TM470 Project Plan

Automating the Identification of UK Coarse Fish

Robert Hunter X4545588

| | | | | Project Start: | 28/01/2023 |
| | | | | Display week: | 21 |

TASK	START	DAYS	END
Phase 1: ML model creation			
Module reading	28/1/2023	7	3/2/2023
Background research and gather resources	4/2/2023	7	10/2/2023
Finalise scope of project, start TMA01, lifecycle and plan	11/2/2023	7	17/2/2023
TMA01	18/2/2023	11	28/2/2023
Assignment reflection, Finalise resources - update plan to reflect chosen lifecycle/s	1/3/2023	7	7/3/2023
Install local ML environment and associated software - look at TMA02 - install Anaconda - install TensorFlow, Keras and Jupyter - check GPU is being used and test performance	8/3/2023	14	21/3/2023
Data preparation - look at datasets (resourced) - separate UK coarse fish - add other datasets if lacking - create test and train datsets - adjust images to suit purpose	22/3/2023	14	4/4/2023
Create model. Begin TMA02 - Begin TMA02 - research suitable CNN model architecture - create basic CNN model	5/4/2023	14	18/4/2023
TMA02 - complete TMA02	19/4/2023	7	25/4/2023
Train model and evaluate - parameter tuning - feature extraction - cross-validation	26/4/2023	21	16/5/2023
Phase 2: Integration into mobile app			
Finalise model - evaluation and predictions - tidy code - retest	17/5/2023	14	30/5/2023
Start work on TMA03	31/5/2023	14	13/6/2023
Research TensorFlow LIte	14/6/2023	7	20/6/2023
TMA03	21/6/2023	14	4/7/2023
Install app creation software environment. - install Android Studio and relevant sofwareCreate app. - design wireframe UI - create basic app template - test functionaliy of app	5/7/2023	14	18/7/2023
Integrate model with app - Convert model to TF Lite	19/7/2023	14	1/8/2023
Refine app - add extra requirements if needed	2/8/2023	14	15/8/2023
Review and final adjustments.	16/8/2023	21	5/9/2023
EMA	6/9/2023	6	11/9/2023

Key events:
TMA01 28/2/23, TMA02 25/4/23, TMA03 4/7/23, EMA 11/9/23

Calendar header (display weeks): 17/06/2023, 24/06/2023, 01/07/2023, 08/07/2023
Day numbers: 17 18 19 20 21 22 23 24 25 26 27 28 29 30 1 2 3 4 5 6 7 8 9 10 11 12 13 14
Day letters: S S M T W T F S S M T W T F S S M T W T F S S M T W T F