

A comprehensive Hospital And Patient Database Management system

Summary

Hospitals are an essential part of our lives, providing best medical facilities to people suffering from various ailments which may be due to change in climatic conditions, increased workloads, emotional trauma- stress etc. It is necessary for the hospitals to keep track of its day to day activities and records of its patients, doctors, nurses.

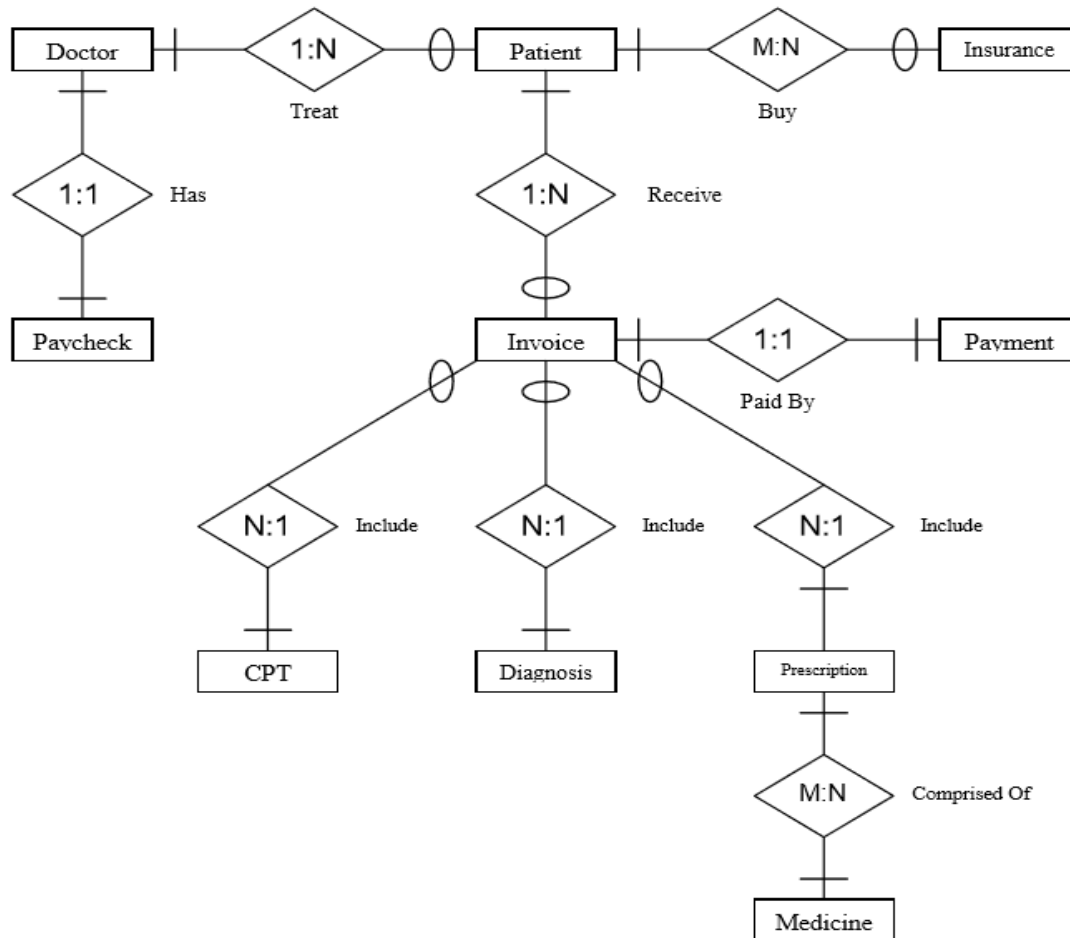
Currently, different departments in the healthcare center have their own separated systems leading to the lack of communications and the inefficient data sharing. For example, the finance department uses simple EXCEL spreadsheets to record the paycheck information of the employees which is inconvenient to retrieve and update employees' information; in the clinic department, the doctors have to write down the prescriptions for the patients and keep paper documents, and also do not have any information about the patients' insurance plans; the medicine department has to keep the prescription and inventory records on their own computer system. Keeping track of all the activities and their records on paper is very cumbersome and also an error. Prone process. While each system serves a distinctive purpose, there is no coordinating, assimilating and representing of data. The systems may have duplicate data which is a waste of space. The different systems also may have different application programs which cause incompatible files.

Due to these disadvantages of the current system, a healthcare management system is proposed. Healthcare management system is a database management system (DBMS), which is based on computer networks, using the advanced database technology to construct, maintain, and manipulate various kinds of data in a database system (DBS). The main aim of this project is to provide a paperless hospital and provide excellent data security at every level of user system interaction considering healthcare data being extremely confidential. Data Contained in the system:

Entity Attributes

Doctor - (D_Name, D_Ssn, Gender, Age, Position, Phone, Address, Office, City, Zip)	Patient – (P_Name, P_Ssn, Gender, Age, Position, Phone, Address, Office, City, Zip)
Paycheck - (Chk_Num, Salary, Bonus, Pay_Date)	Insurance- (InsCo_Id, InsCo_Name, Category, Phone, Address, City, Zip)
Invoice- (Invoice_Num, Amount, Invoice_Date, Due_Date)	Payment – (Invoice_Num, PayTrans_Num, Pay_Method, Pay_Status, Paid_Date)
CPT- (CPT_Id, Category)// Current Procedural Terminology (CPT) is a medical code set that is used to report medical, surgical, and diagnostic procedures and services to entities such as physicians, health insurance companies and accreditation organizations.	Diagnosis – (Diagnosis_Id, Category)
Prescription- (Prescription_Id, Medicine_Quantity)	Medicine - (MInventory_Id, M_Name, Manufacturer, Price, Quantity, Exp_Date)

Preliminary ER Diagram:



As we navigate through the project, few updates/ deletions to the above may be performed. PT : 'With basic healthcare functions we can combine tracking treatment results and maybe make a little better version of projects available online.

http://www.databaseanswers.org/data_models/tracking_results_of_treatment/index.htm

http://www.databaseanswers.org/data_models/patient_care/index.htm

List of Deadlines:

Project Contents	Tentative Deadlines	Responsibility
Technical and Logical aspects of database model	20 Sept-18	Varsha Sharma
Table creations with primary and foreign keys involved	6 th Oct 18	Shruti Sridharan
Normalization, query execution and Performance and Tuning	25 Oct 18	Palak Tater