

Introduction

The number of Deaf in the world is estimated to be between 700,000-900,000. Other than them, there are numerous others who lose the ability to hear clearly with age. Although these people try their best to live as normal a life as possible, they face difficulties on a daily basis. VirTalks is an easy-to-use mobile app for Deaf. It enables them to communicate with others much more easily.

How It Works

VirTalks has a simple User Interface, similar to that of any messaging application. Users type their message and send it, and the phone speaks it out for them. In a sense, one might say, that the phone gives them a *voice*. For the *hearing* part, the phone recognizes speech, and converts it to text that appears as a message from the other person, on the user's screen. In this manner, there can be smooth communication between the Deaf and the hearing people who do not know sign language.

Additional Features

The app offers several additional features, such as saving conversations in the app and viewing them later. The app offers support for multiple languages, including but not limited to Hindi, English and Bengali. The user can also select from a variety of different voices in each language, including both male and female voices. The app gives a clearly audible *beep* sound to indicate that it is waiting for speech, but since this beep would not be audible to Deaf users, it also gives an on-screen animation to indicate that recognition is in progress.

Upcoming Features

The app will soon include features for saving messages for quick responding, and to store prepared messages that might feel too long to write on the spot, such as shopping lists, etc. Other than this, there would also be a *Deaf Mode*, for people who have hearing issues but are able to speak. This would eliminate the keyboard from the screen, and each time, recording would have to be manually turned on, so as to avoid the user's voice from getting recorded.

Benefits

Other than the Deaf, people with impaired hearing would also find this app extremely useful. Those who are able to hear but not speak would also be given a voice. Moreover, all these people, who often use written medium for communication, would also be able to communicate with people who are unable to read and write.

The Future

The goal is to eliminate the need for a sign language completely. 10 years down the line, I see two Deaf people standing in front of each other, using VirTalks for communication. I intend to make this app faster, smoother, and even more simple to use, so that every Deaf person can be given a virtual voice and a pair of virtual ears.

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