ТЕАМ С

${\bf PostCardBuddy}$

System Requirements

Authors of this document: Emma Albertz Caroline Brandberg Linnéa Claesson Billy Johansson Johan Ju Jacob Mejvik Carl Rynegardh

Contents

| 1 | \mathbf{Sys} | tem Requirements |
|---|----------------|------------------------|
| | 1.1 | Goal |
| | 1.2 | |
| | 1.3 | Product |
| | 1.4 | Design |
| | 1.5 | Data Requirements |
| | 1.6 | Function Requirements |
| | 1.7 | Quality Requirements |
| 2 | Spe | ecification Techniques |
| | 2.1 | Context Diagrams |
| | 2.2 | Features |
| | 2.3 | Virtual Windows |
| | | Task Descriptions |
| 3 | Rel | ease Plan |

1 System Requirements

1.1 Goal

The product aims to increase the amount of postcards sent and will achieve this through the following goals:

- Simplify the process of sending postcards
- Enable user to send personalized postcards
- It shall be possible to generate revenue through the system

1.2 Domain

1.2.1 Supported systems

- Req 1.2.1.1 The system shall support iOS.
- Req 1.2.1.2 The system shall support Android.
- Req 1.2.1.3 The system shall support a mobile payment solution.

1.2.2 Interfaces

- **Req 1.2.2.1** The interface connecting PostcardBuddy and the printed postcards is an of the shelf printer.
- Req 1.2.2.2 The system sends image files to a printer.

Req 1.2.2.3

1.3 Product

- Req 1.3.1.1 Success notification The user should be notified when an order is sent from a device
- **Req 1.3.1.2 Fail notification** The user should be notified when an order fails to be sent from a device.
- Req 1.3.1.3 No internet If the user places an order on a device that is not connected to the internet, the order should be stored and sent the next time the device receives internet connection.

1.4 Design

- Req 1.4.1.1 Front page The front of the postcard should be a single field containing an image.
- Req 1.4.1.2 Text field The back of the postcard should contain a text field.
- Req 1.4.1.3 Address field The back of the postcard should contain an address field.
- Req 1.4.1.4 Postage field The back of the postcard should contain a postage field.
- Req 1.4.1.5 Postage print The postage should be printed in the top right corner on the back of the postcard.

1.5 Data Requirements

Req 1.5.1.1 Data model The system shall handle the data presented in the data model in figure 1.

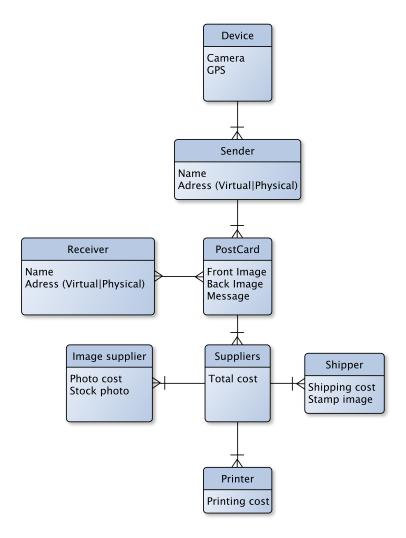


Figure 1: Data model

1.6 Function Requirements

- **Req 1.6.1.1 Image from gallery** Feature for choosing pictures from the phone gallery for the front of the postcard.
- Req 1.6.1.2 Picture from camera Feature for taking a picture through the camera and use as image for the front of the postcard.

- Req 1.6.1.3 Image and GPS position Feature for choosing images depending on the users GPS position.
- Req 1.6.1.4 Image editing Feature for simple editing of images.
- Req 1.6.1.5 Image saving Feature for saving images.
- Req 1.6.1.6 Greetings Feature for writing greetings in the app.
- Req 1.6.1.7 Pictures of handwritten greetings Feature for choosing hand-written greetings.
- Req 1.6.1.8 Auto-generated greetings Feature for choosing auto-generated greetings.
- Req 1.6.1.9 GPS based greetings Feature for choosing greetings based on GPS location.
- Req 1.6.2.0 Handwritten greetings on screen Feature for writing handwritten greetings directly on the screen.
- Req 1.6.2.1 Saving greetings Feature for saving greetings.
- Req 1.6.2.2 Saving postcards Feature for saving postcards.
- Req 1.6.2.3 Reuse postcards Possible to reuse saved postcards.
- Req 1.6.2.4 Postcard size Feature for choosing the size of the postcard.
- Req 1.6.2.5 Physical postcards Feature for sending physical postcards.
- Req 1.6.2.6 Quality of physical postcard Feature for choosing the quality of physical postcards.
- Req 1.6.2.7 Fee Sending a physical postcard requires a fee.
- Req 1.6.2.8 Payment Feature for payment within application.
- Req 1.6.2.9 Confirmation of order Feature for confirmation of order.
- Req 1.6.3.1 Digital postcard Feature for sending digital postcards.
- Req 1.6.3.2 Enter recipients Feature for entering recipients manually.
- Req 1.6.3.3 Phonebook recipients Feature for choosing recipients through the phonebook.
- Req 1.6.3.4 Multiple recipients A postcard can have multiple recipients.
- Req 1.6.3.5 Favourite recipients Feature for saving favourite recipients.
- Req 1.6.3.6 Frequent recipients Frequent recipients should be shown as favourite recipients.
- Req 1.6.3.7 History Feature for seeing the history of sent postcards.
- Req 1.6.3.8 Social media Feature for sharing postcards on social media.

1.7 Quality Requirements

1.7.1 Performance

- Req 1.7.1.1 Memory usage The application shall adjust its memory usage depending on the device.
- **Req 1.7.1.2 Speed** The user interface shall be considered smooth on devices faster than Nexus 5 / iPhone 5 for 8 out of 10 users.
- Req 1.7.1.3 Picture quality The camera shall be able to take a picture in the highest hardware supported resolution.
- Req 1.7.1.4 Autofocus The camera shall have a autofocus that is comparable to the Android / iOS stock camera.

1.7.2 Availability

- 1.7.3 Security
- Req 1.7.3.1 Store cards The photos shall be stored encrypted
- Req 1.7.3.2 Sending card The photos shall be sent encrypted to back-end.

1.7.4 Maintainability/Portability

- Req 1.7.4.1 Language The application shall be developed in non native language e.g. Java for Android.
- Req 1.7.4.2 Device support The application shall work on devices with newer operating systems than Android 4.1 / iOS 7.0.1

1.7.5 Usability

Req 1.7.5.1 User friendly 9 out of 10 users should be able to use the system after a five minute instruction.

2 Specification Techniques

2.1 Context Diagrams

Figure 2 shows the context diagram. This diagram shows the interface that the application PostCardBuddy will interact with and the stakeholders who will interact with the application.

- 2.2 Features
- 2.3 Virtual Windows
- 2.4 Task Descriptions
- 3 Release Plan

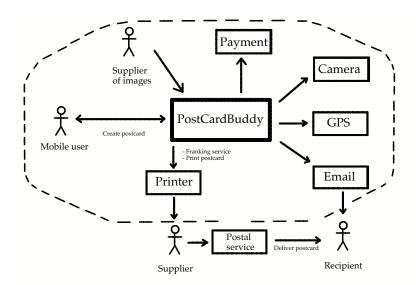


Figure 2: Context diagram