

Monitoring Bus Management System using GPS

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Abstract - College transportation especially buses are not scheduled properly and not reach the destination bus stops with in time. The buses may be delayed then students and faculties will wait for a long time. The present generation requires the information time to time. The use of technology has been increasing day by day. So, we are planning for combination of present technology with the requirement of information transmission and the information of our college buses are transmitted to student and faculties. We planned for creative approach of "vehicle Tracking System using GPS (Global Positioning System)". This system is used to determine the location of vehicle and its information (Speed, Distance travelled, Location etc...). We also provide the information of buses, students, faculties who are using college transportation.

Key Words: GPS system, Information transmission.

1. INTRODUCTION

A college transport is a kind of transport possessed, rented, contracted to, or worked by a college the board. It is routinely used to transport students to and from college. Different designs of college transports are utilized around the world: the most notable precedents are the yellow college transports. College transports are reason fabricated vehicles recognized from different kinds of transports by structure attributes ordered by government and state guidelines. Notwithstanding their unmistakable paint shading (college transport yellow), college transports are fitted with outside notice lights (to give them traffic need) and various wellbeing gadgets.

II. FEASIBILITY STUDY

1. Existing System

Bus management system is used for the purpose of tracking, this is done by the help of GPS. In the existing system only admin can track the location of the buses. The admin who has rights can only access this system. In this existing system the admin receive the message about the condition of buses, the travelling speed of the bus and the system sends the message when the bus is delayed and cancelled due to various reasons. All this functions are accessed only by the admin not by the students, faculties or others.

Advantages:

- ❖ Track the bus location.
- ❖ Receives the message when the bus is over speed and stopped at one stop for a long time.

Disadvantages:

- ❖ Students and faculties are not able to track the bus.
- ❖ The students and faculties don't know the changed bus when their travelling bus is stopped.

2. Proposed System

College transportation especially buses are not scheduled properly and not reach the destination bus stops with in time. So in this proposed system we planned for creative approach of "vehicle Tracking System using GPS (Global Positioning System)". This system is used to determine the location of vehicle and its information (Speed, Distance travelled, Location etc...). We also provide the information of buses, students, faculties who are using college transportation. In this proposed system everyone can access the system.

Advantages:

1. Students and faculties can track the bus.
2. They can see the alternate or changed bus when their travelling bus is stopped.

III. IMPLEMENTATION

Modules Description:

Student Module:

This module is for students who are travelling in the college transportation. Here the students can know about the bus details, delay of buses, location of the buses etc...which is helpful for the students and this tracking is done through the GPS system. They should sign in with their respective rollno and password.

Employee Module:

This module is for the faculty members who are using the college transportation. Faculty can also know the bus details, delay of buses, location of buses etc...where the tracking is done through the GPS system. They should sign in with their respective userid and password.

Others Module:

The other module is for parents etc...who want to know the details of buses can know here without any registration and login. Here they have to fill the form to view the buses. But, the difference between registration candidate and the person who see the location through others module is the candidate who are registered can get a particular bus number and bus route.

Admin Module:

This module is for admin who is eligible to register student and employee. Here they can add the details of the student and employee, delete the details of the student and employee, update the details of the student and employee. The admin should sign in with userid and password where they will be only three or four admins who are maintaining the college transportation. Here the admin know's all the details of the buses and location of the buses. After registration admin will provide the userid and password for the students and employees.

