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## CHAPTER 1 - INTRODUCTION

### 1.1 Background

In recent years, the information technology business has grown rapidly. This has undoubtedly had an impact on the development of existing businesses on the operational side and has boosted their economic growth. In the context of trading business transactions involving heavy machinery, which falls under Business-to-Business (B2B) transactions, B2B transactions play a crucial role in any economy, and it is of utmost importance that there should be a proper payment system to facilitate those B2B transactions (Tiwari, 2023). The Company that will be discussed here pertains to the development of document billing distribution to customers. In this case, information technology development has been implemented in several companies, especially in clients of the Company. They are using information technology called E-Invoice (Electronic Invoice). However, despite the improvement in these processes, not everything is going smoothly and as planned. Many customers in this regard are unable to keep up with the advancements in information technology due to various reasons such as:

- A. Technology investment costs,
- B. Standard Operational Procedures (SOP) from the Customer that require manual document signing,
- C. Inadequate human resources competency, and
- D. Lack of strategic planning

This research aims to find ways to make the delivery of the Document Pack Invoice as fast as the delivery of the E-Invoice. Conventional delivery typically relies on Delivery City Courier, where the last mile transportation of goods is one of the most expensive activities, accounting for approximately 28% of the total cost (Pronello et al., 2017). This poses an issue for a company where a significant amount of money is spent, but the goods are not delivered on time. Therefore, this research aims to identify the errors in the process of delivering the Document Pack Invoice to the customer to improve customer satisfaction and accelerate the cash flow into Company.



**Figure 1.1** PS Revenue Tanjung Enim 2022 (Source: Internal Company Data)

This research was carried out within an Indonesian heavy equipment distribution company, hereinafter referred to as the "United Tractors Site Tanjung Enim." In addition, UT Site Tanjung Enim is engaged in the sales of spare parts for heavy equipment, contributing significantly to its revenue and after-sales services. Spare parts play a vital role in maintaining the machinery's optimal functionality, holding a central position in the machines' operation and performance. UT Site Tanjung Enim's spare parts sales are executed through two channels: cash and credit transactions (Kurniawan, 2021). The sales of Product Support at this Company in the Tanjung Enim area have shown a highly significant increase compared to the previous year. Thus, it can be said that UT Tanjung Enim has become the number 1 business in Sumatera, this is illustrated in Figure 1.1.

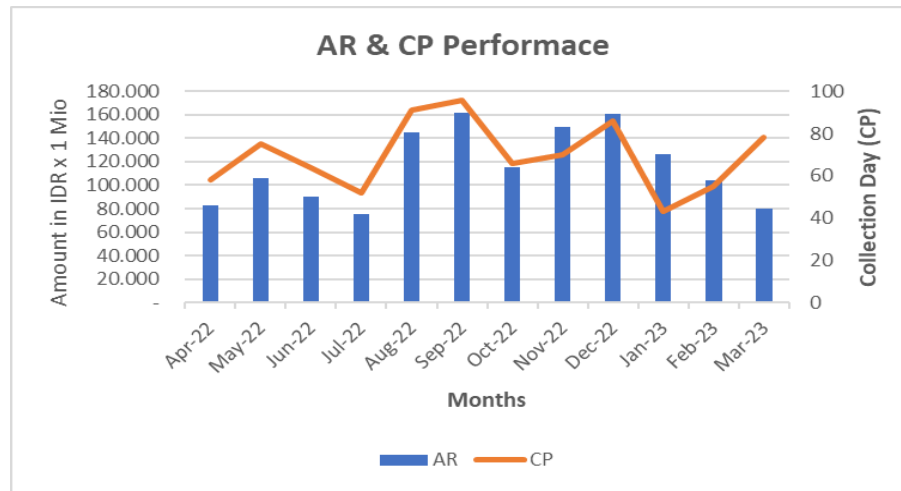


**Figure 1.2** AR & CP Performance Tanjung Enim (Source: Internal Company Data)

This image, it can be observed that the sales trend has shown a notable increase until the end of 2022, involving diverse customers in the Tanjung Enim area. The following details provide insight into the outstanding receivables or Accounts Receivable (AR) for spare parts from the previous year, along with the corresponding billing performance (collection period), as illustrated in **Figure 1.2**.

