RONALD KWAN

Email	ronaldskwan@gmail.com	**Website**	http://rkwan.me
Main Tools	Python, JavaScript, R, SQL, LaTeX		

EDUCATION

UC Berkeley (Berkeley, CA) — *Graduated*: 05/2016

B.A. Computer Science, Mathematics, and Statistics — *GPA*: 3.66 (cumulative), 3.91 (CS)

<u>Select Technical Coursework</u> — 1xx: upper division, 2xx: graduate.

CS Core	Data Structures & Algorithms (CS 61B/170/270), Operating Systems (CS 162), Databases (CS 186)
AI & ML	Artificial Intelligence (CS 188), Machine Learning (CS 189, Stat C241A), Optimization (EE 127)
Statistics	Statistical Computing (Stat 133), Probability & Statistics (Stat 134/135), Linear Models (Stat 151A)

WORK EXPERIENCE

PrepScholar (Cambridge, MA) — **Full Stack Engineer** — 09/2016 – *present*
Feature development and maintenance for Django and Backbone apps backed by MySQL. — Python, JS, SQL

Qualcomm Inc. (Boulder, CO) — **Engineering Intern** — 06/2013 – 08/2013
Furthered adoption of OS libraries by replacing hardcoded settings with configuration files. — C

Sandia National Labs (Livermore, CA) — **Technical Intern** — 06/2012 – 08/2012
Ensured data integrity and authenticity by adding digital signatures to simulation software. — Java

BERKELEY MATH TOURNAMENT

Berkeley Math Tournament (BMT) — **Technology Consultant** — 09/2012 – *present*
Lead software developer for biannual K-12 math contests attracting 350-500+ students/year.

<u>Projects</u>

Atomic Grader — http://atomicgrader.com — 12/2015 – *present*
Parallelizes exam grading by splitting scanned exams into "atomic" problem answers. — Python, JS (React)

BMT Web App Suite — http://bmt.berkeley.edu — 09/2012 – *present*
Tools for math contests: registration (public) and problem writing/grading (staff). — Python (Django)

DATA JOURNALISM

The Daily Californian (DC) — **Projects Developer** — 09/2015 – 05/2016
Data analysis/visualization and web development for the UC Berkeley student newspaper.

<u>Projects</u>

Grade Distributions (DC) — http://projects.dailycal.org/grades — 09/2015 – 11/2015
Data visualization for comparing average grades between departments and disciplines. — Python, JS

Admissions Trends (Blog) — http://rkwan.me/blog/ucb-eecs-lscs-admissions — 07/2015
Investigation of admissions trends for EECS and CS freshman applicants to UC Berkeley. — Python, R

ACADEMIC RESEARCH

UC Berkeley (Berkeley, CA) — *Supervisor*: Tom Griffiths — 01/2015 – 12/2015
Models & simulations of optimistic/pessimistic AI agents in Markov decision processes. — Python (NumPy)

Carnegie Mellon University (Pittsburgh, PA) — *Supervisor*: Cosma Shalizi — 05/2015 – 07/2015
Detecting activity clusters in fMRI brain images with machine learning & network analysis. — Python (NumPy)

Georgia State University (Atlanta, GA) — *Supervisor*: Robert Harrison — 05/2014 – 07/2014
Development of an ensemble classification algorithm with multiobjective optimization. — Python (NumPy)