Intelligent Glove For Visually Impaired People using Haptic Feedback System

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Abstract

The primary objective is to bridge the gap between the visually impaired people and society. There are approximately 37 million people across the globe who are blind, over 15 million are from India. People with visual disabilities are often dependent on external assistance. Blind people use Braille language for reading, writing and for communication purpose.

Blind people face problems such as reading SMS and replying for it in case of emergency. Braille language is used as the basis of the project. Therefore interfacing Braille pad with the GSM module so that the blind people can have the access to the SMS system is advantageous.

Thus we were motivated to develop an experimental system for communication to assist people who are completely blind using Braille pad system. In which GSM module convert text inputs into Braille patterns through vibrations using DC cylindrical motors with PIC microcontroller as the master. Therfore the words corresponding vibration will be intimated through the gloves to the visually impaired people. It will result to overcome the disabilities of visually impaired to understand other's expressions.

References:

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