# Skyler Alderson

- skyler@thealdersons.org
- GitHub
- LinkedIn
- 604-807-1061
- White Rock, BC

## **Professional Summary**

- Programs small physics simulations, data analytic toys, and video games as a hobby
- Enjoys solving challenging problems
- Recent graduate from the University of British Columbia
- Worked as a Teacher's Assistant to lead physics labs
- Worked as an Undergraduate Academic Assistant to conduct data analysis in physics labratories

#### Education

- Two degrees from the University of British Columbia
  - Bachelor of Science in Physics and in Computer Science
- Have been on the Dean's List several times
- A previous executive of UBCO's Astronomy Club

## Experience

- Undergraduate academic assistant, a research position (4 months)
  - Project was to investigate the effectiveness of replacing paaper lab manuals with a Python Notebook for early experimental physics labratories
  - Wrote Python to perform data analytics on student sumbissions
  - Code and theme based analysis of interview and survey data
  - Lead semi-structure interviews with students
- Computer science capstone project: automatically creating and grading SQL/RelAlg questions for a third year course
  - Writing JavaScript for functional SQL and relational algebra editors
  - SQL
  - RelaX tool for relational algebra
  - Python for backend
  - Fullstack development, focus on SQL and the backend in Python
  - Project achieved the highest grade in the class
- Teacher's Assistance for three semesters (18 months)
  - Lead two experimental physics labs
  - Helped create slides for the class
  - Graded homework

- $\bullet$  Volunteer work for iGEM, a UBC club competing in an international competition in 2022
  - Frontend CSS and HTML work to design their website/wiki
  - The wiki won the [gold medal] for its category

## Skills

- Coding
  - Python
  - Java
  - JavaScript
  - C
  - Lua
  - Minor familiarity with Rust and R
- Physics
  - Experimental design and conduct
  - Problem solving
  - Simulation and models
- Presentations
- Writing and reports
- Communication