MUHAMMED SYAHMI

Computer Science / Data Science Student

go4syahmi@gmail.com | Portfolio : Muhd Syahmi | Bukit Jalil

PROFILE

Detail-oriented Computer Science student specializing in Data Science and Artificial Intelligence, with practical experience building machine learning, NLP, and predictive analytics solutions. Skilled in Python, TensorFlow, SQL, and data visualization, with a strong ability to clean, analyze, and model complex datasets. Experienced in developing end-to-end data pipelines, evaluating models with statistical metrics, and presenting insights through dashboards. Looking to apply technical expertise in a data-driven environment through an internship that values analytical thinking and real-world problem solving.

EDUCATION

Asasi Science Physical

University Teknologi Malaysia (UTM)

Kuala Lumpur | 2022 - 2023

- CGPA: 3.80

Bachelor of Computer Science (Hons)

Taylor's University | 2024 - Present

- Specialization: Data Science
- Extension: Artificial Intelligence
- Current CGPA: 3.78

SKILLS

Programming Languages

Java, SQL, R, C++, Python

Machine Learning & Artificial Intelligence

Scikit-learn, TensorFlow, Keras, Random Forest, XGBoost, LSTM, NLP (Tokenization, Word Embeddings, Text Preprocessing), Model Evaluation (Accuracy, F1, RMSE, MAPE)

Data Handling & Analytics

Pandas, NumPy, Data Cleaning, Feature Engineering, Exploratory Data Analysis (EDA), ETL Pipelines, Apache Spark (Basics), Statistical Analysis

Data Visualization

Tableau, Matplotlib, Seaborn

Databases & Cloud

MySQL, AWS Cloud Foundations

Operating Systems

Linux (Basic Command-Line Operations)

Tools & Platforms

Google Colab, Cisco Packet Tracer, Github

Soft Skills

Problem Solving, Analytical Thinking, Team Collaboration

PROJECT EXPERIENCE

Stock Price Prediction using Machine Learning

Individual Project | Python

- Processed 246 records of APPL stock data, generated 60-day sliding windows, and split data into 148 training and 38 testing sequences.
- Scaled features and reshaped inputs into the required 3D LSTM format (samples, timesteps, features).
- Built and trained a 2-layer LSTM model (64 → 32 units) using Adam optimizer and MSE loss.
- Achieved a Test RMSE of 3.80, outperforming a Baseline Linear Regression model (RMSE: 7.51) and visualized predicted vs. actual prices to assess trend-tracking accuracy.

IMDB Movie Review Sentiment Classification

NLP Project | Python

- Built an NLP model using tokenization, embeddings, padded sequences, and a TensorFlow LSTM/Dense architecture to classify movie reviews.
- Processed 50,000 IMDB reviews with full text-cleaning pipeline: lowercasing, stopword removal, sequence vectorization.
- Trained and evaluated multiple architectures (Dense vs LSTM) to compare performance.
- Achieved accuracy percentage of 79.15% and evaluated model using Precision, Recall, and F1-score.
- Used validation curves and loss/accuracy plots to analyze model convergence and reduce overfitting.

Disease Diagnosis Prediction (Random Forest Classification)

Machine Learning Project | Python

- Developed a supervised machine learning model to predict disease diagnosis using structured clinical and symptom data.
- Performed feature engineering by splitting blood pressure into Systolic and Diastolic components, encoding categorical features, and scaling numerical variables.
- Trained a Random Forest Classifier, then optimized hyperparameters using GridSearchCV (max_depth=None, min_samples_split=2, n_estimators=100).
- Achieved 99.25% accuracy, with consistently high metrics across classes (Precision: 0.99, Recall: 0.99, F1-score: 0.99).

Loan Approval Prediction Using Random Forest

Statistical Inference and Modeling Project | R studio

- Trained a Random Forest classifier (ntree = 300) to predict loan approval outcomes and extracted variable importance measures.
- Evaluated performance using a confusion matrix, achieving metrics including:
- Accuracy: 99.1%
- Precision, Recall, F1-score: 99.21%, 99.61%, 99.40%
- Interpreted the model using feature importance plots, identifying key drivers of loan approval

Climate Change Impact on Agriculture – Interactive Dashboard

Data Visualization Project | Tableau Public

- Developed an interactive dashboard in Tableau Public analysing multi-country datasets (temperature trends, CO_2 emissions, rainfall, and crop yields) to evaluate long-term agricultural impacts of climate change.
- Created multiple views such as trend charts, adaptation strategies by countries, and yield-vs-climate scatter plots to highlight relationships and insights.
- Enabled stakeholders to explore adaptations: for example, filtering by country to compare yield improvements of drought-resistant seeds vs conventional methods.
- Delivered actionable insight and visual storytelling

CERTIFICATIONS

- Amazon Web Services

AWS Cloud Practitioner - Cloud Foundations

- Cisco Networking Academy

Introduction to Packet Tracer

- Google Developer Student Clubs (GDSC)

Portfolio Mastery: Full-Stack Development Workshop

ACHIEVEMENTS

- 1st Place - MLPC Supercomputer Poster Competition

Awarded for outstanding presentation and technical explanation of machine learning concepts using supercomputing resources.

LANGUAGES

- English - Fluent
- Malay - Fluent
- Tamil - Fluent
- Mandarin - Intermediate (Speaking & Listening)

CONTACT DETAILS

- Email : go4syahmi@gmail.com
- Phone No : 019-5586575
- LinkedIn
- GitHub