

## Unit 03 A review on Google AI

**Explore AI tools developed by Google.** Investigate, review and try it out.

**Explore Google Translation** by entering a sentence and then translating it to a language you understand. Examine the quality of the translation. Analyse why you think the translation quality is good or bad from a computer science perspective, i.e., the technology behind it, what is being used, and what technology may have improved the quality.

**Record** your findings for both tools in your e-portfolio.

### Google AI

A review on Google AI is separated into:

1. For developers: Google provides a platform for an open-source machine learning library for everyone to share their Machine Learning ("ML") training models.
2. For researchers: Google provides a datasets that help researchers to reach professional datasets and the cited scholarly articles. These datasets are important in ML as the developers have to use them to train, to test and finally to validate the ML model.

Experience: I have tried Google AI dataset to find a topic "Stamps in Hong Kong" which turn out to provide information like: US Exports of postage to Hong Kong, Germany import data of Stamp from Hong Kong, Hong Kong SAR, China Special Stamp Duty: Number of Case.

Insight: It mainly provided data from trusted sources for analysis purpose. It works different with google search because there will be a lot of social, untrusted informaiton, personal opinion and advertisement when you do a search in google search. In google dataset, the information provided are professional and governmental data which are ready for use in research.

3. For organisation: Google provides a platform for ML products such as Speech to text model, google translate, etc. so that organisation can use these models to train its ML and enhance the organisation's product.

Example: "Hi Translate" use google AI in translate to improve the performance to its own translation product and Hi Translate claims that it helps to shorten the translation time of about 40% (Google AI, ND).

Experience: Hi Translate is an instant voice translation to text. Young people use this to do instant translate when they play video games. Some comments that the performance is good while some other commented that the performance is not stable.

On top of Hi Translate, youtube also use google translate for the instant voice-to-text translation feature.

Insight: I have experience to use instant voice-to-text translation in youtube video. The performance is fairly good. Although sometime the translation is not correct due to accent but the result is sufficient for me to understand the conversation.

4. For start-ups: Google not only offers its technology (such as cloud technology) to start-ups, it also offers "consultation" to help the start-ups to use its technology to boost sales.