

Employee Management System

The Employee Management System is designed to manage employee records (attendance, absence, departures). The system was developed using PHP and the Laravel framework, with a MySQL database.

Attendance and departure:

Users log in and can view the full records of attendance, absence, and departures. For daily attendance and departures, users must enter their employee ID to check in and check out.

The system allows only one check in per day, and once the user check in, the check out option becomes available.

Check in is enabled from 7:00 AM, and if a user check in after 8:30 AM, the system marks them as late.

Check out Mechanism:

Check out is available starting at 7:00 AM, and if a user check out before 3:00 PM, the system records an early departure.

The system relies on the device's clock, simulating the mechanism used in biometric timekeeping devices. However, since this is a simulation, it presents a vulnerability: users can manipulate their device's clock to check in or out multiple times. To address this, the system can rely on the server's clock instead of the device's clock, or it can use an API from a service that provides accurate time and time zones.

Absence Mechanism:

An absence manager verifies the employees who were absent for the day and marks their absence accordingly.

Notes:

The absence mechanism is triggered after 4:00 PM to ensure that the user did not attend.

The absence manager must check absences daily after 4:00 PM to avoid overriding the previous day's records. To solve this, we could implement a scheduling feature where the system automatically marks absent employees without requiring manual intervention.

For those who did not check out despite attending, the absence manager will record an early departure for them.

To run the project, write in command prompt:

- **php artisan serve** => to run the project.
- **npm run dev** => to run Vite on resources folders to load the frontend files.

In database:

- run **XAMPP**.