Kalle Kaasinen

Opportunity Stagnation in B2B Sales Process

An Operations Management Perspective from the Renewable Energy Sector

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UNIVERSITY OF VAASA
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Author: Kalle Kaasinen
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Supervisor: Inês Simoes de Brito Peixoto
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ABSTRACT:
This study examines factors associated with lead stagnation in business-to-business (B2B) sales processes from an operations management perspective. In complex B2B environments, sales opportunities often remain inactive for extended periods, leading to inefficiencies in the sales pipeline. Drawing on concepts from operations management, particularly work-in-progress (WIP) and process flow, this study conceptualizes stagnation as the accumulation of partially processed sales opportunities within a structured process. The aim of the study is to increase understanding of why individual opportunities fail to progress and to identify the key factors associated with this phenomenon. The study focuses on a Nordic case company operating in the renewable energy sector.

The theoretical background combines perspectives from B2B sales literature and operations management. Sales processes are conceptualized as stage-based flows in which opportunities progress toward a final outcome, while operations management literature provides a framework for understanding waiting, accumulation, and process efficiency. In this context, stagnation is interpreted as a disruption in flow, potentially caused by imbalances between process input and capacity or by limitations in buyer readiness.

The empirical analysis is based on transaction data collected from the case company's customer relationship management (CRM) system. The dataset consists of 73 sales opportunities in the Finnish market. The study applies a quantitative research design and uses binary logistic regression analysis to examine the relationship between buyer maturity, electricity consumption, and industry classification on the likelihood of an opportunity becoming stagnant in the sales pipeline.

The results show that buyer maturity is the most significant factor associated with opportunity stagnation. A higher level of buyer maturity statistically significantly reduces the likelihood of stagnation. In contrast, electricity consumption and industry do not emerge as statistically significant explanatory factors in the multivariate analysis. These findings suggest that stagnation in B2B sales processes is primarily related to the readiness of the buying organization rather than to structural characteristics of the market or the deal.

From a theoretical perspective, the study contributes by integrating operations management concepts, particularly WIP and flow efficiency, into the analysis of sales processes. From a managerial perspective, the findings highlight the importance of assessing customer readiness, prioritizing qualified opportunities, and actively managing the sales pipeline to improve process efficiency and reduce accumulation.

KEYWORDS: B2B sales, sales opportunity stagnation, buyer maturity, work-in-progress

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ABSTRACT:
Tässä tutkimuksessa tarkastellaan myyntimahdollisuuksien stagnointiin liittyviä tekijöitä yritysten välisissä (B2B) myyntiprosesseissa operaatiojohtamisen näkökulmasta. Monimutkaisissa B2B-ympäristöissä myyntimahdollisuudet jäävät usein pitkäksi aikaa passiivisiksi, mikä heikentää myyntiputken tehokkuutta. Operaatiojohtamisen käsitteisiin, erityisesti keskeneräiseen työhön (work-in-progress, WIP) ja prosessivirtaan, tukeutuen stagnointi käsitteellistetään osittain käsiteltyjen myyntimahdollisuuksien kertymiseksi prosessissa. Tutkimuksen tavoitteena on lisätä ymmärrystä siitä, miksi yksittäiset myyntimahdollisuudet eivät etene, sekä tunnistaa keskeiset tekijät, jotka ovat yhteydessä tähän ilmiöön. Tutkimus keskittyy pohjoismaiseen uusiutuvan energian toimialalla toimivaan tapausyritykseen.

Tutkimuksen teoreettinen viitekehys yhdistää B2B-myynnin kirjallisuutta ja operaatiojohtamisen näkökulmaa. Myyntiprosessit nähdään vaiheittaisina virtoina, joissa myyntimahdollisuudet etenevät kohti lopputulosta, kun taas operaatiojohtamisen kirjallisuus tarjoaa viitekehyksen odottamisen, kertymisen ja prosessitehokkuuden ymmärtämiseen. Tässä kontekstissa stagnointi tulkitaan prosessivirran häiriöksi, joka voi johtua epätasapainosta prosessin syötteen ja kapasiteetin välillä tai ostajan valmiuteen liittyvistä rajoitteista.

Empiirinen analyysi perustuu tapausyrityksen asiakkuudenhallintajärjestelmästä (CRM) kerättyyn transaktiodataan. Aineisto koostuu 73 myyntimahdollisuudesta Suomen markkinassa. Tutkimuksessa sovelletaan kvantitatiivista tutkimusasetelmaa ja analyysimenetelmänä käytetään binääristä logistista regressioanalyysiä, jolla tarkastellaan ostajan kypsyyden, sähkönkulutuksen ja toimialan yhteyttä myyntimahdollisuuden todennäköisyyteen stagnoitua myyntiputkessa.

Tulokset osoittavat, että ostajan kypsyys on merkittävin myyntimahdollisuuksien stagnointiin liittyvä tekijä. Korkeampi ostajan kypsyystaso vähentää tilastollisesti merkitsevästi stagnoinnin todennäköisyyttä. Sen sijaan sähkönkulutus ja toimiala eivät osoittautuneet tilastollisesti merkitseviksi selittäjiksi monimuuttuja-analyysissä. Tulokset viittaavat siihen, että stagnointi B2B-myyntiprosesseissa liittyy ensisijaisesti ostavan organisaation valmiuteen eikä markkinoiden tai kaupan rakenteellisiin ominaisuuksiin.