UT Site Tanjung Enim is taking steps to tackle the mentioned issues by launching a project focused on overseeing both internal and external performance. With an anticipated surge in the sales of Parts and Services at UT Site Tanjung Enim, the volume of customer invoices will naturally increase. This necessitates heightened vigilance to ensure all documents reach customers promptly and accurately, avoiding any misplacement or delays. As a solution, UT Site Tanjung Enim has established specific standards to uphold swift document delivery through a robust process and measures the Days of Collection Period. This period calculates the duration from when customers receive their ordered goods to when the corresponding invoice is settled.

As the text above, the author took an initiative that was further developed into a study entitled “ INNOVATIVE APPROACHES FOR EFFECTIVE SUPPLY CHAIN INVOICE-TO-CUSTOMER MONITORING ” by providing an analysis of the pros and cons of undertaking this initiative with the top 10 customers at UT Tanjung Enim so that it can be applied to all UT customers.

### 1.1.1 Background of Customer Selection

In addition, focusing on the largest transactions with customers in UT Site Tanjung Enim is why this research is conducted. This study selects the top 10 customers of UT Site Tanjung Enim based on historical sales in 2022. More transactions lead to a larger cash in. The purpose of this initiative is to maintain payment performance, align with customer operational needs, and avoid the Blocking System from UT Site Tanjung Enim.

Table 1. Sales Achievement from UT Site Tanjung Enim in 2022

| Part Number | Amount         | Rank |
|-------------|----------------|------|
| PT.A        | 92.713.782.628 | 1    |
| PT.B        | 64.059.631.327 | 2    |
| PT.C        | 38.885.052.458 | 3    |
| PT.D        | 31.215.232.100 | 4    |
| PT.E        | 26.272.190.860 | 5    |
| PT.F        | 22.305.630.326 | 6    |
| PT.G        | 5.323.443.823  | 7    |
| PT.H        | 5.190.262.202  | 8    |
| PT.I        | 4.936.449.265  | 9    |
| PT.J        | 4.318.604.984  | 10   |

### 1.1.2 Robust Process Overview

"Robust Process Account Receivable" refers to a well-developed and resilient system or methodology for managing and handling accounts receivable within a business or organization. Accounts receivable (AR) represent the outstanding payments that a company is owed by its customers for goods or services provided on credit. The "robust process" in this context signifies a comprehensive and effective approach to managing these financial transactions and ensuring timely collection of outstanding amounts. A "Robust Process Account Receivable" entails a series of well-defined and efficient steps that aim to streamline the entire accounts receivable cycle, from the issuance of invoices to the collection of payments.

A "Robust Debt and AR" approach is crucial for maintaining healthy cash flow, reducing the risk of bad debt, and ensuring a steady revenue stream for the organization. It involves not only effective financial practices but also strong

communication and relationship management skills to interact with customers in a way that encourages timely payment while preserving positive business relationships. The timeframe that can be used to UT Site Tanjung Enim can be illustrated to this **Figure 1.3** and **Figure 1.4**.

