

**Online Pizza Ordering System
Analysis and Design Document
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Online Pizza Ordering System	Version: <1.0>
	Date: 04/04/18
CS.OPOS2018	

Revision History

Date	Version	Description	Author
04/04/18	<1.0>	Added Architectural Design + Domain Model	Margin Razvan Cristian

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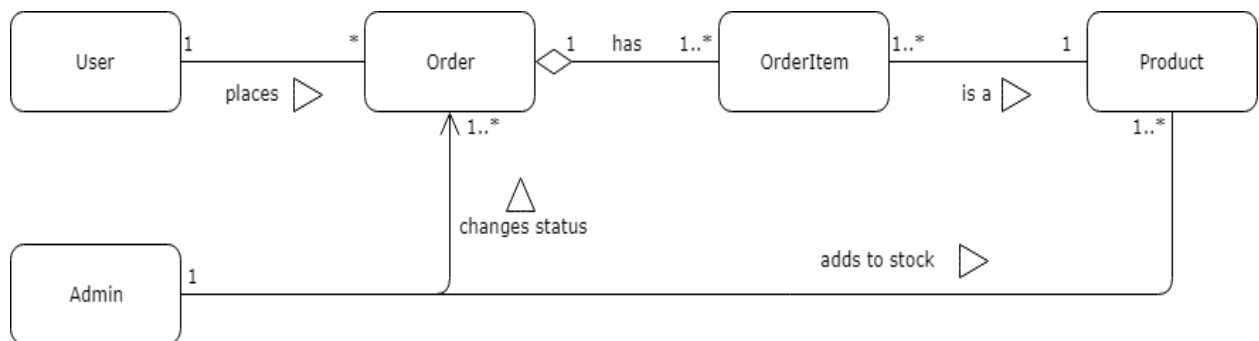
I. Project Specification

The project consists in developing a web application from which a client of a pizza restaurant, does not need to place an order in a “face-to-face” approach. Instead, he can simply order something online and pick up his order when it is ready.

II. Elaboration – Iteration 1.1

1. Domain Model

The domain model consists in the 2 main actors of our system: the User (Client), and the Employee (Admin). As mentioned above, the User places an Order, which contains all the items that he wants to purchase at a transaction: OrderItems. Finally, each OrderItem is associated to a Product. The Admin has the responsibilities of changing the status of an order (from not finished to finished), and update the Menu (the Products) if there is need for this.



2. Architectural Design

2.1 Conceptual Architecture

I will use in this project the layered architectural pattern, because it helps us organize the structure of our application much easier, grouping components into layers, according to their responsibility.

Presentation Layer

The Presentation Layer will manage the interactions of our application with the users. Therefore, this layer will be responsible with retrieving data from the user and displaying it back, according with the events occurred.

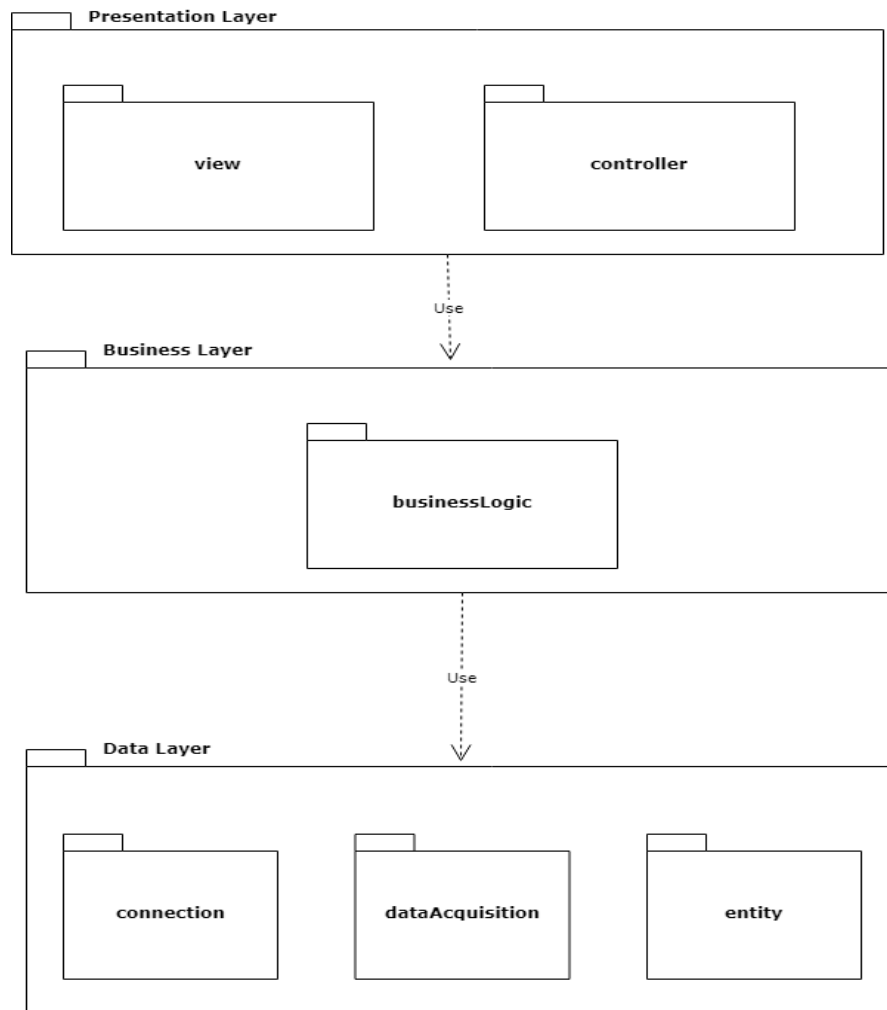
Business Layer

The Business Layer encapsulates all the business logic of our system. Its job is to process the information passed on by the presentation layer.

