## Jason Tan

Phone: 415-606-5079 | Email: jastan313@gmail.com | Website: jastan313.github.io/Portfolio — EDUCATION —— Computer Science, Bachelors of Science (BS) August 2012 - June 2016 - University of California, San Diego - GPA: 3.82 La Jolla, CA PROJECT EXPERIENCE — December 2017

**DocIt** 

- MEAN Full-Stack Developer -
- Designed and developed a clean, single-page web app for anonymous-based, creative writing and reading. Established a responsive, paper-esque layout design and added a dynamic feed to load viewable, published works.

Fractalize August 2017

- Client-side JavaScript Scripter -
- Built a dynamic escape-time fractals generator website. Researched and applied mathematical recurrence relations for five types of fractals into coloring algorithms affected by user input.

**TScorify** March 2016

- Front-End and Spark/Scala Application Developer -
- Implemented a Spark/Scala application to produce keyword lists associated to text files of a given data set; formulated a custom TF-IDF scoring algorithm to accurately score words based on relative frequencies.
- Incorporated a web application to display resulting keyword data graphically in a word "cloud".

## GlassMADA (Memory Assistive Display for Persons with Alzheimer's) December 2015

- GoogleGlass Android App and Front-End Developer -
- Integrated Scandit framework for QR scanning to perform passive QR scanning, providing users visual reconfirmation of personal information such as relationship details between the user and family members.
- Created MADA Timeline, a website made for the user with Alzheimer's and his/her caretaker to review and filter collected contextual data: past photos' Google geolocations and timestamps.

**Battle Blocks** June 2015

- Game Designer and C++ Server-Side Engineer -
- Designed and engineered entire server-side gameplay logic and a Bullet physics engine for 3D object simulation.
- · Optimized gameplay features such as processing game events, dynamic block object creation/deletion, and damage systems by 24% in execution time and 80% in memory complexity.

ΚJ March 2015

- System Verilog Hardware Architect -
- Engineered a 3-stage pipelined CPU that runs on a 8-bit ISA and eight general registers. Optimized and tested by executing three different programs in ModelSim's hardware simulation.
- Reduced clock cycles per instruction to 1 by introducing data forwarding to avoid data hazards and asynchronous reading to avoid branch hazards, resulting in no stalling nor flushing.

WORK EXPERIENCE –

## MarketSource, Inc.

July 2016 - October 2017

- Electronics & Entertainment Lead -

San Francisco, CA

· Managed team responsibilities, schedules, and tasks. Trained associates for electronics and mobility sales experience and knowledge. Acquired guest needs from face-to-face interactions and promoting sales regarding mobile technologies, smart home devices, and digital services.

## — TECHNICAL SKILLS -

Java, JavaScript, NodeJS, MongoDB, AngularJS, HTML/CSS, SQL, C++, Scala, C, Python, (System) Verilog Languages: Technologies: Git, npm, Heroku, PostgreSQL, gulp, bower, Unix, JSP, mLab, MS Excel