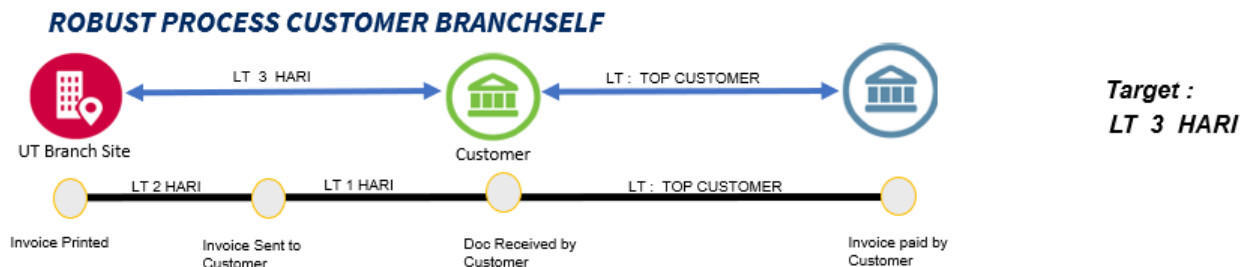


**Figure 1.3** Robust Process Customer Branchself (Source: Internal Company Data)

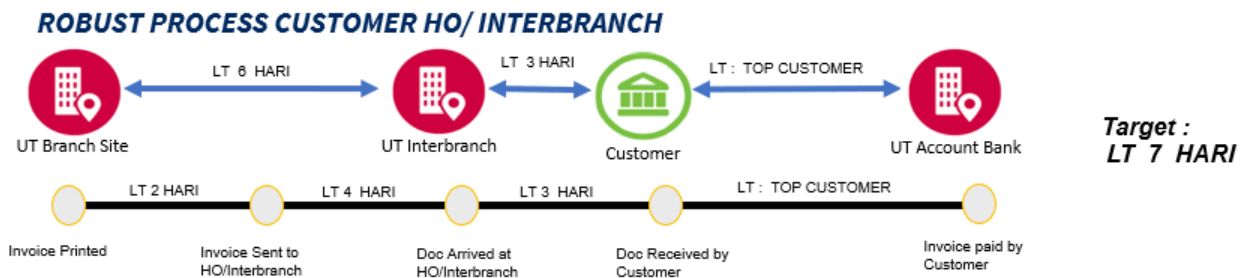


**Figure 1.4** Robust Process Customer HO/Interbranch

In this regard, the Robust Process is hindered due to a lack of system efficiency within "UT Site Tanjung Enim's" internal operations, resulting in a relatively high lead time for document delivery to customers. This process can be explained as shown in the image below.

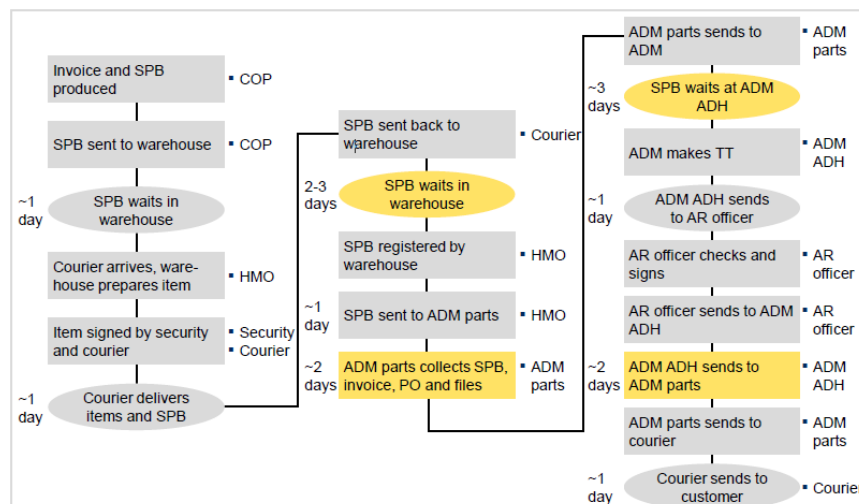


**Figure 1.5** Current SPB Process

In (Sackmann et al., 2011) the risk of default in payment is divided into two dimensions. The first dimension is represented by individuals who are unable to settle their bills because of insolvency or illiquidity, and the second dimension is represented by individuals who are unwilling to settle their bills because they are engaging in fraud. Using those dimensions, four risk categories were defined:

1. Ability and willingness to settle bills.
2. Inability to settle bill.
3. Unwillingness to settle bill.
4. Inability and unwillingness to settle bill.

