

Transcription Assistance for Jojon

Description:

Jojon is the sole heir of the richest Ramaputraboy family. However, he faces hearing issue since young, make him requires assistance in transcribing audio. One day, he wants to transcribe the contents of an audio file named “speech.wav”. He seeks to understand the speech within the audio. Mr. Yu, who has been serving Ramaputraboy family for twenty years, is tasked to help his young master. He doesn’t have the knowledge about digital audio processing, so he asks you, a born genius, to help him. Let’s assist Mr. Yu by transcribing the speech from the audio file to text.

Key Features:

- First, the application will **show the main menu**.
 1. **Audio Augmentation**
 2. **Predict Text**
 3. **Exit**
- After that, the application will ask the user to **input the menu numbers**.
- If the user chooses **menu 1 (Audio Augmentation)**, the application will **show the audio augmentation menu**.
 1. **Increase or decrease volume**
 2. **Increase or decrease pitch**
 3. **Insert fade in effect**
 4. **Insert fade out effect**
 5. **Back to main menu**
- If the user chooses **sub-menu 1 (Increase or decrease volume)**, the application will:
 - Ask the user to input **volume dB** to increase or decrease the volume. Validate that the input must **between -10000 and 100**.
 - Ask the user to input **new file name**. Validate that the input must **ends with “.wav”**.
 - **Export manipulated audio** as new audio file.
- If the user chooses **sub-menu 2 (Increase or decrease pitch)**, the application will:
 - Ask the user to input **pitch rate** to increase or decrease the pitch. Validate that the input must **between -10 and 10**.
 - Ask the user to input **new file name**. Validate that the input must **ends with “.wav”**.
 - **Export manipulated audio** as new audio file.
- If the user chooses **sub-menu 3 (Insert fade in effect)**, the application will:
 - Random the **duration effect** between **1 – 5 seconds** to set **fade in effect**. Validate that the input must **more than 0**.

- Ask the user to input **new file name**. Validate that the input must **ends with “.wav”**
- **Export manipulated audio** as new audio file.
- If the user chooses **sub-menu 4 (Insert fade out effect)**, the application will:
 - Random the **duration effect** between **1 – 5 seconds** to set **fade out** effect. Validate that the input must **more than 0**.
 - Ask the user to input **new file name**. Validate that the input must **ends with “.wav”**.
 - **Export manipulated audio** as new audio file.
- If the user chooses **sub-menu 0 (Back to main menu)**, the application will **redirect to main menu**.
- If the user chooses **menu 2 (Predict text)**, the application will **predict** and **print** the sound delivered in the form of text with **wav2vec2 model** and **change ‘|’ (vertical bar) to ‘ ’ (whitespace)**.