Project mission – 1 min BYT SLIDE

The background to our project new government has decided to decrease the greenhouse gas emissions. They want to achieve this by making commuting easier and thus increasing the use of public transport. The government has given group B the mission of developing a service that gathers all the different public transport operators in Sweden. This service should help the user to find the fastest route to their favorite destinations.

Group B has then hired us for our expertise in requirements engineering, to do the requirements specification. I will briefly explain the results from our project and then Philip will go over how we did it and what we learned. BYT SLIDE

Overview project results – 4 min

Quite early on we realized together with the product owner that the service should consist of an app and a widget. The high visibility of the widget should be combined with the deep level of customization of the app.

We realized that we cannot compete with existing apps, such as Skånetrafiken's app. So we wanted a service that is faster and easier to use. This lead to a more passive search approach, meaning that the service should present your favorite trips and you should not have type in your search each time.

We identified the stakeholders using stakeholder analysis. The main stakeholder is group B since they hired us. We considers the future users as another important stakeholder because if they don't like the service, they won't use it. Other stakeholders are the regional public transportation companies from whom we need time tables etc. We also consider the government a stakeholder as they want will want statistics from the system to see how much it is used and if it increases the use of public transport. BYT SLIDE

We made a context diagram in order to visualize how the different stakeholders interact. The service works as a hub connecting different providers with the users.

To find out the technical limitations we have investigated API possibilities from Skånetrafiken as a first step. And Skånetrafiken has a rather complete API that would not put limits on our system. BYT SLIDE

Methods – 2 min

We started our project with getting to know what **our clients where asking for**. This was done using **several elicitation techniques**, such as asking the product owner and potential users for **goal requirements**. We also **brainstormed** within the group to get ideas of what the system could do and why.

We arranged **a focus group and a design workshop** with people not taking the course. It was important for us to **get input from people** who had not seen the project before and **could be objective**. BYT SLIDE

We were not sure exactly **what information and how much of it** to show on the screen. So in the design workshop we let the **participants make mock-ups** on how they imagine the **app and widget would look like**. BYT SLIDE

We used **phone sized papers** so that the participants would be **realistic on how much information** they wanted. Some of the mock ups can be seen here. What we took with us from the workshop was that most users were **focused on the next stop, where to go from here and time to departure.**

During our regular **meetings with our clients**, we have been able to clarify any doubts and get **regular feedback**. The product owner is our **main stakeholder** so we let them **prioritize the requirements**. This was later used for our **release planning**. BYT SLIDE

Experiences – 2 min

While working on this project we have learned that it is **not easy at all** to create a requirement specification for a product. There are a lot of things to take in to account and **barriers to overcome**. And not just the obvious barriers such as understanding what the customer wants, but the **more subtle once**, the once that you as a team create.

For example we **experienced difficulties to elicit** new requirements since it was easy for us to come up with requirements **that we wanted**. The members in our group have a big **domain knowledge** and this combined with the fact that we also are potential end users gives us a **false sense of security and belief** of that what we want is the best solution, but that **might not necessarily be what an average user** wants or what our **primary stakeholder wants.** And that we had to keep in mind when writing the requirements.

As said earlier, we used a **variation of elicitation techniques** to try **to minimize the elicitation barriers** that we encountered and to get the most information as possible to make a **good requirement specification.** We have noticed that using a variation of techniques gave **contradictory results** but also that when we could **combine them**, we could get **good requirements**.

Conclusion

Writing a requirement specification is **not just to list the things** you think you would want a product to do. You have to look at the **full scope of the** market and the stakeholders and try to create something that is **best for everyone involved**. You will hit some barriers which will be **impossible to remove**, but with the **right elicitations** they will be smaller **and manageable**. One thing that one has to remember is that it is **not wrong to ask again**.

All the members in our group feel that we are **happy with the final result** of this project and we are **confident that our** customers will be **satisfied** with the requirement specification that we will deliver to them. Thank you!