

# Sean Lobo

708-287-7702 (Mobile)  
sean.lobo@berkeley.edu  
github.com/seanlobo

## Education

---

### University of California, Berkeley – GPA: 3.883

Aug 2015 - Present

- Intended B.S. in Electrical Engineering and Computer Science, expected graduation May 2019
- Relevant Course Work: CS61B (Data Structures), CS61C (Computer Architecture), CS188 (Artificial Intelligence), CS70 (Discrete Math and Probability Theory)

## Projects

---

### Facebook Message Mining (Personal project)

Dec 2015 - Present

A data analysis and visualization of individual's Facebook messaging history:

- Parsed and analyzed aggregate Facebook messenger data, with queryable data such as word frequencies, regex searching of conversations, and emoji analysis
- Visualized user data on a web browser, with personalized graphs and charts
- Generated beautiful and customizable word clouds for Facebook conversations

Technologies used: Python (*BeautifulSoup*, *Flask + Jinja*, *Colorama*), Java (*Kumo*), Javascript (*HighCharts*, *jQuery*), CSS (*Bootstrap*) | | [github.com/seanlobo/fb-msg-mining](https://github.com/seanlobo/fb-msg-mining)

### Bear Maps (Course Project)

Mar 2016 – April 2016

A browser based maps service for the surrounding UC Berkeley area:

- Efficiently rastered images of the surrounding Berkeley area as maps, utilizing efficient data structures such as QuadTrees, HashSets and Priority Queues
- Utilized OSM data to construct a graph of paths for the Berkeley Area
- Implemented an A\* algorithm to calculate the shortest path between any two locations

Technologies used: Maven, Java, OSM Data

### Editor (Course Project)

Feb 2016 – Mar 2016

A cross-platform minimalist text editor:

- Utilized efficient data structures for constant time character insertion and deletion
- A feature set including arrow key and cursor movement, opening and saving of files

Technologies used: Java (*JavaFX*)

## Work Experience

---

### Course Tutor: CS61A

Aug 2016 – Present

- Hold office hours and small group tutoring for struggling students
- Collaborate with course staff to effectively teach, run and manage intro class of over 1,600

### J. Craig Venter Institute

June 2014 – Aug 2014

- Designed curricula for high school students in the field of Computational Biology
- Implemented solutions to the Longest Common Substring and Subsequence problems as intermediate steps to a DNA alignment algorithm

## Research

---

### L.B. Stanza Programming Language Development

Sep 2015 – Jun 2016

- Wrote benchmarks and provided feedback on developer documentation
- Collaborated in creation of language's website: [lbstanza.org](http://lbstanza.org)

## Technical Skills

---

Languages/ technologies: Java (experienced), Python (experienced), JavaScript (working knowledge), C (working knowledge), HTML/ CSS (working knowledge), SQL (prior experience)