University of California, Berkeley **Electrical Eng. Computer Science**

Expected Graduation: Spring 2018 Leadership Scholar GPA: 3.7

Technical Courses

- **CS189: Intro to Machine Learning**
- EE126: Advanced Probability and **Random Processes**
- **EE120: Signals and Systems**
- **CS188: Artificial Intelligence**
- CS294: Lean Launchpad
- **IEOR 185: Machine Learning and Intellectual Property**
- CS61A: Programming Structure
- CS61B: Data Structures
- CS61C: Computer Architecture
- CS70: Discrete Math and Probability
- EE16A, EE16B: Designing Devices

Proficient

- Swift/Obj. C
- Python
- Java

Frequently Used

- SQL, Lisp, C
- Web App Dev
- Mips Assembly

Projects Sixteen

- Voice Controlled Drone Car
- PCA Classification, Designed and Implemented Low-Pass Filter for Voice
- Used Controls and a transistor circuit to build turning and acceleration.

Gotham

- Voice Controlled Safety Real-Time Crime Map (Using Alexa, IBM Watson, MapBox, AWS, AWS IOT Shadow)
- MapReduce Data aggregration
- Underwriter Labs Best Use of Data Prize

Other projects can be found at:

- https://www.hackster.io/akbapu
- https://devpost.com/akbapu
- https://devpost.com/akbapu14

Internships

Apple Inc

Summer 2016

Software Engineering Intern

- Implemented Xcode Interface Builder Feature that uses heuristics to reduce internationalization related issues by 50%, saving engineers hundreds of thousands of hours.
- 1 of 7 total interns selected to present project to Craig Federighi, VP of Software Engineering at Apple.
- Released at WWDC 2017: https://developer.apple.com/videos/ play/wwdc2017/401/

Artificial Intelligence Experience

Machine Learning Research May 2017 - Present

- Generate annotations for Gene Ontology articles using deep sequence 2 sequence models with attentional LSTM decoders
- Turn labels into tree-like structure, saving exponentially less memory

Deepscribe

May 2017 - Present

- Conversational AI that makes doctors 3x more productive

Delphi Vision

Spring 2016 - May 2017

- Find similar patents using artificial intelligence
- Built/refined dimensionality reduction approach using nonnegative matrix factorization, run on ~350k patents on AWS EC2 Instance
- Made it into Steve Blank's Blog: https://steveblank.com/ 2016/11/18/machine-learning-meets-lean/

NBA MVP Pagerank

Spring 2017

 Used the pagerank algorithm and used a combination of head-tohead weights + overall weights to predict the top MVP candidates for 2017 with the same accuracy as NBA experts

iOS Experience

CS198: Intro to iOS

Spring 2017

Instructor

- Teach 100 students the fundamentals of iOS
- Build 12 week curriculum including labs, projects, homeworks, and lectures
- Manage teaching team of 10 Teaching Assistants
- www.iosdecal.com

Berkeley Mobile

Fall 2015 - Present

Director of Engineering

- Lead team of 4 engineers that built and improve Berkeley's campus application (including live buses, dining menus and more) with over 10,000 users
- https://itunes.apple.com/us/app/berkeley-mobile/id912243518? mt=8