Project Design Phase-II

Solution Requirements (Functional & Non-functional)

Date	17 October 2022
Team ID	PNT2022TMID28501
Project Name	Real-Time Communication System Powered by AI for specially abled
Maximum Marks	4 Marks

Functional Requirements:

Following are the functional requirements of the proposed solution.

FR No.	Functional Requirement (Epic)	Sub Requirement (Sub-Task)
FR-1	User Registration	Registration is done through Gmail
FR-2	User Confirmation	Confirmation via Email
FR-3	Communication requirement	For one on one mentoring, teacher will be available.
FR-4	User requirement	Option should be shown for hand sign to text and voice conversion and vice versa.
FR-5	User Communication	Communication can be done through pc or mobile.
FR-6	Regulatory requirements	In case of any cyber attacks the app gets automatically shut down.
FR-7	Reporting	Automated notification will be received by the developer in case of any issues.
FR-8	Compliance to rules or law	Terms and conditions, private policy, End user subscription agreement and cookies.

Non-functional Requirements:

FR No.	Non-Functional Requirement	Description
NFR-1	Usability	The camera captures all expressions including facial expressions and hand gestures which can be easily used by all age groups. It can be used by deaf-mute people and their care takers.
NFR-2	Security & Privacy	The system is more secure and information of the customers is also maintained confidentially.
NFR-3	Accuracy	The system must have a great accuracy rate. The accuracy is important so that the disabled students could get a clear understanding.
NFR-4	Performance	The performance of the model is efficient. The cost-effective nature of the system makes it extremely liable. The latency is very less for the conversion process.
NFR-5	Availability	The solution is suitable for different languages and can be used in many countries. It can be trained for all the available sign languages. This model can be used at any time anywhere.
NFR-6	Scalability	The system gives output rapidly. It also predicts quickly when it gets so many inputs at a time. It predicts different types of sign language at a time. Upto 25000 users can be use this model at a time.