

TITLE OF PROJECT REPORT

Online Attendance System

WADL MINI PROJECT REPORT (SEMESTER -II)

NAME OF THE CANDIDATE(S)

Urvashi Katile (33137)

Rashi Khandelwal (33139)

Ashish Patil (33156)

THIRD-YEAR ENGINEERING INFORMATION TECHNOLOGY



Society for Computer Technology and Research
PUNE INSTITUTE OF COMPUTER TECHNOLOGY
DHANKAWADI, PUNE — 43
A.Y. 2021-22

Guided By

Mrs. R.A. Karnavat

Abstract

The student attendance management system deals with the maintenance of the student's attendance details. It generates the attendance of the student based on their presence in the class. It is maintained daily of their attendance. Taking offline attendance and maintaining it manually is a bit difficult. It also creates confusion and many times; a proxy attendance is also given. To make the task easier and remove confusion, a system is designed to take attendance of students only if they are present physically. A system is designed to take the login details of the students and then maintain them for the taking of the attendance. The system is an online website based on the technologies such as HTML, CSS, Bootstrap, Flask, and Mongo DB to maintain students' daily attendance online and remove various anomalies which happen by taking attendance offline.

TABLE OF CONTENT

Chapter No.	Title	Page No
1)	INTRODUCTION	1
2)	LITERATURE SURVEY	2
3)	IMPLEMENTATION DETAILS	4
4)	OUTPUT SCREENSHOTS	5
5)	CONCLUSION AND FUTURE SCOPE	9

INTRODUCTION

Attendance Management System is a software developed for daily student attendance in schools, colleges, and institutes. It facilitates to access the attendance information of a particular student in a particular class. The information is sorted by the operators, which will be provided by the teacher for a particular class. This system will also help in determining the eligibility criteria of a student.

PURPOSE

The purpose of developing an attendance management system is to computerize the traditional way of taking attendance. Another purpose of developing the software is to generate the reports automatically at the end or in between sessions.

SCOPE

The scope of the project is limited to a local host as of now, but it can be modified by deploying it to a full-fledged website and adding some more features to it.

LITERATURE SURVEY

A Survey on Smart Attendance Management System using RFID:[1]

In this Smart Attendance System, RFID ID cards are provided to the students. In that RFID Cards, a Unique ID is stored. So, whenever a student taps that card on the RFID reader module reads that card and gets an id. Then this id will be sent to the server for verification purposes. If any student came late or is absent from a specific lecture, then an SMS will be sent to their parents regarding the same. With this server-side dashboard, staff can extract the student's data sheet in various formats like PDF for further processing purposes.

Literature Survey on Attendance Monitoring and Access Control

System: [2]

Many organizations and institutions waste a lot of time and effort on a daily basis recording of attendance and providing access to each individual. The use of an attendance tracking, and access control system is vital in providing high security to places like educational institutions. Physical access control systems are a key for the protection of infrastructure systems, where timely access, maintenance of attendance, and the security of sensitive areas are essential.

SURVEY- STUDENT ATTENDANCE MANAGEMENT SYSTEM:[3]

The whole world and managements of Educational Institutions are worried about the consistency of student attendance, which affects their complete academic performance

and finally affects the development of education in students'. Presently the conventional method for taking attendance is calling name their name/roll no or by signing on a paper, which is practically time-consuming and less secure also since there are many chances of proxy attendance. Hence, there is a necessity for a computer-based student attendance supervision system that will assist the faculty in preserving attendance. The paper reviews several computerized attendance supervision systems which is being developed by using different techniques.

ADVANTAGES:

- Less usage of Pen-Paper
- Easy storage, retrieval, management, and access of data
- Saves time and money
- Calculating attendance and maintaining individual record becomes much simpler

DISADVANTAGES:

- Online internet connectivity is required every time.
- If the backup is not maintained properly, all the data can get vanished.
- If the website is not secured, the data can be hacked
- Naïve users can get confused if the website is not designed in an interactive way.

