System Design for Flick Picker

Team 7, 7eam
Talha Asif - asift
Jarrod Colwell - colwellj
Madhi Nagarajan - nagarajm
Andrew Carvalino - carvalia
Ali Tabar - sahraeia

January 18, 2023

1 Revision History

Date	Version	Notes
January 18	1.0	Added content to section 6.4, some potential content to 6.1

2 Reference Material

This section records information for easy reference.

2.1 Abbreviations and Acronyms

symbol	description
Flick Picker	Explanation of program name
[—SS]	[—SS]

Contents

1	Revision History	i
2	Reference Material 2.1 Abbreviations and Acronyms	ii ii
3	Introduction	1
4	Purpose	1
5 Scope		
6	Project Overview 6.1 Normal Behaviour. 6.2 Undesired Event Handling. 6.3 Component Diagram. 6.4 Connection Between Requirements and Design. 6.4.1 Connection Between Authentication Requirements and Design. 6.4.2 Connection Between Profile/Group Requirements and Design. 6.4.3 connection Between Recommendation Requirements and Design.	1 1 1 1 1 2 2
7	User Interfaces	2
8	8 Design of Communication Protocols	
9	9 Timeline	
A	Interface	3
В	B Mechanical Hardware	
\mathbf{C}	C Electrical Components	
D	O Communication Protocols	
${f E}$	E Reflection	

List of Tables

List of Figures

3 Introduction

[Include references to your other documentation—SS]

4 Purpose

[Purpose of your design documentation —SS] [Point to your other design documents —SS]

5 Scope

[Include a figure that show the System Context (showing the boundary between your system and the environment around it.) —SS]

- 6 Project Overview
- 6.1 Normal Behaviour
- 6.2 Undesired Event Handling

[How you will approach undesired events—SS]

- 6.3 Component Diagram
- 6.4 Connection Between Requirements and Design
- 6.4.1 Connection Between Authentication Requirements and Design

For email and password authentication, the user's email and a hashed form of their password are stored in the database. Upon login request, the inputted email and password will be compared to the pairs in the database and the login will either succeed or fail depending on whether a match is found.

Google and Facebook OAuth will provide authorization and an email to Flick Picker which will have / create an account with this email. If an account with this email already exists using OAuth, the user is logged in successfully. If an account using the previous method (email and password) exists, the user will be prompted to login using their email and password as above. If an account with this email does not exist, the user will be logged in and a new OAuth account will be created. They will then be brought to the new user page (creation of username, preferences, etc.).

Upon clicking the logout button, the user will be brought to the login screen and their token is removed.

6.4.2 Connection Between Profile/Group Requirements and Design

6.4.3 connection Between Recommendation Requirements and Design

Daily, Flick Picker will retrieve information about the top 3000 most popular Movies, TV Shows, and Anime and store that information for quick access. This information will be used in the vast majority of all recommendations. If a recommendation cannot be found within these Movies, TV Shows, or Anime, additional queries will be sent to the relevant APIs to find a recommendation.

During the recommendation process for a group, individual users reflect their desire to watch a recommendation using the 'like', 'neutral', or 'dislike' buttons. This information will be stored alongside their preferences to aid in future recommendations for both the group and the individuals.

Given user permission, Flick Picker will send emails to all members in a group once a recommendation has been chosen.

7 User Interfaces

[Design of user interface for software and hardware. Attach an appendix if needed. Drawings, Sketches, Figma —SS]

8 Design of Communication Protocols

[If appropriate —SS]

9 Timeline

[Schedule of tasks and who is responsible —SS]

A Interface

[Include additional information related to the appearance of, and interaction with, the user interface —SS]

- B Mechanical Hardware
- C Electrical Components
- **D** Communication Protocols

E Reflection

The information in this section will be used to evaluate the team members on the graduate attribute of Problem Analysis and Design. Please answer the following questions:

- 1. What are the limitations of your solution? Put another way, given unlimited resources, what could you do to make the project better? (LO_ProbSolutions)
- 2. Give a brief overview of other design solutions you considered. What are the benefits and tradeoffs of those other designs compared with the chosen design? From all the potential options, why did you select documented design? (LO_Explores)