WEALTH GAME Superstarr

Superstarr RROJECT

|  |  |
| --- | --- |
| **Prepared by:** | Yagyani |
| **Prepared for:** | Superstarr |
| **Current Version:** | V1.0 |
| **Ref No.:** | TC/SS/20231031 |
| **Document Name** | Wealth Game Superstarr |
| **Author:** | Yagyani |
| **Date Created:** | 31th October 2023 |
| **Date Submitted:** | 31th October 2023 |
| **Approved By:** | Naman Narayan |
| **Approval Date:** |  |

**Revision History:** 

|  |  |  |  |
| --- | --- | --- | --- |
| **Version Number** | **Brief Description of Changes** | **Revision Author** | **Date Updated** |
| V1.0 |  |  |  |
| V1.1 |  |  |  |
| V1.9 |  |  |  |
| V2.0 |  |  |  |

**Document Approvals History:** 

|  |  |  |  |
| --- | --- | --- | --- |
| **Version Number** | **Name** | **Signature** | **Date** |
| V1.0 | Naman Narayan |  |  |
|  |  |  |  |
|  |  |  |  |

Contents

[Documentation 2](#_Toc149677295)

[**1.** **Project Overview** 3](#_Toc149677296)

[**2.** **Mobile Application Development** 3](#_Toc149677297)

[2.1.1. Needs Analysis 3](#_Toc149677300)

[2.1.2. Solution 4](#_Toc149677301)

[**3.** **Database Design** 5](#_Toc149677302)

[**4.** **Image Processing Algorithms** 6](#_Toc149677303)

[**5.** **Operation Plan** 7](#_Toc149677304)

[**6.** **Application Deployment** 9](#_Toc149677305)

[**7.** **Multi-Platform and Multilingual Support** 11](#_Toc149677306)

# Documentation

|  |  |  |
| --- | --- | --- |
| Documentation Type | Description | Note |
| Product Requirement Document | Please see this documentation |  |
| User Experience Design documentation | User Experience Design documentation begins at the requirements stage and proceeds through all the stages of development, including the testing and post-release stages. The process of UX design includes research, prototyping, usability testing, and the actual designing part, during which lots of documentation and deliverables are produced |  |
| System Design | **Overview and background:** Briefly describe the main goals of the project, what problems you are trying to solve, and the results you want to achieve.  **Architecture & Design Principles:** Underline the guiding architecture and design principles with which you will engineer the product. For instance, if you plan to structure your solution using microservices architecture, don’t forget to specifically mention this.  **User Story description.** Connect user stories with associated business processes and related scenarios. You should try to avoid technical details in this section.  **Solution details.** Describe the contemplated solution by listing planned services, modules, components, and their importance.  **Diagrammatic representation of the solution.** Provide diagrams and/or other graphic materials to help understand and communicate the structure and design principles. |  |
| Source Code Document | A source code document is a technical section that explains how the code works. While it’s not necessary, the aspects that have the greatest potential to confuse should be covered. The main users of the source code documents are software engineers.  Source code documents may include but are not limited to the following details:   * HTML generation framework and other frameworks applied. * type of data binding. * design pattern with examples (e.g., model-view-controller). * security measures; and * other patterns and principles.   Try to keep the document simple by making short sections for each element and supporting them with brief descriptions. |  |
| QA Documents | * The test case ID * Test case description * Prerequisites * Test steps * Test data * Expected result. * Actual result * Status * Created by * Date of creation * Executed by * Date of execution |  |
| API Document | User Reference of Stripe or Twilio or any other big company |  |

# **Project Overview**

The primary objective of the Wealth Game module is to incentivize user engagement, encourage gifting activities, and promote live streaming interactions within the Superstar platform. By participating in challenges, sending virtual gifts, and reaching specific levels, users can earn virtual wealth and, in the case of Broadcasters, even receive cash rewards, fostering a vibrant and interactive community.