Teoreettisesta näkökulmasta tutkimus kontribuoi yhdistämällä operaatiojohtamisen käsitteitä, erityisesti WIP:n ja prosessivirran tehokkuuden, myyntiprosessien analyysiin. Liikkeenjohdon näkökulmasta tulokset korostavat asiakasorganisaation valmiuden arvioinnin, myyntimahdollisuuksien priorisoinnin sekä myyntiputken aktiivisen hallinnan merkitystä prosessitehokkuuden parantamisessa ja kertymisen vähentämisessä.

KEYWORDS: B2B sales, sales opportunity stagnation, buyer maturity, work-in-progress

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1 Introduction

This chapter introduces the research context and outlines the background, research problem, and research objectives of the study.

1.1 Background

Business-to-business (B2B) sales processes are widely recognized as lengthy and complex. Rangarajan et al. (2022) argue that the B2B sales processes have become increasingly complex due to several factors, including the expansion of customer decision-making units, digitalization, and changes in the operating environment of organizations. This has led to solution offerings to become more service-driven that requires more training and support of salespeople which simultaneously increases the sales cycle times (Wieland et al., 2017). Furthermore, prior research on complex and strategic buying decisions suggests that sales opportunities often progress slowly due to the involvement of multiple stakeholders with conflicting objectives and the use of sequential, highly formalized decision processes (Ulaga & Sharma, 2001). In practice, this implies that many sales opportunities remain in intermediate stages for a long time before either progressing to the next stage or being formally closed.

Prolonged waiting in the sales pipeline may be considered to have significant managerial implications. According to Moncrief (2017), organizations need to rethink their sales strategies and resource allocations to help salespeople deal with these phenomena. From a process perspective, inactive sales opportunities will accumulate over time in the system. Operations management literature has presented a concept called work-in-progress (WIP) as materials or components that have entered the production process and are currently in the processing stage, but are not yet finished products (Tan et al., 2018). It has also been identified in the previous literature that when additional WIP has put into the system, flow times increase (Spearman, 1997). Sales literature rarely mentions WIP as its origin is from industrial management area. However, sales literature classifies these unfinished units as sales opportunities (Mortensen et al., 2019). These could be

seen as unfinished WIP units and could then be mirrored in the sales process, where leads act as unfinished materials or components, and adding more of them into the system may increase the time required to close deals. This phenomenon is often illustrated by Little's Law, which shows that when throughput remains constant, an increase in WIP leads to a corresponding increase in throughput time (Bertsimas & Nakazato, 1995; Sato & Kawai, 2007). Historically, this principle has also been applied to fields outside of operations management. For instance, Kim and Whitt (2012) used Little's Law to study the regularities of operational activity in a call center of a large U.S. bank, and thus its application to a B2B sales process provides a relevant perspective.

Furthermore, this challenge is particularly timely in capital intensive B2B industries. For example, Kunkera, Tošanović, and Štefanić (2022) studied a B2B sales process in a European shipyard on how sales lead time can be shortened. At the same time, Trailer and Dickie (2006) argue that the average length of the sales cycles continues to increase. Taken together, this gives a relevant framework to study this area within renewable energy space that could be seen as capital intensive and traditional.

1.2 Research problem

While previous literature has studied the increasing complexity of B2B sales, prolonged sales cycles and the managerial challenges associated with these, limited attention has been given to understanding stagnation at the sales opportunity level. To be more precise, it is less well understood why individual sales opportunities remain inactive or accumulate within specific stages of the sales process for extended periods. Lilien (2016) also made an interesting observation, noting that, surprisingly, there is relatively little research on the B2B sector compared to B2C. Due to the increased complexity of B2B sales processes, Badrinarayanan et al. (2019) argued that more research is needed to understand how sales managers should allocate their resources.

Furthermore, the existing studies have focused a lot on understanding the bottlenecks and the sales pipeline management in the sales process. Veltman et al. (2014) argue that

research in operations management shows that when there are bottlenecks in the sales process, they slow things down and hurt a company's overall performance and profits. In addition, it has previously been found that analysing the sales pipeline is essential for business success, and estimating opportunity conversion is considered a fundamental component of sales management (Yan et al., 2015). However, these studies focus heavily on identifying failing points in the process that could be improved or eliminated. Existing literature does not sufficiently explain the factors that lead to bottlenecks, among other issues.

Stagnation and waiting in the sales pipeline have been addressed in the previous research from different perspectives. Trailer and Dickie (2006) identified structural factors that lengthen sales cycles, such as increased complexity on the buyer side and a mismatch between the buying and selling processes. Habel et al. (2025), in turn, explain stagnation through information asymmetry between buyers and sellers, arguing that unresolved asymmetries may cause leads to remain inactive in the sales funnel. These findings illustrate that the causes of stagnation are not straightforward. According to prior literature, the phenomenon may originate from both buyer- and seller-related factors. However, despite these explanations, the fundamental reasons why stagnation occurs in the first place remain insufficiently understood.

Lastly, while prior research has examined sales pipeline performance and stage progression, existing studies primarily focus on sales team effectiveness or final outcomes. Waiting and accumulation at single opportunity levels have not been studied from this angle. Haque (2019) further supports this perspective by arguing that prior research has paid limited attention to stagnation and observing that many opportunities remain in the same stage for prolonged periods. This study addresses this gap by specifically analysing the determinants of stagnation at the opportunity level using transactional sales data.

1.3 Research questions and objectives

This study aims to answer the following research question and contribute to the following four objectives.

Research question: What factors are associated with sales opportunity stagnation in a B2B sales process?

Objective 1: To identify and empirically test the factors associated with sales opportunity stagnation at the individual opportunity level.

Objective 2: To examine the role of buyer readiness in explaining stagnation in B2B sales processes.

Objective 3: To apply and adapt operations management concepts to the analysis of B2B sales pipeline environment.

