

## EDUCATION

**Cornell University** | Ithaca, NY *Expected May 2016*  
BA in Computer Science and Mathematics & M. Eng in Computer Science, GPA 3.53  
Concentration: Artificial Intelligence  
**Thomas Jefferson High School for Science and Technology** | Alexandria, VA 2012

## EXPERIENCE

**Numenta** | Redwood City, CA  
Algorithms Intern May – August 2015  
Added features so users could customize nupic • Created a framework for NLP using HTMs • Designed a phonology encoder for letters for speech synthesis • Updated the build pipeline (*Python, C++*)  
**Cornell Data Science** | Ithaca, NY  
Education Lead December 2014 – 2015  
Organized a 5 hour crash course for 60 students • Create and lead weekly educational sessions  
**Blackbird Technologies** | Menlo Park, CA  
Artificial Intelligence Intern May – August 2014  
Found the dominant color in images with SVMs • Implemented a spatial pyramid for image classification, soft k-means for ambiguity in image classes, and an image cropper • Made a Parts of Speech tagger (*Python*)  
**AnthroTronix, Inc.** | Silver Spring, MD  
Software Engineering Intern May – August 2013  
Object detection – *NDA* • Implemented a game called Tap Tap Rehabilitation to use with the AcceleGlove • Created a version of Tetris • Wired an Arduino and programmed a controller (*Java, Matlab, Processing*)

## PROJECTS

**Research:** Cornell Graphics and Vision Group (*Professor Kavita Bala*)  
**Outside:** Keystroke Dynamics on Smartphones (*Python*) • EEG Classification for Seizure Prediction (*Python*) • Analysis of the Anti-Vaccine Movement through Social Media (*Python*)  
**In-Class:** Sentiment Analysis of Rotten Tomatoes Reviews for Analyzing Box Office Revenues (*Python*) • Application of Genetic Algorithms to Procedural Image Generation (*Python, C++*) • Analysis of Phonations for Speaker Identification (*Matlab*)

## RELEVANT COURSES

Algorithms • Artificial Intelligence • Machine Learning (**Teaching Assistant**) • Computer Vision (**Teaching Assistant**) • Operating Systems • Information Retrieval • Functional Programming • Computational Linguistics • Neuroscience • Mathematical Foundations for the Information Age • Applicable Algebra • Linear Algebra • Statistics  
**Fall '15:** Software Engineering • Computational Genetics • Differential Equations • Probability

## SKILLS AND INTERESTS

**Programming Languages:** Python • Java • C++ • Matlab/Octave • Bash Scripting • LaTeX  
**Other Technical:** OpenCV • sklearn • NLTK • git • pandas • numpy • nupic • vim • Eclipse • JIRA  
**Organizations:** Cornell Data Science • Math Explorer's Club • Alpha Xi Delta