

# Kevin Jung Chang

kevinchang@live.ca

## Summary of Skills

- Ranked 11<sup>th</sup> and 10<sup>th</sup> in consecutive academic standing semesters
- Started a sole proprietorship company in the ecommerce industry
- In-depth iOS and Android development experience
- Hardware prototyping using Arduino, Raspberry Pi, and BeagleBone Black

### Software:

- Implemented various data structures and sorting algorithms using C++
- Advanced object oriented experience with Java, C#, Objective C, and Python
- Back-end web development using ASP.NET, Oracle Databases, and PL/SQL
- Front-end web development using HTML, CSS, Javascript and jQuery
- Developed iOS and Android applications using Objective C and Java respectively
- Experience with HTTP/Web Sockets communication
- Experience using Github, PerForce, and Team Foundation Server for source code management

### Hardware:

- Used Raspberry Pi and BeagleBone boards for IoT (Internet of Things) projects
- Calibrated and printed with a Mendel 3D printer
- Built a robot using VEX parts and easyC for a robotics competition
- Xbee and WiFly integration with several Arduino boards
- Used Java along with Android sensors and actuators to create a pedometer
- Conceptual understanding of CPU architecture and memory processes

## Education

Bachelor of Applied Science, University of Waterloo

*Honours Electrical Engineering*

September 2012 – Present

- Achievements: Merit Scholarship
- Currently enrolled in semester 3A of Electrical Engineering

## Professional Experience

SAP Labs, Scarborough, Canada

*Software Application Developer*

August – December 2014

- Practiced scrum methodologies for managing product development
- Developed an iOS application using the xCode environment and Objective C
- Designed and implemented professional UX strategies for the iOS application
- Combined Arduino boards and Xbee modules to send sensor readings to a receiver
- Analyzed and tested WiFly and Xbee communication using open source APIs
- Updated a real time dashboard hosted on the SAP HANA using a Wifly module
- Implemented web socket communication between SAP servers and a web page
- Practiced secure HTTP requests when posting sensor readings to SAP servers
- Developed projects on Internet of Things that will be showcased in SAP's official tech conferences
- Experience with constructing and working with a 3D printer (RepRap Mendel Model)

**Meis Bags**, Toronto, Canada  
Founder (www.meisbags.com)

February 2014 - Present

- Entrepreneurship qualities established from creating a sole proprietor business
- Structured and executed original business model to market merchandise
- Self-taught implementation of security features on both client and server side using PCI compliance and SSL standards
- Created e-commerce website using custom CSS, jQuery and the WordPress platform

**Toronto Transit Commission**, Toronto, Canada  
*C#/.NET Web Developer*

January – April 2014

- Implemented major components using HTML, CSS and jQuery for the official TTC intranet site used by all TTC employees
- Lead developer for an in-house web application used to organize employees and groups allowing client-side data manipulation
- Developed and managed an Oracle database along with SQL components using PL/SQL stored procedures and triggers
- Daily use of PL/SQL, C#, and ASP.NET to build an in-house web application
- Independently handled deployment of web application through different development environments
- Executed client meetings to present the functions and features of the web application
- Created dynamic forms distributed to 50+ stakeholders using Microsoft InfoPath

### Relevant Courses and Experience

**Android Development**, Embedded Systems

January – April 2013

- Successfully developed Android applications with Eclipse IDE and Java
- Integrated Android sensors and actuators to produce a pedometer application on an Android 4.0 phone
- Experience in using Eclipse SVN version control system
- Basic knowledge of XML attained from working with Android UI

**ARM Architecture**, Digital Computers

September – December 2013

- Wrote assembly language within ARM architecture
- Knowledge of memory hierarchy as well as the internal structure of a processor
- Conceptual understanding of I/O operations and roles of cache and main memory

**Altera FPGA Board**, Digital Circuits and Systems

January – April 2013

- Designed and implemented elevator simulation on FPGA Board
- Coded Finite State Machines using VHDL
- Conceptual understanding of switches, flip flops, and adder circuits
- Worked with concurrent programming

**Arduino Keyboard Simulator**, Personal Project

May – June 2012

- Translated analog game controller signals to digital processes
- Controlled system actuators to respond to controller input
- Integrated C++ software to drive the system