CHAPTER I INTRODUCTION

I.1   Background

Customer Relationship Management (CRM) as a strategy and technology has gone through a remarkable evolution of the journey. After the initial technological approach, this process has matured quite a bit – both from a conceptual and application point of view. By all means, this evolution continues, especially given the digital transformation. Nowadays, CRM refers to strategies, sets of tactics, and technologies that have become indispensable in the modern economy (Kumar & Reinartz, 2018). The CRM role focuses on improving a company's ability to understand current customer needs, what they have done in the past, and what they plan to do in the future to meet their own objectives. The goal is to improve the customer experience of how they interact with the company, which is expected to create more satisfaction thus generating more loyalty which ideally results in more sales of products and services (Xu et al., 2002).

CRM has changed the way companies handle customer queries, advertising and sell their products or manage the entire relationship with their customers (Wirawan, 2003). As the power of CRM technology has grown, companies have seen it as an increasingly important resource for their success in customer management (Messner, 2005b). CRM is a strategic activity-oriented approach mainly to understand the relationship between the company and the customer then support its redesign using a based-method approach (Reinartz et al., 2004). A CRM strategy is a guide to turning customers into assets. It is based on an understanding of how a company's competence can create a value proposition for customers and the market segment that offers the most value potential (Payne & Frow, 2005). This competence then produces business results. It does not sit in isolation but its objectives come from the company's strategy, bound into a business model and then integrated with other strategies at the operating planning level (Prayitno et al., 2013). As a result, a CRM strategy can be described as the interweaving of various operational strategies. The company's position in the market relative to its competitors and its goals are described in the marketing strategy (Ebner et al., 2002). Customer strategy defines goals based on the

customer lifecycle to create greater customer value and loyalty (Group & others, 2003). Area strategies (sales, service, channel, product, and communication strategies) derive their goals from marketing and customer strategies (Messner, 2004). Their interweaving helps to understand customers in the context of market, market segment, and market forces. It then sets up other supporting operational strategies – such as HR and Information System (IS)/IT (Messner, 2005a). So that in the end with the CRM output capabilities process, the company summarizes the strategy and contains landscapes processes, diagrams, and organizational charts (Schmid et al., 2000)(Shanmugasundaram, 2008).

The development of the globalization era is very rapid from year to year, the technological era also follows the times, several companies / universities in various countries in building relationships with their customers have been applied in technology (Wirawan, 2003). In Indonesia, it is one of the countries that has implemented Customer Relationship Management in maintaining relationships with customers, especially in universities. (Hamidin, 2008). The development of educational institutions in Indonesia is increasing by more than 665 educational institutions currently established in Indonesia (Danardatu, 2011) (Fauzi et al., 2017). The high level of competition between educational institutions results in each institution must be able to manage its institution professionally, just like a company, since from how an educational institution can have good quality, relevance to high competitiveness (according to Diknas standards) (Prayitno et al., 2013).

The high level of competition between higher education institutions in Indonesia requires each institution to manage professionally. Like a company, a tertiary institution that fails to satisfy its customers will face even more complex problems due to the impact of bad word-of-mouth from stakeholders (both from graduate users and graduates themselves) (Indra, 2019). The development of information and communication technology is part of these processes (Apriyanti, 2022). Currently, many universities have implemented information and communication technology related to the process of improving service quality, but the process is still not integrated, some are still done manually. Meanwhile, the information

desired by stakeholders can produce information that is more useful, transparent and accountability. CRM has the ability to allow higher education institutions to understand the behavior of service users better, and to determine the type of communication that institutions must establish with stakeholders (Ibrahim et al., 2017). The application of Customer Relationship Management (CRM) in the information system of a university is expected to make the existence of marketing (marketing), customer support, and customer care more effective. Thus, management decisions can be more tailored to customer expectations and needs (Salahshour et al., 2014).

The absorption of university graduates in the world of work is a benchmark for the University's success in educating students to form characters and skills that can contribute to the nation (Muhson et al., 2012). The success of Higher Education (PT) graduates in entering the world of work is one of the indicators of learning outcomes and the relevance of universities to society (Handayani, 2015). Thus, universities are responsible not only for equipping graduates with certain competencies (learning outputs) but are also obliged to facilitate and bridge graduates into the world of work. The existence of a Career Center in Higher Education reflects the responsibility of service for graduates, and students in general as prospective graduates (Harianto et al., 2019).

Telkom University is one of the universities in Indonesia located in Bandung, West Java. Telkom University has been ranked first in the Best Private Universities several times and has been included in the ranks of the Best Universities in Indonesia (*Telkom University : Rankings, Fees & Courses Details | Top Universities*, 2023). All of that cannot be separated from the efforts made to continue to develop rapidly and be flexible to changing times especially approaching prospective students as customers, Telkom University has implemented the concept of Customer Relationship Management as a means of serving customers to get a large amount of interest in their interest in studying at Telkom University. Nevertheless, in customer approach it certainly needs to be developed since technology has become more advance in the future of CRM. To maintain and increase potential in customer satisfaction it needs for testimonials

from students who have studied at Telkom University, especially university graduates in the world of work.

