

Application Development for Mobile and Ubiquitous Computing

# *CampusSurfing*

Group 12

Antonio Pietzsch, Maximilian Vollstädt

# Application Scenario / Idea

Where to go when you need a free seat to

**study**  
**relax** ?  
**discuss**

# Application Scenario / Idea

Where to go when you need a free seat to

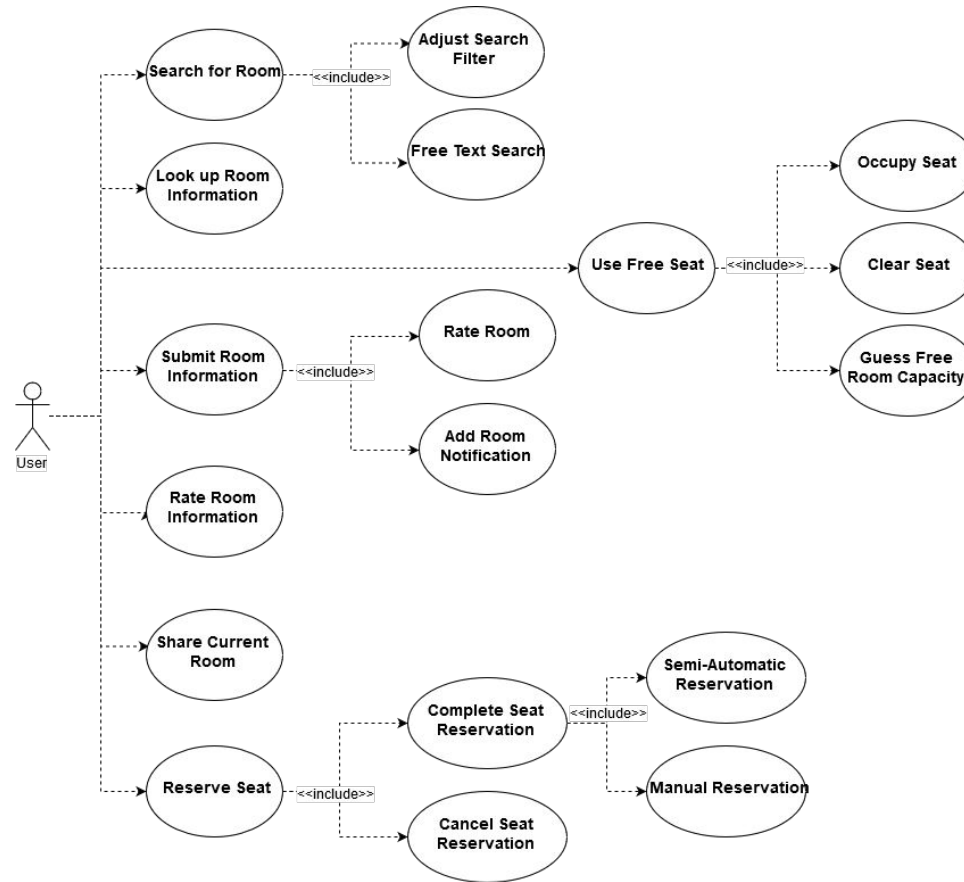
**study**  
**relax** ?  
**discuss**

→ Use CampusSurfing to find available rooms on campus based on:

