Individual Project Report

Team Name: AI Predictors

Project Title: Intelligent Dengue Predictor

Team Member Name: Bai Sihai

Team Member Matriculation Number: A0229986E

Team Member Contact (Mobile/Email): e0687394@u.nus.edu

1. My personal contribution to this project.

I took on the role of Project Manager for this project, and contributed to the following Project management:

- Co-ordinate team efforts
- Organize meetings
- Provide meeting agenda and meeting minutes.

Application implementation:

- Data Pre-processing
- Results visualization module

Report:

- Project report template design
- Research on dengue
- Report writing and consolidation.

Video Presentation:

- Slide creation and presentation for business case

Project idea discussion and research/data gathering:

- We discussed various project ideas among team members. Everyone contributed their project ideas. The team members have various interesting ideas in different areas such as AI-powered shopping mall, Route optimizer, Malware detection. We eventually reached a majority consensus on the Dengue Cases prediction project, because it allows good practice of what we have learned in the course. It also has a clear problem statement that is beneficial to mankind, and the predicted results that can be validated against actual historical data.

- For the project, I worked together with the team to research on dengue information.
- For data gathering, the number of dengue cases was stored as graphics in PDF files, so we shared the data entry tasks among team members.

2. What I have learnt that is most useful ?

Project ideas are the most useful thing that I have learnt.

Each of our team members come from different industries (Automotive, Marine, Security and Utilities). During project idea discussion, many interesting and diverse ideas were shared that is relevant to solving problems for our respective industries. At the same time, the project ideas can also cross-pollinate other industries.

3. How I can apply this knowledge and skills in other situations or my workplace ?

Dengue prediction is a time-series problem. It can be applied to any trend-forecasting problem. In my industry (Utilities), it can be adapted to make processes more efficient, or to predict the trend/outputs based on process inputs.