Project Proposal: A Music Player Application

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1 Overview

An Android music player application is developed using Kotlin. The application is designed in such a way that user can create an account and listen to his favorite songs and user can record his voice. Once, the application is opened it asks the user to log in or register for the application. All the login credentials authentications are maintained using Firebase. Two main features the application holds Firstly, it has a playlist the user can play a song, pause a song, forward and backward a song. The second feature is the user can record his voice or song.

2 Project Description

In this project, an android music player application is developed. Planning to develop an online music player using firebase. Firebase is a real-time database provided by Google for mobile and web applications and it acts as Backend as services. Initially, songs are loaded to the firebase database and the user can download songs from the android application. Users must register for the application before accessing the application. All the user's login credentials are maintained in the firebase database. A voice recorder is also included in the android application where the user can record voice.
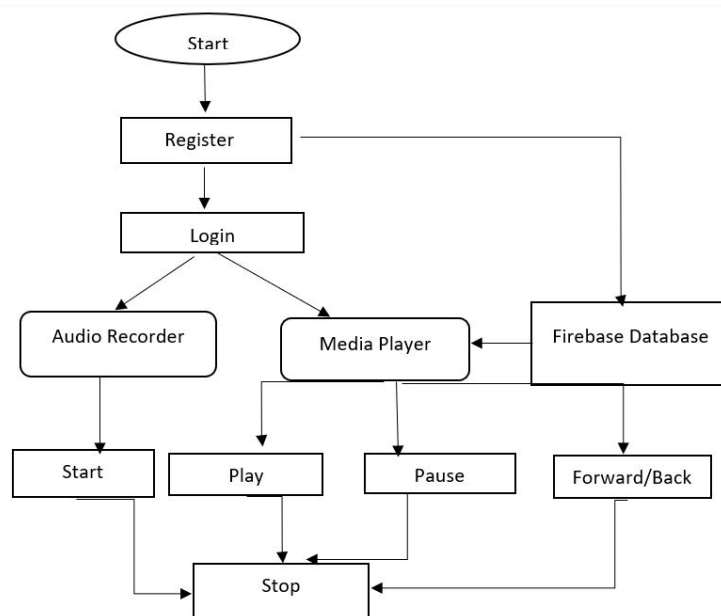
Figure 1: Flowchart

3 Target Audience

Target audience are specific group of people uses the mobile applications. The purpose and goal of the project is to build a music player application. There may be the wide range groups of the target audience for this application but people who love to listen the music are the most important target audience for this application. This application is built keeping into consideration of music lovers who love to listen music on their phone and also people who are interested in recording their voice and maintains a favourite list.

4 Technical Specifications

- Tools: Android Studio

- Operating System: Android

- Database:Firebase

- Language: Kotlin, XML

5   Functional requirements

- Login: The user must create an account or register to login to the applications. Social network logins are not used in this application.

- Database: All the music files and login credentials are uploaded to the firebase database.

- Push Notification:when the user finished recording his voice a notification is show to the user 'would you like to save the recording' so that user can click on yes or no based on his choice.

- Monetization: No paid content or advertisements are invoked in this application.

6   Timeline

I am new to Android development and novice kotlin language developer so a music player application with firebase concept will be implemented. The deadline for each milestone is mentioned below.

- Milestone 1: Design the interface – November 11th, 2019

- Milestone 2: Firebase setup for the application – November 15th,2019

- Milestone 3: Develop login authentication using firebase – November 21st,2019

- Milestone 4: Develop the kotlin code for Music player – November 30th,2019

- Milestone 5: Develop the kotlin code for recording – December 5th,2019

- Milestone 5: Test the application – December 10th,2019
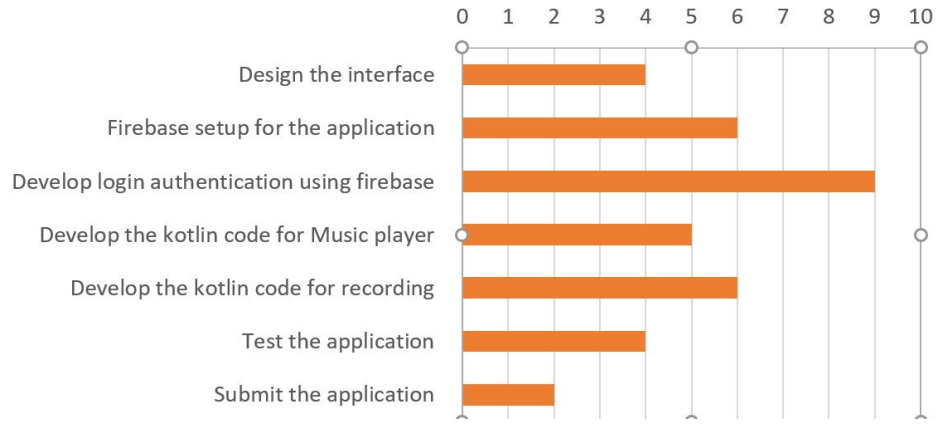
- Milestone 5: Submit the application – December 12th,2019

Figure 2:

References

[1] Instructables.com.Availableat:[Online].Available:
https://www.instructables.com/id/HOW-TO-MAKE-a-SIMPLE-MUSIC-
PLAYER-APP-FOR-ANDROID-