#### **GEOFFREY WONG HIN**

## Full-Stack Data Scientist/ ML Engineer

**Personal Website:** https://geoffreywonghin-personal.vercel.app

+1 825 9457174 | geoffreywonghin@gmail.com | www.linkedin.com/in/geoffreywonghin | github.com/RyanStark223232

#### **RELEVANT SKILLS**

- Proficient in Pytorch, Scikit-learn, MLFlow | Python, SQL | GCP, Azure | Apache Beam | Looker Studio, Tableau,
   PowerBI | Airflow, Gitlab-CI, Docker | FastAPI
- Experience with Keras, TensorFlow, TensorFlow Extended | R, C, Java, DAX | AWS | Hadoop, Spark, Databricks | Looker | Django | React JS | Flask | RAG, LoRA
- **Managed** the development of two data dashboards and a **Machine Learning client project.** Completed projects on time despite tight schedules and captivated clients with explorations of future directions
- Demonstrated proactive problem-solving skills by independently identifying inefficiencies in data pipelines and devising solutions with heuristic algorithms that improved scalability and memory usage by 14x and reduced the processing time by 50%
- Investigated the use of **LLM** in Personally Identifiable Information (PII) cleaning and web content understanding, and created systems that outperformed manual labeling services in speed and robustness

#### RELEVANT WORKING EXPERIENCE

#### **RESEARCH ASSISTANT (Part-time) & INDEPENDENT DEVELOPER**

THE CHINESE UNIVERSITY OF HONG KONG & SHATIN HOSPITAL

08/2023 - 08/2024

- Parkinson's Diagnosis Research:
  - Designed collection procedures for patient data that satisfy researchers' demand for efficiency while maintaining a controlled experimental environment
  - Experimented with off-the-shelf AI products to eliminate personal information, reduce the complexity
    of the collected videos, and ensure prediction output did not overfit despite a small dataset
- Natural Language Query Interface:

Built chatbots capable of querying databases, answering questions with accurate information, and generating graphs using an **agent-based Large Language Model (LLM)** 

#### **DATA SCIENTIST**

HOTMOB LIMITED 07/2021 - 06/2023

- Leveraged web-scraping and transfer learning with GPT-2 for comprehensive website understanding. Extended
  capability to sentiment analysis, interest classification, and keyword extraction, while increasing capacity by more
  than 10 times with half of the cost
- Impressed the Business Intelligence team of a global insurance company with client projects, including revamping
  their data processing system originally in SAS to PowerBI, training machine learning models to predict insurance
  fraud with Azure, and adding explainable ML to inference output, establishing long-term collaborative
  relationships to this day
- Fully automated data processing pipelines using **Airflow**. Removing the need for manual labor in monitoring data quality, updating ML models, and generating reports
- For more details, visit <a href="mailto:github.com/RyanStark223232/work-porfolio-hotmob">github.com/RyanStark223232/work-porfolio-hotmob</a>

#### AI DEVELOPER INTERN

FLYING MILK TEA LIMITED 07/2020 - 09/2020

• Performed **Web Crawling** with **Selenium** to Collect Images and 3D Model Data

- Preprocessed 3D Mesh Data with **Programmable Blender**
- Built a **Voxel Generator** that Converts 2D Images into 3D Models

#### **EDUCATION**

#### MASTER of DATA SCIENCE & ANALYTICS (Health Data Science & Biostatistics)

UNIVERSITY OF CALGARY

09/2024 - PRESENT

### BACHELOR of SCIENCE in COMPUTER SCIENCE (Artificial Intelligence)

THE CHINESE UNIVERSITY OF HONG KONG

09/2017 - 07/2021

# GPA: 3.85 / 4

## Scholarship/Award:

- Gold Award for Outstanding Academic Performance
- Prof SC Loh Scholarship for CSE
- Li Po Chun Charit T Fund UGD
- Yu To Sang Memorial Scholarship 2019/20
- ELITE Stream Scholarship
- CodeVita 2018 Hong Kong 1st runner-up (Python & C)

#### **Projects:**

- Developed a Computer Vision system for Parkinson's Disease diagnosis that outperformed previous techniques (Final Year Project)
- Built an Emsemble Atrial Fibrillation classifier with accuracy comparable to the 2017 PhysioNet Competition winner (Individual TensorFlow Project)
- Evaluated the randomness of card shuffling techniques using Recurrent Neural Networks and a simulated card guessing game. Found room for improvement for existing algorithms (Group TensorFlow/Programming Project)
- Wrote a Review Paper comparing 10 different machine learning classifiers for pre-mRNA splicing prediction (Individual Bioinformatic Project)

## PROFESSIONAL DEVELOPMENT & CERTIFICATES

Professional Machine Learning Engineer	
GOOGLE CLOUD CERTIFIED	06/2023 - 06/2025
Professional Project Management Certificate	
GOOGLE	07/2023 - PRESENT
Google's Large Language Model (LLM) Learning Path	
CLOUD SKILL BOOST	06/2023 - PRESENT
Dive into Deep Learning Using MXNet Workshop	
AWS	08/2019 - PRESENT