# Derek Dang

dqdang17@gmail.com | (669) 235 – 0367 | San Jose, CA 95132

## Education

**University of San Francisco**                                   **San Francisco, CA**
*B.S in Computer Science, Minor in Mathematics, Cum Laude*          *Graduated May 2018*

## Professional Experience

**LitePoint**                                                        **Sunnyvale, CA**
*Lead Software Engineer*                                       *July 2019 — Present*
   • Leading a team with a focus on testing and tooling.
*Software Engineer*                                         *Dec 2018 — July 2019*
   • Designed a system to pipe national software releases 235% faster.
   • Redesigned a tech stack to automate an entire branch of testing for the QA team, quadrupling efficiency.
   • Developed a multitude of tools for stats, diagnostics, triggers, and log analyses.

**Twitter**                                                     **San Francisco, CA**
*Senior Capstone Internship*                                   *Jan 2018 — May 2018*
   • Managed a team of 5 to create a supervised classifier for malicious and benign websites on a dataset of over 1800 anonymous websites. In addition to fundamental machine learning concepts, we implemented extreme gradient boosting with a Raspberry Pi Cluster (rpicluster) to efficiently generate an automatic and scalable classifier with the best possible area under the curve score.

**University of San Francisco**                                 **San Francisco, CA**
*Computer Science Tutor*                                       *Aug 2015 – May 2018*
   • Held weekly hours to guide students from Introductory Programming classes to Operating Systems on homework, projects, and labs. Debugged thousands of lines of code from hundreds of students.
   • Maintained a set schedule with 7 other tutors to regulate help all day from Monday to Friday.

## Projects

**Dropbot**                                                        **Messenger Bot**
*github.com/tmbernardo/dropbot*                                *June 2018 — Present*
*Python, Flask, Gunicorn, PostgreSQL, SQLAlchemy, Psycopg2, Heroku, Facebook Messenger API*
   • A subscription-based Facebook messenger bot hosted on Heroku featuring a database of products populated by a web monitor. Key design differences from other messenger bots include efficient database queries, asynchronous background services, and a responsive chat-based user interface.

**rpicluster**                                                 **Raspberry Pi Cluster**
*github.com/rpicluster/rpicluster-stretch*                     *June 2017 — May 2018*
*Python, Shell Scripting, Raspbian OS, Fabric, zerorpc*
   • A distro for a cluster of Raspberry Pis,  rpicluster easily integrates a real cluster of computers, removing the hassle of networking and remote procedure calls. Downloadable images come with a set of tools to aid setup, configuration, and updates. The scalable architecture allows anyone to effortlessly put together a cluster and start creating their very own distributed/parallel projects. Visit *www.rpicluster.com* to download the images and for more details.

**xv6 Container System**                                         **Containers in xv6**
*github.com/dqdang /xv6-container-system*                       *Nov 2017 — Dec 2018*
*C, Unix, Docker, QEMU, Valgrind*
   • A container system integrated into MIT's OS xv6. Using file and process isolation, the application allows users to create containers running on virtual consoles, framing environments for various technologies.