

# CS19611 - MOBILE APPLICATION DEVELOPMENT PROJECT REPORT

QUIZ APP

*Submitted by*

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**BONAFIDE CERTIFICATE**

This project report titled **"QUIZ APP"** is the bonafide work of **KAAVIYA G (220701114)**, who carried out the work under my supervision. Certified further that to the best of my knowledge, the work reported herein does not form part of any other thesis or dissertation based on which a degree or award was conferred earlier.

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**CHAPTER 1**

**ABSTRACT**

**The Quiz App is an interactive and engaging mobile application designed to test users' general knowledge across various topics. Developed for Android devices using Kotlin, the app presents users with a set of 10 questions, one after another, each providing immediate feedback on whether the user's answer was correct or incorrect. At the end of the quiz, the app calculates and displays the user’s score out of 10, giving them a clear result and an opportunity to track their performance.**

**With an intuitive and user-friendly interface, the Quiz App ensures a smooth, engaging experience for users of all ages. The app is optimized for high performance, providing a seamless navigation experience and delivering real-time feedback after each question.**

**From a technical standpoint, the app demonstrates key mobile development concepts such as dynamic content rendering, real-time user interaction, and responsive UI design. Future updates could include additional question categories, multiplayer functionality, social sharing features, and an AI-driven quiz difficulty system, making the Quiz App an essential tool for users seeking to challenge and improve their general knowledge.**

**CHAPTER 2**

**INTRODUCTION**

**2.1 GENERAL**

**The Quiz App is an engaging and interactive mobile application designed to challenge users' knowledge across a variety of topics. Built using Android Studio and Kotlin, the app allows users to participate in a fun and educational quiz experience by answering a series of 10 questions. The app provides real-time feedback after each question, indicating whether the user's answer is correct or incorrect, and calculates the final score at the end. With a simple and user-friendly interface, the Quiz App offers an enjoyable experience that encourages learning and improvement.**

**2.2 OBJECTIVE**

* To develop a fun and educational mobile app that challenges users with a variety of quiz questions.
* To provide immediate feedback after each question, helping users learn while they play.
* To create a user-friendly interface that ensures smooth navigation and an enjoyable quiz-taking experience.

**2.3 EXISTING SYSTEM**

Many existing quiz apps either offer limited question sets or fail to provide real-time feedback, which can affect the learning experience. Some apps focus on specific categories of quizzes, leaving users with limited options.

**CHAPTER 3**

# LITERATURE SURVEY

Several mobile applications currently offer quiz-based learning and entertainment, with apps like "Kahoot!," "QuizUp," and "Trivia Crack" engaging users across various topics. However, many existing quiz platforms often lack:

● A **streamlined and intuitive UI** for effortless question navigation and result tracking.

● **Adaptive difficulty levels** that intelligently adjust based on user performance.

● **Customizable quiz categories** tailored to individual interests, such as science, history, or pop culture.

● **Offline functionality** to access and play quizzes without requiring an internet connection.

Research in mobile quiz applications highlights that users prefer **interactive and engaging formats**, rewarding progression, and instant feedback for better learning retention. Many users favor apps with **clear visuals, minimal distractions**, and smooth gameplay mechanics. However, some quiz apps feature **intrusive ads, complex interfaces**, or restricted content behind paywalls, limiting overall user satisfaction and accessibility.

**CHAPTER 4**

# PROPOSED SYSTEM

**4.1 SYSTEM OVERVIEW**

**The Quiz App offers a seamless and interactive quiz experience, allowing users to test their general knowledge in a variety of categories. Designed with a user-friendly interface, the app presents a series of questions one after another, providing immediate feedback on each answer. The app keeps track of users’ scores throughout the quiz and displays the final result at the end.**

**4.2 SYSTEM ARCHITECTURE**

* User launches the app.
* Enters their name to begin the quiz.
* The app presents a series of 10 questions, each with multiple-choice options.
* After each question, the app provides real-time feedback, indicating whether the answer is correct or incorrect.
* At the end of the quiz, the app calculates the total score (out of 10) and displays the result to the user.
* The application automatically updates:
* Real-time feedback after each question.
* Final score calculation and display.

A diagram of a quiz application

Description automatically generated

(Fig 3.1 System Architecture)

**CHAPTER 5**

# MODULE DESCRIPTION

**5.1 MODULES**

* **Question & Answer Module:**

1. Presents a series of 10 questions to the user.
2. Displays multiple-choice options for each question.
3. Provides immediate feedback on whether the user's answer is correct or incorrect.

* **Score Tracking Module:**

1. Tracks the user's score throughout the quiz.
2. Displays the final score (out of 10) at the end of the quiz.
3. Allows users to view their score history and aim for improvement.

* **User Profile Module:**

1. Allows users to input their name at the beginning of the quiz.
2. Displays user-specific data, such as total quiz scores and progress.
3. Stores user preferences (e.g., difficulty level, category) for future quizzes.

* **UI/UX Module:**

1. Implements a sleek, responsive interface using Material Design principles.
2. Ensures smooth navigation, minimal clutter, and visually appealing layouts.
3. Provides a simple and intuitive flow from question to question with immediate feedback.

A screenshot of a computer screen

Description automatically generated**5.2 ACTIVITY DIAGRAM**

(Fig 4.1 Activity Diagram)

**CHAPTER 6**

**IMPLEMENTATION AND RESULTS**

**6.1 TOOLS USED**

* Android Studio
* Java
* XML for UI
* SQLite (for storing sports news)
  1. **OUTPUT SCREENSHOTS**

**A screenshot of a quiz app

Description automatically generated A screenshot of a cell phone

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(Fig 6.1 App Home Page) (Fig 6.2 Correct Answer)

A screenshot of a cell phone

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(Fig 6.3 Incorrect Answer) (Fig 6.4 Quiz Score)

**CHAPTER 7**

**CONCLUSION AND FUTURE ENHANCEMENT**

**6.1 CONCLUSION**

**The Quiz App provides a simple, fun, and educational platform for users to test their general knowledge across various topics. With its real-time feedback, clean interface, and smooth navigation, the app offers an engaging quiz experience that is both entertaining and informative. The app encourages users to learn through gameplay and track their progress, making it suitable for users of all ages.**

**6.2 FUTURE ENHANCEMENT**

* Integrate a timer for each question to increase challenge and competitiveness.
* Implement a leaderboard system for global and local ranking.
* Enable multiplayer quiz modes for real-time user competition.
* Include social sharing features to allow users to post scores and challenge friends.
* Introduce adaptive difficulty using AI based on user performance.

**REFERENCES**

# Android Developer Documentation

# Kotlin Programming Language Official Guide

# Material Design UI/UX Principles (2025)

# Firebase for User Data and Score Storage