



CHILDREN'S MEDICAL CENTER MANAGEMENT SYSTEM

Presented to:
Eng. Rowayda Adel

Team Members:
1-Aya Mahmoud Mohamed Mahmoud
2-Amira El-Sayed Mohamed Abdelhamid
3-Naden Mohamed Ali Soliman

Table of contents

➤ **About children's medical center**

➤ **Abstract**

➤ **Problem Definition**

➤ **Problem Statement**

➤ **Advantages**

➤ **Disadvantages**

➤ **Conclusion**

About Children's Medical Center

A children's medical center is a center that offers its services exclusively to infants, children, adolescents, and young adults from birth up to until age 16.

When it comes to health care, kids are different:

Children need health care designed for their unique needs that is delivered by specially trained clinicians in environments designed just for kids.

Children's centers play a central role in advancing the health of all children. From prevention to critical care, children's hospitals meet the health care needs of children 24 hours a day, 365 days a year.

Children's hospitals also provide a disproportionately large share of the nation's health professional's training and research aimed at producing the best possible medical outcomes for kids.



Abstract

Hospitals are one of the most important institutions invaded by information technology, not only in terms of equipment and medical equipment, but in terms of systems and electronic applications to manage these applications and varied according to the nature of the size of the hospital and depending on the problems faced by such as the presence of data in different and unrelated to, save the locations of data in hand, waste of effort and time the doctor happens to brief on all the records of loss and damage, and increase accuracy and make use of the data available to the hospital to get the desired results, keeping medical records from damage and loss and the possibility of retrieval at any time by authorized persons.

The primary objective of the project is to design a system that manages all hospital departments with each other through a link to a single network, which helped in great to get rid of unnecessary operations.

Problem Definition

The Children's Medical Center does not currently rely on a specific work system or specific laws and regulations within the work environment, which leads to many problems as follows:

- The presence of data in different locations that are not linked centrally, which leads to some inconsistencies, differences and repetitions.
- Managing and preserving documents manually (specializations and departments, appointment dates, doctor and patient data, and resulting reports) are dealt with manually, resulting in errors, for example when recording patient data, this is done manually, and then it is saved in the archive of patient records and these procedures increase slow delivery of health services in the center.
- There is a great waste of time and effort of the doctor, as he must see the record of any patient when diagnosing him or when following up on patients' cases.
- The presence of difficulty in searching for patients' files, and thus the difficulty of knowing the patient's previous disease and treatment condition, especially in late health conditions or in the case of chronic diseases.
- Unavailability of backup copies in case the patients' files were damaged and lost.

Problem Statement

- Collecting data of the center in one database, ease of retrieval of data, procedures and amendments to it, in addition to saving data from damage and loss through backup copies and providing protection for them, which leads to the speed and accuracy required in completion of the work.
- Converting all traditional records into electronic records that enable the doctor to access them in all matters related to the medical center, where the first beneficiary of the system is the doctor so that he can follow up his patients in an easy, simplified and more accurate way.
- Electronic medical records provide what is called a medical patient file that contains All patient information from the beginning of the initial examinations to the therapeutic data and history.
- The system provides healthcare providers with complete scheduling of their daily work and patient appointments they have.
- Update and standardize the forms used in the patient's file.

Advantages

The System can

- 1 Improve health care delivery by providing medical personnel with better data access, faster data retrieval, higher quality data, and more versatility in data display.
- 2 Decrease the amount of time spent doing paperwork that increase work efficiency by reducing costs and improving staff productivity.
- 3 Help reduce mortality rates among children by reviewing a monthly or annual report of patient generated from this system.

Disadvantages

1 Expensive and Requires time to adapt fast.

2 Over-dependency on technology

While once the staff has adapted to the new way of work, there comes the next problem. It is not uncommon for a computer system to face technical errors. The health care informatics system is no exception. This problem is especially crucial in the Accident & Emergency (A&E) Department. Various departments in the hospital are interconnected by a common information system. When 1 department is down, others are affected. For example, a patient was rushed into the A&E Department. When there is an error while retrieving blood analysis information, the rest of the procedures following it will be delayed. This will cause huge inconveniences, or worse; it may even have adverse effects in the patient's health condition.

3 Susceptibility to network hackers

Patients' medical history and other health information should be kept confidential for ethical and legal reasons. While the health care system network is definitely equipped with security measures, it is not impossible for network hacking to occur. Hence, this is certainly a vulnerability of Health Informatics.

Conclusion

Children's Medical Center is pediatric care hospital. The hospital provides comprehensive pediatric specialties and subspecialties to infants, children, teens, and young adults aged 0–16 years.

Children's Medical Center Information System is a comprehensive, integrated information system designed to manage all the aspects of a hospital's operation, such as medical, administrative, financial, and legal issues and the corresponding processing of services.

The system enhances the ability of health care professionals to coordinate care by providing a patient's health information and visit history at the place and time that it is needed.

The ultimate goal of this project is to design an app to manage children's health records and control all center operations .

More questions about Presentation?

THANK YOU!