

## Highlight of Skills

- **Theoretical Computer Science Knowledge:** Solid knowledge in algorithms and data structures; familiar with relational database; Also experienced in machine learning and big data analytic techniques
- **Programming:** Proficient in C/C++, SQL and Matlab; Also experienced in Java, Ruby and shell scripting
- **Web Development:** Hands on experience in web development with Ruby on Rails, HTML, CSS, Javascript; Also experienced in J2EE web with JSP, Servlet and JDBC; Skilled in both front-end and back-end development
- **Development Tools:** Proficient in MATLAB, Visual Studio and XCode; Skilled in Git/Github bash shell and VIM editor; Also experienced in Netbeans and Eclipse
- **Teamwork:** Experienced in diverse groups of people; Teamwork skills demonstrated in multiple projects

## Education

- **University of Waterloo** Waterloo, Ontario  
*Master of Math in Computer Science (GPA: 92.3/100)* 2014 - 2016
  - Relevant courses: Artificial Intelligence, Advanced Algorithms, Big Data Quality, Requirements Engineering
  - **Full Tuition Scholarship** recipient; International Student Entrance Award winner
- **University of Science and Technology of China** China  
*Bachelor of Engineering in Electrical Engineering (GPA: 86.5/100)* 2010 - 2014
  - Relevant courses: Database, Object Oriented Software Design, Data Structures, Computer Network

## Experience

- **Full Stack Developer Intern** Kitchener, Ontario  
*ApplyBoard, a thriving startup incubated at Velocity* Jan 2016 - Present
  - Suggesting, scoping, designing and implementing new software components for our platform ([Demo here](#))
  - Deployed on Amazon EC2, the ApplyBoard platform is based on Ruby on Rails framework, with back-end using MySQL and front-end using HTML, CSS and Javascript/JQuery
  - Mainly developing on bash shell and VIM, cooperating with the dev team using Git/Github version control
  - Newly implemented features are fully covered by well-written functional/integration tests for quality assurance; adopting Jenkins for continuous integration and Rollbar for agile error tracking
  - Having 50K+ active users globally with 400K+ visits to date; there have been 200+ students successfully getting accepted to colleges/universities in Canada or the U.S. with the help of our web application
- **Graduate Research Assistant** Waterloo, Ontario  
*University of Waterloo* May 2015 - Present
  - Designed and implemented an innovative algorithm to solve de novo protein sequencing problem using C++
  - Generated near-full length de novo protein sequencing at nearly perfect accuracy
  - The methodology is a novel combination of a sophisticated protein scoring function and an amino acid based Hash table; tested on standard dataset, demonstrating superior performance compared with the state-of-the-art
- **Developer and Group Leader** Palo Alto, California  
*Global Design Innovation Workshop, Stanford University* Sep. 2013 - Jun. 2014
  - Developed a smart charging system prototype for electric vehicles, sponsored by Electric Mobility Norway
  - Implemented a station model using an Arduino microcontroller, an android smartphone application and a C program calculating the actual power distribution
  - Applied the whole design innovation process and presented the project on Stanford Design eXperience Fair

## Notable Projects

- **Ruby Gem Wrapper for International Telephone Input** Waterloo, Ontario  
*Open Source Contribution* Feb 2016 - Mar. 2016
  - Identified and helped to fix critical bugs in International Telephone Input ([jackocnr/intl-tel-input](#)), a famous open source JQuery plugin with 1800+ stars on Github
  - Wrapped the plugin as a Ruby Gem and published to RubyGems.org to facilitate the installation for Rails users
- **Data Quality Assurance in Biological Database** Waterloo, Ontario  
*Advanced Topics in Databases (CS848)* Feb. 2015 - Apr. 2015
  - Analyzed factors that cause data quality problem in biological database; designed and implemented a cleaning scheme by integrating the similarity of sequence and the semantic of the sequence description