**HOSPITAL MANAGEMENT SYSTEM**

**SYNOPSIS**

The hospital management system (HMS) is integrated software that handles different directions of hospital workflows.

The hospital system software covers the services that unify and simplify the work of healthcare professionals as well as their interactions with patients.

The main purpose of our system is to make hospital tasks easy and is to develop software that replaces the manual hospital system with an automated healthcare management system.

The main objectives of a Hospital Management System are:

* Design a system for better patient care.
* Reduce hospital operating costs.
* Provide an MIS (Management Information System) report on demand to management for better decision-making.
* Better coordination among the different departments.
* Provide top management with a single point of control.
* Refined Appointment registration
* Room system
* Room billing service

**Project Category:** RDBMS

**Tools/Platform, Hardware, and Software Requirement specifications:**

* Frontend: Java
* Backend: MySQL
* Operating System – Windows 10, Windows 7, Windows 8, Windows XP, Linux, and Mac OS

**Hardware Requirements:**

* Processor: Pentium III 630MHz
* RAM: 1 GB
* Hard Disk: 25 MB
* Monitor: 15” Color Monitor
* Keyboard: 122 Keys

**Systems Introduction**

1. **Brief Description of the System under Study**: We have made a system where doctors, pharmacists, receptionists, and admin can store various information in the hospital’s database and make information easy to access, it can make appointments, also keeping a record of the appointment, handling billing and other hospital-related queries.
2. **About the proposed System:**

Our aim is to help hospitals in managing the records of patients, doctors, and any other paperwork, by storing it in a digital database.

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1. **The methodology used for Analysis, Design & Development:** We used waterfall models for the design of our project.

Software Development Life Cycle (SDLC) is a process used by the software industry to design, develop, and test high-quality software. The SDLC aims to produce high-quality software that meets or exceeds customer expectations, reaches completion within times and cost estimates.

We used the iterative waterfall model for the design of our project

The iterative Waterfall Model is the extension of the Waterfall model. This model is almost the same as the waterfall model except some modifications are made to improve the performance of the software development. The iterative waterfall model provides customer's feedback paths from each phase to its previous phases.

The iterative waterfall model provides feedback paths from every phase to its preceding phases, which is the main difference from the classical waterfall model.

1. **The methodology used for Data Collection:**

To carry out systems analysis and establish userrequirements students can use either **primary data** (through a questionnaire, interview, or observation) or **secondary data** (through document analysis or published data), or both.

We used the secondary data of analyzing published data from hospital online sites and various online content.

1. **System Requirement Tools:**

* Frontend: Java
* Backend: MySQL
* Operating System – Windows 10, Windows 7, Windows 8, Windows XP, Linux, Mac OS

1. **Project Planning:**

Table 1.1(Gantt chart)

|  |  |  |
| --- | --- | --- |
| Task | Start Date | Days to Complete |
| Planning and Requirement Analysis | 01-03-2021 | 7 |
| Defining | 07-03-2021 | 9 |
| Designing | 16-03-2021 | 26 |
| Developing | 11-04-2021 | 25 |
| Testing | 06-05-2021 | 16 |

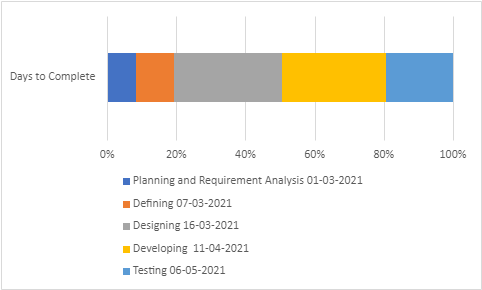


Fig 1.1(Gantt chart)

**Summary and Conclusions**

This hospital management system is occupied with a user-friendly interface, and software for completing the process at the backend. For this system, the software helps to maintain records easily and efficiently. The system is user-friendly and easy to handle. Not much time is needed to study and understand it.

The admin creates users, services, and rooms, he manages all the users also what services to be provided, and also how many rooms there are in their category i.e General and Duplex. The Registration of patients and Doctors is very simple which is done by a receptionist. The adding of medicine, its price, and its sales report are maintained by the pharmacist. The doctor can view and track his appointment very easily.

The system was introduced to reduce the labor of paperwork and to have efficiency in maintaining records and require less space to manage.

The Hospital Management System (HMS) is computerizing the working of a Hospital. It is a great improvement from the manual system. The computerization of the system has sped up the hospital process. In the current system, the front office management is very slow. The software takes care of all the requirements of an average hospital and is capable of providing easy and effective storage of information related to patients that come up in the hospital.

It generates bills and also provides a facility for making appointments. Implementation of hospital management system projects helps to store all the kinds of records, provide coordination and user communication, implement policies, improve day-to-day operations, arrange the supply chain, manage financial and human resources, and market hospital services.