The Directorate of Career Development, Alumni and Endowment (CAE) is a Telkom University Career Center that has the task of bridging the information needs of the world of work needed by universities, answering the challenges of the world of work and conducting graduate tracing or Tracer Study. This Tracer Study program is carried out by the Career Development unit under the Directorate of Career Development, Alumni and Endowment (CAE) and is carried out annually as an effort to find out and analyze the performance of graduates as material for improving quality graduates in accordance with the demands of developments in the industrial world and society. The data obtained from the results of the Tracer Study is very useful for strategizing in the learning process and improving the quality of a sustainable Telkom University.

Tracer Study becomes an educational outcome in the form of a transition from the world of higher education to the world. However, in the process of successfully forming a tracer study requires the availability of alumni in filling out a tracer study survey to produce accurate data. The following Table I.1 is a comparison of the results of the tracer study from 2019 to 2021 on Telkom University respondents.

Table I. 1 Comparison of 2019-2021 Tracer Study Results

Tahun	Population	Respond	Response Rate
2019	4519	2503	55.39%
2020	5075	3302	65.06%
2021	5954	2147	36.06%

Based on the results of an interview with Mr. Indra Lukman Sardi as a representative of the relationship between Institutions and Tracer Studies, it was explained that the response rate of Telkom University's Tracer Study in 2021 was 36.06%, where the population of 2019 graduates was 5,954, with the number of

respondents amounting to 2,147 referring to the Tracer Study book. When viewed from the comparative data from 2019 to 2021, there is a significant increase in population every year. Another thing with a high population in the availability of alumni in filling out the questionnaire form has decreased every year in Telkom University units, but the percentage of the response rate study program achieved in the tracer study always reaches the target of 60% in each year so as to produce a fairly accurate report. The approach of the team tracer study with alumni is to follow-up on the availability of filling out the questionnaire form through media such as email and WhatsApp. However, the process of monitoring progress from the distribution of surveys to alumni, detecting that the form submission was successfully sent or not, alumni filling out forms, to the status of alumni successfully collecting questionnaire forms is still inefficient because the database system they use still uses an excel dashboard so that the monitoring process is not in real time which results in time consuming in monitoring the development of alumni respondents. The impact involves the results of an ineffective approach so that researchers propose the process of approaching alumni in distributing questionnaire, filling out, and alumni collecting questionnaire forms in real time by applying the concept of Customer Relationship Management technology.

The alumni approach through the CRM concept can help the tracer study team in monitoring the development of the tracer study survey to alumni, the process requires technology that can support the application of CRM so that it can produce structural alumni data, a dashboard in the form of pipeline analysis that can be accessed by a cloud-based / online tracer study team in real time, to produce fast reporting results (Frow & Payne, 2009) . In addition, in the application of CRM in tracer studies that can increase productivity between tracer study teams and alumni to obtain graduation analysis results, transition outcomes from education to the world of work, to want further studies can also increase marketing for the admission of new Telkom University students which has the potential to generate a lot of student interest to register at the Telkom University campus. Therefore, the approach between alumni and students will be an objective researcher for the improvement of CRM technology so that tracer studies become increasingly important role because it can provide a variety of informations to the development

of the College. In addition to tracer study serves as a tool to evaluate the relevance of higher education to the world of work, can provide a useful input for Bachelor's degree, Master's degree, and Diploma's degree for performance improvement (Frow & Payne, 2009). One of the new student admissions to support the implementation of CRM between alumni and students is Telkom University Admission, especially the Marketing & Analytics section for marketing materials based on the achievement of tracer studies.

Tracer Study will be a reference to increase marketing for Telkom University Admissions in increasing the interest of prospective new student participants to register for the study program they are interested in with it will result in the purchase of many Personal Identification Number (PINs). Admission and Tracer Study will be an integrated system so that the alumni data desired by the admission can be accessed easily. In integrating lead data in Telkom University Tracer Study with ERP implementation, this research requires a CRM to maximize marketing strategies and customer loyalty.

The integration of the Customer Relationship Management (CRM) in managing tracer study is the next step to manage detailed information about individuals and "touch points" related to prospective students to maximize loyalty, CRM is the most important part of marketing because the strength and driver of Telkom University's profitability is the overall value of prospective candidate. In implementing this CRM system using Odoo software which is an open-source ERP and CRM developed in 2005 until now. Odoo is an open-source ERP and CRM software that has integrated modules to support business processes and goals (Wirawan, 2003).

