Ideation Phase
Define the Problem Statements

Date	19 September 2022
Team ID	
Project Name	Real-Time Communication System Powered by AI for Specially Abled
Maximum Marks	2 Marks

Problem Statement:

In our society, we have people with disabilities. The technology is developing day by day but no significant developments are undertaken for the betterment of these people. Communications between deaf-mute and a normal person has always been a challenging task. It is very difficult for mute people to convey their message to normal people. Since normal people are not trained on hand sign language. In emergency times conveying their message is very difficult. The human hand has remained a popular choice to convey information in situations where other forms like speech cannot be used.

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 and speech is given as output.

Example:

Problem Statement (PS)	I am (Customer)	I'm trying to	But	Because	Which makes me feel
PS-1	Person without disability	Communicate with deaf and dumb via phone	It is not possible	I can't able to understand the sign language	Frustrated
PS-2	A human like everyone	Communicate freely with others	I cannot do so	I am a deaf/dumb	Captivated as well as unmotivated