Android Bike Rental

Problem Definition/ Concepting

1. Problem

The problem we identified, is that if you currently want to rent a bike, there are 2 options – OVfiets and Swapfiets. Both are on fixed locations and subscription based, with a prepaid deposit. Also there are a lot of unused bikes at the homes of people, especially during Covid.

Concept

We decided to go with our own topic, which is BikeRental – a platform in which people could rent/lend bikes to people for a certain period. You pay a small price for this, and the profits go to the person renting it out. You verify renting the bike by scanning the user's unique QR code that appears on the owner's screen



3. Empathy map

I created an empathy map for our persona – Kara, so we can further empathize with her and understand her problem. From this we found out that Kara's dreams, goals, and potential feelings.

SAYS

- I want a new car
- I want a good paying job

THINKS

- Will I be good at my new job?
- How can I reach my new job, without a car?
- Could I rent a bike for a month or two, until I save up enough money for a car?

Kara

FEELS

- Scared, because it's her first job, but also she is super comfortable, because she has studied it for 4 years and she is confident in her knowledge
- Happy, because she knows her parents are proud of her for graduating university.

DOES

- Rents a bike from BikeRental, so she can go to her new job, until she saves up enough money for a car
- During her spare time, she loves watching Netflix, but if she could she would prefer the

 I want to be successful in my career, to the point I open my own company for digital marketing

GOALS

- I want to get married and hopefully have 2 healthy children

- I want to visit as more countries as I possible could, but if I could choose one, it would be Egypt

4. MoSCoW Analysis

In our first brainstorming session we created it, because we wanted to be straightforward with the important parts of our app. For example, you can see in the must have we have the Location feature of our app, because without it our app doesn't make any sense, because its location based. Our second goal was implementing the QR code scanner feature, so users can rent without a problem.



- 1. Location on the bike (marker)
- 2. Location of the bike you rent out
- 3. Basic bike information (image, type)
- 4. Location of the bikes near you
- 5. Information if the bike is free or taken
- 6. Information about the person renting



- Camera for QR code to confirm you're renting the bike
- QR code to confirm you're renting it from the owner
- 3. QR code to confirm you're returning it



- Notifications if bike locked/unlocked
- 2. Profile (reputation)
- 3. Report system from abuse



1. Ads

Glad to say we were able to implement everything from the Must/Should have.