Team Blinkers

DevJams '21

Track: Digital Accessibility



Problem

- Digital Accessibility is still very scarce amongst people who are physically handicapped or suffer with muscle atrophy problems.
- The power of internet is not being completely exploited to not only bring in entertainment but also for healthcare and communication

PROBLEM STATEMENT

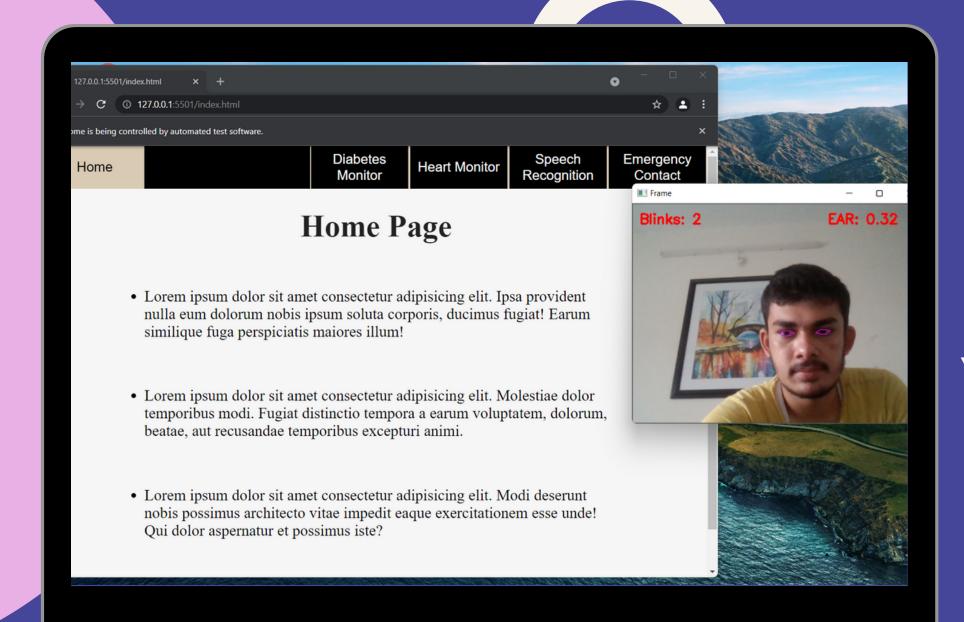


Solution

- We put together a solution to bring digital accessibilty at the conviniece of those for whom traditional digital access is still a problem.
- We try to integrate a fully functional one stop destination for the one's who are physically handicapped or unable to access web resources by means of normal interface.
- Our goal is to revolutionize the means of accessing the world wide web at their own convenience and also bring together emergency and health features to cater one's needs.

THE UTOPIA





Blinkerz

Your destination is one blink away!



Step 1

One call to discuss the idea of the hack

Birth of Blinkerz

Step 2

Checked out the Digital Accessibility track.

Step 3

Found out the people for whom Digital Accessibility was still an issue



TIMING

Reason 1

Internet is growing at a rapid pace. People who are physically challenged are equally capable of moving forward and there must be no hinderance to access the internet for education or entertainment.

Reason 2

To keep record of medical stats and also track health diseases which can be easily tracked with the help of modern sensors and gadge



Working of Blinkerz

1. We navigate through out the web application using detections of blinks

2. A short blink refers to next option whereas a long blink can be used to select a button

3. Scanning of various health parameters using sensors from smart watches

4. Using third party API calls to access resources on the web

5. Trained ML Models to scan for diseases such as heart failures and diabetes.

6. Contact Emergency contacts in times for serious emergencies using automated whatsapp messages

Tech Stack

 Step 1
 Python Flask Frame
 Step 1
 OpenCV

 Step 2
 Selenium Web Driver
 Step 2
 HTML/CSS/JS

 Step 3
 scikit-learn
 Step 3
 Numpy/Pandas



Our Progress

Detect Blinks for Navigation

Create a simple Ul

Train ML Models

4 Integration

The Team



Aviral JainBackend & ML



Arhit Bose Tagore
Backend & ML



Vidipt Khetriwal
Frontend





THANKYOU