In this study, to support the odoo development design in the Telkom University Tracer Study was developed with the Accelerated System, Application, and Production in data processing (ASAP) methodology. The use of the ASAP method can help implement CRM so as to produce an effective and efficient process according to the needs in the tracer study and customer environment. The ASAP method has five stages, including Project Preparation, Business Blueprint, Realization, Final Preparation, Go Live & Support (Supriyono & Sutiah, 2019).

The processes described earlier will be generated in the form of dashboard reports. This report aims to monitor the data information system through integrated Customer Relationship Management (CRM) data using the Odoo application with the Accelerated SAP (ASAP) methodology at Telkom University Tracer Study.

Based on the background above, it is necessary to develop a blueprint design for Customer Relationship Management (CRM) based on open-source Odoo ERP with the ASAP method at Telkom University Tracer Study. Using a CRM system will facilitate Telkom University Tracer Study in managing alumni data. With this blueprint design, it is hoped that Telkom University Tracer Study by integrated with Admission can optimize the number of PIN purchases during the New Student Selection (SMB) in the coming years and improve marketing strategies that are right on target.

I.2   Problem Statement

Based on the problem background that has been described, the researcher can identify some problems are as follows:

1. How is the blueprint business design and business process proposed in the CRM at Telkom University Tracer Study based on Odoo ERP as a solution to existing problems?
2. How is the integration function between Tracer Study and Marketing & Analytics in Admission Telkom University works in Odoo software?

I.3   Research Objective

By referencing Problem identification, this research is expected to achieve the following objectives:

1. Designing an ERP-based business blueprint in the Customer Relationship Management using Odoo with the ASAP method at Telkom University Tracer Study.
2. Design Integration based Odoo between Directorate of Career, Alumni & Endowment (CAE) and Directorate of Marketing & Admission (PADMI) in Telkom University.

I.4 Research Scopes

Some limitation will be implemented in this research are as follows:

1. This research was conducted up to the business blueprint stage based on the Accelerated SAP (ASAP) method.
2. This research focuses on the concept of Customer Relationship Management (CRM).
3. This research uses requirements obtained from the Directorate of Career Development, Alumni and Endowment (CAE) Telkom University.
4. This research focuses on the Tracer Study which is part of the Directorate of Career Development, Alumni and Endowment (CAE) Telkom University.
5. This tracer study research only reaches the stage of integration with Marketing & Analytics which is part of the Directorate of Marketing and Admissions (PADMI) Telkom University for tracer data access needs.
6. The Tracer data that will be accessed by Marketing & Analytics is the data of alumni of Diploma, Bachelor, and Master's degrees.
7. This research was not conducted until the configuration stage with the ABAP programming language.
8. This research was only conducted from the functional identification stage to the form of a business blueprint and not until the implementation stage.
9. This research does not discuss field implementation directly.

I.5 Research Benefits

1. The Research Benefits for Telkom University Tracer Study:
   a. Application of Customer Relationship Management system to manage tracer study data of Telkom University alumni.
   b. Increase productivity in tracer study management and reduce costs borne in the implementation of tracer study.
   c. Provide Tracer Study in processing alumni data automatically and produce the results of data analysis reports.
   d. With Odoo CRM, users can monitor the development of alumni tracer studies.

2. The Research Benefits for Telkom University Admission:

    a. Integration with Tracer Study in accessing graduation data and study program recommendations based on survey results from alumni for marketing and analytics materials.

3. The Research benefits for Scientific:

    a. Customer Relationship Management (CRM) knowledge and skills that can be implemented to universities, especially the Telkom University Tracer Study.

    b. Providing insight and views on designing a business blueprint in Customer Relationship Management (CRM) so that it can be applied in other educational worlds as company branding.

I.6   Report Writing Systematics

This research is described by systematic writing as follows:

Chapter I   Background

This chapter discusses the research background, problem formulation, research objectives, research benefits, problem limitations in research, and the writing systematics used.

Chapter II   Literature Review

This chapter contains theories that support research based on case studies found at Tracer Study Telkom University.

Chapter III   Research Methodology

This chapter explains the research methodology that will be used in research including conceptual models, research systematics, data collection and data processing, evaluation methods, reasons for choosing methods and plans for schedules of activities to be carried out during the research.

Chapter IV   Blueprint Analysis

This chapter explains the results of the analysis of current business processes (as-is), business processes on the application system (to-

be), Business Requirement Specification (BRS), System Requirement Specification (SRS), fit and gap analysis in the proposed business process.

Chapter V   **Evaluation**

This chapter explains the evaluation carried out in the form of a Forum Group Disscusion (FGD) and an analysis of improvements related to the proposed business process and the design of the business blueprint.

Chapter VI   **Conclusion and Suggestion**

This chapter explains the conclusions of the problem solving carried out as well as the answer to the problem formulation in the introduction. Suggestions of solutions are put forward in this chapter for the next final project.