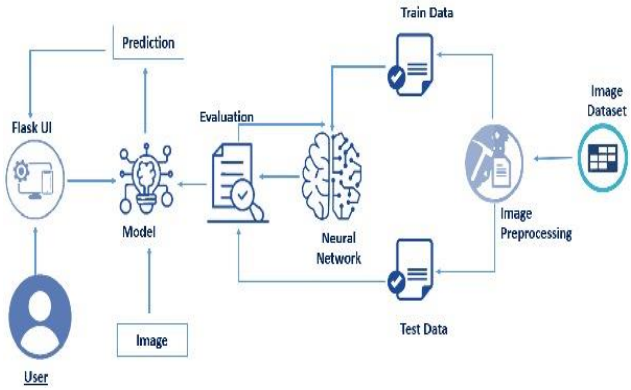
Project Design Phase-I
Proposed Solution Template

Date	24 September 2022
Team ID	PNT2022TMID45469
Project Name	Project - Real time communication system powered by AI for specially abled
Maximum Marks	2 Marks

Proposed Solution Template:

Project team shall fill the following information in proposed solution template.

S.No.	Parameter	Description
1.	Problem Statement (Problem to be solved)	• In this world there are many with disabilities. They face fewer education, less job opportunities due to impaired communication and difficulties in communicating with others. They are struggle to accommodate themselves in the world designed around hearing, leading to lack of inclusiveness along with breakdown of their mental, physical and social health. Lack of efficient gesture detection system designed specifically for the differently abled person.
2.	Idea / Solution description	• The project aims to develop a system that converts the sign language into a human hearing voice in the desired language to convey a message to normal people, as well as convert speech into understandable sign language for the deaf and dumb. We are making use of a Convolution Neural Network to create a model that is trained on different hand gestures. An app is built which uses this model. This app enables deaf and dumb people to convey their information using signs which get converted to human-understandable language.

		TECHNICAL ARCHITECTURE 
3.	Novelty / Uniqueness	• The proposed work aims at converting sign gestures into speech that can be understood by normal people. The entire model pipeline is developed by CNN architecture for the classification of 26 alphabets.
4.	Social Impact / Customer Satisfaction	• It's a mobile application • Sign to speech which can be understood by normal people , speech to sign (2 in 1 application) • Due to this every disabilities can be treated as a normal person.
5.	Business Model (Revenue Model)	• Single User application • Free of cost to access.
6.	Scalability of the Solution	• Simple in nature. • Due to simplicity It is available in play store • Can be downloaded easily and get installed on any ANDROID devices