Situation

In this scenario, I will be working as a Product Manager (PM) for UrbanMobility, a startup company that is exploring new solutions to address urban mobility challenges.

A specific problem to be solved here is the transportation of children to and from school in urban areas.

In this wireframe, I will be doing the following:

- 1. Jobs To Be Done strategy for parents and children.
- 2. Create a wireframe for a mobile application for the SmartBus concept.

Mobility trends

- 1. The percentage of children walking or bicycling to school has dropped significantly since 1969.
- 2. Even when schools are $\frac{1}{4}$ or $\frac{1}{2}$ miles away, family vehicles account for half of the school trips.
- 3. In Chicago, 30% of children use public transportation.
- 4. In LA, ~10% of children use public transportation.

Pain points for youth mobility to school

1. Safety

- a. Children from low-income families are twice as likely to walk to school and face greater risks of being injured.
- b. Pedestrians are over four times as likely to be killed by a school vehicle than other vehicles.

2. Access

- a. In low income neighborhoods, 25% of children travel more than 4 miles to school.
- b. The logistics and complexity of travel to and from school influence punctuality, absences and ability to participate in afterschool activities.
- c. Additionally, access to quality schools is hampered by lack of transportation options.

3. Pollution

- a. Kids who ride the school bus breathe in 5-15x more than they would otherwise.
- b. Children exposed to traffic pollution are more likely to have asthma, permanent lung deficits, and a higher risk of heart problems.
- c. Among children aged 5 to 14, there has been a 74% increase in asthma cases in the last 25 years.

4. Congestion

- a. 33% of the traffic in the US is caused by cars to and from school.
- b. School-related traffic congestion poses a threat to the safety of the students, teachers, parents, residents and motorists in and around school sites.

Customer Insights

- 1) Parents spend a surprising amount of time chauffeuring their children between activities.
- 2) Children attend a highly diverse (and growing!) set of activities after school.
- 3) Safety is of top priority (supervision, vehicle safety, interactions, privacy/security).
- 4) Parents want to spend less time and effort than current solutions as the top 10% of parents are spending over 2 hours a day commuting with their children.
- 5) Many children require allergen free environments, such as vehicle interiors which have not been exposed to peanuts & access to epi-pens.

Opportunity Hypothesis

How might we transport K-8 children in urban areas safely and efficiently with minimal parental effort and supervision?

Jobs to Be Done (JTBD) for Parent Personas

a) Functional Jobs

Functional job is often referred to as a job that customers have been trying to accomplish for years, decades and in some cases even centuries.¹

The following are the potential functional jobs for parent personas:

- 1. When the parent is short on time, I want to ensure that the children can be dropped off to school with minimal supervision, so that parents can focus on their professional duties.
- 2. When a parent stays at work longer than usual, I want to give them the ability to keep their children's after-school activities on schedule, so that children are not overly reliant on their parents to keep up with a daily schedule.
- 3. When parents allow their children to travel in a shared mode of transport, I want to give them the chance to interact with their friends on a daily basis and enjoy the journey to and from their place of education.

b) Social/Emotional Jobs

An emotional job is often referred to as a job where customers try to accomplish something that advances society and puts them in a good light.

The following are the potential emotional jobs for parent personas:

- 1. By allowing children on a shared mode of transportation, parents should be perceived as individuals that care about the harmful effects of the lack of carpooling with respect to transporting children.
- 2. By allowing their children on a shared mode of transportation, parents should be perceived as individuals who care deeply about the overall

¹ Ulwick, T. (2020, January 11). The Core Tenets of Jobs-to-be-Done Theory. Retrieved September 10, 2020, from https://jobs-to-be-done.com/the-5-tenets-of-jobs-to-be-done-theory-ba58c3a093c1?gi=c710776ab83d

- happiness of their children, since their children are given the opportunity to have fun with their friends on the commute.
- 3. By providing their children with a reliable mode of transportation, I hope to let children know that their parents greatly care for their well-being, even though they might be very busy with their professional careers.
- 4. By providing their children with a safe mode of transportation, I hope to provide parents with the confidence that their children will be able to commute hassle free from one place to another.

Jobs to Be Done (JTBD) for Children Personas

a) Functional Jobs

- 1. As a child, when I board the vehicle, I hope to remain safely seated through means of say, a seat belt or another feature that can help me remain safe.
- 2. As a child, when I board the vehicle, I hope to be able to grab a quick bite, especially if it's snack time, so that I can avoid delaying my schedule and finish all the required tasks for my day.
- 3. As a child, when I board the vehicle, I hope to be able to store my belongings in a safe and secure place, so that I am safely secured into my seat and am safe in the case of an emergency.
- 4. As a child, when I board the vehicle, I hope to be able to see our location and how far I am from my house, so that I can ease my anxiety as to when I will reach home.
- 5. As a child, when I board the vehicle, I hope to be able to communicate with my parents about anything. This could be through means of text or video calls, and this is so that I can ease their anxiety as to whether I am safe during my commute.

b) **Emotional Jobs**

- 1. As a child, when I board the vehicle, I hope to show I am being conscious about the environmental impact of sharing transport with others in the vehicle.
- 2. As a child, while travelling in the vehicle, I want to show that I am an independent person and make my parents proud about this aspect of my life.