Objective 4: To contribute to sales literature with the help of industrial management concepts.

2 Literature review

This chapter examines the theoretical foundations that are central to understanding the stagnation of B2B sales processes from an industrial management perspective. The chapter first conceptualizes B2B sales processes as structured and step-by-step processes and introduces the key concepts that form the basis of the study's analysis. It then draws on the literature on operations management to develop a process-based perspective, focusing in particular on waiting time, work-in-progress (WIP), and process efficiency. Based on these, it reviews previous research on sales process delays from both the buyer and seller perspectives. The chapter concludes by identifying key limitations of the existing literature and justifying the research gap for this study.

2.1 B2B sales processes as business processes

2.1.1 Core concepts

Before engaging more deeply with the literature, several instrumental concepts require clarification. Sales can take multiple forms, and this study focuses on business-to-business (B2B). B2B selling is defined as relationship-based selling activities in environments where the exchange involves medium to high-complexity business products and services and the focus is on the performance of individual salespeople in organizational markets, excluding retail and direct-to-consumer sales (Zallocco et al., 2009). Furthermore, a sales lead is a widely used term in B2B sales research. In this context, a sales lead is defined as "a recorded expressed interest in the company's goods or services" (Monat, 2011, p. 179).

This study focuses on B2B sales opportunities. Mortensen et al. (2019) define a single sales opportunity as a unit recorded in a company's Salesforce.com customer relationship management (CRM) system, described by several attributes (e.g., duration, type, and value), and classified as either open or closed. This definition aligns well with the purpose of the present study, as the case company utilizes Salesforce-based

environment and records sales opportunities accordingly. Finally, a sales pipeline in B2B CRM systems is defined as a staged process that progresses from leads to sales opportunities and ultimately to deal resolution (won or lost) (Maulana and Napitupulu, 2022). The term sales funnel is often used to describe the same process, highlighting how the number of opportunities decreases at each stage as they move forward (Syam & Sharma, 2018; Paschen et al., 2020). Although small differences between the concepts can be identified, they are commonly used in a similar way in the literature. For this reason, this study uses the terms sales funnel and sales pipeline interchangeably to describe the stage-based progression of sales opportunities.

Lastly, sales cycles and the related phenomena of waiting and stagnation are central themes in this study and therefore require clarification. Sales cycle duration refers to the time interval between the initial meeting in which the new product is introduced to the customer and the customer's issuance of the first purchase order (Loudiadis, 2003). Naturally, the duration of sales cycles varies depending on the industry. In the context of this study, waiting refers to a situation in which a lead is pending the next step in the sales cycle, whereas stagnation refers to a situation in which the lead has completely stopped progressing.

2.1.2 B2B sales in the renewable energy sector

It is also important to understand the characteristics of this study's industry. This study was conducted with a case company within the renewable energy sector, and the B2B sales can be classified as complex. Rodríguez et al. (2020) state that complex B2B sales processes typically involve multiple actors on both the selling and buying sides, often organized as buying centers, which frequently results in extended sales cycles. This is the case in this study, as there are often multiple actors on both sides and sales cycles are long.

2.1.3 B2B sales process structure

B2B sales processes and their structures have been researched extensively, and they more or less have the same characteristics despite the industry. Already in 1992 Jolson and Wotruba identified that there are three main steps that starts the B2B sales process. These steps were called suspecting, prospecting and qualifying. Suspecting refers to guessing the customer's needs and buying intent of a sales lead. Secondly, prospecting refers to categorizing the sales lead to have right needs and ambition to become a customer and lastly, qualifying is an advanced model of this where the sales lead is further sorted out based on the lead's right characteristics and actions. Smith, Gopalakrishna and Chatterjee (2006) presented a three-stage model of the sales process that could be interpreted continuing the earlier three steps. Their study was implemented in a large U.S based home improvement retailer where the stages were lead generation, conversion of leads to sales meetings and conversion of appointments into sales. Jaramillo and Marshall (2004) noted that the same steps are applicable in the banking industry. In addition, they bring prospecting stage between lead generation and appointment setting. Paschen, Wilson and Ferreira (2020) had a slightly more covering process where they relied on seven stages to study how human and artificial intelligence create value along the B2B sales process. The seven stages were: prospecting, pre-approach, approach, presentation, overcoming objections, close and follow up.

Taken together, these studies show that even though the number or naming of the sales stages differ slightly based on the industry, sales processes consistently follow a structured stage-based logic in which potential customers are gradually moved towards a purchase decision. Virtanen et al. (2015) measure sales performance at the level of individual sales lead by classifying leads as won, lost to a competitor or cancelled. They continued that the lead time is calculated from once the customer was identified to when the deal is lost, won or cancelled. Therefore, it could be stated that the sales process has come to its end once one of these three stages happen. Virtanen et al. (2015) explains the stage "cancelled" as terminated sales process without a buying decision due to outcome of complex and collaborative sales processes in which customers explore ideas

without committing, decision making is fragmented, real needs are hard to verify, and long lead times delay or prevent a purchase decision from being reached.

Based on these findings, it also shows that sales processes are always outcome-oriented where sales opportunities may advance, stall, regress, or remain inactive for extended periods before reaching a final outcome. As a result, a substantial share of opportunities may remain within the sales process without being classified as won, lost or cancelled for a considerable time. Haque (2019) investigated the factors influencing team-based inside sales performance across different stages of the B2B sales pipeline. Notably, the study found that the majority of leads remain confined to a single stage throughout their lifecycle, indicating that progression through the pipeline does not occur automatically. Although the purpose of the sales process is to move leads toward a final outcome, many leads remain in the same stage for a long time. This process-oriented view of sales provides the foundation for examining sales opportunities as work in progress units with a business process.

