RAJALAKSHMI ENGINEERING COLLEGE

DEPARTMENT OF INFORMATION TECHNOLOGY

IV IT PROJECT (Batch : 2022-2026)

Academic Year : 2025 - 2026

ABSTRACT

TITLE	Flutter-Based Digital Classroom App for Android & iOS
TEAM MEMBERS (Register Number –Student Name)	221001010 - Agalya R 221001050 - Harini P
Supervisor	Dr.P.Valarmathie
Batch Number	26A09

ABSTRACT: Flutter-Based Digital Classroom App for Android & iOS

This Flutter-based **Digital Classroom App** is built to modernize education through a smart, interactive platform. It brings together learning tools, assignments, materials, announcements, and communication. This app enhances the student-faculty connection in both online and offline settings. It simplifies daily classroom operations using intuitive digital workflows.

A key innovation is the **AI assistance chatbot** that handles student and faculty queries instantly. It can also **summarize uploaded content** like notes and documents for faster understanding. This improves accessibility and helps in quick revisions. The chatbot uses natural language processing to provide personalized support.

This app features a **Timetable Builder** that schedules and displays classes with full details. Alerts include **date, time, class, faculty, and room number** to keep students informed. It also includes an **On-Duty Permission Portal** for leave applications and tracking. Faculty can approve OD requests digitally, improving efficiency.

An additional tool is a **PDF-to-Audio Converter** with **multilingual support**, promoting inclusive education. It allows students to listen to notes in different languages. This benefits visually impaired students and non-native speakers alike. Together, these features create a smart, accessible, and AI-integrated learning platform.

SUPERVISOR SIGNATURE   **PROJECT CO-ORDINATOR SIGNATURE**