Craig Loewen

Website: www.craigloewen.com
Phone: (519) 781 2563 **Email:** craigaloewen@gmail.com **Github:** github.com/craigaloewen

Skills

- Programming Languages: C#, C, C++, Java, Python, MATLAB, Android, SQL, and Visual Basic
- Concepts: Computer Vision, Machine Learning, Real Time Systems, User Interface Design
- Skills: Product and Program Management, Product Design, Problem Solving and Debugging

Education

Bachelor of Applied Science With Distinction, Waterloo, Ontario September 2013 – May 2018
Mechatronics Engineering, Honours, Co-operative Program, Management Sciences Option

- Graduated on the dean's list, and ranked 1st in class of 110 Engineering students

Work Experience

Program Manager Intern, Microsoft, Redmond, WA, United States May – August 2017
Software and devices Industry, Worked on the Windows Console Team

- Proposed and implemented a change in the default console colors for the Windows Operating system, resulting in an article being featured in technology news website 'The Verge' to exhibit the new changes
- Wrote functional specs for 6 features and oversaw their implementation during the 4 month internship

Process Engineering Student, General Motors, Saint Catharines, ON September – December 2016
Automotive Industry, Powertrain Production Facility, Transmission Machining

- Implemented a camera to recognize and sort defects using optical recognition software and PLC logic
- Developed a program to create a readable quality report from OEM custom machine code in C#

Quality Engineering Student, Siemens, Konstanz, Germany January – April 2016
Postal Automation Industry, Global leader in automation, Airports and logistics division

- Designed and implemented a new tool calibration system and device to reduce calibration time by 40%
- Designed a PCB for the sensor's hardware interface, and programmed the user interface in C++

Student Group Leader, General Motors, Ingersoll, ON May – August 2015
Automotive industry, Builds GMC Terrain and Chevrolet Equinox, leanest automotive plant in Canada

- Reduced line downtime by 20% through skilled management of over 30 unionized employees

Technical Projects

WatVision, watvision.github.io September 2017 – May 2018

- Created a wearable product that allowed any visually impaired person be able to use any touch screen with the aid of a smartphone, developed using Java and OpenCV image processing
- Awarded the General Motors innovation award and 2nd place in people's choice award

Spot Me, spot-me-app.herokuapp.com August 2016 - Present

- Developed an open source application that uses deep learning algorithms to analyze your exercise form when using weights and provide personalized training advice, in C# on the Universal Windows Platform
- Collaborated with a graphics designer to develop product branding, resulting in a 3.5% conversion rate for subscriptions to product news and the application being featured on www.xboxdynasty.de

Artificial Intelligence to Learn a Game January – May 2016

- Developed a Neural Network that is modified by a genetic algorithm to learn a simple game that exceeds the performance of an average human player within the first 10 games

Awards and Achievements

University of Waterloo September 2013 – May 2018

- First in Class Engineering Scholarship, for being ranked 1st in academics in the Engineering class
- Richard Motzeg Memorial Scholarship, for excellence in academics and extracurricular leadership
- President's Scholarship of Distinction, for academic achievement

Extracurricular Activities and Interests

President of University of Waterloo Weightlifting and Fitness Club September 2015 – May 2018
Languages: Conversational German and French