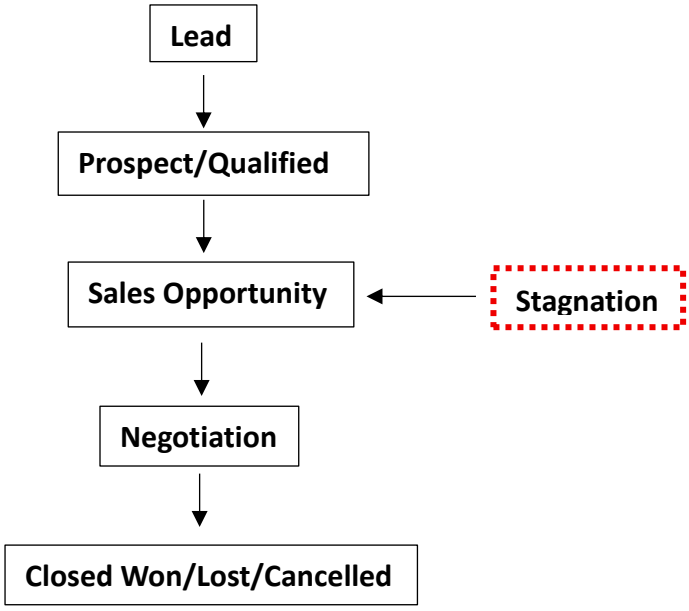

Figure 1. Conceptual representation of B2B sales stages and potential stagnation.

2.2 Work-in-progress, waiting and process efficiency

The operations management literature offers a process-based perspective on how units move through organizational systems and how waiting and accumulation can affect process efficiency (Schmenner & Swink, 1998). Although these concepts originated primarily in manufacturing environments, they can also be applied to other types of step-by-step processes in which units progress toward a final outcome. In the context of B2B sales processes, sales opportunities can be interpreted as units that flow through a structured sales pipeline, which allows concepts such as waiting time and work-in-progress to be used as analytical perspectives in understanding sales process stagnation. In this study, these operations management concepts are not applied as direct quantitative metrics but are used as a conceptual perspective to interpret stagnation and waiting in the B2B sales pipeline.

2.2.1 Waiting time

In operations management literature, waiting time is one of the most commonly used indicators of process performance in business process literature (Van Looy and Shafagatova, 2016). According to Rahani and Al-Ashraf (2012), waiting and non-value-added activities represent waste and reduce process efficiency. Due to the central role of waiting times in business processes, analysts are interested in identifying and quantifying them and analysing the underlying causes (Mannhardt et al., 2019; Nogayama & Takahashi, 2015). Generally, waiting in a process can be considered an undesirable phenomenon that requires explanation.

The relevance of waiting time as a source of inefficiency has also been demonstrated in sales-related contexts. For example, Kunkera, Tošanović, and Štefanić (2022) studied a B2B sales process in a European shipyard on how Lean Management can be used to reduce sales lead time by identifying and eliminating waiting time and other non-value adding activities across the sales process stages. This illustrates that waiting is not only

an operational problem in production and service processes, but also an unwanted phenomenon in sales processes that weakens the overall performance of the entire process.

However, waiting has also been studied from a different perspective in the sales literature. According to Liu et al. (2015) in their study several sales executives revealed that waiting can also been so called “active waiting”. In the same article, this is defined as a strategic timing process by which purpose is to position the sales firm on the consideration set for the customer’s next buying cycle. In practice, this could mean that it may encourage customer’s return when the new supplier falls short on performance.

2.2.2 Work-In-Progress

From a flow-based perspective, waiting time is closely related to the accumulation of work-in-progress (WIP). Operations management literature has defined WIP as materials or components that have entered the production process and are currently in the processing stage, but are not yet finished products (Tan et al., 2018). Isaksson and Seifert (2014) conceptualize WIP as one of three primary inventory components: raw materials, WIP and finished goods. In this context, WIP refers to partially completed goods that are in intermediate stages of the production processes and have not yet become finished products.

Spearman (1997) explicitly argues that waiting time originates from excessive work-in-progress, noting that “as additional WIP is put into the system, flow times increase” (p. 32). This relationship reflects an imbalance between the input to the process and the available capacity. In such situations, work accumulates above the capacity-limiting steps, leading to prolonged waiting times. A bottleneck is defined as a capacity-limiting process step that regulates the throughput of the entire process (Slack et al., 2010). Taken this into consideration, excessive WIP is not a bottleneck itself but rather a consequence of bottlenecks and capacity imbalances within the process.

The relationship between WIP, throughput, and wait time can be formally described using Little's Law (Bertsimas & Nakazato, 1995). According to Little's Law, the average number of units in the system (L) is equal to the product of the throughput rate (λ) and the average time a unit spends in the system (W). This central principle of operations management implies that if the throughput rate remains constant, an increase in the amount of WIP will inevitably lead to an increase in the wait time (Sato & Kawai, 2007).

$$L = \lambda W$$

In the context of the sales process, this means that an increase in the number of sales opportunities in the sales pipeline is systematically associated with longer wait times and reduced process responsiveness. In other words, the accumulation of sales opportunities increases the processing time of an individual case and slows down the flow efficiency of the entire process. Provenly, Little's Law has applied also for fields other than manufacturing. Kim and Whitt (2012) used Little's Law to study the regularities of operational activity in a call center of a large U.S. bank. The analysis was based on detailed event-level data covering 18 weekdays in May 2001. The study empirically examined the interdependence between service system load, customer arrival intensity, and time spent in the service process in a real-world operating environment. Considerably, Little's Law can be applied also in the field of sales.

