



**9530**

**St. MOTHER THERESA ENGINEERING COLLEGE**

**COMPUTER SCIENCE ENGINEERING**

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**Completed the project named as**

**Phase 1**

**FRONT END TECHNOLOGY**

**INTERACTIVE QUIZ APP**

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## **Phase 1 – Problem Understanding & Requirements**

### **❖ Problem Statement :**

Users need an engaging and interactive quiz platform that allows them to participate in quizzes, track scores, and receive instant feedback. The application should support multiple quiz formats (MCQs, true/false, fill-in-the-blank), provide real-time scoring, and maintain quiz history in a simple and responsive interface.

### **❖ Users & Stakeholders :**

- End Users (students, learners, casual players)
- Educators / Trainers (who create and assign quizzes)
- Developers (frontend engineers, backend engineers, UI/UX designers)
- Project mentor/faculty

### **❖ User Stories**

- As a user, I should be able to attempt quizzes with multiple question types.
- As a user, I should see my score and correct answers instantly after submission.
- As a user, I should view my past quiz results and performance history.
- As an educator, I should be able to create, edit, and publish quizzes.
- As a user, I should have a smooth, responsive, and fun quiz-taking experience.

### **❖ MVP Features**

- Question display area with options (MCQs, true/false, short answers).

- Timer for quizzes (optional).
- Real-time score calculation.
- Feedback (correct/incorrect) after answering.
- Result summary at the end of the quiz.
- Basic styling for engagement and readability.

## **Wireframes / API Endpoint List :**

### **❖ Wireframes:**

- Quiz selection screen (list of available quizzes).
- Quiz-taking screen (question + answer options + timer).
- Result summary screen (score, correct answers, feedback).

### **❖ API Endpoints (future integration):**

- GET /quizzes → fetch available quizzes.
- POST /submit → submit answers & get results.
- GET /results → fetch past results of a user.
- POST /quiz → create new quiz (for educators).

### **❖ Acceptance Criteria :**

- Users can select and attempt quizzes.
- Users receive immediate feedback on answers.
- Results (score & performance summary) are displayed at the end.
- Quiz data is maintained during session.
- UI is responsive, user-friendly, and gamified for engagement.