

DSTA Scholar · Computer Science and Business Analytics · Nanyang Technological University

□ 84557799 | ■ ylua001@e.ntu.edu.sg | 🛅 linkedin.com/in/ivan-lua/

About Me

Programming $C++/C \cdot Python \cdot NodeJS \cdot ReactJS \cdot Java$

Analytics Python · SQL · Hadoop · Power BI · Tableau · Excel/VBA · R · Alteryx · UiPath

Work Experience ____

TikTok (ByteDance)

Singapore

Jun. 2022 - Now

DATA ENGINEER INTERN - E-COMMERCE TEAM

- Designed and built data transformations for reporting, growth analysis, multi-dimensional analysis
- · Built batch and real-time data warehouse and managed data modeling design and optimization of ETL jobs (Hadoop)
- Built data metrics, data pipelines and services development for data products to make smarter business decisions

Nanyang Technological University

Singapore

RESEARCH SOFTWARE ENGINEER - BIOMEDICAL COMPUTING GROUP

Apr. 2022 - Now

- Built CT Segmentor, a patented AI Web Application (ReactJS, CornerstoneJS) that aids Radiologists in diagnosis for neurological disorders
- Developed a Generative Adversarial Network and YOLOv5 (PyTorch) that analyses brain CT scans for neurological disease
- Designed and developed DICOM viewer to process, display and interact with DICOM images using CornerstoneJS
- Implemented Orthanc DICOM server to fetch DICOM images, studies and structured reports
- · Deployed Deep Learning model for brain imaging analysis with Flask on AWS EC2 instance

Shopee (Sea) Singapore

DATA ANALYST INTERN - REGIONAL BI & PLANNING TEAM

Apr. 2022 - Jul. 2022

- · Conducted descriptive and diagnostics analytics to monitor region performance and automate report creation
- Developed, streamlined and deployed data pipelines to automate ETL process using Hadoop (Airflow, PySpark, Presto)
- Performed migration of data pipeline architectures from Airflow to Data Studio

Robert Bosch Singapore

DATA ANALYST INTERN - AUTOMOTIVE AFTERMARKET TEAM

Sep. 2021 - Feb. 2022

- Developed data automation program for ETL process to reduce manual work
- Analyzed diverse datasets (Python, R, SQL) to understand sales, drive optimization and improve business strategies
- Created Customer Analysis Dashboard (Power BI, Power Query, DAX) that provides sales, revenue and profit figures by various channel
- · Developed data models and algorithms that efficiently transform and enrich sales data

NTU Sports Club Singapore

MEDIA AND IT OFFICER - 31ST MANAGEMENT COMMITTEE

Sep. 2021 - Now

- Headed the Media and IT subcommittee to create and implement web-based projects
- Built a website that facilitates promotion and registration for national events (Bike Rally, National Vertical Marathon)
- Used HTML, CSS and JavaScript to create and style components in work projects
- · Refactored existing codebase using Atomic Design methodology to improve design modularity

Foo Kon Tan LLP Singapore

SOFTWARE ENGINEER INTERN - TAX TEAM

Jun. 2021 - Aug. 2021

- · Spearheaded multiple Digitalisation Projects to design new software programs that automated work processes
- Implemented a Support Vector Machine that uses Natural Language Processing (Text Classification) to automatically sort unstructured text into
 pre-defined categories
- Deep dived into structured and unstructured Big Data (General Ledger, Profit and Loss Statement, Balance Sheet etc.)
- Automated application deployment in AWS and on-prem for tax services

Honors & Awards

2022 **DSTA Scholar**, Defence Science and Technology Agency (DSTA) Scholarship Singapore

2022 **1st Place Winner**, MicroStrategy Datathon Challenge

Singapore

2022 **Top 10% from 198 teams,** Huawei Cloud Spark Hackathon

Singapore

Education

Nanyang Technological University

Singapore

BACHELOR OF ENGINEERING (COMPUTER SCIENCE) AND BACHELOR OF BUSINESS (BUSINESS ANALYTICS)

Aug. 2020 - Now