Importantly, these principles of accumulation are not limited to manufacturing and service operations. For instance, Rangarajan et al. (2018) argue that poor alignment between sales and operations undermines operational efficiency, forecasting accuracy, and overall company performance. This perspective implicitly suggests a process-based interpretation, where sales functions are seen as part of the overall flow of the system and the formation of its responsiveness. In addition, previous research has explicitly applied production and operations management concepts to sales processes and has shown that stalled sales stages act as sales bottlenecks, limiting overall throughput and impairing performance and profitability (Veltman et al., 2014). Although the existing literature

demonstrates that sales bottlenecks are harmful to performance, it provides limited insight into why individual sales opportunities accumulate as work in progress in the sales process. This lack highlights the need for opportunity-specific analysis of sales process stalls.

2.2.3 Process efficiency

In industrial management literature, organizational activities are commonly conceptualized as interconnected processes, whose overall performance depends on the efficiency and continuity of flow through successive stages (Schmenner & Swink, 1998). From this perspective, interruptions and delays in the process flow are key indicators for process efficiency. Harbour (1997) further emphasizes that increasing efficiency is achieved by systematically eliminating or minimizing the number and duration of non-value-adding process. This indicates that waiting is something that needs to get rid of in order to make the business process more efficient.

Lastly, previously discovered WIP is also reflected upon process efficiency. Since WIP describes the average number of units in the system at any one time, an increase in it means that there are more products in the system at any one time (Vidalis et al., 2014). If the throughput rate remains the same, a higher WIP leads to a longer lead time. In other words, an individual product stays in the process longer before being completed or delivered. As a result, an increase in WIP slows down the process's responsiveness to changes in demand. From a flow efficiency perspective, excessive WIP reduces the flexibility and responsiveness of the system. Taken together, this showcases that waiting time and WIP has important impact on the process efficiency.

2.3 Explaining stagnation in sales processes

2.3.1 Buyer's side explanation

Stagnation from the buyer's side can be explained with customers' readiness. Storbacka and Pennanen (2014) suggest that markets with high readiness are associated with

customers' ability to operate effectively within them. This includes how buyers access relevant information about market actors, complete necessary transactions, and use the purchased offering in their own processes. This may affect customers to progress in the sales process. However, explanations on customer readiness are largely descriptive and operate at a general level and therefore offer only limited insight into why individual sales opportunities become stuck in certain stages of the sales process over time.

When it comes to service readiness, it refers to how willing an organization is to adopt new services and how capable it is of actually using them effectively (Vaittinen et al., 2019). Vaittinen et al. (2019) continue that even if the service provider recognizes the added value for the customer, the customer does not necessarily recognize the added value. These two can be related, if the customer does not have the desire to adopt or does not have the ability to utilize new services, it could be because the customer does not recognize the added value. However, Vaittinen et al. (2019) conclude that a certain level of service readiness is required for customers to adopt a service. This is therefore important to achieve, so that the customer is generally ready to proceed with the sales process. Vaittinen et al. (2019) further emphasize that service readiness is not a static state but can be influenced by service providers, once they understand the readiness.

Furthermore, Habel et al. (2025) explains stagnation as a situation in which leads remain inactive in the funnel due to unresolved information asymmetry between buyers and sellers. What they mean by this is that in B2B contexts, sellers often lack knowledge about the needs and purchasing intentions of potential buyers, making it difficult to assess the extent to which sales efforts are justified. At the same time, potential buyers may not have sufficient information about the seller's capabilities and the suitability of the solutions for their own needs. However, their study focused primarily on "automated lead nurturing" to solve the information asymmetry between buyers and sellers even though it touches on the reasoning behind the stagnation. This can also be thought of from the perspective of Vattinen et al. (2018), that buyers' service readiness can be influenced by reducing information asymmetry, as one example.

When attempting to explain the buyer's perspective, the long-established theory of the Technology Acceptance Model (TAM) is often invoked. TAM suggests that a system's features do not directly determine its use but instead influence usage through perceived usefulness and perceived ease of use (Marangunić & Granić, 2015). Perceived usefulness refers to the belief that using the system enhances work performance, while perceived ease of use describes how effortless the system is to operate (Marangunić & Granić, 2015). These factors have been found to directly influence the intention to use, which in turn predicts the actual use of the system. Marangunić and Granić (2015) further argue that the TAM is grounded in behavioral theory, in which the individual's intention to act is a central determinant of behavior. If the benefits of the technology are not perceived as significant, or if its implementation is considered cumbersome, the intention to use it will remain weak and the adoption of the technology unlikely. From this perspective, TAM offers explanatory power, particularly in situations where customer decision-making regarding the acquisition or implementation of technology-based solutions is examined.

2.3.2 Seller's side explanation

Seller-side stagnation can be explained from a management perspective. Trailer and Dickie (2006) identified structural factors that lengthen sales cycles, such as increased complexity on the buyer side and a mismatch between the buying and selling processes. These structural factors in the sales process can lengthen sales cycles and thereby lead to stagnation in the process. However, these do not explain much of what factors lead to stagnation.

In contrast, Beam (2006) approaches the phenomenon operationally and normatively, emphasizing that lead stagnation is often due to the fact that the sales pipeline is not actively managed, monitored, and "worked." According to him, even a complete sales pipeline will not produce results if the next steps are not systematically taken forward and the conversions between the stages are not measured appropriately. In this case,

stagnation is seen as an inefficiency of the sales process or a management problem, rather than as a phenomenon of interaction between the buyer and the seller. In addition, Parodi et al. (2024) analysed a B2B sales process using value stream mapping and PERT-CPM to identify activities that cause excessive lead times. Although their results show that waiting and bottlenecks are common in sales processes, the study approaches the phenomenon from a process development perspective and does not examine why individual sales opportunities stall during the process or become inactive over time.