- current location
- desired time
- individual preferences

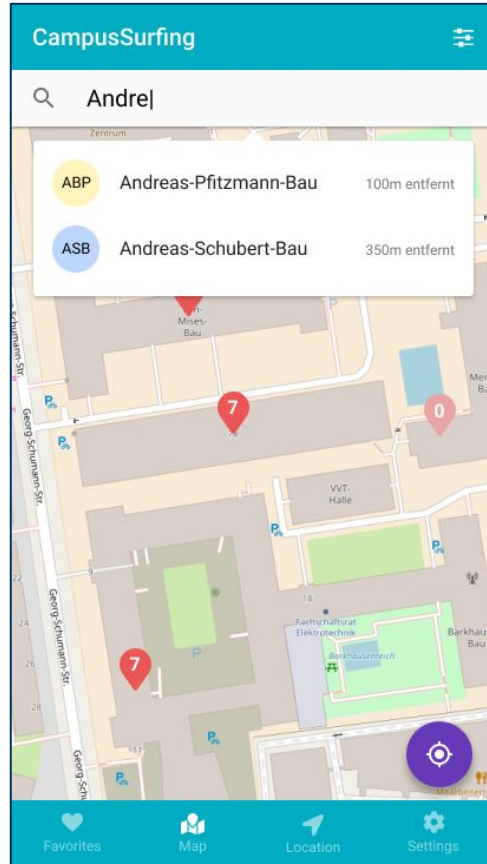


# Use Cases

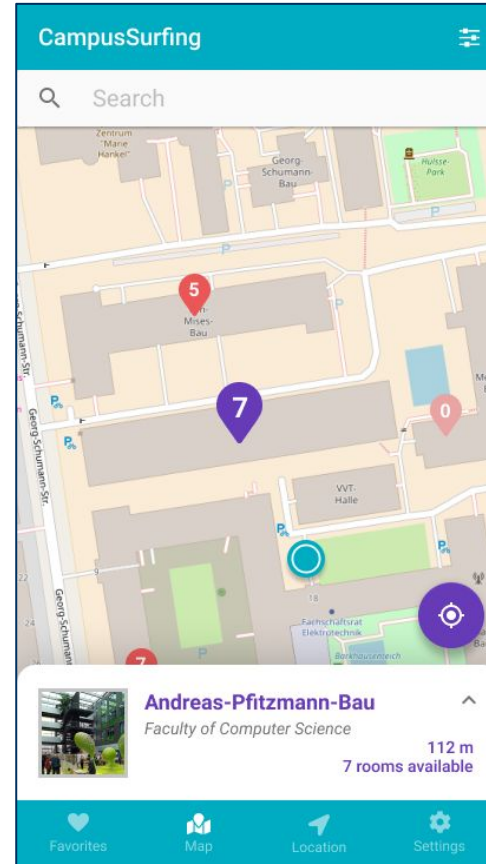


# Mockups

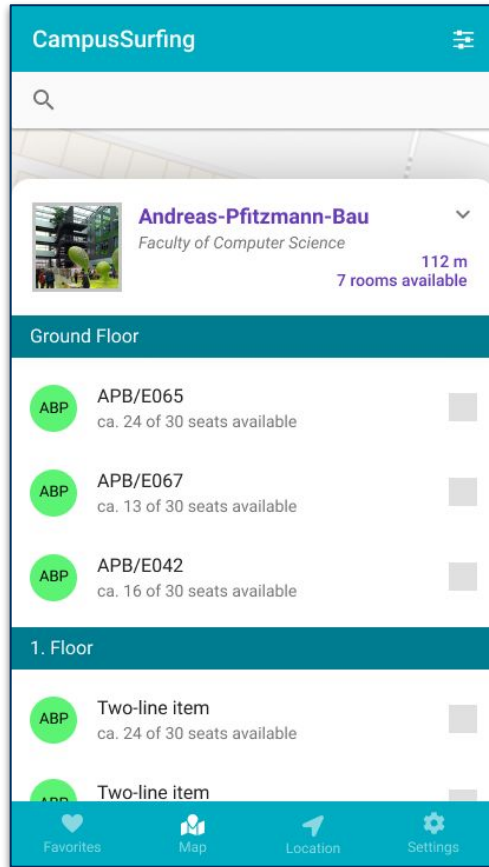
Search for a  
*Location*



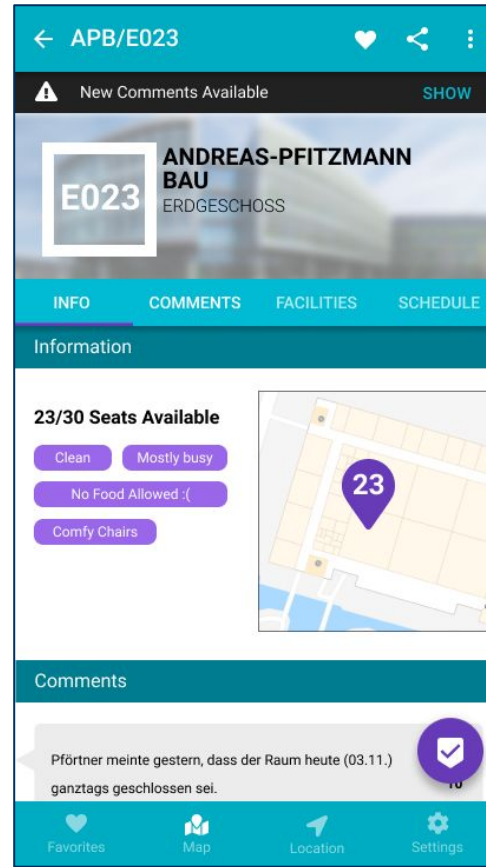
Select the *Desired*  
*Location*



Look up *Building Details*



Look up *Room Details*



# Challenges I

## ENERGY CHALLENGE

- Toggling GPS location dependent

## OFFLINE CHALLENGE

- Downloading (indoor) maps
- Local caching/prefetching of room schedules and allocation plans