IMPLEMENTATION DETAILS

Front end: Html, CSS, Bootstrap

Backend: Flask, Mongo DB

Dataset: One time registration of student's data:

Registration details: Mongo DB

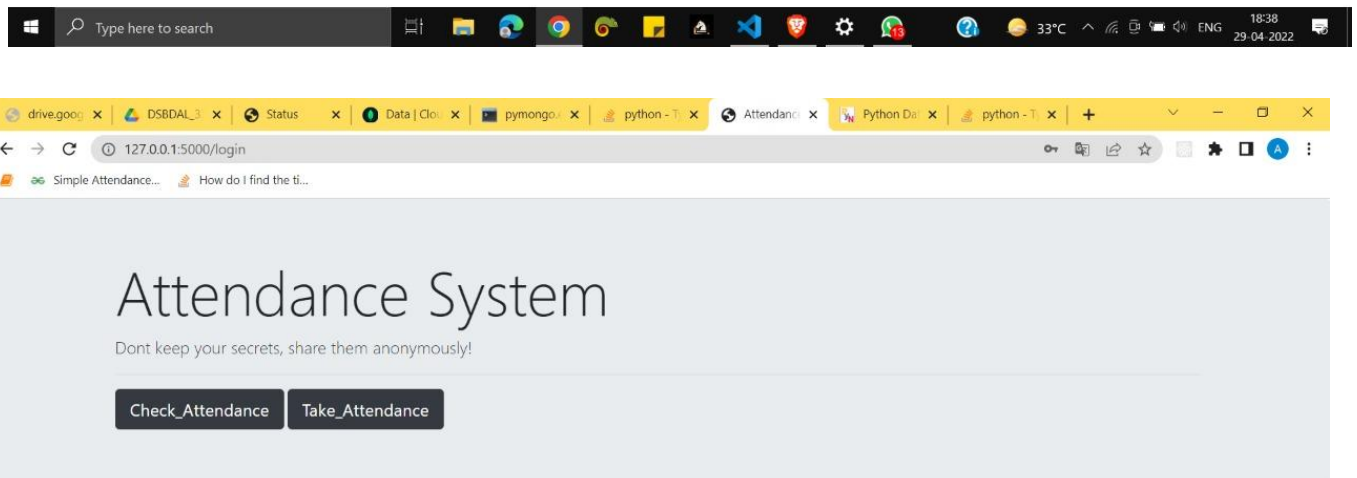
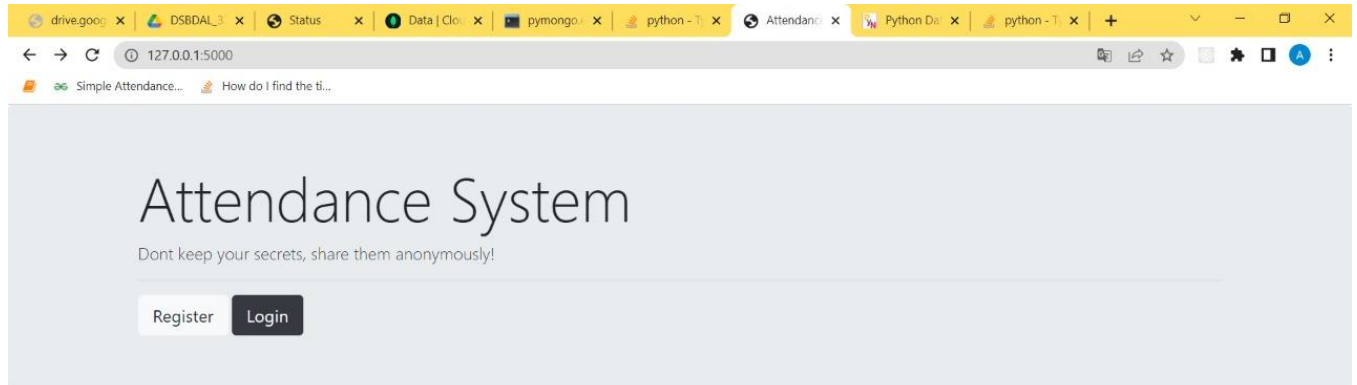
Student's Photos: Local Folder