Previously, concept of “active waiting” was presented. Liu et al. (2015) defined this as a strategic timing process by which purpose is to position the sales firm on the consideration set for the customer’s next buying cycle. Leach et al. (2016) emphasize that active waiting does not mean ignoring the customer. Instead, it is about thoughtful and consistent communication while allowing time to pass strategically. Delays can have several purposes, such as allowing the customer to calm down, waiting for changes in the group that influence the purchasing decision, adjusting the timing to the customer’s procurement cycle, or waiting for potential problems with the new supplier to emerge. Thus, active waiting is a conscious and planned approach in which the sales organization maintains the customer relationship and monitors the situation in order to prepare for a more opportune moment to return to negotiations. This perspective shows that delaying the sales process should not automatically be interpreted as inefficiency or loss of momentum. In some situations, delay can be a conscious strategic choice aimed at improving the chances of winning the customer back in the long term (Leach et al., 2016). This is why it is important to distinguish between passive stagnation and intentional active waiting, especially in long and complex B2B sales processes.

2.4 Summary and research gap

Previous research has shown that waiting times, bottlenecks and long sales cycles are typical features of B2B sales processes. Structural explanations emphasize the complexity of buying and the imbalance between buying and selling. At the same time, information-based perspectives emphasize the role of information asymmetry in the causes

of delays. From a management perspective, stagnation has often been interpreted as a consequence of poor pipeline management and a lack of systematic monitoring.

Despite these contributions, the existing literature mainly examines stagnation at a general or process level. Less attention has been paid to why individual sales opportunities stagnate at certain stages of the sales process. In particular, empirical studies that analyse stagnation at the level of individual sales opportunities are still limited, even though detailed CRM data is increasingly available. Furthermore, it is difficult to disentangle the factors underlying stagnation, as they can be related to both buyer and seller activities and interactions. While previous research provides useful descriptive and normative explanations, it provides limited information on the factors associated with stagnation of an individual sales opportunity.

From an industrial management perspective, stagnation can be interpreted as a process-level phenomenon, where sales opportunities accumulate in intermediate stages and slow down the flow of the entire process. Concepts such as waiting time and work-in-progress (WIP) provide a useful theoretical perspective for examining this phenomenon. However, the application of these concepts to the context of B2B sales processes has been limited to date. This study addresses the identified research gap by empirically examining the factors associated with stagnation of sales opportunities at the individual sales opportunity level in the B2B sales process. By combining perspectives from sales research and operations management, the study aims to provide a deeper understanding of the mechanisms underlying stagnation in the sales pipeline.

3 Methodology

3.1 Research design

This study adopts a quantitative research design. In general terms, quantitative research seeks to measure and/or count social phenomena and examine relationships between them (Bell et al., 2022). More specifically, quantitative research involves the collection of numerical data that is subsequently used to test theoretical propositions (Bell et al., 2022). As Bell et al. (2022) further argue, quantitative research relies on measurement and statistical techniques and is grounded in the assumption that aspects of social reality can be objectively measured. This methodological approach is appropriate for the present research problem, which seeks to identify factors associated with sales opportunity stagnation. The empirical data consists of numerical CRM-based sales records, which are analysed in relation to the theoretical framework developed in the literature review.

The empirical analysis is based on secondary sales data extracted from the case company's customer relationship management (CRM) system. A binary logistic regression method is applied to estimate the probability of an opportunity ending up in the nurturing stage. In this study, the nurturing stage is conceptualized as equivalent to stagnation, and this definition is discussed in more detail later in the thesis. According to Hosmer et al. (2013), logistic regression is a statistical method used to model a binary dependent variable. The method estimates the probability that a specific event occurs by applying a logit transformation, which ensures that predicted probabilities remain within the interval 0–1. The model coefficients are interpreted in terms of odds ratios, which describe how changes in independent variables affect the likelihood of the event occurring (Hosmer et al., 2013). This approach is particularly suitable for the present study, as the dependent variable can take one of two possible outcomes: nurturing (1) or any other stage (0). In this study, the dependent variable refers to the outcome being explained, namely whether a sales opportunity is in the nurturing stage. Independent variables are those explanatory factors that are hypothesized to influence the dependent variable. In the

present analysis, buyer maturity, electricity consumption, and industry classification function as independent variables.

To enable statistical analysis, qualitative categories were converted into numerical form through coding. Coding refers to the process of assigning numerical values to categories, in order to include them in statistical models (Hosmer et al., 2013). Buyer maturity and electricity consumption were treated as ordinal variables and coded using ascending numerical values to reflect increasing levels. Industry, as a nominal categorical variable without inherent ordering, was included in the regression model using dummy coding. Dummy coding involves transforming a categorical variable with multiple categories into a set of binary indicator variables, with one category serving as the reference group against which the others are compared (Hosmer et al., 2013). The statistical analyses were conducted using SAS Enterprise Guide (SAS EG). SAS EG was used for data import, variable preparation, cross-tabulation analysis, and logistic regression modeling. The software enables estimation of model parameters, statistical significance testing, and computation of odds ratios and model fit statistics.

3.2 Case company and data

3.2.1 Case company

The case company is a Swedish utility-scale solar energy developer operating in the Nordic region. The company originates and develops renewable energy projects and sells long-term Power Purchase Agreements (PPAs) to large corporate customers. A PPA is a long-term contractual arrangement in which a renewable energy developer agrees to sell part or the entire electricity output of a solar park to a buyer, typically a large corporate entity. This can be seen as a service.

