

Project Report
Online Quiz System (Java)

Student: Banwari Mewada Course: Integrated M.Tech in Artificial Intelligence Date: 20-Nov-2025

Introduction

This project implements a simple console-based Multiple Choice Question (MCQ) Quiz System in Java. It allows administrators to add questions and students to take quizzes. Results are saved to CSV for record-keeping.

Functional Requirements

- 1. Load questions from CSV
- 2. Run shuffled quizzes
- 3. Add questions (admin)
- 4. Save results to CSV

Non-Functional Requirements

Usability, Reliability, Maintainability, Performance

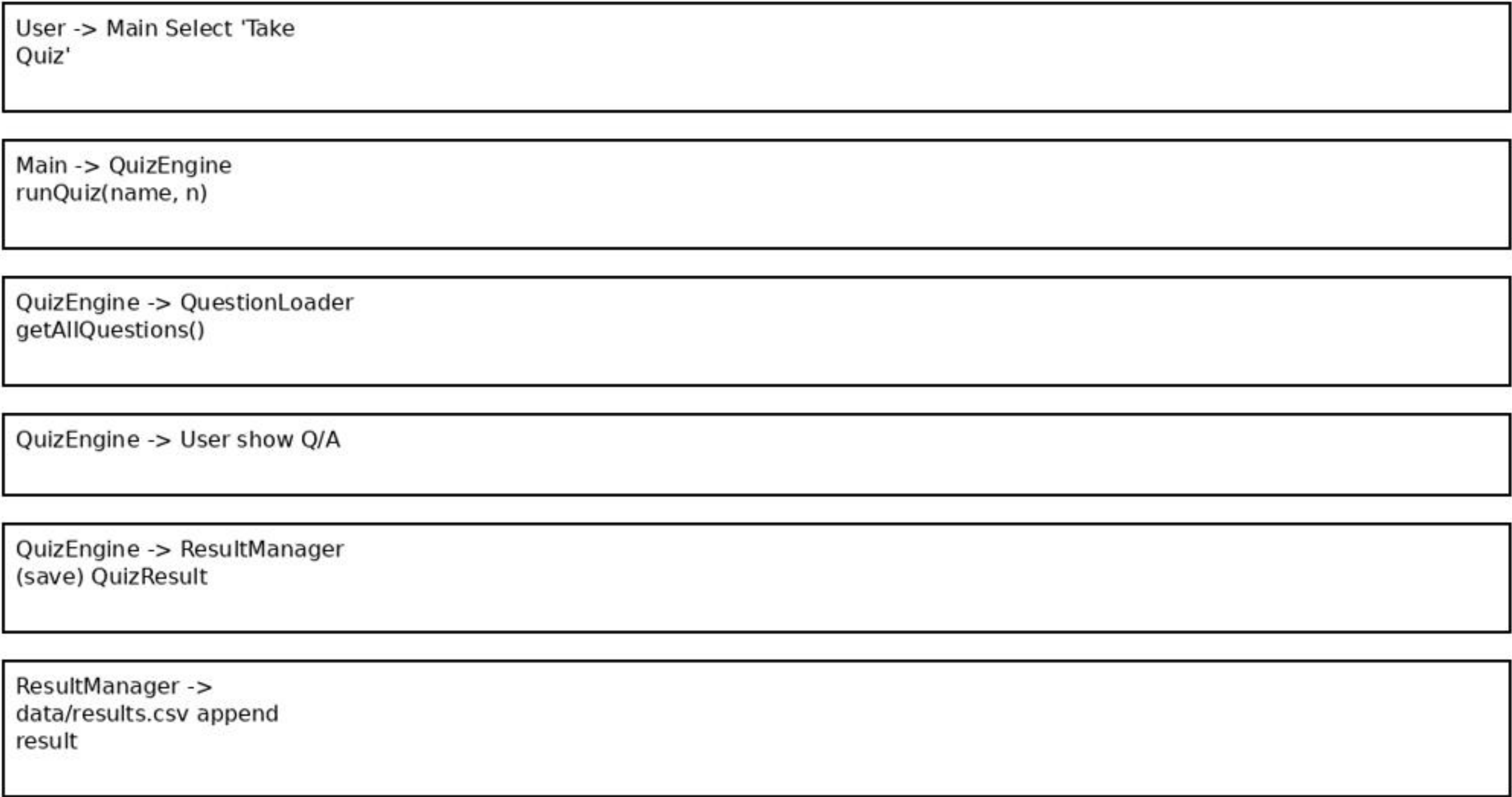
Use Case Diagram - Online Quiz System

Actor: Student - Take Quiz - View Results
Actor: Admin (Teacher) - Add Questions - View Results
System: Online Quiz System - Load questions from CSV - Run Quiz Engine - Save results

Class Diagram - Online Quiz System

Question - id - text - options - correctIndex + fromCSV() + toString()	model.Question
QuizResult - userName - totalQuestions - correctAnswers - takenAt	model.QuizResult
QuestionLoader - getAllQuestions() - addQuestion()	service.QuestionLoader
QuizEngine - runQuiz()	service.QuizEngine
ResultManager - saveResult() - getAllResults()	service.ResultManager
FileHandler - readAllLines() - appendLine() - overwrite()	util.FileHandler

Sequence Diagram - Take Quiz Flow



Architecture Diagram - Online Quiz System

