Capstone Project 2021 The Complete Recorder

Prepared by: Azeezat Lawal Mfonisoabasi James Muhammad Ishraf Shafiq Zainnuddin

Supervised by: Dr. Timothy Maciag

Abstract

The complete recorder app is a sound recording app with organizational features for easy access and search. The app includes features which we have been looking for, however, these features do not exist on the apps currently in the market. Most sound recorders pile up recordings into a list, without basic search functionality and organization to help users find a specific recording. As some users have lots of recordings per week, sifting through a pile of recordings and playing each one of them just to find the one recording they're looking for can be a pain. The complete recorder app will help to solve these issues.

Table of Contents

1.0 Introduction	6
1.1 Background	6
1.2 Purpose	6
2.0 Requirements and Specifications	7
2.1 Project Scope	7
2.2 Project Timeline	7
2.3 User Story Map	7
3.0 System Design	8
3.1 Design Goals	8
3.2 Software Architecture	8
4.0 Object Design	9
4.1 Package 1 - Flutter Sound	9
4.2 Package 2	9
4.3 Package 3	9
5.0 Software Development Process	10
5.1 Agile Development	10
5.1.1 Sprint 1	10
5.1.2 Sprint 2	10
6.0 Test, Plan and Execution	11
7.0 Used Tools and Technologies	12
8.0 Engineering Log Book	12
8.1 Meetings with Group	12
9.0 User Manual/How-tos	13
10.0 Business Plan	14
10.1 Vision	14
10.2 Stakeholders	14
10.3 Target Customers	14
10.4 SWOT Analysis	14
10.4.1 Strengths	14
10.4.2 Weaknesses	14
10.4.3 Opportunities	14
10.4.4 Threats	14

References	15
10.6 Costs	14
10.5 Existing Similar Software Applications	14

List of Figures

- 1.0 Introduction
- 1.1 Background
- 1.2 Purpose

2.0 Requirements and Specifications

2.1 Project Scope

The scope of this project is to create a cross-platform recording application which will include features we believe a good, complete, recorder should have. This includes features such as:

- A fully functional, user friendly recording page
- Organizational features; this is to ensure that recordings are not just in a list, and can be organized, either through folders or tags
- Search functionality; if a user wants to quickly search for a specific recording, without going into all the folders they might have created.

2.2 Project Timeline

The table below shows the timeline of our project.

	September	October	November	December	January	February	March	April	
Phase 1	Project Requirements								
Phase 2				Studying Dar	tudying Dart and Flutter				
Phase 3					Code Development				
Phase 4						Testing			

We had a time constraint. We began the preparations for the project in September, and the project was set to conclude at the end of March/mid April.

2.3 User Story Map

- 3.0 System Design
- 3.1 Design Goals
- **3.2 Software Architecture**

- 4.0 Object Design
- 4.1 Package 1 Flutter Sound
- 4.2 Package 2
- 4.3 Package 3

5.0 Software Development Process

- **5.1 Agile Development**
- **5.1.1 Sprint 1**
- 5.1.2 Sprint 2

6.0 Test, Plan and Execution

- 7.0 Used Tools and Technologies
- 8.0 Engineering Log Book
- 8.1 Meetings with Group

9.0 User Manual/How-tos

10.0 Business Plan

- 10.1 Vision
- 10.2 Stakeholders
- **10.3 Target Customers**
- **10.4 SWOT Analysis**
- 10.4.1 Strengths
- 10.4.2 Weaknesses
- **10.4.3 Opportunities**
- **10.4.4 Threats**
- 10.5 Existing Similar Software Applications
- **10.6 Costs**

References