## 1.2 Research Problems

The delay in delivering document invoices to customers by UT Site Tanjung Enim is impacting the customer company's system due to the Leadtime process not being met. This is caused by UT Site Tanjung Enim not having specific monitoring in place for the internal process from goods received by the customer until the document invoice is sent to the customer.

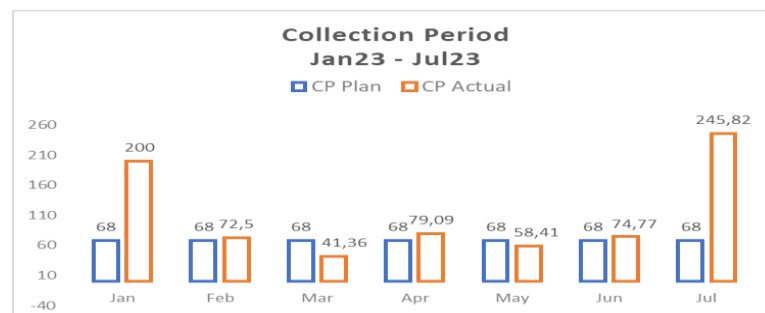


**Figure 1.6** UT Tanjung Enim CP Performance

## 1.3 Research Objective

The purpose of this research is to assess new methods that can affects the lead time for delivering Document Pack Invoices to customers with QFD Technique to reach Days of Collection Period target of 68 days.

## 1.4. Significance Study

The benefits or significance of this study are:

#### **1.4.1 For the Company**

This research aims to speed up the delay in sending invoice documents, which happens due to unmonitored process checks by United Tractors. While using E-Invoice is the ideal solution, not all customers are ready for it during implementation.

#### **1.4.2 For the Authors**

1. Applying theoretical knowledge from academia to address real-world challenges encountered within companies.
2. As a mandatory component of the educational graduation criteria.

#### **1.5 Research Questions**

Here are some questions used in this research by following this below:

- What strategies can be implemented to mitigate the impact of shipment holds on delivery lead times and reception times for Document Pack Invoices?
- How can the new method become a solution based on customer feedback?

#### **1.6 Hypothesis**

Due to the IPM Method, the lead time for delivering the Document Pack Invoice to the customer has been minimized. Payment time from customers can be achieved within 68 days or less from the collection period.

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## CHAPTER 2 - LITERATURE REVIEW

This research chapter scrutinizes the operational efficiency of our Company's invoicing system and its direct correlation with the promptness of customer payments. The timeliness of these transactions holds paramount importance, particularly for our dedicated After Sales Consultants, who are actively engaged in trialling and refining methodologies to ensure timely document dispatch to our valued customers.

At the heart of our investigation lies a comprehensive study encompassing the entire transactional process. From the moment the Delivery Note is dispatched to our customers to their receipt of goods, culminating in the invoicing phase—we meticulously analyze each step to discern and alleviate any bottlenecks or hindrances that might impede swift and accurate invoicing.

This research initiative bears testament to our unwavering commitment to optimizing our operational workflows. By meticulously dissecting the intricacies of our processes, we aim to identify potential areas for enhancement. The ultimate objective is crystal clear: to mitigate any delays inherent in our invoicing procedures.

For After Sales Consultants serve as catalysts for change, diligently exploring innovative strategies to streamline the document delivery process. Their efforts are anchored in a collective goal—to bolster our Company's responsiveness and efficiency in sending out invoices.

Through this research endeavor, we aspire not only to expedite payment cycles but also to fortify customer relations by ensuring a seamless and punctual delivery of crucial documents. By mitigating delays in the invoicing phase, we aim to solidify our Company's reputation for reliability and operational excellence.

This chapter is an earnest pursuit of improvement—an exploration of strategies and mechanisms aimed at fine-tuning our operations to achieve optimal efficiency. Join us in this journey as we navigate the intricacies of our invoicing processes, seeking to enhance our operational prowess and elevate customer satisfaction to unprecedented heights.