System Architecture

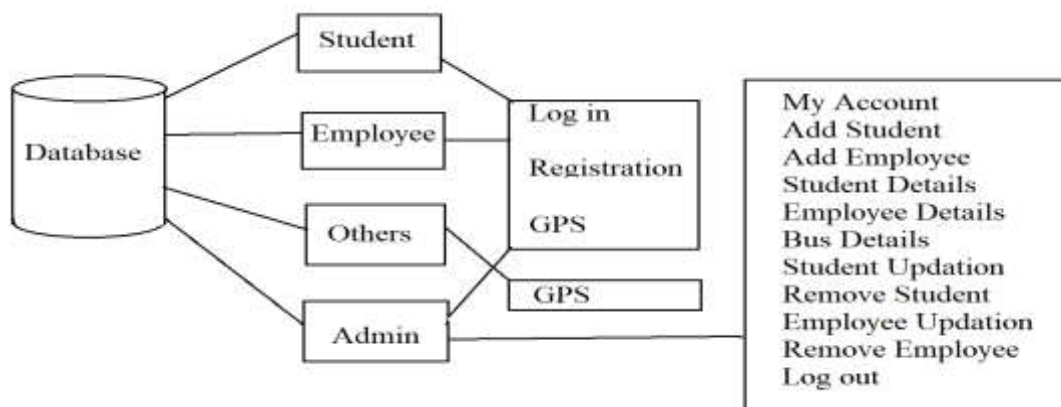


Fig: System Architecture

IV. CODING

Index.php:

```
<?php
session_start();
$conn=mysqli_connect("localhost","root","","cool");
if($_SESSION["idno"]==""||$_SESSION["rollno"]==""||$_SESSION["userid"]=="")
{
header("location:index.php");
}
<!DOCTYPE html PUBLIC "-//W3C//DTD XHTML 1.0 Strict//EN"
"http://www.w3.org/TR/xhtml1/DTD/xhtml1-strict.dtd">
<html xmlns="http://www.w3.org/1999/xhtml">
<head>
<meta http-equiv="Content-Type" content="text/html; charset=utf-8" />
<title></title>
<meta name="keywords" content="" />
<meta name="description" content="" />
<link href="http://fonts.googleapis.com/css?family=Montserrat:400,700" rel="stylesheet" />
<link href="default.css" rel="stylesheet" type="text/css" media="all" />
<link href="fonts.css" rel="stylesheet" type="text/css" media="all" />
</head>
<body>
<div id="wrapper">
    <div id="header" class="container">
        <div id="logo">
            </div>
            <div id="menu"><font size="3"><h1>Mother Theresa Institute of Engineering and
Technology</h1>
            </font></div><br>
<div id="wrapper">
```

```
<div id="header" class="container">
    <div id="logo">
        </div>
    <div id="menu">
        <ul>
<li><u><b><font size=4><a href="Login_v1\studentlog.php">Student</a></li>
<li><u><a href="Login_v1\employeeelog.php">Employee</a></li>
<li><u><a href="Login_v1\templated-privy1\regi\others.php">Others</a></li>
<li><u><a href="Login_v1\adminlog.php">Admin</a></li></b>
        </ul>
    </div>
</div>
<div id="banner">&nbsp;</div>&nbsp;</div>
</body>
</html>
```

V. RESULTS



Figure: Home page for Monitoring Bus Management System using GPS.



Figure: Login page for Admin in Monitoring Bus Management System using GPS.



Figure: Profile for Admin in Monitoring Bus Management System using GPS.



Figure: Login for Student in Monitoring Bus Management System using GPS.



Figure: Employee login for Monitoring Bus Management System using GPS.



Figure: Others form in Monitoring Bus Management System using GPS.

VI. CONCLUSION

Here we declare that the project is useful for the students, faculty members those who travel in the college buses. The parents can also know the bus details of their children who use college transport. The students and the faculty members can know the location of the buses through GPS system where it shows the location of the buses. Parents can only track the bus location by filling a form with correct details and they doesn't have any registration to track the buses. They can use

this website for knowing daily updates of buses. So, this project is useful to know the details of each and every bus and location of those buses.

VII. REFERENCES

1. C. Rizos, College Transport Management System.
2. "Advanced Transportation Management Technologies-Transit Management system."
3. J. Smith and A. Ruffle, The Transport Asset Management System.
4. Templated-crosswalk1/index.html.

BIOGRAPHIES



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