

# Chapter I INTRODUCTION

## I.1 Background

The company's strategy to improve performance and efficient supply chains has forced them to find ways to improve their operational performance by adopting information technology (Ali and Cullinane 2014). Implementation of information technology in organizations will provide benefits in the form of time efficiency, increase flexibility, and accessibility (Feller et al. 2008). Implementation of information technology not only affects technical matters but also influences user behavior or habits. However, if the information technology that is applied does not fit the needs and readiness of the company, then that will also be a business obstacle (Tarhini et al. 2016). In this case, Enterprise Resource Planning (ERP) is used. Enterprise Resource Planning (ERP) increases operational efficiency by integrating various activities throughout the organization so as to facilitate the flow of information. Because of its effective role, there are more than 200 ERP system providers in the industry to meet organizational needs. This growth may be due to an increase and the need for greater visibility into business functions (Rajan and Baral 2015).

Some large companies that provide this system include SAP, Oracle, Microsoft, Odoo, etc. The ERP system provider company provides a broad ERP answer for its clients at a very significant cost that is, they have an exclusive ERP programming bundle with them that they customize based on client requirements. The system that was anticipated to advance the company's operational implementation turned out to face various obstacles in preparation for use. In an overview by Deloitte Counseling of 64 companies listed in the Fortune 500, 25% of the companies reviewed stated that they had experienced a sharp decline in implementation in the period after usage (AMR Research 2011).

Companies in Indonesia have begun implementing an ERP framework with the aim of accelerating business processes, increasing efficiency, and reaping greater revenues and speeding up the company's administrative processes. Not only large companies, medium and small companies began implementing ERP systems (Zeplin Jiwa Husada Tarigan 2009).

According to (Amoako-Gyampah and Salam 2004) users will adopt the system if they have the perception that the system used will improve their performance. Information systems will have a positive impact on individual performance if the system can work in accordance with user duties (Ying 2012). Research on the relationship between information system usage and user performance results in various conclusions. For example, (Venkatesh and Davis 2000) concluded that there was a positive relationship between the use of information systems with user performance, while (Bani-Hani, Al-Ahmad, and Alnajjar 2009) conclude that there is no relationship at all between individual performance with the use of information systems. Like companies that have received ERP frameworks recently, companies in Indonesia also experience involvement issues both in the implementation and after implementation of the ERP framework. A general decline in execution occurs in the middle of the ERP execution handle. After preparing for the use of ERP, the company also faces an adjustment problem from end users (Kocakulah and Willett 2003).

Other disappointments can be within the frame of specialized or non-technical components. Specialized problems that cause disappointment within the form of breaking down ERP equipment or computer program that is utilized such as equipment components are damaged, or the computer program crashes. Non-technical components, as a rule, include HR involved within the utilize of ERP frameworks. Lacking Preparing may be a need of preparing within the utilize of ERP frameworks, either staff or communities that use ERP frameworks and Corporate Culture, to be specific culture in companies that encounter framework changes, so there will be a period of alteration to new frameworks which will take a long time and will be in struggle with the consolation zone where in the event that feel comfortable with the ancient culture it will be troublesome to form changes and alterations to the unused culture (Barton and Tobin 2001).

In its application, ERP has the benefits and risks of failure during and after implementation. According to (Falgenti and Pahlevi 2013) many organizations are interested in evaluating due to uncertainty about the actual value of their investment. Many companies conduct evaluations to find out the success or failure factors after the ERP system is implemented. This was done because seeing from

the budget costs incurred to implement the ERP system is very large also for the future the information technology budget will continue to increase. ERP implementation in the company must be customized according to need respective companies. ERP implementation is very complex due to many factors internal and external involved in the implementation process (Ahmad and Cuenca 2013).

This research will raise the topic of problems at PT Bio Farma. Bio Farma is a company engaged in manufacturing and is the only BUMN in Indonesia that manufactures vaccines and antisera. Bio Farma began implementing an ERP system in 2014. Previously, each division had its own application whose function was to complete work in the related division. ERP implementation is expected to integrate all business processes and facilitate data and information flow so that work becomes more effective and efficient. Bio Farma implements an ERP system using the Microsoft Dynamic AX 2012 application. Currently, there are 250 total users who have used the Microsoft Dynamic AX application at Bio Farma. But in this study, the author only examined 3 divisions namely Accounting, Procurement, and Sales. Because these 3 divisions are divisions that have used ERP with the most users and with more or less the same functions.

To find out whether the ERP system that has been implemented at Bio Farma for more or less 5 years has been well received by employees or not, the analysis was carried out using Theory of Planned Behavior (TPB). TPB was chosen because it can determine user acceptance based on its psychological side through unconscious attitudes and behaviors. This is important to know because user acceptance of a system will also affect employee performance and productivity because almost all work is done through the Microsoft Dynamic AX application. From the background above, the authors conducted a study with the title **“User Acceptance Analysis of Enterprise Resource Planning by Using Theory of Planned Behavior for PT Bio Farma”**

## **I.2 Problem Formulation**

Based on the background explanation above, several problems can be formulated, namely:

1. How to analyze user acceptance of the Microsoft Dynamic AX application system at PT. Bio Farma using the Theory of Planned Behaviour (TPB) model?
2. How are the results of the analysis of user acceptance of Microsoft Dynamic AX application systems at PT. Bio Farma based on the Theory of Planned Behaviour (TPB) model?

### **I.3 Research Objectives**

The purpose of this research is:

1. To know the results of the analysis of user acceptance of the Microsoft Dynamic AX application system at PT Bio Farma using the Theory of Planned Behavior (TPB) model.
2. To provide recommendations from the results of evaluations conducted at PT Bio Farma.

### **I.4 Limitation of Research**

Obtained of the problem, while restrictions of scope are as follows:

1. This study only analyzes the factors that support success ERP systems are based on variables in the Theory of Planned Behaviour (TPB) Model.
2. The study was conducted at PT Bio Farma and only focus on employees who use the ERP system.
3. This study only focuses on analyzing respondents' assessments of ERP system.
4. The data used in this study only uses results interviews and questionnaires.
5. This research was conducted only up to the analysis stage, not until the customization stage.

### **I.5 Research Benefits**

The benefits of this research are as follows:

1. As a reference to analyze the success rate of ERP implementation at company.
2. The company will focus more on critical factors determining success so that ERP implementation in the company is successful and more optimal.
3. As an evaluation material to the company on how to use ERP implementation.

## **I.6 Research Systematics**

### **CHAPTER I INTRODUCTION**

This chapter discusses general research which is made such as a general description of research objects, background, problem formulation, research objectives, research, and benefits of research.

### **CHAPTER II LITERATURE REVIEW**

This chapter discusses the theories used by researchers in this study. Theories used such as published research as a reference in making thought, company profile, Enterprise Resource Planning, Microsoft Dynamics AX, TPB Model, SPSS software, SmartPLS software, SEM, and PLS.

### **CHAPTER III RESEARCH METHODOLOGY**

This chapter explains the initial implementation of research from the stages carried out during the study, research implementation, and conceptual methods.

### **CHAPTER IV RESULTS OF RESEARCH**

This chapter contains the results of data collecting, in this case in the form of questionnaire.

### **CHAPTER V ANALYSIS AND DISCUSSION**

This chapter explains the discussion of the problems that have been formulated and the results of research that has been done.

### **CHAPTER VI CONCLUSION AND RECOMMENDATION**

This chapter contains the conclusion and result of final research and suggestions provided for improvement and sequent research.