"CS 386 HoloLens Project" by Stephen White, Jack Garrard, Colton Nunley, Daniel Williamson, and James Todd

Github Link: https://github.com/Swhite9478/CS386-HoloLens-Project
Trello Link: https://trello.com/invite/b/z5QYDqJx/77df811166edfedfdc5a11206a15c38a/public-board

CS 386 Software Engineering, Spring 2017 Instructor: Marco Gerosa

Deliverable 6.2: User Evaluation

Interviewee Adam Paquette:

Usability:

- **How easy / difficult is this product to use?**

The overall usability of the program is alright. I think the drawbacks are a result of the hololens being a rather new technology, and some of those features being very finicky. The voice commands could use a little work, and it would be since to get a tutorial on what commands to what. While we had one of your fabulous group members help us through the program, I don't think I would have figured out the commands.

- **Who is the intended user of this product?**

Developers, like everyone in the Computer Science field.

- **What are the good and bad aspects of this product?**

I think that seeing the augmented world is really neat. Being able to interact with the objects in the scene, as they also interact with the world around them is really cool! I think that the commands are rather awkward to use and don't always work. There may be something available to help normalize audio and create a more stable voice program.

Accessibility:

- **How easy is it to understand / learn basic functionalities of this product?**

Rather difficult as there is little to no tutorial on using the voice commands or the default hololens commands/gestures. Some basic tutorial stuff that could be built into the application would be nice. Maybe more info from Steven's voice over at the beginning would be nice.

- **How intuitive are the voice commands?**

If I knew them from some kind of tutorial, I think that the commands would be easily remembered and understood. They all do something that is unique and memorable, so as long as the voice command functionalities don't overlap.

- **How easy is it to manipulate holograms?**

The holograms don't seem to have too much manipulability associated with them. I think if you could pick up individual objects, and potentially either crush them, throw them, or move things around more individually that would be cool.

- **How easy is it to use an audio node?**

Didn't recognize any kind of "audio node", if the node wasn't colored green and just a floating disc it would be more recognizable as an audio node. Maybe put some kind of speaker symbol in the node to let people know about it.

User Interface:

- **How easy is it for the user to launch the application?**

It was pretty easy, but something other than a window to indicate that the thing is an actual application would be nice. The way I saw it was as a floating white box, so maybe some kind of start button?

- **How intuitive are the controls for the hologram?**

For the controls that were there, they were pretty good. It was easy to start manipulating the holograms and mess around with them.

- **On the scale of 1 to 10(1 being the worst 10 being the best), how would you rate the layout of our design and why.**

For the one user interface that I did interact with it was rather bare bones if nothing at all. It would be nice to get a start button of some kind and maybe a menu to adjust various settings. For the other objects, it might be nice to get a context menu for since not every object will have the same commands. So, overall I give it a 6.

Interviewee Chandler Hayes:

Usability:

- **How easy / difficult is this product to use?**

Using the hololens was not intuitive. I didn't know what I was supposed to be looking at and I was distracted by the green circle (the sound node?). Moving the origami table was more intuitive once I found it. It was glitchy though.

- **Who is the intended user of this product?**

People who enjoy video games and the newest technology.

- **What are the low level and high level aspects of this product?**

I think there should be an instruction option that explains what you are looking for and what the instructions are (low level). High level: it was fun to have a 3D experience with software.

Accessibility:

- **How easy is it to understand / learn basic functionalities of this product?**

It was glitchy, because of that it was more difficult to figure how to use the software. Such as the red circle that selects the object.

- **How intuitive are the voice commands?**

The voice commands are very intuitive.

- **How easy is it to manipulate holograms?**

I had a hard time doing anything beside turning on the gravity.

- **How easy is it to use an audio node?**

Pretty easy.

User Interface:

- **How easy is it for the user to launch the application?**

It was simple.

- **How intuitive are the controls for the hologram?**

Somewhat intuitive, it didn't take too long to figure out.

- **On the scale of 1 to 10(1 being the worst 10 being the best), how would you rate the layout of our design and why.**

8, I think you should figure out how to make the green circle invisible and to make everything bigger.

Interviewee Connor Schwirian:

Usability:

- **How easy / difficult is this product to use?**

  Somewhat difficult, largely due to the limited viewing window.

- **Who is the intended user of this product?**

  Developers that wish to get started with the Microsoft Hololens, and wish to see an example of its use.

- **What are the good and bad aspects of this product?**

  The functionalities presented by this product are appropriate and fill requirements of this type of product, however the implementation of said functionalities and the limitations of the hardware combine to make the experience less than satisfying.

Accessibility:

- **How easy is it to understand / learn basic functionalities of this product?**

  The entire project is a demonstration of basic functionalities, and it is easy to learn the entirety of its functionalities.

- **How intuitive are the voice commands?**

  The voice commands are very intuitive.

- **How easy is it to manipulate holograms?**

  Not easy at all. The hologram is automatically pushed as far away from the user as possible, making it pointless to move a hologram unless that is what you intend to do with it.

- **How easy is it to use an audio node?**

It is easy to actually activate one, but it is unclear when the node is actually activated.

User Interface:

- **How easy is it for the user to launch the application?**

  The application must be launched from a window pinned to the room, requiring the user to actually find the window.

- H**ow intuitive are the controls for the hologram?**

  They are fairly intuitive, though clunky.

- **On the scale of 1 to 10(1 being the worst 10 being the best), how would you rate the layout of our design and why.**

  7, because of the current state of the mapping geometry being present, cluttering the display.

- Group Member Participation -

- *Stephen White:*
  - *Communicated through slack*
  - *Ensured team cooperation*
  - *Developed plan for interviewing people*
  - *Ensured document consistency*

- *James Todd:*
  - *Communicated through slack.*

- *Daniel Williamson:*
  - *Communicated through slack.*
  - *Created Google Doc.*
  - *Wrote Google Doc.*
  - *Interviewed each Interviewee.*
  - *Created questions.*
  - *Submitted onto EasyChair.*

- *Jack Garrard:*
  - *Communicated through slack.*
  - *Helped create questions.*

- *Colton Nunley:*
  - *Communicated through slack.*