Individual reflection - Anika Kok

Using research to ask questions

During this course, I have worked on a study in relation to research done by assistant professor Lenneke Kuijer. I deliberately chose this project with the LAB approach because my learning goals were mainly based on a previous course given by her. In that course, I was taught to use design to ask questions in research, rather than designing solutions only. This approach intrigued me as it completely bent my existing thoughts on design and research, which is why my first learning goal connects to this. In this semester, I have gone through the cycle of a research project with such an approach again which has strengthened my ability to set up a study that is asking questions based on existing knowledge and the gaps and opportunities that can be found there.

Looking back, I think that we have come up with an interesting research question that allowed us to conduct a focused study using the Lab methodology. However, I do believe that we jumped to the next steps in the process too quickly sometimes. This is partly due to the time constraints of the course, but we should have for instance looked for open ends in the literature better to make our findings more in line with existing knowledge. I think that we could have put more attention into some of our decisions by frequently asking ourselves: what do we want to know and why? Learning to think critically and to break up the research is something I will continue to do in my future projects.

Conducting a lab study

At the beginning of this semester, I wanted to work on a field study which was not possible because that group was full already. I took some time to rethink my learning goals and chose a lab project instead. When reflecting on this course and the skills I had prior to the course, I am really happy I ended up in this group. This is the first time I conducted a lab study on university level (rather than 'HBO') which extends beyond the skills I had prior. I learned you really have to be critical and think of every detail. What assumptions do you make? How can we make the results valid? What factors can influence your results and therefore count as limitations in your research? These are things I have to practice with because I sometimes found myself overwhelmed with all things to consider. We tried to be inclusive of most details that influence the study and I know it is impossible to think of everything, but looking back, there are still quite some things we didn't make a conscious decision about. Something to work on in future studies, because it greatly influences the added value of the projects.

Quantitative data analysis

My final reflection is on something other than my learning goals: statistical analysis. I have previously used questionnaires in my projects and I followed the course 'Data Acquisition and Visualisation through Embodied Sensors' at this faculty but those projects didn't include quantitative data analysis like we did in this project. To improve my skills as a researcher, I will have to learn how to handle data in a more statistical way. I know the basics of finding correlations in data but especially the validation step that one of my team members initiated was something I have never done before. We used this validation to check the reliability of the parameters and the significance of the results of our study. Something I believe can be very valuable to increase the value of the study and its results. I will therefore use these new insights to learn more about how this works, so I can implement it in my current and future projects.