

S.NO	PAPER TITLE	AUTHORS	DESCRIPTION
1	Portable Communication Aid for Specially Challenged: Conversion of Hand Gestures into Voice and Vice Versa	T Meera Devi, K M Shravan Raju	The goal of the project is to provide a portable communication tool for people with disabilities who have trouble adequately communicating with healthy people. The process of identifying the characteristic hand gesture that sets it apart involves several steps. Using a neural network, the gathered gesticulation is taught. A continuous recording of gestures is isolated from the hand movement pattern. The gestural section represents low-level comprehension of the feature pattern. This will let normal people and those with disabilities communicate with one another.
2	Real-Time Two-Way Communication Approach for Hearing Impaired and Dumb Person Based on Image Processing.	Shweta. S. Shinde, Rajesh M. Autee, Vitthal K. Bhosal	The proposed system employs a method for hand recognition based on vision. The hand movements are recognised in various lighting situations. The suggested method segments the hand's background using the data that has been collected, and then each letter is given a specific gesture. It uses feature extraction techniques to determine hand motions' peak and angle values. By translating the motions into speech and vice versa, the gestures are finally recognised. Mel-frequency cepstrum coefficients and dynamic temporal warping are utilised to extract the voice signal's characteristics. The suggested system is MATLAB-based.
3	Full Duplex Communication System for Deaf & Dumb People	Shraddha R. Ghorpade, Surendra K. Waghmare (2015)	People with disabilities are having a difficult time keeping up with the rapidly advancing technology, which is one of the major issues that our society is dealing with. For those with disabilities, having access to communication tools has become crucial. Deaf and stupid individuals typically use sign language for however, they struggle to communicate with people who don't comprehend sign language.
4	Smart communication for differently abled people	R. Bhavani , B. Poornima, M. Surya Bharathi , M. Saraswathi	The majority of the tasks we perform on a daily basis involve speaking and hearing.

			<p>People who are deaf or dumb find it challenging to communicate with those who do not comprehend sign language or misinterpreters. In this study, we developed a straightforward embedded system-based solution to address this issue. To collect data from the deaf and dumb using sign language, we used a flex sensor. The user of the android-based voice software will speak into it when he or she is deaf and needs to communicate. The programme will then convert this specific speech to text, which will be displayed on LCD. Two Flex sensors are utilised to play whatever messages that Dumb People want to play for the user.</p>
5	Real-Time Recognition of Indian Sign Language	Muthu Mariappan H, Dr Gomathi V	<p>The real-time sign language recognition system is designed to identify Indian Sign Language motions (ISL). Sign languages often only use hand gestures and facial emotions. The skin segmentation function of OpenCV is used to identify and track the Regions of Interest (ROI) for the purpose of recognising the indications. By using the fuzzy c-means clustering machine learning algorithm, hand motions are trained and predicted. Applications for gesture recognition include game control, Human-Computer Interaction (HCI), sign language interpretation, and gesture-controlled robots and automated houses. Real-time signs are recognised using the suggested approach. Therefore, it is highly helpful for those with hearing and speech impairments to communicate with other individuals.</p>