# Challenges II

## USABILITY CHALLENGE

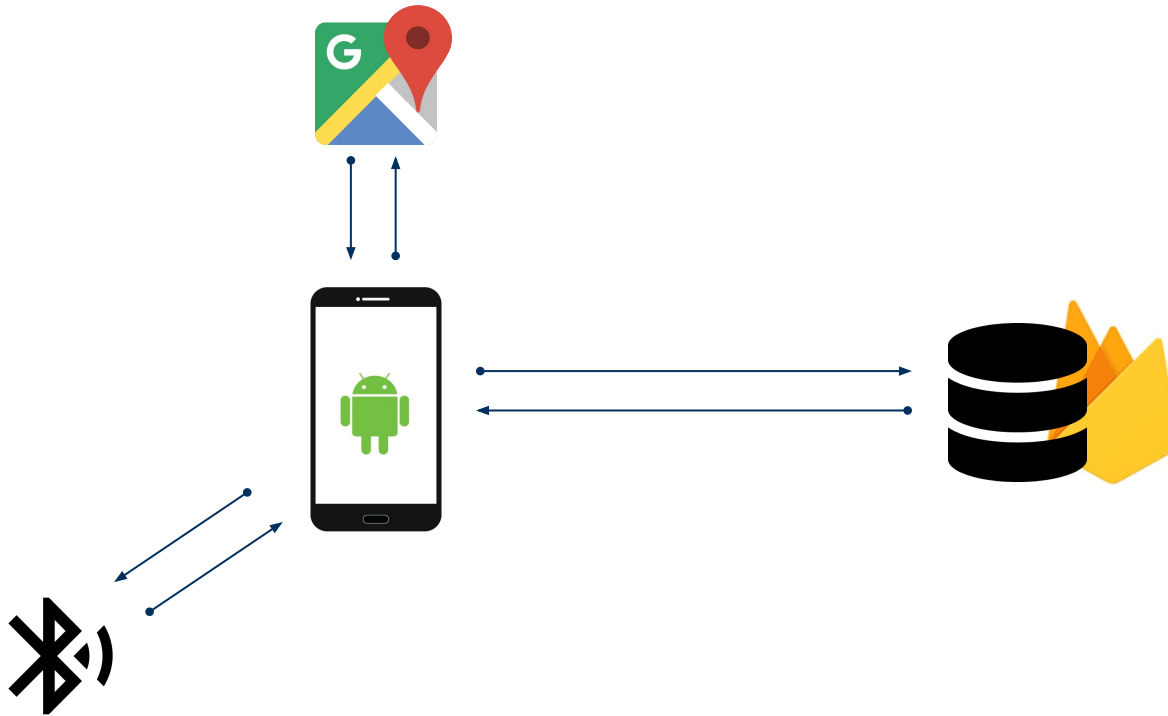
- Personalisation according to user preferences
- Familiarity with Google Maps and Material Design Guidelines

## CONNECTIVITY CHALLENGE

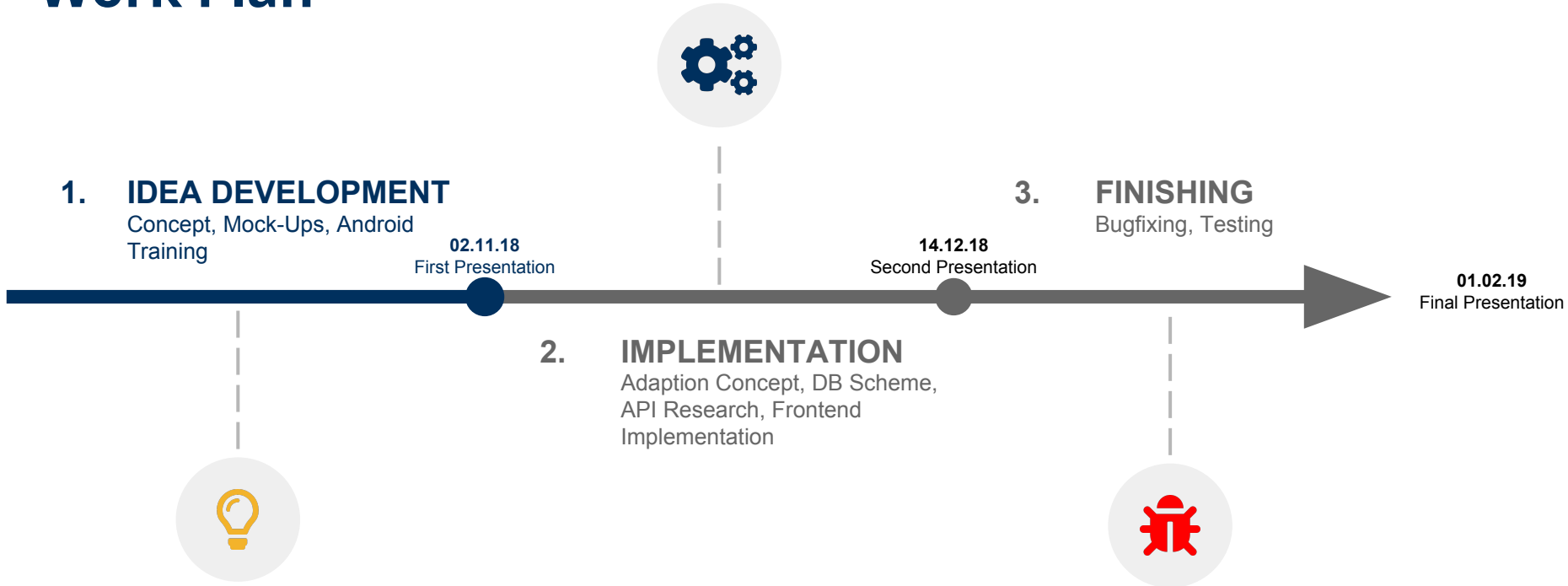
- Network dependent information download



# Technologies and Architecture



# Work Plan



*Any Questions?*