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This version overrides all previous versions.

1 Introduction

1.1 Purpose of application
The purpose of this application is to create an online order system to reduce the waiting time of a queue. Customers are given the opportunity to look at an menu and order their food/drink etc through the app without the need of standing in a physical queue.

1.2 General characteristics of application
The program will be an online mobile application made for the Android platform. Internet is required to use the application.

The application will provide two graphical user interface. One for the customer and one for the Bar. The customer will be able to look at a menu and order their food and drinks through application. When the order is made the user will be able to see their queue number. There's also a chat where the user can talk with other users. If the user is a Bar, the user will be able to access the orders and push the virtual queue. The bar will also be able to edit the menu and create new Bars.

1.3 Scope of application
The application is limited to the users phones through the unique clientID. If no Bar is available the customer will not be able to enter the main application.

1.4 Objectives and success criteria of the project
- 1. The customer should be able to look through the menu and pick products to place an order.
- 2. The bar should be able to find the order and make it.
- 3. The bar should to be able to push the queue forward.

1.5 Definitions, acronyms and abbreviations
- Android - mobile operating system for smartphones
- Activity- class handling the view for every window in an Android application
- Bar - the user who handles the orders
- Customer - the user who makes an order
- ClientID - unique ID used to track the user of the application

- GUI - Graphical User Interface
- Product -the item a customer can order.
- Order- A list of products made by the customer.
- Queue- a queue based chronologically on the orders.

2 Requirements

2.1 Functional requirements
- Display a menu created by the Bar
- Customer can explore the menu and the products
- Customer is able to place an order
- Customer gets an notification when it's his or her turn.
- Customer is able to dismiss the order
- Global chat where customers can talk with each other.
- Bar is able to retrieve the orders
- Bar can confirm that the order is done and push the queue
- Authentication system to validate if it's a Customer or Bar

Create a list of high level functions here (from the use cases).

2.2 Non-functional requirements

2.2.1 Usability
A lot of focus is put on the usability of the application. The application should be easy to learn and use for the customers. Especially drunk people who might have a hard time navigating through the application. The bar should also have an effective GUI to navigate through orders and change the menus.

User test will be used to make sure the application is easy to use. Design rules will be followed. E.g Schneiderman's eight golden rules.

2.2.2 Reliability
The application shouldn't crash. It should be hard for a customer to misplace an order. The bar shouldn't be able to dismiss an order by mistake.

2.2.3 Performance
The application should be responsive and shouldn't freeze. Although the performance might depend on the Users smartphone.

2.2.4 Supportability

The application will be implemented in a way to make sure most of the code is reusable and modifiable to suit other needs. E.g the GUI should be swappable from Android to Swing. The database will also be changeable without the need to rewrite alot of code.

2.2.5 Implementation

The implementation will be using the Java programming language which makes the code reusable on alot of different platforms. The application itself will be made for Android smartphones. Every user will need to have the application downloaded.

2.2.6 Packaging and installation

The application will need to be downloaded in form of an APK.file and installed on the smartphone.

2.3 Application models

2.3.1 Use case model

UML and a list of UC names (text for all in appendix)
- Display the menu
- Add items to cart
- Send an order
- Update queue order
- Create and change menu
- Global chat
- Authenticate

2.3.2 Use cases priority

- Display menu
- Add items to cart
- Make an order - one use case with item to cart
- Update queue order
- Create and change menu
- Authentication
- Global chat room

A list

2.3.3 Domain model

UML, possible some text.

2.3.4 User interface
See AppDesign pdf

Clean UI, with grid of equals to showcase categories/items.

Text to motivate a picture.

2.4 References

APPENDIX

GUI

Domain model

Use case texts