Plant Hug

Human Computer Interaction

A3 – STORYBOARD AND LOW-FI PROTOTYPES

Knowing is Caring



Group informations

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Project name: Plant Hug

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Problem overview

At the start of this project we decided to pursue the path of plant care, the aim was helping people who own plants.

In the precedent steps we discovered needs and thoughts of different type of users by mean of interviews, thanks to that we had a clear idea about what needs we needed to focus on for our project.

Now we are analyzing the solutions we have thought of, choosing the best one and defining how to proceed with the conceptual development of it.

Tasks definition

1. Simple task

Action: Recognizing a plant

Goal: Getting useful information about the maintenance of the plant, including watering

frequencies, problems that can occur, repotting period etc..

2. Moderate task

Action: Receiving suggestions about which plant to buy

Goal: Suggesting a plant that meets the user needs in terms of money, effort and aesthetic

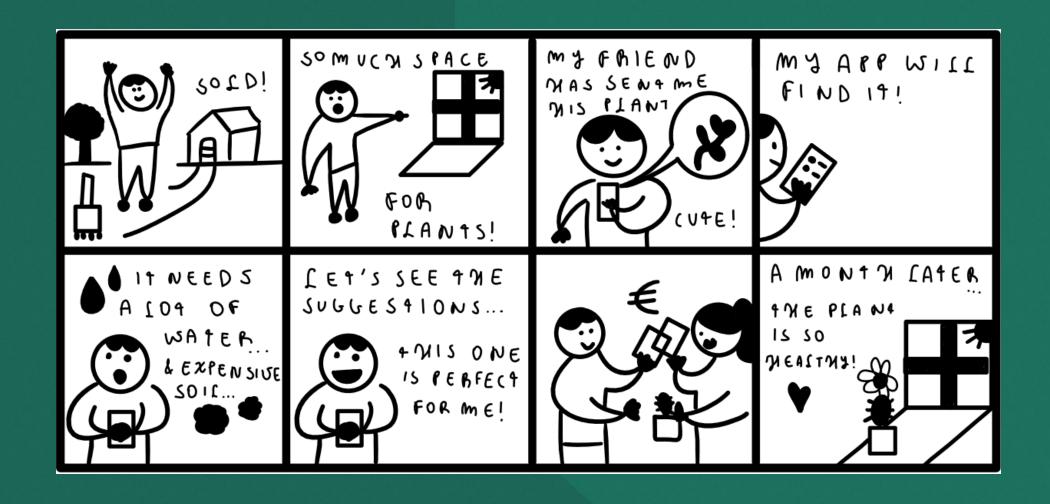
3. Complex task

Action: Interaction with peers

Goal: Getting information in a natural language, explained by peers, on specific needs, or

just interact with other enthusiasts

Storyboard



Storyboard

In the comic strip-like sketch we can see how our application can be used to satisfy the user's needs.

The user buys a new house and has plenty of space for plants, he received a photo of a plant from a friend and since he doesn't know which plant it is he uses the app to recognize it (task 1) and gain informations, after that, by using the recommendations (task 3) he decides to buy another plant that better reflects his needs.

We choose this storyboard because it represents well the context and how the user should feel while using the app, showing the positive emotions that a possible use of it can infond on people and a concrete improvement in everyday life. This storyboard perfectly fit the core idea of this project and meet the user needs we previously have found out.

Pros:

- Simple, without frills
- Very intuitive
- Focus on emotions and improvments

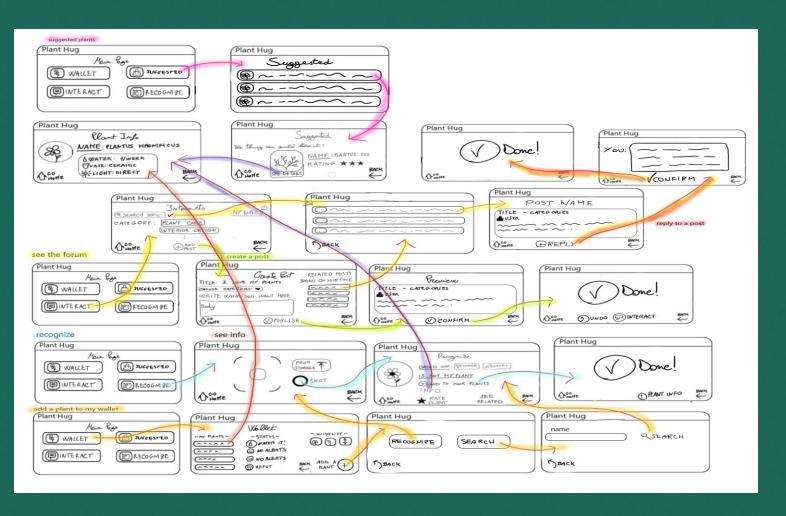
Cons:

- Does not cover task #3
- Specific case (although objectives are common to other cases)

