OWEN TAN KENG LENG

Email: owen.tan@u.nus.edu   Mobile: (+65) 9247 2807   Linkedin: www.linkedin.com/in/owentankengleng

EDUCATION

National University of Singapore   **Aug 2022 - May 2026**
Bachelor of Science (Honours)
- Major in Data Science and Analytics, 2nd Major in Computer Science
- Grade Point Average: 4.83/5.00 (Expected Honours with Highest Distinction)
- Attained Dean's List for AY2023/2024 Semester 1 & Semester 2 and Top Student for Data Structures and Algorithms

TECHNICAL SKILLS AND PROFESSIONAL CERTIFICATIONS

- Programming Languages: R, Python, Java, Javascript
- Visualisation Software: Power BI, Tableau
- Database and Operating Systems: SQL (PostgreSQL), Docker, Kubernetes
- Machine Learning Techniques: K-Nearest Neighbors, Random Forest Algorithm, AdaBoost, Neural Networks
- Completed AI Singapore's Foundations In AI and currently pursuing Google's Professional Machine Learning Engineer Certification

PROJECTS AND COMPETITIONS

Standard Bank Data Science Job Simulation, Virtual   **Jun 2024**
- Developed more than 5 machine learning models to streamline loan application processes, utilising scikit-learn for model creation
- Conducted data analysis to identify more than 3 trends between borrowers and loan statuses, including correlation between income and loan amount
- Performed feature engineering to prepare dataset through imputing of missing values and handling of 4 categorical variables, such as Gender and Education
- Implemented a Random Forest Algorithm to predict loan default, achieving an accuracy of 80% and improving risk assessment processes

Data Visualisation Group Project, Singapore   **Jan 2024 - May 2024**
- Led a team of 5 in a data visualisation project, conducting data cleaning of a global energy consumption dataset with over 100,000 data points using R's Tidyverse package
- Validated data integrity by cross-referencing aggregated global population values with external data sources, ensuring accuracy over a 70-year period
- Illustrated key energy consumption trends through diverse visualisation techniques, including Line plots, Bar plots, and Proportional Stacked Area charts in both R and Python (NumPy, Pandas, Matplotlib, Seaborn)

NUS Statistics & Data Science Society Datathon 2024, Singapore   **Jan 2024**
- Developed and trained a Neural Network using TensorFlow and Keras to predict customers' likelihood of purchasing life or health insurance products within next three months at Singlife
- Optimised model performance through hyperparameter tuning, achieving a prediction accuracy of up to 80%
- Applied advanced data preprocessing techniques using Python (NumPy, Pandas) to clean and manipulate data for optimal model training

WORK EXPERIENCE

Singapore Airlines, Flight Operations Rostering Intern   **May 2024 - Aug 2024**
- Automated monthly reporting processes by developing and optimizing Excel Macros, reducing manual labour by over 50% and enhancing operational efficiency
- Collaborated with the Data Analytics Department to enhance accuracy of pilot leave rostering algorithms, contributing to creation and testing of at least 10 different scenarios
- Managed various adhoc tasks, including production and maintenance of 3 monthly reports critical to flight operations
- Authored a comprehensive training manual detailing usage of two key systems, streamlining onboarding and ensuring knowledge continuity for new associates and rostering officers

ADDITIONAL INFORMATION

- Languages: English (Fluent in Writing and Speaking), Chinese (Intermediate in Speaking)
- Interests: Running, Hiking and Volunteering
- Serving as a volunteer under Agency for Integrated Care to engage elderly in the Hougang and Ang Mo Kio communities