# **Mobile Application Development**



## Needs Analysis

The Need Analysis for mobile application development encompasses a thorough understanding of user requirements, market dynamics, and technological considerations. Through user surveys and market research, key features and gaps in the market are identified. Technology assessments ensure the choice of suitable platforms and frameworks, while compliance with regulations and security standards is prioritized. Performance, scalability, offline functionality, and user experience are carefully analyzed, and user feedback mechanisms are integrated. Additionally, budget allocation and resource planning are crucial aspects considered during this phase, ensuring the application meets user needs effectively and efficiently.

## Solution

Design and develop mobile applications that include the following components:

1. **Intuitive user Interface :**

The Wealth Game module is designed with an intuitive and visually appealing user interface. The interface ensures seamless navigation, allowing users to explore challenges, customize avatars, participate in live streaming, and interact with other users effortlessly.

**(2) Gifting Mechanism**

The solution includes a sophisticated gifting mechanism that enables users to send virtual gifts to broadcasters, general users, and live streamers. These virtual gifts serve as a form of appreciation, encouraging positive interactions and fostering a sense of community within the app.

**(3) Level Achievement System**

The Wealth Game incorporates a level achievement system where users, both Gifters and Broadcasters, can progress through different levels based on their activities and engagement. Each level achieved unlocks specific benefits, challenges, and opportunities for users to earn virtual wealth and cash rewards.

**(4) Popup Notifications**

To keep users informed and engaged, the solution implements popup notifications. These notifications alert users when they achieve specific levels, become eligible for the Wealth Game, or receive gifts, enhancing user experience and ensuring timely communication.

**(5) Subscription Model**

A subscription-based model is integrated into the Wealth Game, allowing users to subscribe and unlock exclusive challenges, features, and cash reward opportunities. Subscribers gain access to premium content, creating a sense of exclusivity and motivation for users to participate actively.

**(6) Cash Rewards and Payouts**

For qualified Broadcasters, the Wealth Game offers the opportunity to earn cash rewards based on their engagement and activities within the platform. Monthly payouts are facilitated through secure payment gateways, ensuring that Broadcasters are duly rewarded for their contributions and efforts.

**(7) Community Building Features**

In addition to challenges and gifting, the solution includes community-building features such as friend requests, chat functionalities, and user profiles. These features facilitate social interactions, enabling users to make friends, engage in conversations, and build connections within the Superstar community.

**(8) Scalability and Performance Optimization**

The Wealth Game module is developed with a scalable architecture and optimized performance. The solution is designed to handle a growing user base and high levels of concurrent interactions, ensuring a smooth and responsive user experience even during peak usage periods.

**(9) User Analytics and Engagement Metrics**

To analyze user behavior and enhance engagement, the solution incorporates analytics tools. These tools provide valuable insights into user interactions, preferences, and challenges, enabling the Superstar team to optimize the Wealth Game module continuously.

**(10) Future-Ready Enhancements**

The solution is designed with flexibility in mind, allowing for future enhancements and feature additions. Superstar's development team can seamlessly integrate new challenge types, advanced gifting options, leaderboards, and other interactive elements to keep the Wealth Game module dynamic and engaging for users.

# **Database Design**

Design and develop a scalable database system to support future resource expansion.

|  |  |  |  |
| --- | --- | --- | --- |
| Field | Type | Variable | Note |
| UserID | INT | Unique user ID | Primary key, identifies each user |
| Username | VARCHAR(50) | User's username | Unique username for login |
| Email | VARCHAR(100) | User's email | Unique email for registration |
| Password | VARCHAR(100) | Encrypted password | Password for user login |
| GiftID | INT | Virtual gift identifier | Unique identifier for each virtual gift |
| SenderUserID | INT | Sender's user ID | User ID of the sender |
| ReceiverUserID | INT | Receiver's user ID | User ID of the receiver |
| GiftType | VARCHAR(50) | Type of virtual gift | Category or type of the virtual gift |
| GiftValue | INT | Value of the gift | Value in wealth points |
| LevelID | INT | Level identifier | Unique identifier for each level |
| LevelNumber | INT | Level number | Number indicating the level |
| LevelDescription | VARCHAR(255) | Level description | Description of the level |
| SubscriptionID | INT | Subscription identifier | Unique identifier for each subscription |
| SubscriptionType | VARCHAR(50) | Type of subscription | Type of Wealth Game subscription |
| SubscriptionCost | DECIMAL(10,2) | Subscription cost | Cost in local currency |

# **Image Processing Algorithms**

Design and develop image processing algorithms to improve data accuracy, including Karaoke singing audio and vedio mode, Live streaming, gifting, broadcasting, gaming, song storage, recorded vedio-audio song posts.

