

# Review on School Management System

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## ABSTRACT

*Our team created the School Management Application specially for students to make managing the everyday work of the institute and the smooth operation of the school administration. Software for school management is used for management, administration, and learning activities in colleges and schools. managing the timetable, exams, class tests, attendance, money collecting, and finances for the students and the staff.*

*Your broad phrases must be any phrase that can be used to categories the given material properly, such as algorithms, security, or pattern recognition. It is difficult to keep information about students, faculty, and parents on paper in the present school management system. When someone tries to get any of the stored information, it becomes a complex and time-consuming operation due to the large amount of information. While parents and teachers now have more responsibilities than only looking after students, it may be challenging for them to keep an eye on them. While the task of storing and retrieving*

*information is challenging, it also calls for a large number of extra workers.[2]*

## Keywords

Admission, Library, Attendance, Bus Tracking, Fees report, Live classroom, Dynamic report, education system etc. [3]

## 1 INTRODUCTION

Information technology is critical to the growth of every nation's educational system. Accessing to educational information is made very simple and quick with the use of information and communication technologies. The communication network in many colleges and universities has become much more powerful thanks to ongoing technological developments. Today, nothing is ignored or missing, resulting in historic levels of fulfillment among parents, teachers, students, and supervisors. There is no requirement that professors give mountains of pamphlets to dozens or hundreds of students. These methods were combined with technology in the sixteenth century, following the Industrial Revolution, to make the procedure more powerful and successful. Institutions started using technology in education in the 19th and 20th centuries. Currently, the dominant source of the potent technologies used in educational institutions all over the world is information and communication technology. In this information age, it appears that many companies could benefit from

incentives to improve services thanks to rapid advancements in technology. Several significant factors, such as the ongoing development of information technology, information interchange, increased community expectations, management of modern perceptions and applications cause organizations around the world to develop new applications for survival. In order to address the needs of rural teachers in terms of creating, building, and maintaining school-based resources, a system for overall administration of school-based resources was designed. It can be used to systematically plan and manage a lot of school-based resources so that teachers in rural areas can quickly and simply look for what they need. Also, the system has the ability to link many teaching resources and create standardized teaching resources, such as websites and network courses. [4]

## 2 Literature Review

Automation of school administration tasks is the main focus of school management in the initial stage of technology in school information systems. The technology is now being used by school administrators to develop information systems in the daily administrative workforce, which is continuously growing. The usage of information systems is generally justified by increased productivity through information processing, improved management efficiency as a result of fulfilling information needs, and improved performance in competitions as a result of strategic planning. Through the processing of information, school information management systems aim to assist administrative and educational tasks for school officials. Definition of school management information systems as "management information systems designed to fit the structure, administrative function, educational procedures, and special demands of the school." Information systems support innovations as well as information processing. Thus, school management information systems help the school's environmental flexibility. It allows the school to specify and understand the distribution of both internal and external information. As a result, school administration serves the needs and desires of both internal (teachers and students) and external (other

stakeholders) members. oversees the timely and proper scheduling of all school events. [5,7]

## 3 Research Methodology

The goal of the research is to locate the information communication technology infrastructure that is already in place in the schools for the implementation of the information management system. The describing research was carried out in preparation for management information system installation at schools. Primary and secondary schools in Hyderabad division were the subject of the investigation. The study's respondents included both public and private schools. Data gathering involved the use of a questionnaire. The first section of the questionnaire asks for demographic data about the respondents. The second section of the questionnaire asks about technological resources that can be used to create an information system and managers' and principals' preferences. The majority of the items in a question are of the liker scale, which ranges from strongly agree to neutral to strongly disagree. Managers and principals of the schools who are employed as administrators made up the study's population. This system can combine all the media content into the systematic resources, such a whole web-based course for a school or a theme website. Rural teachers should develop an effective web course instructional design before beginning this activity, upload the media resources into the resource library, and then start developing the web course. [8]

## 4 System requirements

### 4.1 Hardware Requirements

Name of component	Specification
Operating System	Windows 98, Windows XP, Windows7, Linux
Language	Java 2 Runtime Environment
Database	MySQL Server
Browser	Any of Mozilla, Opera, Chrome etc
Web Server	Tomcat 7
Software Development Kit	Java JDK 1.7 or Above
Scripting Language Enable	JSP (Java Server Pages)
Database JDBC Driver	MySQL Jconnector

