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EDUCATION

- **University of Alberta** Edmonton, AB
  BSc Specialization in Computing Science — GPA: 3.3 *September 2019 - December 2021*
  - **Education:**
    - CMPUT 174 & 175 - Introduction to the Foundations of Computation *(Using Python with a problem-driven approach introduces notions of data structures, recursion, modularization, objects, functional programming and Abstract Data Types)*
    - CMPUT 201 - Practical Programming Methodology *(Using C and Unix environment focuses on fundamental principles of software engineering based on abstract data types and their implementations)*
    - CMPUT 204 - Algorithms *(Courses on algorithm design and analysis, emphasis on searching, sorting and graph algorithms, including dynamic programming, backtracking and local search methods with analysis to estimate program efficiency)*
    - CMPUT 229- Computer Organization and Architecture *(Computer architecture and organization, instruction-set architecture, assembly-level programming, memory access through pointers)*
    - CMPUT 261 - Introduction to Artificial Intelligence *(Focusing on techniques for building intelligent software systems and agents, include search and problem-solving techniques, knowledge representation and reasoning, reasoning and acting under uncertainty, and machine learning)*
    - CMPUT 272 - Formal Systems and Logic in Computing Science *(Introduction to the tools of set theory, logic, and induction, and their use in the practice of reasoning about algorithms and programs)*
    - CMPUT 291 - Introduction to File and Database Management *(Computer data organization and information processing; entity-relationship model; relational model; SQL and other relational query languages)*
    - CMPUT 301 - Introduction to Software Engineering *(Object-oriented design and analysis, with interactive applications as the primary example, include Software Process, Unified Modeling Language (UML), software architecture, design patterns, frameworks, unit testing, software tools)*
    - CMPUT 325 - Non-Procedural Programming Languages *(Study of the theory, run-time structure, and implementation of selected non-procedural programming languages, PROLOG, LISP)*
    - CMPUT 350 - Advanced Games Programming *(State-of-the-art AI and graphics programming for video games, C++, the Standard Template Library, and OpenGL)*
    - CMPUT 355 - Games, Puzzles, Algorithms *(Introduction to algorithms and theory behind computer programs that solve puzzles (mazes, peg solitaire, etc.) or play games (chess, Go, Hex, etc.))*
    - CMPUT 361 - Introduction to Information Retrieval *(Algorithms and data structures for organizing and searching through large collections of documents, and techniques for evaluating the quality of search results)*
    - CMPUT 366 - Search and Planning in Artificial Intelligence (Model real-world problems as state-space search problems, algorithms for solving deterministic shortest path problems, combinatorial optimization problems, constraint satisfaction and multi-agent problems)
    - CMPUT 382 - Introduction to GPU Programming *(GPU parallelism, hardware architecture, algorithmic design, programming languages (e.g., CUDA, OpenCL), and principles of programming for GPUs for high performance)*
    - CPUT 391 - Database Management Systems *(Compilation, execution, and optimization of SQL queries; concurrent execution of transactions; indexing; advanced constructs in SQL; semi-structured data models and query languages; distributed and parallel databases; NoSQL and cloud-based database systems)*
    - CMPUT 401 - Software Process and Product Management (All phases of software are reviewed from a process perspective. Architectural and technological impact on management.)
    - CMPUT 404 - Web Applications and Architecture *(The evolution of the Internet, relevant technologies and protocols, the architecture of modern web-based information systems, web data exchange and serialization, and service-oriented middleware)*
    - CMPUT 416 - Foundations of Program Analysis *(Main concepts of program analysis such as intermediate representations, inter-procedural and intra-procedural analysis techniques, call graphs, pointer analysis, and analysis frameworks)*
    - CMPUT 455 - Search, Knowledge and Simulation *(Knowledge can be created by machine learning techniques and encoded in deep neural networks. Search and simulations help to understand the short and long-term consequences of possible actions. This course leads from basic concepts to state-of-the-art decision-making algorithms.)*

Experience

- **Tim Hortons** Edmonton, AB

  Supervisor, Trainers, Members, cashier, Baker *May 2022 - Feb 2023*

  - Lead by example and encourage your team to make Guests their highest priority. Share ideas, look for opportunities to grow the business and empower your team to do the right thing
  - Put my supportive nature to work. Train, coach and build a strong team with the skills and knowledge they need to excel
  - Bring my energy and passion to work every day and help make coming to Tims the best part of someone else's
  - Execute Tim Hortons' standards around people, product, cleanliness and exceptional customer service while on shift
  - Produce the best loved bakery items that guests come to enjoy

- **Eyes High Education & Technologies Ltd** Edmonton, AB

  Tutoring computing science - CMPUT 174 / 175 / 201 / 291 *September 2019 - April 2020*

  - Helping students with understanding course material both remotely and in person
  - Explain course homework, assignments to students
  - Guide students through the homework and assignments
  - Course resources include Python, C, C++, unix system, SQL

- **TeamUp Science at University of Alberta** Edmonton, AB

  Computing Science workshop TA *Feb 2020 - December 2021*

  - Create computing science workshops for university, high school and junior high students
  - Teach students Python who previously had experience with Python
  - Teach intermediate students program Java applications

  External communication volunteer *Sept 2019 - Apr 2020*

  - Advertising TeamUp Science workshops to high school students
  - Volunteer for computing science workshop as a TA to explain Python to high school students

- **University of Alberta** Edmonton, AB

  Interdisciplinary Science Competition Computing Science TA *Feb. 14, 2020 - Feb 15, 2020*

  - *Teach students Python who previously had no experience with programming*
  - *Mark exam papers from students*

- **Harry Ainlay High School** Edmonton, AB

  Maths Contests team *Sept 2014 - June 2017*

  - Communicate with teachers to organize students for contests.
  - Teach students different method to solve problems
  - Work out different approaches to one problem with fellow students

Skills

Operating Systems: *Microsoft Windows, Mac OS, LINUX, UNIX*
Software: *(Proficient): Python,* C, C++, Java, Linux, SQL, non-procedural programming (lisp, prolog), Git, HTML, CSS
(Familiar): CSS, REST API, Docker, Docker, Android

Leadership and Extracurriculars

- Lead Harry Ainlay High School to be the Champion of Team Contests, 2015
- Champion in Harry Ainlay High School for CEMC Math Contests, 2015
- Champion of Harry Ainlay High School for Fermat Math Contests, 2014