A diagram of a company

Description automatically generated with medium confidence

# **Operation Plan**

|  |  |  |
| --- | --- | --- |
| **Feature** | **Responsibility** | **Activities** |
| User Support and Assistance | Superstar Support Team | * Provide 24/7 user support to address user queries, issues, and complaints related to the Wealth Game module. * Assist users in understanding game rules, challenges, and reward mechanisms. * Resolve technical issues and glitches promptly to ensure a seamless user experience. |
| Challenge Management | Content Management Team | * Curate and create diverse challenges to maintain user engagement. * Regularly update challenge content to offer fresh and exciting experiences. * Monitor challenge submissions, ensuring fair evaluation and reward distribution. |
| Gifting System Oversight | Wealth Game Operations Team | * Monitor virtual gift transactions, ensuring accuracy and security. * Address any issues related to virtual gifts, such as failed transactions or missing gifts. * Implement fraud prevention measures to prevent misuse of the gifting system. |
| Level Achievement and Subscription Management | User Account Management Team | * Manage user levels, tracking achievements and level upgrades. * Oversee user subscriptions, ensuring timely renewals and access to Wealth Game features. * Provide support to users regarding subscription-related queries. |
| Live Streaming and Broadcasters Support | Live Streaming Support Team | * Assist broadcasters in setting up and managing live streaming sessions. * Monitor live streams for content adherence and user interactions. * Facilitate communication between broadcasters and viewers for a positive streaming experience. |
| Performance Monitoring and Optimization | Technical Operations Team | * Monitor system performance, identifying and resolving bottlenecks or issues. * Regularly optimize database queries and server configurations for efficient operation. * Conduct load testing to ensure the platform can handle peak user activity. |
| Reporting and Analytics | Data Analytics Team | * Generate regular reports on user engagement, challenge participation, and gifting trends. * Analyze user behavior data to identify patterns and preferences. * Provide insights to the management team for strategic decision-making. |
| Security and Compliance | Security and Compliance Team | * Implement security protocols to safeguard user data and financial transactions. * Ensure compliance with data protection regulations and user privacy policies. * Regularly conduct security audits and vulnerability assessments. |
| Continuous Improvement and User Feedback | Product Development Team | * Gather user feedback through surveys, reviews, and user interactions. * Use feedback to identify areas of improvement and implement new features or enhancements. * Stay updated with industry trends and technologies to keep the Wealth Game module competitive. |
| Emergency Response and Downtime Management | Emergency Response Team | * Develop and maintain an emergency response plan for unexpected system failures or cyberattacks. * Implement backup and disaster recovery protocols to minimize data loss in case of emergencies. * Communicate transparently with users during scheduled maintenance or unexpected downtimes. |

# **Application Deployment**

The deployment of the Wealth Game module involves the process of making the application accessible and operational for end-users. It includes the setup of servers, databases, application files, and other necessary components to enable users to access the Wealth Game module within the Superstar Music Karaoke App.

Following are the steps required in deployment:

|  |  |
| --- | --- |
| Steps | Description |
| Target Platform | The Wealth Game module will be deployed on the following platforms: iOS: The application will be available for download and installation on Apple devices via the Apple App Store.  Android: The application will be available for download and installation on Android devices via Google Play Store. |
| Server Infrastructure | * The application will be hosted on secure and scalable cloud servers (e.g., AWS, Azure) to ensure high availability and performance. * Load balancing and redundancy measures will be implemented to distribute user traffic efficiently and prevent downtime. |
| Database Setup | * The application's database, containing user data, challenges, gifting information, and other relevant data, will be hosted on a dedicated database server. * Database security protocols, including encryption and regular backups, will be implemented to safeguard user information. |
| Deployment Process | Code Repository: The Wealth Game module codebase will be stored in a version control system (e.g., Git) for version management and collaboration.  Continuous Integration: Continuous integration pipelines will be set up to automate code testing, build processes, and ensure code quality.  Deployment Automation: Deployment scripts and automation tools (e.g., Jenkins) will be used to deploy new updates, bug fixes, and feature enhancements seamlessly. |
| Security Measures | Data Encryption: All data transmitted between the application and servers will be encrypted using SSL/TLS protocols to ensure secure communication.  Firewall and Access Controls: Firewall configurations and access control lists will be implemented to restrict unauthorized access to server resources.  Security Audits: Regular security audits and vulnerability assessments will be conducted to identify and mitigate potential security risks. |
| User Acceptance Testing (UAT) | * Prior to deployment, the Wealth Game module will undergo extensive User Acceptance Testing to ensure that all features function as intended and meet user expectations. * UAT will involve real users testing the application in a controlled environment to identify any usability issues or bugs. |
| Rollout Plan | * The rollout of the Wealth Game module will be staged, starting with a limited release to a subset of users for initial feedback and monitoring. * Once feedback is incorporated and the application is stable, a full-scale release will be initiated, making the module available to all users. |
| Monitoring and Support | Application Monitoring: Monitoring tools will be implemented to track application performance, server health, and user engagement metrics in real-time.  User Support: A dedicated support team will be available to assist users with any issues, inquiries, or feedback related to the Wealth Game module. |
| Documentation and Training | User Guides: Comprehensive user guides and tutorials will be provided within the application to assist users in understanding Wealth Game features and functionalities.  Internal Training: Internal training sessions will be conducted for support staff and administrators to familiarize them with the module's features and common user queries. |

# **Multi-Platform and Multilingual Support**

1. Multi -Platform Support

The Wealth Game module is designed to be accessible across various platforms, providing a seamless experience for users on different devices and operating systems.

|  |  |
| --- | --- |
| iOS and Android Compatibility | * The module will be compatible with iOS devices (iPhone and iPad) running iOS [version number] or above. * The module will support Android devices (phones and tablets) with Android [version number] or above. |
| Web Compatibility | A responsive web version of the Wealth Game module will be developed to allow users to access the game via web browsers on desktop and laptop computers. |
| Cross-Browser Compatibility | The web version will be compatible with popular web browsers, including but not limited to Google Chrome, Mozilla Firefox, Safari, and Microsoft Edge. |

1. Multilingual Support

The Wealth Game module will support multiple languages to cater to a diverse user base, ensuring inclusivity and user engagement.

|  |  |
| --- | --- |
| Supported Languages | * The initial release will support [list of languages], covering a broad range of regions and user demographics. * The application will feature an intuitive language selection option, allowing users to choose their preferred language during the onboarding process or within the user settings. |
| Localization and Translation | * All in-app text, notifications, prompts, and user interfaces will be localized and translated accurately into the supported languages. * Professional translation services will be employed to maintain linguistic and cultural nuances, ensuring high-quality translations. |
| Dynamic Language Switching | Users can switch between supported languages dynamically within the application, allowing them to change their language preference at any time without affecting their overall experience. |

1. Accessibility Features

The Wealth Game module will incorporate accessibility features to ensure usability for users with diverse needs and abilities.

|  |  |
| --- | --- |
| Screen Reader Compatibility | The user interface and in-app content will be optimized for compatibility with screen readers, enabling users with visual impairments to navigate and interact effectively. |
| Color Contrast and Font Legibility | High color contrast and legible fonts will be used throughout the application to enhance readability for users with color vision deficiencies or visual impairments. |

1. User Assistance and Support

|  |  |
| --- | --- |
| Multilingual Support Team | A dedicated multilingual support team will be available to assist users in their preferred language, addressing queries, issues, and feedback effectively. |
| Localized Help Resources | Help resources, FAQs, and user guides will be translated into supported languages, providing users with localized assistance and guidance. |