

Progress report

-Report 3 April:

We want to update that we are no longer three partners but two. Loay Moualm left our group so now we are two partners.

We have started Learning about the MYO armband's API and how to use it. The MYO armband will help to translate the hand movements to sentences . We started to learn about the android studio and work with it as well (already building small hello world like apps.

We think that the idea of our project is still valid and will work well. In the upcoming two weeks we are aiming to build a demo app using MYO and build it in an android studio environment.

-Report 17 April:

In the last two weeks we divided the work between us due to the holiday and our inability to meet and here is how it went. First in my end (Noy) i have been struggling with the MYO's API for android studio because they have almost no documentation regarding serious problems. In order to run an app using MYO's API i have overcome several problems regarding build path, libs folder problem and 'sdk not found' issue. However i still don't have a solution for "missing GDK 19" problem which is about missing Glass wearable SDK for android which I have installed. I have seen the problem posted MYO's forum and posted myself on stack overflow, but, the responses I got were not working. We don't know anyone in Haifa who build an app using MYO so we can't get any help. If you are familiar with the problem we would like if you could help us.

During those two weeks, Amit, have built java code for the app: already implemented a Trie tree for the letters represented in morse and braille , a general public class to manage the trees (can be either morse or braille tree), and an Enum class to represent signals in MYO (wave out, wave in, fingers spread, fist, double tap). In his implementation he assign semantics to each gesture of the MYO:

wave in - delete letter
wave out - end letter
finger spread - long line
fist - dot

For the next two weeks we are hoping to solve the MYO's SDK problems completely and will merge the java with the xml code to create an app for writing text using MYO and morse/ brile

-Report 8 May:

In the past two weeks we have reached several goals. First we solve the problem we had with the MYO apk, next me and Amit made a demo app typing with the MYO and our plan is that Amit will keep improving and make the MYO typing system while I will try to develop a demo chat between two phones in order to show the application of the product as a "what's app for blind people". We want to be able to chat using our typing system. Of course in order to do that Amit needs to finish the receiving message procedure (include using the phone vibrating system as a transmitter for the Morse code), but we are hoping that in the next two weeks he will do it and we will work both of us on the server to get a demo chat.

-Report 31 May:

In the past two weeks me and Amit struggled with several problems, First, was building the chat. We had no knowledge before this project about java sockets and now we know how to implement it which is a great learning experience by itself. It took us a lot of time but we finally implemented a java socket frame work to our project. There are still bugs to solve but overall we have a really nice idea on how to make it work. On the MYO side, we have implemented the send type gesture as holding a fist for 3 seconds. I believe we can finish this project in the next two weeks and will be able to show you our app. In the next two weeks we will fix the chat so it will work properly and make it more consistent (we have a problem that after one message the connection restarts). We will also finish the design and will make any form of submission you desire (we heard it is an html and a video).