

UWaterloo Software Engineering '21

Self-taught, full-stack, web-focused. 8+ years of experience. Passionate about machine learning and tech outreach.

Citizenship USA/Canada Dual Languages English, native fluency; Mandarin, basic fluency

Experience & Skills

Notable public projects: <u>clive.io</u>, <u>lexscibowl.org</u>, <u>live.lexhack.org</u>, <u>lhsmath.org</u>, <u>calcbee.org</u>, <u>vocative.github.io</u> **Lines of code:** 100,000+ public on GitHub (github.com/cchan)

Work and Research Experience

SkillFlow developer, 2016-present

Palo Alto startup creating a live collaboration platform for software developers in need

of experienced help, using Slack chatbots.

VitaeDev co-founder, 2016-present Lead developer in startup writing modern websites for Lexington-area businesses. Free

services to nonprofit community organizations. < vitaedev.com>

MIT PRIMES researcher, 2016-present

Network meta-analysis of cancer treatments to fairly compare treatment comparison

studies with different parameters and results.

Kumon Teaching Assistant, summers 2014-15 Taught children in math & reading; supervisor of my section of TAs.

KTByte Teaching Assistant, summer 2014 Helped students learn Processing & build their own interactive projects.

Tretper students team riotessing & build their own interactive project

Private C++ instructor summer 2013 Taught basics of C++ programming to elementary school students.

Web Development Languages/Technologies

*bold indicates particular expertise

General: Git & GitHub, Bash, DOS Batch, FDD, BDD, Travis CI Research: C/C++, Java with Maven, Python, NumPy, TensorFlow, Octave/MATLAB, R, LaTeX Web Frontend: HTML5, CSS3 with Sass, JavaScript, JQuery, AngularJS, ReactJS, Socket.IO, Firebase Apache Webserver: PHP, MySQL, PHPMyAdmin NodeJS Webserver: NodeJS, Express, CoffeeScript, Gulp, NoSQL Linux Server Admin: Amazon EC2, DNS, SSL, Networking, HTTP, SSH, Curl, RedHat OpenShift, CloudFlare Other: RESTful APIs, GPG, Raspberry Pi, Arduino, Verilog

Academics

University of Waterloo Software Engineering, Co-op: 2016-2021

Lexington High School (Lexington, MA): 2012-2016

AP Scores 5 on Calculus AB & BC, Biology, Chemistry, Physics C Mechanics & E&M, Computer

Science, Statistics, and Macro/Micro Economics; National AP Scholar

National Merit Scholarship Finalist

Supplementary Courses Multivariable Calculus and Linear Algebra courses at Harvard Extension School, gr. 10

Coursera Machine Learning, gr. 10-12

National Science Competitions

USA Computing Olympiad Platinum League USA Chemistry Olympiad 2x School Finalist

USA Physics Olympiad Silver Medalist **USA Math Olympiad** AMC 12 School Winner, 5x AIME qualifier

Leadership

FIRST Robotics

LexHack high school hackathon, Co-Founder and Co-Director, gr. 11-12 (lexhack.org)

OpenSource town grant-funded High School MakerSpace, Co-Founder and Co-Director, gr. 11-12

FIRST Tech Challenge Team, Research & Development Lead, gr. 11-12

Science Bowl

LexSciBowl middle school science contest, Founder and Director, gr. 11-12 (lexscibowl.org)

National Science Bowl Team Co-Captain of national 4th place team (physics specialist), qr. 12

Math Team

Lexington Math Tournament middle school math competition, Director, gr. 11-12 (lhsmath.org/LMT)

Math Team Co-Captain, gr. 11-12

Webmaster, qr. 10-12

(github.com/cchan/lhsmath.org)