

#### **PROJECT**

## Build a Sign Language Recognizer

A part of the Artificial Intelligence Program

### PROJECT REVIEW

CODE REVIEW 4

### NOTES

# SHARE YOUR ACCOMPLISHMENT! **Y F** Meets Specifications

The project has met all the specifications. Hope you enjoyed working on all the 4 projects. Good luck for term2 🤐

### PART 1: Data

- 1. Student provides correct alternate feature sets: delta, polar, normalized, and custom.
- 2. Student passes unit tests.
- 3. Student provides a reasonable explanation for what custom set was chosen and why (Q1).

The custom set of features is correctly implemented. The answer to Q1 is well written and the unit-tests pass! 👍

## PART 2: Model Selection

- 1. Student correctly implements CV, BIC, and DIC model selection techniques in "my\_model\_selectors.py".
- 2. Student code runs error-free in notebook, passes unit tests and code review of the algorithms.
- 3. Student provides a brief but thoughtful comparison of the selectors (Q2).

Note: the results of CV have fewer states than BIC/DIC for the five words given.

SelectorCV uses KFold and the "combine\_sequences" correctly. The tests run error free. The formula for BIC and DIC is well implemented.

A good comparison between the model selection techniques has been made 👍

## PART 3: Recognizer

- 1. Student implements a recognizer in "my\_recognizer.py" which runs error-free in the notebook and passes all unit tests
- 2. Student provides three examples of feature/selector combinations in the submission cells of the notebook.
- 3. Student code provides the correct words within <60% WER for at least one of the three examples student provided.
- 4. Student provides a summary of results and speculates on how to improve the WER.

The script for my\_recognizer.py is correctly implemented and runs error free.

Three examples of feature/selector combinations are provided.

Atleast one example for correct words within <60% WER is provided.

Results have been well summarized. Impressive

Part 4 could be implemented to know more about how the WER score could improve using SLM techniques.