

Gen-O-Clock: AI-Enhanced Employee Time Monitoring and Project Management System

Prasad SN Babar¹, Vijay Devkar², Ashada Dabhekar³, Harshada Gandhi⁴

Students, Department of Computer Engineering^{1, 2, 3, 4}

Marathwada Mitramandal's College Of Engineering, Pune, India

¹prasadbabar2021.comp@mmcoe.edu.in, ²vijaydevkar2021.comp@mmcoe.edu.in,

³ashadadabhekar2021.comp@mmcoe.edu.in, ⁴harshadagandhi2021.comp@mmcoe.edu.in

Abstract: *Gen-O-Clock is a smart mobile application designed to simplify employee time tracking for businesses. Traditionally, organizations relied on manual registers to record attendance and work hours, which were often prone to errors and tampering. These outdated methods could compromise accuracy and lead to mistrust within the workplace. To address these issues, Gen-O-Clock provides a secure, automated solution that monitors employee work activities and ensures data integrity. The app offers essential features like clock-in, clock-out, break tracking, and detailed reports on work durations. This eliminates the need for traditional attendance systems and reduces the risk of disputes between employees and managers. By streamlining time management, Gen-O-Clock creates a more transparent and efficient work environment. What sets the app apart is its integration of speech-to-text functionality and generative AI, allowing for hands-free task logging and intelligent suggestions. These features enhance user experience and support better decision-making by offering real-time insights into employee performance. Gen-O-Clock is more than just a time tracker—it's a tool for modern workforce optimization. By embracing AI-driven technology, organizations can automate routine processes, gain actionable insights, and foster a culture of accountability and growth. This research-backed application serves as a model for companies looking to leverage artificial intelligence in performance management and achieve long-term, sustainable success.*

Keywords: AI-Enhanced Employee Management, Task Management, Voice Recognition, Time Tracking, Speech-to-Text Conversion, Generative AI prompting, Performance Management, User Role Management, Mobile Application

