# **DEVELOPING TIME AND ATTENDANCE SYSTEM**

(TAS)

A dissertation submitted to the College of Art and Science in partial fulfillment of the requirement for the degree

Master of Science (Information Technology)

Universiti Utara Malaysia

By

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# **ABSTRACT**

Time Attendance System is software that helps organization for registering and tracking employee attendance, it can integrate with existing payroll and human resource systems, as well as various collection devices.

This system consists of three major parts. The first is the employee, through which they can record their attendance either in manually through timekeeper or automatically through special hardware device such as card reader. The second is timekeeper who is responsible for recording employee's attendance manually. The last is the administrator, the administrator may add, remove, search, view employee information or designation information and more.

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### **CHAPTER ONE**

### INTRODUCTION

Previously the work procedures in many organizations were done by paperwork, which may cause many faults and inaccuracy, and this made gap between the manager or administrator and employee and customer (Harold, 2000).

After the revolution and the growth of the technology, The dependent on computers has become a base factor for any successful business, by the spread of the computer applications and the wide usage of these application by the organizations, many innovative ideas rise to find flexible systems that were developed to provide better results and can be used by many organizations.

The system which developer is trying to build is the time attendance system for employee monitoring. This system will have a high flexibility by its ability to work in any organization that may need to use such system for example: use this system in hospitals, hotels or companies and any organizations that have large or small number of employees. Furthermore, such systems are not available in many parts of Jordan.

Time Attendance System is software that helps organization for registering and tracking employee attendance. This system software eliminates paperwork and saves employees time calculation, validation, and re-keying payroll information. It may be integrated with existing payroll and human resource systems, as well as various

# The contents of the thesis is for internal user only

Jordan one of the countries that suffer from this problem because of the diminution of applying this system in their organizations and institutions especially the organizations that stand out side of the capital Amman, because recording the entrance and exit processes spend a lot of time which pushed us to develop this system to serve and try to solve their problems.

Through our search, the searcher found that this system divides into two main parts which are software and hardware part. Some techniques need the two parts together as in our system which depends on the software and the reader. What searcher is seeking for in this work is to introduce a preferred solution through three models (requirement, analysis and design model).

Also, the developer tried to introduce an easy design for its users. The analysis and design of this system considered as a prototype which can be reused for any new analysis or design of any system such our system. The developer walked through a sequence form started from the requirement model and finished with the implementation and testing model passing through the analysis and designing processes.

### 7.2 Future work

Time attendance system has the ability and several chances for future improvements and updating, so it can be connected with other systems within the organization such as connecting it with financial system or payroll system. That because of its ability for providing the financial system with latency hours for each employee, then the

financial system utilizes from the given information's to cut a piece of that employee salary based on the provided reports.

The connections of the time attendance system with other organization systems like financial system will improve the administration system from saving the time till follows the employees attendance, and finally in calculating the extra work hours for each employee, this on the technical part while in the design part, I will try to make future designs that should be more attractive and compatible with control and input systems.

Finally, this system works based on the use of card reader or manually, and I will test this system by connect it with other devices such as digital clock or finger print device and I will make some analysis on the way that each one works.

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