Yuchen Wang

Passionate software engineer and researcher, striving to solve challenging real-world problems.

LINKS

WebSite: https://yuchenwyc.com Email: yuchenw@stanford.edu Github:// yuchenWYC LinkedIn:// yuchenWYC

EDUCATION

Stanford University

SEP 2021 - JUNE 2023

Master of Science in Computer Science

University of Toronto

SEP 2017 - APRIL 2021

Honours Bachelor of Science Computer Science specialist, Statistics major & Mathematics minor cGPA: 3.98/4.00, Course Average: A+

AWARDS

(Jan 21) Konrad Group Women in Technology Scholarship \$2000

Awarded to a student who demonstrates innovation. (Jan 21) **The Dorothy Walters Scholarship** \$2000 (May 20) **UofToronto Excellence Award** \$6,000 Awarded to about three students each year.

(Dec 19) **The Dorothy Walters Scholarship** \$600 (All years) **Dean's List Scholar**

TEACHING

Stanford | TEACHING ASSISTANT

Sep 2021 - Dec 2021

CS 221: Artificial Intelligence

Jan 2022 - March 2022

CS 161: Design and Analysis of Algorithms

UofToronto | TEACHING ASSISTANT

Jan 2021 - April 2021 | Supervisor: Karen Reid Course: Software Tools and Systems Programming

SKILLS

Specialized

Python • C • Unix/Linux • LaTeX • Git JavaScript • React • HTML & CSS

Familiar

R • C++ • MatLab • MySQL • Android

Machine Learning Libraries

NumPy • PyTorch • Pandas • Autograd Matplotlib • ggplot2 • SciPy • Scikit-learn OpenCV2

WORK EXPERIENCE

Ernst & Young | Technical Consultant Intern (Software)

June 2021 - August 2021 | Shanghai, China

- Developed a software pipeline to help an aviation authority automate extracting parameter values from graphic interfaces, which takes real-time video stream as input and outputs formatted data.
- Utilized AI technologies for optical character recognition
- Communicated closely with clients, wrote detailed documentations and proposal for the project workflow.
- Technologies: Python, OpenCV2, Pandas, Docker

Vector Institute | Machine Learning Intern

April 2020 - Jan 2021 | Supervisor: Roger Grosse

- Designed and implemented hypernetwork algorithms to auto-tune hyperparameters of artificial neural networks during a single run.
- Wrote extensive unittests.
- Reading the literature and proving the related mathematical theories.
- Technologies: Python, NumPy, PyTorch, Autograd, Slurm

University Health Network | Machine Learning Intern

May 2019 - Dec 2019 | Supervisor: Bo Wang

- Working with clinicians to design a data processing pipeline for electronic health records time-series.
- Engineered modular code for sequential artificial neural networks and tree-based machine learning models.
- The final models accurately predicts one-year and two-year outlook cause of death for post-organ-transplant patients.
- Technologies: R, Pandas, Python, NumPy, PyTorch, Scikit-learn

PROJECTS

Project X Research Competition | Sep 2020 - Nov 2020

- Led the UofT team to develop a new neural ordinary differential equation architecture, which learns the dynamics of time series with multiple predictors and beats the baseline models in performance.
- Applied the model on semi-synthetic plant disease datasets and achieved remarkable results in both extrapolation and interpolation.
- Awarded a \$20,000 prize as a winner for the competition. [ICML 2021 workshop page]

ASA Datafest 2020 | June 2020

Led a student group to classify sentiment on Twitter using deep learning models, then explored how the U.S. general public responds to breaking news in the COVID-19 pandemic. Wrote a static web page to display results. (Honourable mentions)

Mars Game Platform | Jan 2019 - March 2019

An open-source game platform containing three well-designed games and user identities. Implemented games Sliding Tiles and Sudoku in Java. Designed and implemented the user interface and interaction. Created comprehensive unittests and detailed documentations.