# 1 Project proposal

## 1.1 Group name and members

Christoph Reinhart   christoph.reinhart@students.unibe.ch
Raphaël Tuor   raphael.tuor@gmail.com
Nicolas Spycher   nicolas.spycher@students.unibe.ch

## 1.2 The idea

With the idea, that a library cannot display all of its catalog on its shelves we decided to create some kind of digital catalog which contains all the book - meaning also the ones that are not displayed on the shelves. The access terminal to this application could be situated inside the library and the customers could then look up books and ask for them if they are not displayed on the shelves.

## 1.3 The application

The user should be able to look up books giving a certain keyword. He should be able to browse them. The user is able to mark a keyword in the book and look up books given this keyword. He also should be able to copy text out of the book in a separate file.

## 1.4 The interfaces

### 1.4.1 1st interface

The first interface would be controlled with voice and gesture commands. We would like to implement this using a Kinect or a normal webcam depending on whats more reasonable.

**Speech:** "Show me all books about dinosaurs"

**Gesture:** Swipe trough pages.

**Combined:** Look up additional information about what you are currently pointing to (synergeistic). Select text with gesture and say things like copy this text to a file (alternate). Go to a certain page and say, search for t-rex (exclusive) $\rightarrow$ found words get highlighted on the page.

### 1.4.2 2nd interface

As the second interface we would simply like to try the keyboard mouse approach so that we can compare if the usability of the user of the system is improved with the more sophisticated and natural interface of gesture and speech.

## 1.5 Question

Our main goal is to determine if the use of a sophisticated interface can improve the usability and productivity of the user or if on the other hand the keyboard mouse interface is still a better way to go through information.