Data Layer

The Data Layer consists of holding the data of our application, having the job of giving access to data that is stored outside our system and passing it to the Business Layer.

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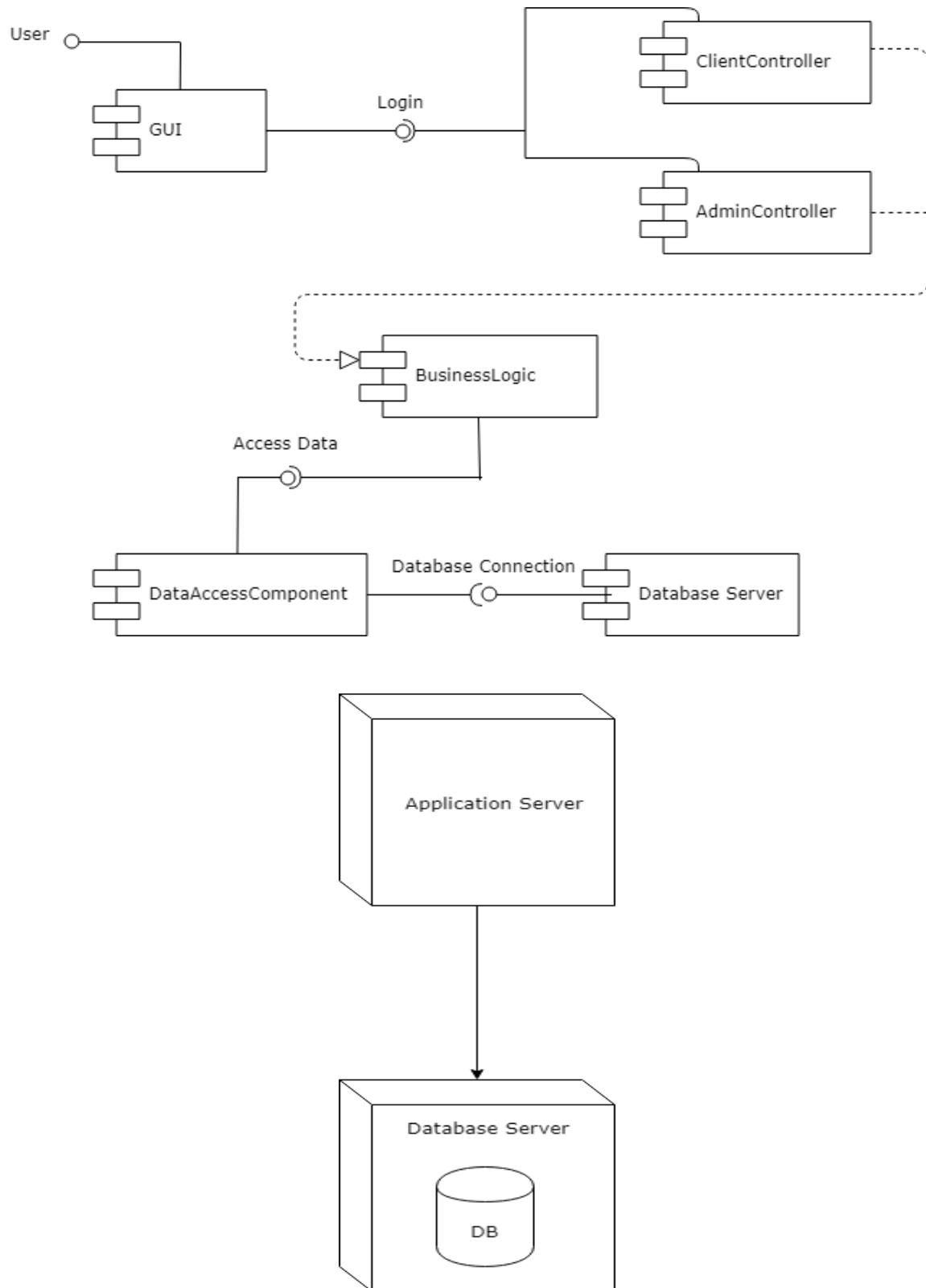


2.2 Package Design

[Create a package diagram]

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2.3 Component and Deployment Diagrams



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III. Elaboration – Iteration 1.2

1. Design Model

1.1 Dynamic Behavior

[Create the interaction diagrams (1 sequence, 1 communication diagrams) for 2 relevant scenarios]

1.2 Class Design

[Create the UML class diagram; apply GoF patterns and motivate your choice]

2. Data Model

[Create the data model for the system.]

3. Unit Testing

[Present the used testing methods and the associated test case scenarios.]

IV. Elaboration – Iteration 2

1. Architectural Design Refinement

[Refine the architectural design: conceptual architecture, package design (consider package design principles), component and deployment diagrams. Motivate the changes that have been made.]

2. Design Model Refinement

[Refine the UML class diagram by applying class design principles and GRASP; motivate your choices. Deliver the updated class diagrams.]

V. Construction and Transition

1. System Testing

[Describe how you applied integration testing and present the associated test case scenarios.]

2. Future improvements

[Present future improvements for the system]

VI. Bibliography