# Title: Identificatie bij de politie

Subtitle: Het ontwerp van de interactie met een identificatievoorziening in het kader van strafrecht Zahra Broekhuis, Industrial Design Engineering, University of Twente, Netherlands

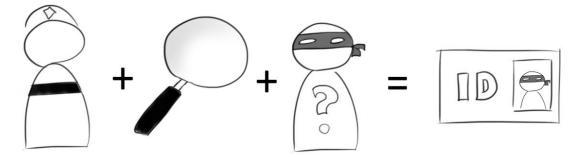


Figure 1

Subject: Design of the interaction with an identification device to be used by the Dutch police for criminal law.

## Introduction

When the Dutch police arrests a suspect, they use an identification device to grant a formal ID-status to this person. The identification documents of this person will be checked, and fingerprint scans and photos are made. This data is then compared with several databases. The identification device is also used by the military police and for the identification of outlanders. The current design is outdated, and some parts need to be replaced, hence this assignment was created.

## Goal

The goal of this assignment is to explore how the identification process can be designed when taken into account the developments in the field of biometrics, findings about the current process and the different interactions that are possible. The final design and the recommendations of this assignment can be used by the IT-department of the Dutch police to redesign the current identification device.

## Method

See figure 2 for a visual rendering of the process. This shows a timeline of the different aspects of the assignment and the steps that

were taken in each section. To start this assignment a literature research into both biometrics and the context of use of the current design has been done. To further investigate the current use and their users, a user research was conducted at a police station in the Netherlands. Available data has been analysed and both these findings were used to develop personas. A stakeholder workshop was organised to discuss the findings of the analysis phase and to draw up a communal vision for the device. Three different concepts have been developed based on this. These have been tested with both police agents and Dutch citizens to see if this is in line with the established vision. With the findings of this user study, a final concept and recommendations were made.

## Results

The result of this assignment is a broad investigation into the subject and a final concept. Research into biometrics shows that completely new directions do not have to be taken, but that the basics, a frontal photo and fingerprints can be expanded with face recognition, 3D photos, an iris scan and faster scanners. A model has been set up for the interaction. See figure 3.

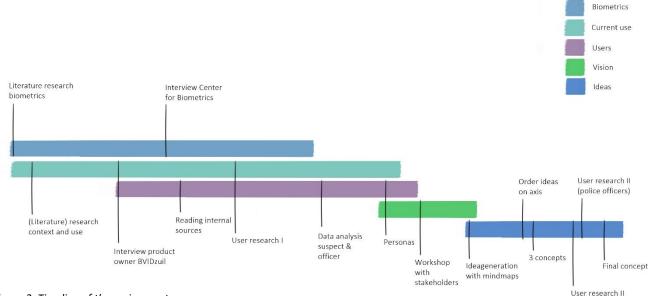


Figure 2: Timeline of the assignment

From the analysis stage the following vision for interaction was drawn up.

#### Our goal is that:

- The user sees the importance of a correct establishment of the identification of the suspect as an important part of the police work
- The identification proces seamlessly connects with the workprocess
- Both the user as the suspect are well informed and can go through the process quick and easy

The final concept consists of, among other things, a new process. For each suspects their fingerprints and identification papers will be compared, to check if they match. This information can also be used to check if the person can be found in the databases. If the person isn't found, biometrics will also be recorded. Therefore, the police officer and the suspect will go to a biometrics room. Here the suspect will be informed by the identification device and the interior will offer peace and obviousness. For the work process of the police officer the main focus is to integrate the identification process with the other processes of the total process of taking a suspect into custody.

#### Conclusion

The research objective has been achieved. However, as planned, this is the just the base for the redesign. To continue this redesign several steps are needed. To validate the personas quantitative research is needed. Parts of the concept can be tested in small user groups to research the effects. To fully developed a design, a new design objective should be stated. This assignment can be used as a base for the design and the analysis phase.

(citizens)

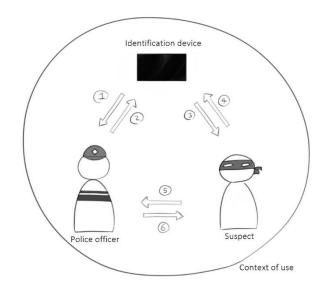


Figure 3: Model for interaction