

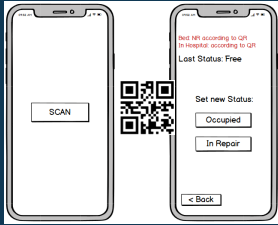


Additional Information: Intensive Care Units (ICU) 4.0 Frontend for Data-Gathering

Challenge 122:
Real-time monitoring of available beds for intensive care

Data-Gathering

Needs & How to?



Needs

- 2 Mobile Phones per ICU
- WiFi Connection in ICU or nearby

How to?

2 Scenarios

- Synchronous real-time Database update
- Asynchronous with local DB on Smartphone (near real-time), which is synchronized when it is connected to Wifi

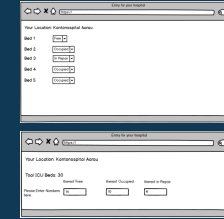


Needs

- 2 Barcode Scanner per ICU
- 1 computer to read information and transmit data
- 1 Person in the Hospital who changes the protocol in existing scanners

How to?

Data in ASCII format will be transmitted as input via Computer and this fills a form



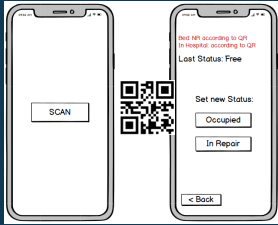
Needs

- 1 computer to type in information

How to?

Update directly one a website which is connected to the database

Pros and Cons



Pros

- + realtime or near-realtime data
- + people know how to use smartphones
- + last status will be shown as direct DB-Access

Cons

- Uncertainty about WiFi access in ICUs

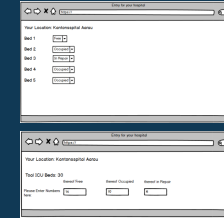


Pros

- + many hospitals have already scanners

Cons

- Last status is not shown directly
- With a command another software has to be triggered (e.g. website) to fill in the data
- Scanning and data-transmission will make it the most slow solution
- Scanners need to be reconfigured



Pros

- + easy to use (lower version)
- + total is visible to the employees

Cons

- Data is not realtime
- Multiple sources of Error: Counted and captured manually