

PATIENT INFORMATION  
SYSTEM IN THE  
MEDICAL INDUSTRY

Project report submitted by  
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## INTRODUCTION

As it is denoted by the title, this project is related with the development of an Information System that could be used in the medical industry.

Ofcourse, the title is very general as there is a very wide range of different areas in the medical industry which could be examined. So, at the initial stage of the project, there was a problem of finding a specific medical area on which to base the project. This problem was solved by deciding to develop a specific project for a department of the General Hospital of Nicosia. More specifically, there was an expressed need for a computerized Information System for the Othopaedic Department of the hospital. This was the base for my project, which was developed based on the specifications derived from the conducts i had with the doctors of the department.

The development of the system was carried out using standard System Analysis methods. This included partitioning the development of the system into different phases and different activities within each different phase.

The first phase of the system, was the Investigation phase. During this phase, the actual specifications of the users were identified and evaluated. Using the method of the Interview, all related information was gathered and the objectives of the new system were defined. Also, during this phase, a feasibility study was carried out to give a rough image of the expected costs for the development of the new system, and also, present the potential benefits from the new system.

The second phase of the system, was the Analysis and Design phase. All information collected in the previous phase, served as input for this one. During this phase, the design of the new system was performed. Data records were formed, Data Stores specified, Inputs and Outputs specified and designed, main processes were also designed and generally, the most "heavy" work in system development, was done during this time.

Implementation was the phase to follow. In this phase, the work done in the previous phase was converted into actual computer terms. In other words, all the computer oriented work, was done during this phase. Data files were created, structure charts were prepared and software modules were designed and coded. Finally, all the developed software modules were linked together to form the program for the Patient Information System. Testing was then performed, in order to locate as many hidden errors as possible and correct them. It is important to note that this phase was the most time consuming of all phases.

The last phase, which was also the shortest one, was the Installation. During this phase, the developed software system was installed and tested on existing hardware. Also, some recommendations were given for using the system in a LAN environment.

At the end of this project, some diagrams are presented as appendices and also, a glossary is included to explain all technical terms used. Also, a table with symbols is given, to explain the use of different symbols in the project.

TABLE I

TABLE I

# C O N T E N T S

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PAGE

INTRODUCTION ..... 1

## PHASE I : INVESTIGATION

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.A. INITIAL INVESTIGATION ..... 3

.1. Introduction ..... 3

.2. Objectives ..... 3

.3. Information Gathering ..... 5

.B. FEASIBILITY STUDY ..... 9

.a. TECHNICAL FEASIBILITY ..... 9

.1. Hardware ..... 9

.2. Software ..... 11

.3. Media ..... 11

.4. Other ..... 11

.b. COSTS/BENEFITS ANALYSIS ..... 13

.1. Costs ..... 13

.2. Benefits ..... 14

.C. CONCLUSIONS/RECOMMENDATIONS ..... 16

## PHASE II : ANALYSIS & DESIGN

---

Introduction ..... 17

Normalization ..... 18

Data Access Diagram ..... 20

Zero Data Flow Diagram ..... 21

Data Element Forms ..... 22

Data Store Forms ..... 26

Record Layouts ..... 35

Input Forms .....	44
Input Screens .....	52
Output Forms .....	56
Outputs Rough Layouts .....	62
Process Forms .....	66
System Flowcharts .....	73

**PHASE III : IMPLEMENTATION**

---

.1. INTRODUCTION .....	77
.2. METHODS AND TOOLS FOR SOFTWARE DESIGN .....	77
.3. TESTING .....	78

**PHASE IV : INSTALLATION**

---

.1. SW & HW CONFIGURATION .....	80
.2. NETWORK CONSIDERATIONS .....	81
.1. Introduction .....	81
.2. Exclusive usage of files and records .....	81
.3. Users responsibilities .....	83

GLOSSARY .....	84
----------------	----

---

APPENDIX .....	89
----------------	----

---

.1. Suggested HW configuration diagram .....	89
.2. Local Area Network configuration diagram .....	90
.3. Control flow structure chart .....	91
.4. Sample structure chart .....	92

SYMBOLS TABLE .....	93
---------------------	----

---

REFERENCES .....	95
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