

PROJECT PROPOSAL

Campus-Wide Smart Attendance System

Proposal to replace paper registers with a QR- and app-based attendance platform

PREPARED FOR

The Principal and Academic
Council

PREPARED BY

Dr. Kavya Menon, Project
Coordinator

DATE

March 2026

Executive Summary

Teachers currently spend several minutes of every lecture marking attendance on paper, and the data reaches the office weeks later. This proposal requests approval and funding to build and roll out a smart attendance system that lets students mark attendance by scanning a rotating QR code in class, with location and time checks to prevent proxies. Teachers get instant class reports and the office gets monthly shortage lists automatically.

6 months

Development and roll-out

₹4.6 L

Estimated budget

3,200

Students covered

Background and Need

Paper attendance takes time away from teaching, is easy to manipulate and is difficult to analyse. Monthly shortage lists are prepared by hand, which delays communication with students and parents.

A digital system would save teaching time, improve accuracy and allow early support for students with poor attendance.

- About 5–7 minutes per lecture spent on roll call (estimate)
- Registers stored in different departments
- Shortage lists prepared manually every month

Goals and Objectives

Introduce a reliable, low-cost digital attendance system for all departments within one academic semester.

1. Reduce time spent on attendance to under one minute per lecture.
2. Generate department and student-wise reports automatically.
3. Alert students and mentors when attendance falls below 75%.
4. Keep student data secure and accessible only to authorised staff.

Approach and Activities

Requirement study

Interview teachers, office staff and students; study existing registers and rules.

Design and development

Build the teacher app, student app and admin dashboard with role-based access.

Pilot

Run a four-week pilot in two departments and collect feedback.

Roll-out and training

Train all faculty, publish user guides and roll out college-wide.

Deliverables

Deliverable	Description	Due
Requirement document	Agreed features and rules	Month 1
Working apps	Teacher and student mobile apps	Month 3
Admin dashboard	Reports and alerts	Month 4
Pilot report	Findings and fixes	Month 5
Training material	Guides and videos	Month 6

Timeline

The work plan below shows the main activities and their indicative timing.

Activity	M1	M2	M3	M4	M5	M6
Requirement study	■					
Design	■	■				
Development		■	■	■		

Activity	M1	M2	M3	M4	M5	M6
Pilot					■	
Training and roll-out					■	■

Team and Governance

Name	Role	Responsibility
Dr. Kavya Menon	Coordinator	Overall responsibility and reporting
Mr. Arjun Pillai	Technical lead	Architecture and development
Student developers (4)	Developers	Apps and dashboard
Office superintendent	Process owner	Rules and reports

A steering group chaired by the Vice-Principal will review progress every month.

Budget

All amounts are estimates in Indian rupees and are provided as sample figures for planning.

Head	Details	Amount (₹)
Cloud hosting (1 year)	Server, database and backups	60,000
Development support	Stipends for student developers	180,000
Devices	Tablets for classrooms without projectors	120,000
Training	Workshops and guides	40,000
Contingency	About 10%	60,000
Total		460,000

Monitoring and Evaluation

Indicator	Target	How measured
Time per roll call	< 1 minute	Classroom observation
Adoption	90% of lectures	System logs
Report accuracy	99%	Audit against sample registers
User satisfaction	4 / 5	Survey after pilot

Risks and Mitigation

Risk	Likelihood	Mitigation
Poor network in some rooms	Medium	Offline mode with later sync
Resistance to change	Medium	Training and champions in each department
Proxy attempts	Low	Rotating QR plus location checks

Conclusion

The smart attendance system is a practical, affordable step that saves teaching time and helps students who are falling behind. We request approval to begin the requirement study in April.

Next step

Approve the proposal and the budget of ₹4.6 lakh so that work can begin next month.

Dr. Kavya Menon

Submitted by

Approved by (name, designation)