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**BUILDING ....**

**INFORMATION TECHNOLOGY PROJECT 2**

**SOFTWARE ENGINEERING**

**HO CHI MINH CITY, 2024**

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Advised by

**Dr. DƯƠNG HỮU PHÚC**

**HO CHI MINH CITY, 2024**

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*Ho Chi Minh city, 3rd September 2023.*

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**DECLARATION OF AUTHORSHIP**

We hereby declare that this is our own project and is guided by Mr. Trinh Hung Cuong; The content research and results contained herein are central and have not been published in any form before. The data in the tables for analysis, comments and evaluation are collected by the main author from different sources, which are clearly stated in the reference section.

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**BUILDING A BOOKS MANAGEMENT AND ORDERING SYSTEM ON THE MERN STACK PLATFORM**

**ABSTRACT**

The ...

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# ABBREVIATIONS

|  |  |
| --- | --- |
| BERT | Bidirectional Encoder Representations from Transformers |
| GEC | Grammatical Error Correction |
| MERN | MongoDB, express, react, nodejs |
| MLM | Masked Language Model |
| NLP | Natural Language Processing |
| NSP | Next Sentence Prediction |

# INTRODUCTION

## Introduction

In the era ...

Books, …

## System Description

The main

## Scope of the topic:

The…

## Practical significance

Web and…

## Report layout

Web…

## Report Structure

Chapter 1: Introduction

* 1. Introduction
  2. System Description
  3. Topic Objective
  4. Topic Scope
  5. Topic Contribution
  6. Report Structure

Chapter 2: System Analysis and Design

2.1 Functional Requirements

2.2 Non-functional Requirements

2.3 Use-case Diagram

2.4 Data-flow Diagram

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Chapter 3: System Implementation

3.1 Technical Stack

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Chapter 4: Demonstration

Chapter 5: Conclusion

5.1 Conclusion

5.2 Potential and Development Direction

# SYSTEM ANALYSIS AND DESIGN

## Functional Requirements

In the era ...

Books, …

## Non-functional Requirements

The main

## Use-case Diagram

Use case …

### Use-case Overview

|  |  |  |  |
| --- | --- | --- | --- |
| ID | Use Case’s Name | Description | Actor |
| UC01 | Booking | Allows customers to search for trips, select seats, and initiate the booking process. | Customer |
| UC02 | Register Ticket | Captures passenger information and confirms the booking. | Customer |
| UC03 | Rebook Ticket | Enables rebooking for a different trip or date. | Customer |
| UC04 | Login | Provides access to customer and admin accounts. | Customer  Admin |

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Use case: Register | | ID: UC01 | | Priority: Must have | |
| Actor: Partner, Customer | | | | | |
| Description:   * Actor create their personal account and the system register a new account. | | | | | |
| Trigger: Actor choose to create an account based on their needs. | | | | | |
| Pre-condition: None | | | | | |
| Basic Flow:   1. The actor access to the MKT’s system. 2. The actor choose to create an account. 3. The actor enter their email address. 4. The actor enter their phone number, password and confirm password. 5. The system verify the information and register a new account. 6. Actor receive information that account has been created. | | | Alternative Flow:   * 3a: The system notify invalid email address. * 3a1. User re-enter new email address. * 3a2. System re-verify the new email address.   Use case continues at step 4   * 4b: The system notify invalid phone number or passwords not matched. * 4b1: User re-enter new phone number and passwords. * 4b: System re-verify the new information.   Use case continues at step 5 | | |
| Exception Flow:   * 4c: The system notify invalid information and actor decide to stop the process. Use case stopped. | | | | | |
| Post-condition:   * System register a new account in the database. * Actor can use the information to login into their account. | | | | | |
| Input | Source | | Outputs | | Destination |
| * Actor’s credentials | * Actor | | * New Account | | * Account Datastore |

### Use-case Description

## Data Flow Diagram

…

## Entity-Relationship Diagram

Figure…

## Physical Database Diagram

Figure…

# SYSTEM IMPLEMENTATION

## Technical Stack

In the era ...

Books, …

## System Architecture

The main

# DEMONSTRATION

|  |  |  |
| --- | --- | --- |
| *Order* | *Specification* | *User Interface* |
| 1 | Add a new property. Partners can navigate to the listings page and start adding a new property.  The flow of the process is as follows:  Step 1: Press on “Add a place” to start adding a new property.  Step 2: Choose a property type and press “Next”.  Step 3: Choose type of place guests will be renting and press “Next”.  Step 4: Select your property’s city and enter its address, press “Next”.  Step 5: Set your maximum guests, bed room number, bed number and bathroom number, after that, click “Next”.  Step 6: Choose what your property offers to the customers, you can leave it blank or select any offering you want and then click “Next”.  Step 7: Upload at least 5 images of your property to show to the customers. After checking thoroughly, press “Next”.  Step 8 & 9: Specify your property’s title and description.  Step 10: Set your property’s prices per night.  Step 11: Set your property type of hosting and some small settings. Click “Next” to reach to review stage.  Step 12: When partners are satisfied with the information, they can press “Finish” finalize the process and they can view their new listing in property listing tab. | A white car with red lights  Description automatically generatedStep 1:  Step 2:  A screenshot of a computer  Description automatically generatedA screenshot of a computer  Description automatically generatedStep 3:  A screenshot of a computer  Description automatically generatedStep 4:  A screenshot of a computer  Description automatically generatedStep 5:  Step 6:  A screenshot of a computer  Description automatically generatedA screenshot of a computer  Description automatically generatedStep 7:  A screenshot of a computer  Description automatically generatedStep 8:  A screenshot of a computer  Description automatically generatedStep 9:  A screenshot of a computer  Description automatically generatedStep 10:  A screenshot of a computer  Description automatically generatedStep 11:  A screenshot of a computer  Description automatically generatedStep 12: |

# CONCLUSION

## Conclusion

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## Potential and Development Direction

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