uses Python scientific stack (numpy + scipy).

Māk - <https://github.com/lenawu/mak-169>

- Led a team of software engineering students to develop a Rails app for a UC Berkeley customer.
- Allows companies to create projects, teachers to assign students to work on the projects.
- Technologies included Rails, Cucumber + Capybara, jQuery, agile tool Pivotal Tracker, Git.

Checkaroo - <https://checkaroo.herokuapp.com>

- A web app that lets students check into current sections, but requires TAs to approve the hours.
- Born from a real problem encountered in CS10 at Berkeley; now used in CS10 and CS61C.

JavaScript projects: Typer.js, Carousel, Net, easy-gallery - steven.codes/typerjs

- Typer.js provides an html-only interface for creating beautiful “typing” effects on a web page.
- Net is a project inspired by a cool WebGL demo. I wanted a JavaScript version.
- Carousel.js lets developers implement iPhone-like pagination. See github for the rest!

Personal website - steven.codes, steven.codes/blog

- Exhibition of skills in JavaScript, CSS, and design.

Pixel Mapper

- Program that takes two images as inputs, and uses the pixels of the first to recreate the second.

Web-term

- Framework to build a faux terminal on a static site while hiding the file system on a Flask server.

Technical Skills

- Python (+scientific stack), Swift, Ruby on Rails, JavaScript, some Java, some C. Xcode. Testing.