Deliverable #3 Template

SE 3A04: Software Design II – Large System Design

1 Introduction

This document is called the Large System Design document and it will be giving the stakeholders an in depth look at how the project, *21 Questions*, is designed. More precisely, the details concerning each class as well as how each class interacts with other classes.

1.1 Purpose

The Large System Design document outlines the functionality of the system through the State Chart diagrams, and focuses on the detail of each class through the Detailed Class diagrams. The interactions among the classes, more specifically the messages passed between classes, will be defined in the Sequence diagrams. The main purpose of this document is to explain in detail the software system to be developed, which in this case is the application, *21 Questions*. Through the use of the various diagrams mentioned before, all components of the product and their relationships with each other are revealed in more detail. The main target audience for this document is the software developers as they need to see, in greater detail, how the system and its modules interact and how they are designed to work in relation to each other.

1.2 System Description

21 Questions is an android application that can be used as a location identifier whose intended use is for any user above the age of ten. The application requires minimal training, experience or technical expertise to use, and can be easily picked up and used by anyone. 21 Questions is a simple game that asks the user a series of twenty-one polar or binary questions to try to identify their area of interest. In this game the area of interest is limited to an establishment, building, place, or effigy with a focus on locations only with an end goal of displaying the result through Google Maps.

1.3 Overview

This document will not only outline the design, but the details of the *21 Questions* application from an implementation perspective. The document will begin from state perspective, in more detail how one gets from one state to another as well as which states follow each other. This is portrayed in the State Charts. This is followed by a sequence overview depicting how each class passes messages to one another. Finally the details of each class are illustrated in the Detailed Class diagram. These sections highlight the classes in greater detail, including how each class interacts with one another. This document easily lends itself to being a model for the implementation.

2 State Charts for Controller Classes

This section should provide a state chart for each controller class for your application.

3 Sequence Diagrams

This section should provide a sequence diagram for each use case of your application.

4 Detailed Class Diagram

This section should provide a detailed class diagram for your application.

A Division of Labour

Team Member	**Contributions**
Gabriel Lopez de Leon	Insert your contribution here.
Maxwell Moore	Insert your contribution here.
Curtis Milo	Insert your contribution here.
Alexandra Rahman	Insert your contribution here.
Connor Sheehan	Insert your contribution here.

Table 1: Division of Labour

Gabriel Lopez de Leon Date

Curtis Milo Date

Maxwell Moore Date

Alexandra Rahman Date

Connor Sheehan Date

IMPORTANT NOTES

- You do NOT need to provide a text explanation of each diagram; the diagram should speak for itself
- Please document any non-standard notations that you may have used
  - *Rule of Thumb*: if you feel there is any doubt surrounding the meaning of your notations, document them
- Some diagrams may be difficult to fit into one page
  - It is OK if the text is small but please ensure that it is readable when printed
  - If you need to break a diagram onto multiple pages, please adopt a system of doing so and throughly explain how it can be reconnected from one page to the next; if you are unsure about this, please ask me
- Please submit the latest version of Deliverable 1 and Deliverable 2 with Deliverable 3
  - They do not have to be a freshly printed versions; the latest marked versions are OK
- If you do NOT have a Division of Labour sheet, your deliverable will NOT be marked