# DAVID WANG

davidlwang.xyz 📆

dlwangxyz@gmail.com ☑

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davidwangg in

5A Computer Science & Business Double Degree, University of Waterloo

## **EDUCATION**

#### University of Waterloo, Honours Bachelor of Computer Science

Sept 2018 - Dec 2023

Coursework: Computer Architecture, Algorithms, Numerical Computation, Operating Systems, Data Structures

## Wilfrid Laurier University, Honours Bachelor of Business Administration (Finance)

Sept 2018 - Dec 2023

Coursework: Securities Trading, Investment Management, Financial Markets, Options & Futures

### WORK EXPERIENCE

## Perpetua, Software Engineer Intern



- o Engineered Google Ads product for launching ad campaigns from Amazon and TikTok Spark Ads that scaled to \$200K in ARR.
- Improved retrieval times by 200% by implementing new local Django models for brands, orders, and campaign objects.
- Enhanced Python sync functions runtime by 400% by reducing the number of calls made to Django objects.
- Implemented SQL query with parameters to dynamically generate 95% of arbitrary customer performance data requests.
- Developed query and React flows to generate potential opportunities and launch 40% of new campaigns with 1-click.

#### The Block, Data Engineer Intern



May 2022 – Jun 2022

- o Created 5+ new custom tables using Google Big Query and SQL queries for institutional clients and research team.
- o Improved performance of data validation scripts by 50% by reducing the number of REST API to public datasets.
- Contributed to open-source digital asset databases to expand data availability to 94% of the top 500 digital assets.
- Wrote weekly data newsletter to 200K subscribers about noteworthy data metrics and offer justification for changes.

#### The Block, Research Analyst Intern



Jan 2022 – May 2022

- o Leveraged blockchain explorers to produce sixteen due diligence reports for clients as part of digital assets team.
- o Discovered three high-risk security concerns that used suspicious smart contract admin privilege implementations.

#### Ada, Software Engineer Intern



Jan 2021 – May 2021

- o Developed 3 new quick reply and suggestions React components that reduced chat bot creation times by 15%.
- Enhanced Redux state logic by introducing 9 new actions and reducers that facilitated the creation of 3 new dashboard blocks.
- Improved stability of the dashboard by 20% by deprecating redundant JavaScript functions and refactoring Redux reducers.

### **PROJECTS**

#### Backtest, Python

o Back-testing tool using Yahoo Finance API, Backtrader, and QuantStats libraries to analyze different technical indicators and simulate historical trading results. Trading outperformed S&P 500 by 30% over the previous 5 years.

### SKILLS

Languages: Python, SQL, JavaScript/TypeScript, C++, C Technologies: Django, NumPy, Pandas, React, Redux

Tools: GraphQL, Git, Docker, Google Big Query, Google Cloud, Jupyter