The company operates two main business lines: grid-connected and behind-the-meter. The grid-connected (GC) business line refers to utility-scale solar parks that are connected directly to the electricity grid, whereas the behind-the-meter business line

consists of on-site solar installations located at the customer's premises. The grid-connected business line operates in Finland, Sweden, and Denmark. The present study focuses exclusively on the grid-connected segment within the Finnish market in order to ensure contextual consistency and comparability across observations.

To better understand the results of this study, it is also beneficial to present the case company's sales process and the stages within its sales pipeline. The sales process begins with lead origination, which involves screening companies based on their bankability, electricity consumption, and PPA purchasing maturity. Leads can originate either from a specific employee responsible for origination or from Client Executives, who ultimately take over and lead the sales process once the lead has been generated. The case company's sales process shares similarities with those presented in the literature review regarding sales processes. It is presented below:

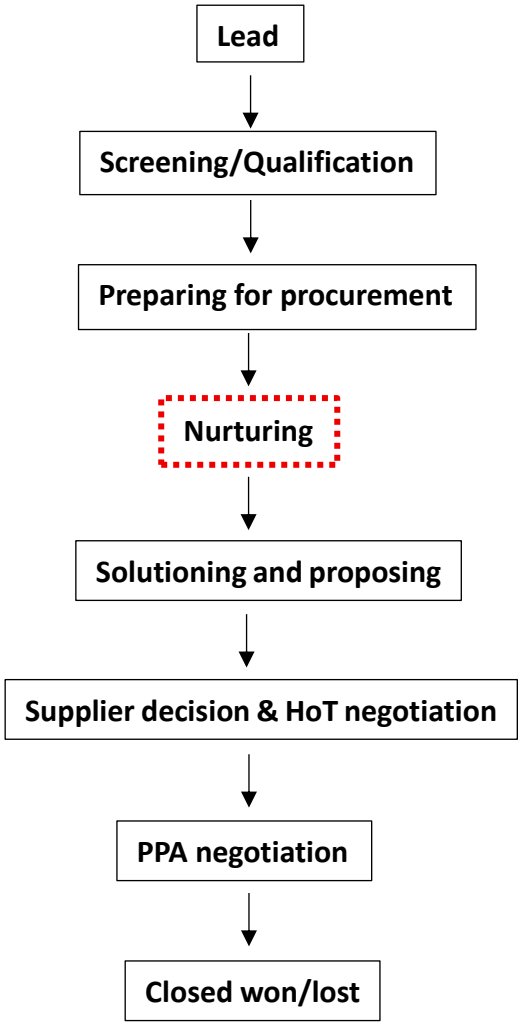

Figure 2. Case company's sales process stages.

After the screening/qualification stage, the lead is either moved to the "preparing for procurement" stage or into the nurturing stage. In the case company's process, the nurturing stage is not a stage that every lead passes through, but rather a stage where leads are placed if they are not ready for some reason to proceed in the pipeline. Leads may also be placed there if the seller decides to pause the process. In other words, the nurturing stage is not the desired stage for a lead because it is not actively progressing toward the end of the sales cycle; instead, the process stagnates. Accordingly, this stage can be interpreted as stagnation within the context of this study.

Furthermore, the supplier decision and HoT (Heads of Terms) negotiation stage indicates that the lead has decided to proceed with the case company and that a Heads of Terms

agreement has been drafted. Lastly, the PPA negotiation stage is where the final terms of the PPA are negotiated. After this stage, the deal is either won or lost, which concludes the sales cycle. The sales cycles in which the lead is not placed in the nurturing stage typically range from six to twelve months.

It is also worth examining this study's variables more closely and how they are interpreted within the case company. In the case company's context, buyer maturity refers to the lead's experience with purchasing PPAs and is categorized as low, medium, or high. Low indicates no prior PPA experience, medium indicates one to two PPAs signed, and high indicates multiple PPAs signed globally. Ideally, the case company prefers to engage with companies that already have experience with PPA purchasing, as this reduces the need for extensive education during the sales process.

Secondly, related to this, an ideal customer profile also includes companies with high electricity consumption in the market where the PPA is sold. This is because the case company's asset portfolio consists of solar projects with a high electricity output, and the goal is typically to have one customer per solar project that purchases approximately 70–100% of the total output. This study focuses on the Finnish market, where the case company has solar projects starting from 90 MW and above. As a result, the contract volumes are large, and the customer ideally needs to have high electricity consumption in Finland.

This study uses three brackets for electricity consumption: low (0–60 GWh), medium (60–120 GWh), and high (120–180 GWh). Exact numerical values are not used because the data in the CRM system is already categorized in this way, and it is often difficult to obtain precise electricity consumption figures from companies. Therefore, the data is analysed using these predefined brackets.

Lastly, the case company categorizes companies into three sectors: energy-intensive industry, commercial and services, and infrastructure. The energy-intensive industry

category includes sectors such as manufacturing and heavy industry (e.g., metals, chemicals, pulp and paper). The commercial and services category includes retail companies, technology firms, and other service-based organizations. The infrastructure category includes transport, telecommunications, and other large infrastructure operators. Next, the dataset used in this study is presented.

3.2.2 Data

The data set consists of 73 Finnish grid-connected solar PPA sales opportunities extracted from the company's Salesforce CRM system. The data include both currently active and historically recorded opportunities within the Finnish market. Each observation in the dataset represents one individual sales opportunity.

