# Alain Lou

2658 Lindholm Crescent · Mississauga, ON, L5M 4P4 · (647)-248-4333

loual@utschools.ca · github.com/alainlou · alainlou.github.io

#### **Education:**

# University of Toronto Schools

2014-Present

- 96.1 % Average
- Honor roll on the University of Waterloo's Senior Canadian Computing Competition (top 50 nationally)
- Top 25 % nationally for Fermat Math Contest, top 50 nationally for Chem 13 Chemistry Contest
- Representing the school at Educational Computing Organization of Ontario's 2017 provincial competition
- Participated in Toronto Brain Bee in 2015 and 2016
- Attended the 2017 International Chemistry Olympiad Team Canada selection camp at the U of T

## Thomas Street Middle School

2011-2014

- 1<sup>st</sup> in school for Gauss math contest
- Part of the gold-medal winning team in the National Canadian Scholastic Challenge
- Elected Master of Ceremonies at middle school graduation

# **Experience:**

## Research Assistant – Dr. Jeff Graham, University of Toronto Mississauga

2017-Present

- Investigating relationships collected through the patented DeckChair online learning platform
- Data processing using Openpyxl and Numpy (Python) on Excel spreadsheets, data analysis with R and MATLAB

# Referee at the SHL, Parkdale Flames Hockey Association, and CCIHA

2016-Present

- Explained rules and guidelines to players and coaches
- Kept players safe and prevented confrontations
- Multitasked to make multiple calls on the same play

#### <u>GridlockED</u>

July 2016

- Worked with McMaster grad students and professors to create a board game to simulate patient flow in an emergency room department
- Product design and product testing

### Personal Interest in Computers

2015-Present

- Running a webserver on a virtual machine, used when fiddling with Meteor.js or other web development
- Experience running an IBM Cloudant no-SQL database
- Personal projects (can be found here: <a href="https://github.com/alainlou">https://github.com/alainlou</a>)
- Bug reporting for Ubuntu Linux bugs
- Upgraded various components of my laptop and learning to be a "superuser" with command line tools

# Envision City - Outreach Director

2015-Present

- Secured a \$400 investment from the school's alumni association for speakers' sessions
- Secured another \$400 for designing and building a public accessory in a priority neighbourhood
- Facilitated a design contest for the grade 7 art class

# Volunteering and other Extra-curriculars:

### Outside Courses:

- Chemistry 136 introduction to organic chemistry at U of T
- Coursera: Machine Learning from Stanford University and Neural Networks for Machine Learning from U of T

#### Canadian Music Centre - Volunteer

- Assisted at concerts
- Helped facilitate composer-performer "testing sessions"

## <u>AIM Mississauga – General Member</u>

- Planned local events for youth such as coffee houses, basketball tournaments
- Part of focus group to gain sponsorship from Ontario's Trillium Fund

## Volunteer in MP Federal Election Office – Team Captain

- Cold called residents and canvassed to get constituency out to vote
- Worked closely with the MP herself to strategically campaign

#### **Additional Credentials:**

- Licensed Hockey Canada level 2 referee
- Proficient in Microsoft Office; Adobe Creative Suite (Photoshop, Illustrator, Audition);
  HTML/CSS/Javascript, Octave, Python and Java programming languages
  AP Exams: Computer Science A 5, Macroeconomics 5, Microeconomics 5
- Yip's Music Festival scholarship recipient (Piano) and ARCT (performance level piano) diploma