# Introduction

The purpose of this system is to design a attendance application for use in schools and in similar places. Designed system is user-friendly system. The biggest reason for making this system is that the existing polling applications used create many difficulties for students, teachers and other users. Our biggest aim is to minimize these problems in the website. We designed application to use fondly in schools and other similar place.

## Purpose of the System

This system was designed with the aim of providing easy, credible for teachers who want to take attendance, users can display their classes, and participation percentages, which class their missed and detailed view of classes. It makes the whole process an easy affair without too much hassle as follow a few easy steps.

## Design Goals

The design objectives signify the specified qualities of online attendance tracking system a constant set of standards that should be thought of when making design choices. Based on non-functionality requirements the next design targets must achieved as a way to qualify the system as profitable:

* **Security**

We use for save all kind of information in Firebase database. Firebase is a Google company. When we set non-security settings, Firebase warns us like “These settings are no safe”. Firebase is a security platform for web application. Also, we set the rules of databese in Firebase settings which kind of users can write or read data in Firebase. We can set these kind of rules in Firebase.

* **Reliability**

We keep the relate every data with users id in the tables in database. We will display the users summarized data in their main pages without any flow or mistake. Students and teachers will be able to see their classes and detail of those classes.

* **End User**

All users can reach their class data, if they login the application. However, Anonym Users can not login or sign-up the system, it is possible if and only if they are teacher or student. When they are using the application, their device has to be connected the internet. Our application can work on every device, they only need a web browser.

* **Performance**

Our system can sturdy enough to manage any valid input from the users. Our system can support 100 users to write and read data in firebase database at the same times.Our system has to show the elections results with 2-3 seconds.

Moreover, the other goals of our system should accept upgrades. The other thing is we have to design our app with easily understandable and useful. Also, the colors, pictures and icons in our app have to be connected each other.

## Definitions, Acronyms, and Abbreviations

**Teacher:** One of the main actor of the system who wants to take attendance.

**Student:** The other main actor in the system who enrolls the lectures.

**Admin:** The system administrator who will manage all data system data and user controls.

**Student Affair:** Controls the relation between system and student, teacher.

**RAD:** Requirement Analysis Design

**SDD:** System Design Document

**Firebase:** Firebase is a Backend as a Service

**Angular CLI:** A platform for web application development

**HTML:** Hyper Text Markup Language

## References

1. <https://doodle.com/free-online-voting>
2. <https://www.easypolls.net/>

# Current Software Architecture

There is an existing system for online attendance tacking.The application show all class details and info gives ability to open attendance and take it. Registered user can see their class details. Students can enroll classes and teacher can display their classes student via system. Student Affair can create new class and can approve the students and teacher who wants to join in the class. User’s has specific profile screen. Students can view their information even view the participation ratio results per class. The most important point is teachers can take attendance easily and safety with online attendance tracking system.

**3.2 Teacher Part**

**Teacher Management Subsystem**

This subsytem is managing mainly attendance functions, offers registered side to its functions. This subsystem manages taking, opening attendance of a class. After, logging step;

The operetions provided by this subsystem are:

* Login()
* Open Attendance()
* Edit Attendance()
* Take Attendance()
* View Student List()
* Logout()

## 3.4 Persistent Data Management

Our system will use the firebase system to store data. This system will make it easier and faster to read and write data. The database will store values such as user input, user information, and attendances. Our database structure appears as follows.