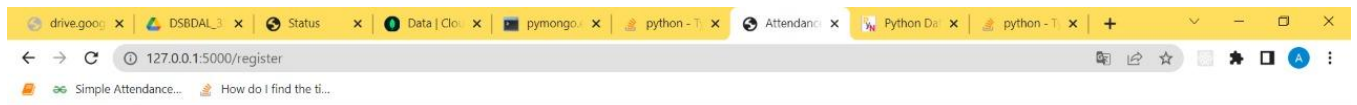
Attendance record: .csv file

MODULES

1. Signup/Login page
2. Take attendance feature
3. Check the attendance feature – name wise and date wise.

OUTPUT SCREENSHOTS





Register

Name

Email

Password

Registration ID

Image
 No file chosen

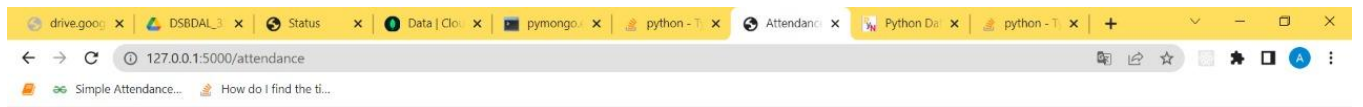


Login

Email

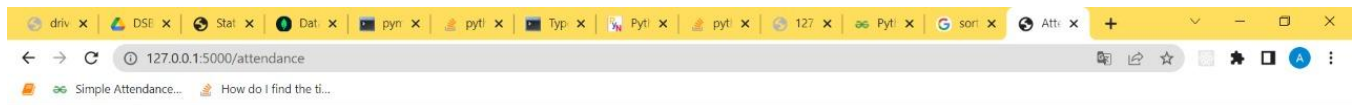
Password





Name:

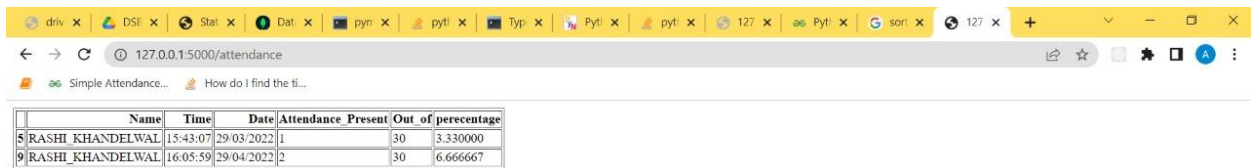
Enter Date



Name:

Enter Date

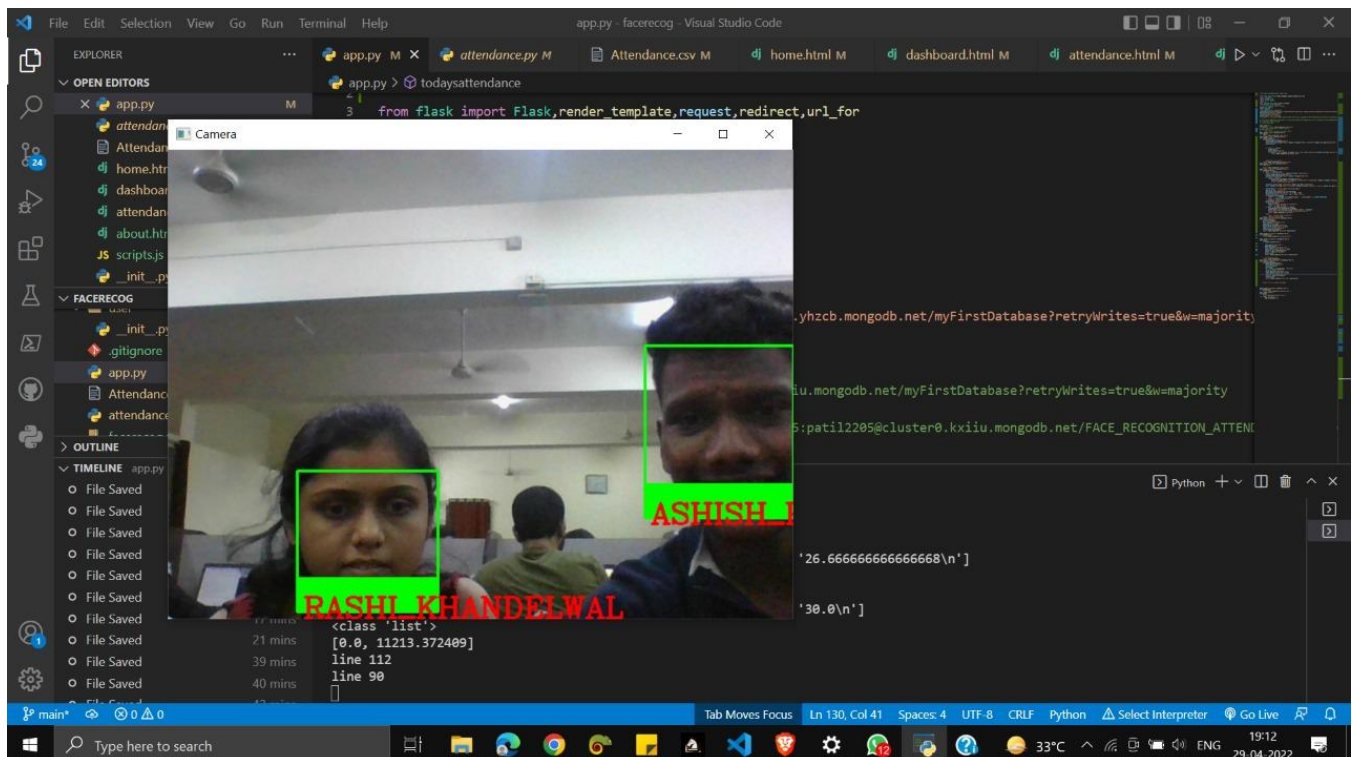




	Name	Time	Date	Attendance Present	Out of	percentage
5	RASHI_KHANDELWAL	15:43:07	29/03/2022	1	30	3.330000
9	RASHI_KHANDELWAL	16:05:59	29/04/2022	2	30	6.666667

CONCLUSION and FUTURE WORK

We have implemented an online attendance system website that allows the users (teachers in this case) to create their accounts on the portal and register the students online. Each user has his/her own account so that they have their data stored separately.



The platform allows users to have one-time student registration for setting up the database and saving it for the future. We have also implemented the search attendance and take attendance feature after logging in to the portal.

FUTURE SCOPE:

1. The system is working fine, but there are still some limitations to it. We are planning to add some more features and structure to the portal in the future.
2. Instead of a student registering to the portal and then getting the attendance, we will make a class login wherein all the students of the class will have to do one-time registration and then the subject-wise attendance will be taken by the respective subject teacher.
3. The control of the portal will be completely in the hands of the teacher.
4. The subject teacher will open that subject tab and will click on the take attendance button; a camera will pop up and will take the real-time pictures of students and increment the attendance count.
5. The webpage will display subject-wise attendance if requested to the server.

References:

[1] A Survey on Smart Attendance Management System using RFID Ashwini Dhumal, Pradnya Jagtap, Aishwarya Mohite, Shamali Pawar, Prof. Monica Waghmare, Dept. of Computer Engineering, Someshwar Engineering College, Someshwarnagar, Maharashtra 412306, India. Assistant Professor, Dept. of Computer Engineering, Someshwar Engineering College, Someshwarnagar, Maharashtra 412306, India.

[2] Literature Survey on Attendance Monitoring and Access Control System by Aishwarya. R, Supriya. S, Sushmitha. R, Vandana. K, Mrs. Bhargavi Ananth

[3] SURVEY - STUDENT ATTENDANCE MANAGEMENT SYSTEM Suyash Bharambe, Shubham Patil, Omkar Dixit, Vyaqti Vikas Singh, Santwana Gudadhe BE Student, Department Of Computer Engineering, Pimpri Chinchwad College of Engineering, Pune, Maharashtra, India Assistant Professor, Department Of Computer Engineering, Pimpri Chinchwad College of Engineering, Pune, Maharashtra, India

[4] <https://youtu.be/iGeRZNuCOgg>

[5] https://youtu.be/rE_bJl2GAY8