### 4.2 Software Requirements

- Front-end: AngularJS
- Back-end: Java, Spring boot, MySQL

## 5 Architecture

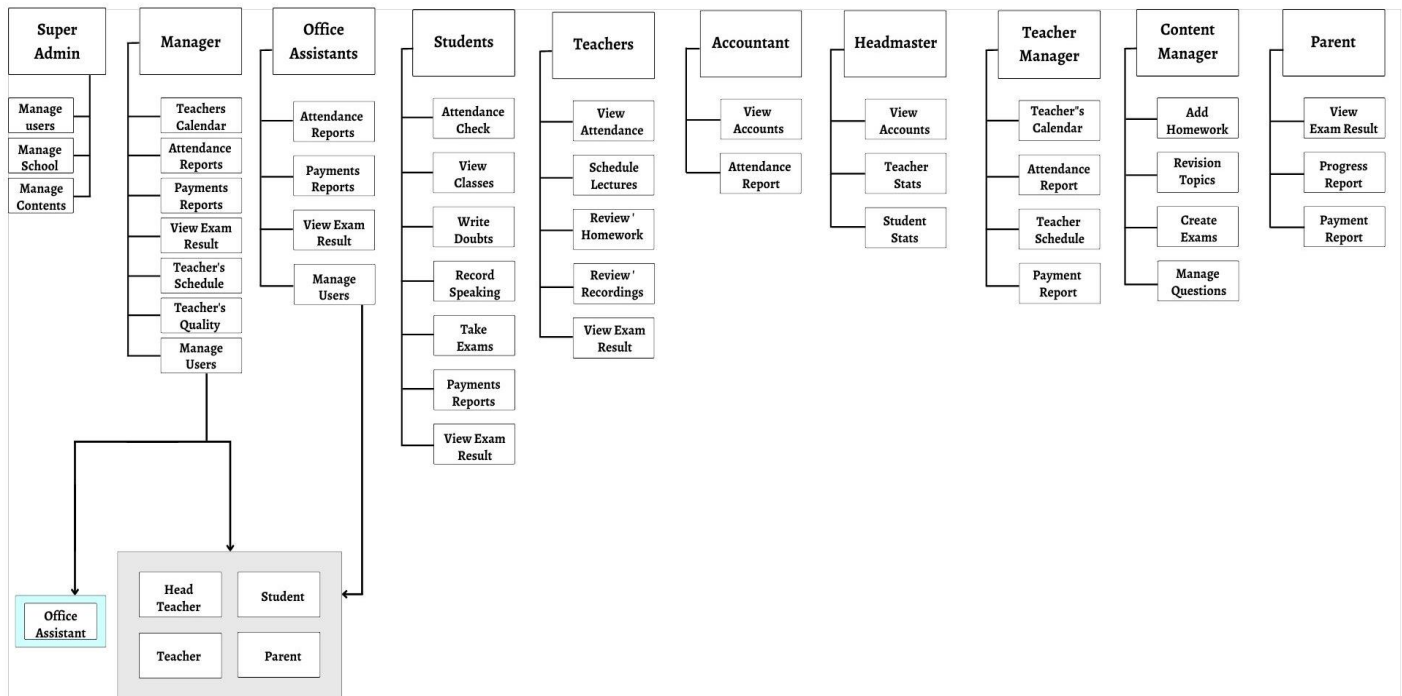


Fig 1: Architecture of School Management System

## 6 DETAILED FUNCTION DESIGN OF KEY SUBSYSTEMS

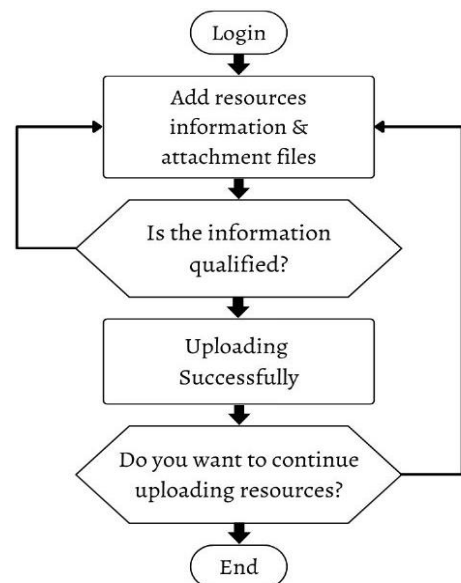
Two important components of the system are the Resource management system and the Resource developing management system. The main task in finishing the entire system is to understand how the two sections function. The detailed function design of the two sections will then be covered.

