

# [Dental records and income monitoring system](https://assignbuster.com/dental-records-and-income-monitoring-system/)

[](https://assignbuster.com/)[Technology](https://assignbuster.com/essay-subjects/technology/), [Computer](https://assignbuster.com/essay-subjects/technology/computer/)

Companies suffer from file-based management system in handling information. Secretaries or person-in-charge who manipulates records manually aren’t assured that each record is properly monitored, due to work loads. It was May 21, 2001, when Dr. Torres an associate dentist opens his own dental clinic with Mrs. Miranda as his personal assistant. As the process of the clinic goes, from ‘ walk-in’ patients they also have appointments. Today, they are now accepting (H. M. O-patient with company accreditation).

Complexity of records turns out as the problem of their clinic, as well as keeping records properly and secure. The existing system deals with problems that needed to be carried out from the management such as the difficulty in accessing data, problems in updating records, data redundancy and the integrity problem with regards on the stored data and its security. Statement of the Problem Proper record managing is a big work upon having a file-based system. First thing to consider is the data accuracy which is the main goal of managing records then the security, but as it goes problems arises such as: 1.

What is the status of the current system in terms of: 2. 1. Data collection and retrieval? 2. 2. Accessing of specific record? 2. 3. Updating of patient’s information? 2. 4. The security of their patient’s files? 2. 5. Income monitoring? System Design Paradigm Input Process Output Dental Records And Income Monitoring System System Analysis and Design Life Cycle -Patient Information -Reports -Billing Statement -Acquired Services Figure1. System Design Paradigm This illustration shows the basic procedure undertaken in this study.

System Analysis and Design Life Cycle has an important role in the development of the new system to track records of patients. The Dental Record and Income Monitoring System will be developed for the monitoring and managing records of patient’s information and the clinic’s income. Patient’s profile, reports, billing statement and acquired services will be gathered, reviewed, and analyzed through Systems Analysis and Design process. This procedure will result to the development of the Dental Record and Income Monitoring System.

Objectives of the Study Dental Records and Income Monitoring System is proposed to lessen some concern with regards in managing the patient’s records, as well as the income of Dr. Torres Dental Care Center. 1. The said system will be developed having objectives as follows: 1. 1. To provide an accurate data collection and retrieval. 1. 2. To provide an easy access to the records. 1. 3. To provide a more secured patient’s files system. 1. 4. To provide the user an easily updated patient’s information. 1. 3. To generate their income.

Significance of the Study Dental clinics and even other business institutions keep their record as their basis in doing actions and decisions to offer better services. On the other hand, they are also profitable organizations. So the group comes to the idea of Dental Records and Income Monitoring System proposed to D. Torres Dental Care Center. With the study, researchers expect that it will benefit the following: Dentist – The said system will provide the dentist reports that monitor the income of the clinic. Secretary - The proposed ystem will minimize the workload of the secretary upon managing patient’s record as well as the billing transactions. Patients - With the system, patients will be easily accommodated and served for easy schedule and billing transactions. Clinic - The benefit of the clinic is that it can now provide fast and easy process for patient, doctorand the secretary. Other researchers – This will benefit them in their future research with regards in this kind of system. Scope and DelimitationTechnologyhas always been a major means of creating new physical and humanenvironment.

In this case data managing is the prior concern. How data or information will be handled properly and secured. In the proposed system, the patient’s records are computerized and being stored in the database for easy access and accurate retrieval of data which is the main priority of this study. This includes the medical history of the patient, the treatment that should be done and their schedule. There is also an income and service fee computations. Managing of appointments is also included. There is a secure log-in for the dentist and the secretary.

On the other hand, the process of automatic scheduling for patients is not included. Printing of receipt will not also be covered. The diagnosis of the particular treatment that will be given to the patient and the prescription of medicine for each treatment are also not included. Assumptions On the implementation of Dental Records and Income Monitoring System, the D. Torres Dental Care Center can now offer faster and easier services. Regarding of patient’s charges and transactions, payment is easily computed and manipulated, as well as the clinic’s income.

Design Methodology To come up with the design, the proponent has chosen the Iteration Approach as the Software Development Methodology. Figure 2. Iteration Approach The figure shows the System Development Life Cycle that provides a phase approach to analyze, design, and implement a system that could solve the encountered problem by the company. 1. Identifying problems, opportunities and objectives. In this phase the group determines whether the problem exist and has a solution. The group has created a project plan, which will help or serve as a guide in solving the problem.

The researchers also conducted a feasibility study that will determine whether a system is needed. 2. Determining information needed. In this phase, the group analyzes and understands what information the D. Torres Dental Care Center needs in their system. 3. Analyzing system needed. In this stage the researchers prepared the system proposal that summarizes the details that been found, provide cost-benefit analysis of alternatives and make recommendations of what should be done. 4. Designing the recommended system. In this stage the group will work on designing the output that will meet the information needs.

After recommendation and approval, the group will eventually design a database system. 5. Developing and documenting software. The group will provide the original software that is needed. Documentation lets the user know how to use the software and manages the problem occurs. 6. Testing and maintaining the system. Information is not applicable to use unless it is undergoing several test. In this stage, the group will conduct a series of tests to pinpoint the problems. System maintenance includes modification of the system use to changes within the inventory process. . Implementation and evaluating the system. In this stage, the group needs to verify and test the information gathered, train the user to handle the system and install the system. Definition of Terms The D. Torres Dental Care Center has these following terms that they used on their center. Here are the following terms: Braces - an orthodontic appliance consisting or brackets cemented to the surface of each toothand wires of stainless steel or nickel titanium alloy. Braces are used to treat malocclusionby changing the position of the teeth.

Dentist – the one who needed and reads the patients information that is given by the secretary. H. M. O. –HealthMaintenance Organization, an organization that provides medical and dental Oral Prophylaxis - cleaning or polishing of the teeth. Pasta or Restoration – the action or process of restoring. Patient - is the recipient of the information. Retainer Fee - a retainer fee is a fixed amount ofmoneythat a client agrees to pay, in advance, to secure the services of a consultant or freelancer. Retainer - an appliance or device that keeps the tooth or partial denture in proper position.

Root Canal - That aspect of endodontic dealing with the treatment of diseases of the dental pulp, consisting of partial (pulpotomy) or complete (pulpectomy) extirpation of the diseased pulp, cleaning and sterilization of the empty root canal, enlarging and shaping of the canal to receive sealing material, and obturation of the canal with a nonirritating hermetic sealing agent. It is also called pulp canal therapy. Secretary – the one, who gathers the information of the patient, gives it to the dentist and also computes the income of the clinic.

Surgery - is an ancient medical specialty that uses operative manual and instrumental techniques on a patient to investigate and/or treat a pathological condition such as disease or injury, or to help improve bodily function or appearance. Teeth Whitening - the process of using bleach or other materials to make teeth look whiter. The materials remove stains or other discoloration from the tooth surface. Tooth Extraction - (also referred to as exodontia) is the removal of a tooth from the mouth. Tooth Impacted - is a tooth that gets blocked as it is pushing through the gum onto your mouth (erupting).