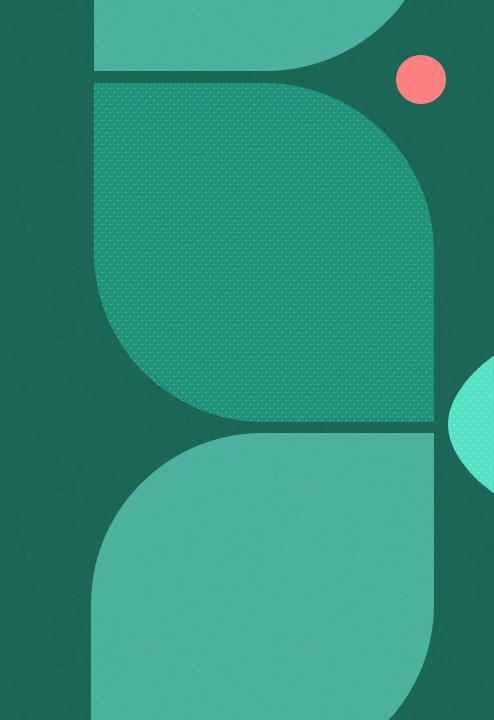
Modalities of exploration

For our application we brainstormed about the modalities we wanted to explore. First of all we knew that users NEED to take a picture of the plant (task #1) or load it from somewhere else, so it is clear that modalities like speech-based or AR/VR applications were not suitable for our case. We considered an app for smartwatches but also that would not be optimal. In the end, since our application must be accessible by all kind of users, experts and non-experts, in a comfortable and fast way, we decided to explore two modaldesktop mobile and desktop applications.

Paper prototype #1, Desktop application - HLF



Note: look at the pdf in the repository for better visualization.



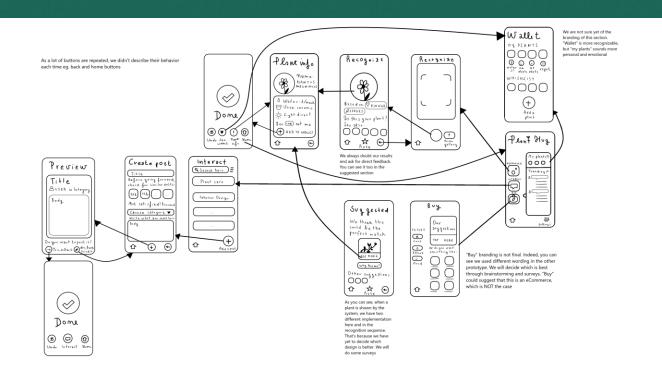
The one in slide 8 is the high-level flow of the screen of our desktop application prototype, we have a main page with all the functionalities needed for our tasks (Recognize, Interact and Suggested).

The storyboard user would use the prototype in this way: he would click Recognize and take a photo of the plant or load it from his device, by that the application would recognize the plant and show on screen the important informations.

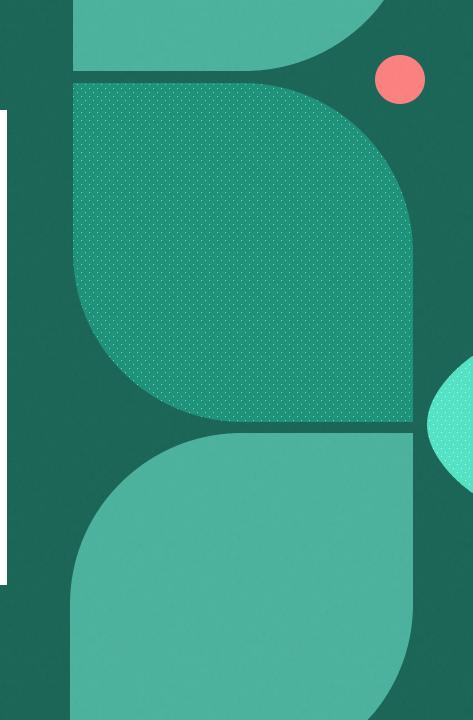
After that he uses the Suggested functionality to find another plant to buy. This show how possibly task #1 and task #3 may intertwine with themselvesnin order to give a better experience to the user.

For task #3 there is the Interact functionality that will lead to a page where you can search for a thread inside the categories or by using the search bar or even create a new thread with personal questions, doubts, comments, thoughts.

Paper prototype #2, Smartphone app - HLF



Note: look at the pdf in the repository for better visualization.



Above we can see the high-level flow of our prototype #2. On the far right we have the main page of our application where the user, by clicking with his finger on the relative icon, can access functionalities. Through this click he can access specific pages relative to our tasks for recognizing a plant (camera icon), interacting with other users by using a forum (dialogue box icon) and receiving plant recommendations (shopping bag icon). This prototype perfectly fits what we see in the storyboard, the user does everything easily by using the smartphone's built in devices

Prototype choice

After a brainstorming we defined pro and cons for each prototype:

Prototype #1 - Desktop application:

Pros:

- Easy to design
- Optimized performances
- May not need internet connection

Cons:

- Need extra accessories in some cases (like a webcam)
- May be dispersive
- Installation is necessary

Prototype choice

Prototype #2 – Smartphone application:

Pros:

- Very accessible
- Good user interaction through touchscreen
- Usage of built-in devices like camera
- Good notification mechanism

Cons:

- Can be difficult to design
- Deployment of mobile application usually has higher costs
- Need to support to different type of phones OS
- Installation is necessary

Final choice

In the end we choose the smartphone prototype, since we came to the conclusion that our application can be smarter and more practical thanks to smartphones' inbuilt features like camera and touch-screen.

We also thought that in this way the application would be more accessible to everyone, since in this time and age everybody has a smartphone in their pocket and, as a consequence, a smartphone app would be more immediate to use respect to a desktop application.