

## Skills Summary

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| * | Substantial experience welding, soldering and working with electronic circuits; developed by working with electronics, computers and automotive electrical systems |

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| * | **Comfortable working with and on computers.** |

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| * | Familiar with a wide range of software: |

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| Controls | RSLogix (PLC5), DVT, Cognex, Rapid, ControlNET, DeviceNET, SISO Tool, Simulink |

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| Productivity | Win 9X/NT, Linux, Word, Access, PowerPoint, Excel, Project, Outlook  |

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| Design | AutoCAD, Solidworks, Illustrator, Fireworks, Photoshop |

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| Development | Matlab, MathCAD, Labview, C/C++, VB, Dreamweaver, Flash, HTML |
| Starting to Learn | AJAX, PHP, Ruby on Rails, MySQL  |
| * | Excellent working independently and as a team |

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| * | Quick learner and good at thinking outside of the box |

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| * | Ability to adapt to various working conditions and apply analytical skills |

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| * | Fluent in both English and Portuguese languages. Intermediate level Spanish |

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| * | Pending US Permanent Resident application – Employment Authorization Document |

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| * | WHIMIS training gained through course of academic study |

## Education

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| University of Waterloo, Waterloo, Ontario | Candidate for Bachelors of Applied Science in: |   |
| **Mechatronics Engineering** | September 2003 -  |
|   | -Option in Biomechanics | Present |
|   | -Option in Management Science |   |

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| * | Relevant Courses: | Mechatronics, Sensors, Digital Controls, Circuits, Image Processing, Algorithms and Fuzzy Logic |

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| * | **One of few students attempting two engineering options**.  |

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| * | Excellent academic standing and cumulative average of 80+%. |

**Work Experience**

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| Toyota / Lexus Work term | Toyota Motor Manufacturing of Canada, Woodstock |   |
| **Research and Development** | April 2007 -  |
|   | Thermal Imaging of Stamped Panels | September 2007 |
|   | Thermal Expansion of Prototype Robots |   |

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| * | Responsible for researching and developing solutions for several industry problems |

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| * | Worked extensively on automated split detection for pressed panels and repeatability of snake welding robots.  |

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| * |   Designed, tested and **patented** innovative way of detecting splits using differential calculus, Labview and thermal imaging. |

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| * | Worked with hardware manufacturers to trial and test potential hardware configurations.  |

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| * | Technology has potential to save well over $2 million/plant at current scrap rate and received **outstanding job rating**, plus an offer to return |

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| * | Worked long hours and willing to put the time in to get the job done. 60 hour weeks was not uncommon |

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| General Motors Work Term | General Motors, Oshawa Truck |   |
| **Mechanical/Controls Engineering** | September 2006 -  |
|   | Robotic Image Recognition | January 2007 |
|   | Andon System - GMT 900 |   |

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| * | Responsible for implementing modifications required for the GMT900 truck launch |

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| * | Work was primarily in the Wheel/Tire room and involved improving reliability, cycle time and quality of the manufacturing process |

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| * | Major projects include the redesign of the robotic stemmer, vision system scheduling and modifications to accept GMT900 rims |

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| * | Changes **saved** in excess of $200,000 and received **outstanding job rating**, plus 2 offers to return |

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| Ford Motor Company | Ford Motor Company, Windsor Operations | 1st term |
| **Industrial/Electrical Engineer** | Aug 04 - Jan 05 |
|   | Ford Falcon Engine Launch - Assembly and Machining | 2nd term |
|   | Steam Cogeneration - Optimizing Boiler | May 05 - Aug 05 |

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Term 1

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| * | Responsible for coordinating productivity improvements |

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| * | Used leadership skills to lead a team of coops |

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| * | AutoCAD was used for 3D modeling of various items required for production  |

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| * | Helped launch the Falcon sports car engine which required process changes and line balancing |

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Term 2

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| * | Optimizing steam turbine downtime and cost analysis at the Ford Powerhouse for electrical generation |

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| * | Excellent rating from employer |

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| **Other Employers** |
| Valiant Machine and  Tool | **IKE Building Maintenance** |

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**Interests**

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| University of Waterloo FSAE | 4th Year Project |   |
| Predictive Traction Control | May 2007 -  |
|   | Dynamic Force Model of Vehicle | Present |
|   | Torque Generation Control |   |

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| * | Responsible for designing and developing predictive traction control to stabilize oversteer in vehicle |

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| * | System preemptively determines and prevents wheel slip |

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| CUTC Non-profit Organization | CUTC 2008 |   |
| Sponsorship Executive/Organizer | September 2007 -  |
|   | Obtain sponsorship from corporate companies | January 2008 |
|   | Design Delegate & Sponsorship PackageSetup/Run event |   |

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| * | Assembling, overclocking and benchmarking high performance computers |
|   | 3DMark, Sandra, Prime95, LAME, Crysis |
|   | Liquid cooling, phase change |

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| * | Designed and built LCD projector - 1500 Lumens / 400 watts |

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| * | Golf, bowling, hockey, fishing, and swimming |