CUSTOMER VIRTUAL ASSISTANT

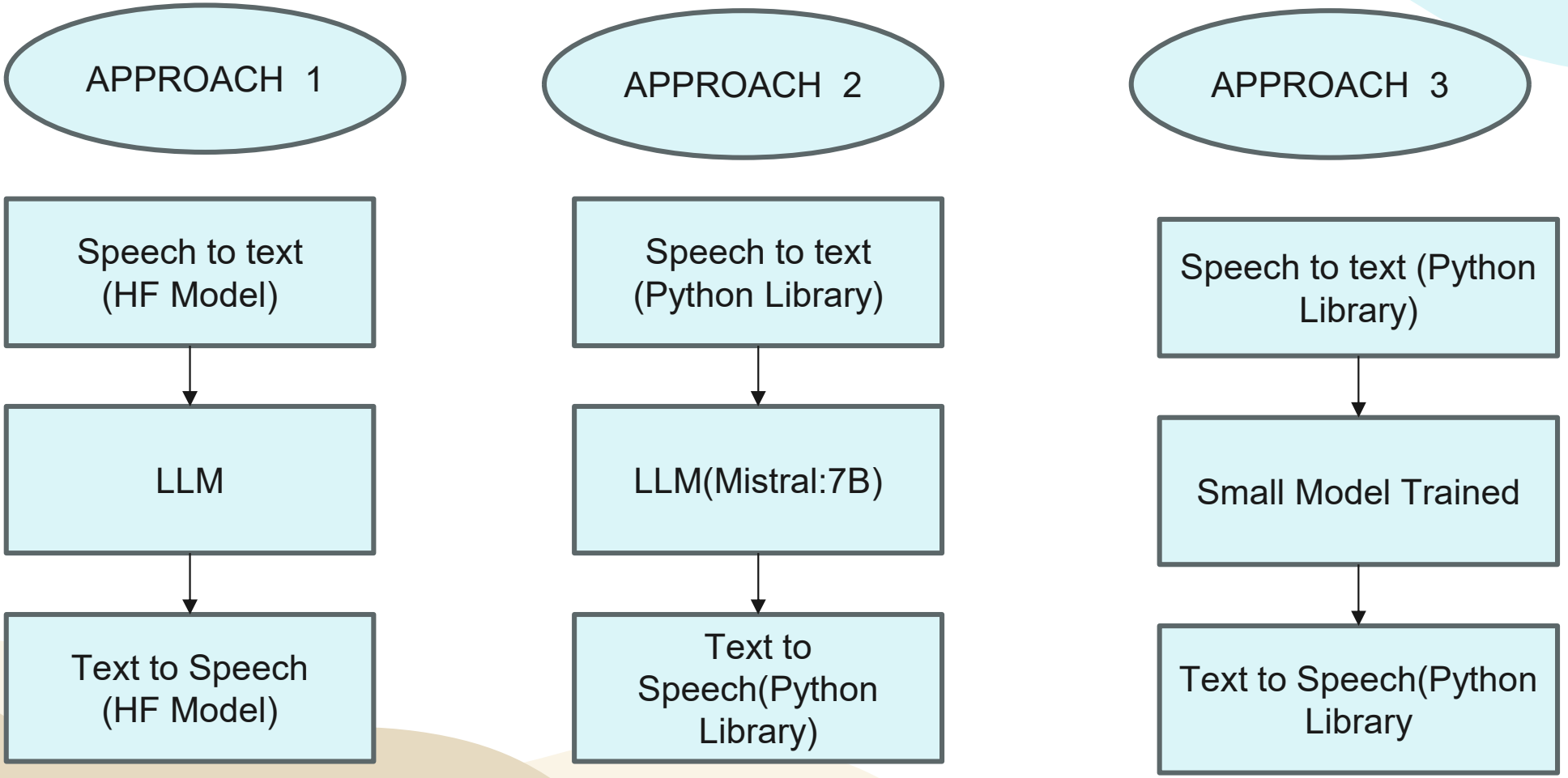
TETRAD

- Sanket Bauskar
- Isha Raut
- Udit Bhurke
-Yash Khot

Problem Statement

Existing Solutions often fall short in delivering seamless and natural interactions between customers and virtual assistants. AI interactions require a complex integration of LLMs, Speech to Text and vice versa. So the mission is to build an intelligent CVA to overcome limitations such as slow response times and unnatural interactions and to facilitate ease of communication.

Approach


APPROACH 1
Speech to text (HF Model)
LLM
Text to Speech (HF Model)
APPROACH 2
Speech to text (Python Library)
LLM(Mistral:7B)
Text to Speech(Python Library)
APPROACH 3
Speech to text (Python Library)
Small Model Trained
Text to Speech(Python Library

Models in use

01

Speech to text

Using pyttsx3 and speech recognition libraries

02

LLM(Large Language Model)

A large language model (LLM) is a type of artificial intelligence (AI) program that can recognize and generate text, among other tasks. LLMs are trained on huge sets of data — hence the name "large." LLMs are built on machine learning: specifically, a type of neural network called a transformer model.

03

Text to speech

Using pyttsx3 and speech recognition libraries

Tech Stack

Hugging Face

Thank You