### 1. The Resource management system:

This system has the function of the resource categories management, uploading resources, approving resources, searching resources, browsing resources and downloading resources. The resource categories management. In order to make the resource management in a rational and sequential manner and improve the efficiency of searching the resources, we first make categorization of the different resources.

### 2. Resource developing management system:

Resource management is the practice of planning, scheduling, and allocating people, money, and technology to a project or program. In essence, it is the process of allocating resources to achieve the greatest organizational value.



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## 8 REFERENCES

- [1] Quintero, M. O'neate Lopez, J., Rua, J. et al. - "Intelligent erratic driving diagnosis based on artificial neural networks". In: ANDESCON 2010, IEEE, pp. 1–6 ,2010
- [2] Fahmi, A. (2019). Polarisasi Manajemen Strategik Pendidikan Dalam Implementasi Full Day School. Jurnal Visionary: Penelitian dan Pengembangan dibidang Administrasi Pendidikan, 4
- [3] A. Ferguson, September 29, 2016, City News (Toronto), "Exclusive: Toddler dropped off at wrong school bus stop, found by stranger". [Online]. Available: <https://toronto.citynews.ca/2016/09/29/exclusive-toddler-dropped-off-wrong-school1bus-stop-found-stranger/>. [Accessed: 23- Mar-2019].
- [4] Ismail, I. (2016). Character education based on religious values: an Islamic perspective. Ta'dib: Jurnal Pendidikan Islam, 21(1), 41-58.
- [5] S. C. Savitha, S. Natya, and J. Parinitha, "Smart College Bus Tracking Management System and its Application" International Journal of Emerging Technologies and Engineering (IJETE), Volume 1, Issue 5, pp 142-147, June 2014. [Online]. Available: <http://www.ijete.org/wp-content/uploads/2014/06/140158.pdf>. [Accessed: 23-Mar12019].
- [6] S. Sangeetha, S. Krishnapriya, Ms. S Janani, "School Bus Tracking and Security System" International Journal of Advance Research in Science and Engineering (IJARSE), Volume No.07, Special Issue No (02), pp 218-227, March 2018. [Online]. Available: [http://www.ijarse.com/images/fullpdf/1521550705\\_DACE2041ijarse.pdf](http://www.ijarse.com/images/fullpdf/1521550705_DACE2041ijarse.pdf). [Accessed: 10- August-2019].
- [7] M. Norwood, October 30th, 2018, ABC11 Eyewitness News, "Fayetteville child found shivering inside wrong school bus". [Online]. Available: <https://abc11.com/fayetteville-child-found-shivering-inside-wrong-school1bus/4577211/>. [Accessed: 23-Mar 2019].
- [8] B. Abdul-Kadern, "Three-year-old girl dies in Abu Dhabi school bus", Gulf News, October 07, 2014. [Online]. Available: <http://gulfnews.com/news/uae/crime/girl-4-dies-in-school-bus-in-abu-dhabi11.1395617>. [Accessed: 23-Mar-2019].
- [9] Olarte-Ulherr, October 10, 2014, Khaleej Times, "Abu Dhabi school bus tragedy: Family still in shock". [Online]. Available: <http://www.khaleejtimes.com/nation/crime/abu-dhabi-school-bus-tragedy-family1still-in-shock>. [Accessed: 23- Mar-2019].
- [10] Visscher, A.J.; Bloemen, P.P.M. (1999). Evaluation of the use of computer assisted management information systems in Dutch schools. Journal of Research on Computing in Education, 32 (1), 172-188.
- [11] Maya, R. (2017). Analisa Kebijakan Publik Konversi IAIN Menjadi UIN. Edukasi Islami: Jurnal Pendidikan Islam, 3(05).
- [12] Primarni, A. (2016). Pendidikan holistic: format baru pendidikan Islam membentuk karakter primperan. Al Mawardi Prima.
- [13] Sari, W. I., Aliman, A., & Djuwita, P. (2017). Strategi Kepala Sekolah dalam Meningkatkan Disiplin Guru. Manajer Pendidikan, 11(3).
- [14] Subaidi, S. (2014). Konsep Pendidikan Islam dengan Paradigma Humanis. Tarbawi: Jurnal Pendidikan Islam, 11(2).
- [15] Umam, M. K. (2017). Analisis Lingkungan Strategik Dalam Corak Penyelenggaraan Pendidikan Islam. Al-Hikmah: Jurnal Kependidikan Dan Syariah, 5(1).