The CRM system stores structured information regarding the status of each opportunity, buyer characteristics, and account-level background information. The nurturing stage is internally defined as a phase in which the customer is considered a viable and relevant prospect but is not yet ready to proceed with procurement or contractual negotiations. Opportunities in this stage are intentionally maintained within the sales pipeline; however, their active progression is temporarily paused. In other words, not all leads pass through the nurturing stage. Only those that are not ready to proceed further in the sales pipeline for various reasons are placed in this stage. The case company's definition of nurturing aligns with the conceptualization of stagnation or waiting within the sales process examined in this study.

3.3 Variables and operationalization

The dependent and independent variables included in the analysis are defined and operationalized as follows.

3.3.1 Dependent variable

The dependent variable is nurturing stage (Stage). It is a binary variable indicating whether a sales opportunity is classified in the nurturing stage.

The classification is classified as follows:
1 = Opportunity is in the nurturing stage
0 = Opportunity is in any other stage of the sales process

Within the context of this study, the objective is to examine which factors lead to leads ultimately stagnating in the sales pipeline, meaning that in the case company's process they end up in the nurturing stage. Binary values are used, and it is not relevant to examine the other sales stages individually. Therefore, the alternative value is coded as 0, representing any stage other than nurturing.

3.3.2 Independent variables

Buyer maturity is the primary independent variable. It reflects the assessed readiness of the customer organization to proceed toward a potential agreement.

The variable is classified as follows:
0 = Low maturity
1 = Medium maturity
2 = High maturity

Higher values indicate greater organizational readiness. The variable is treated as ordinal and entered into the regression model as a quantitative predictor, assuming a linear effect across maturity levels.

Electricity consumption serves as a proxy for potential deal size and customer relevance. It is classified as follows:

0 = Low consumption

1 = Medium consumption

2 = High consumption

This variable is treated as ordinal and entered into the regression model as a quantitative predictor.

Finally, industry indicates the sector in which the customer operates. Differences across industries may reflect variation in internal processes, procurement structures, and strategic priorities.

The categories are:
Energy-intensive industry
Commercial and services
Infrastructure

Industry is included in the analysis as a categorical variable using dummy coding. In this approach, one industry category serves as the reference group, and the regression coefficients of the remaining categories represent their difference relative to this reference category.

Table 1. Variable definitions and operationalization.

Variable	**Type**	**Operationalization**	**Coding**	**Role**
Stage (Nurturing)	Binary	Opportunity in nurturing stage	0=other stage, 1=nurturing	Dependent
Buyer maturity	Ordinal	Assessed customer readiness	0=low, 1=medium, 2=high	Independent
Electricity consumption	Ordinal	Electricity usage category	0=low, 1=medium, 2=high	Independent
Industry	Categorical	Industry group	3 categories dummy coded	Control

3.4 Analytical method

This study examines which factors are associated with a sales opportunity being placed in the nurturing stage. The dependent variable is binary: an opportunity is either in the nurturing stage (1) or in another stage of the sales process (0). Because the dependent variable takes only two possible values, linear regression is not an appropriate analytical technique. For this reason, logistic regression analysis is employed.

Logistic regression models the probability that an observation belongs to a specific category, in this case, the probability that an opportunity is in the nurturing stage. Rather than directly predicting a value of 0 or 1, the method estimates a probability that is transformed into log-odds using the logit function. In practical terms, the model evaluates how changes in the independent variables affect the likelihood that an opportunity remains in a waiting or stagnation state within the sales pipeline.

The analysis was conducted in two stages. In the first model (Model 1), buyer maturity and electricity consumption were included as independent variables. The purpose of this model was to examine whether customer organizational readiness and electricity

consumption level are associated with the likelihood of an opportunity entering the nurturing stage.

In the second model (Model 2), industry was added as a control variable. The inclusion of industry allows assessment of whether the observed effect of buyer maturity is independent of structural differences across sectors. In other words, Model 2 tests whether buyer maturity remains statistically significant after accounting for potential industry-related effects.

Results are interpreted using regression coefficients and odds ratios. The regression coefficient indicates the direction of the relationship whether an increase in the independent variable increases or decreases the probability of being in the nurturing stage. The odds ratio provides a more intuitive interpretation of the magnitude of the effect. For example, an odds ratio below 1 indicates that an increase in the predictor reduces the likelihood of nurturing.

Model fit was assessed using the likelihood ratio test, which evaluates whether the inclusion of explanatory variables improves model fit compared to an intercept-only model. In addition, model discrimination was evaluated using the area under the receiver operating characteristic curve (AUC). The AUC indicates how well the model distinguishes between nurturing and non-nurturing opportunities. Statistical significance was evaluated at the 5% level.

3.5 Validity and limitations

Validity refers to how well the metrics used in the study describe the phenomena they are intended to measure (Bell et al., 2022). In quantitative research, ensuring validity is important because it enables the assessment whether the metrics of the variables truly correspond to the theoretical concepts being studied. In this study, the key variables are based on data obtained from the CRM system of the case company. These variables directly correspond to how the organization itself classifies leads and their characteristics

at different stages of the sales process. Since the variables reflect the company's practical sales management practices, they can be considered to have so-called face validity. In other words, the metrics appear to describe the phenomena they are intended to measure (Bell et al., 2022). For example, the stages of the sales pipeline and the characteristics of leads directly correspond to the company's practical processes in managing sales opportunities.

Limitations, on the other hand, refer to factors related to the research design, data, or metrics that may affect how the research results should be interpreted (Bell et al., 2022). Several limitations related to measurement and data should be noted in this study. First, buyer maturity is based on internal assessments recorded in the CRM system. This classification is usually based on the salesperson’s view of how much previous experience the potential customer has with PPAs and how ready they are to participate in the procurement process. As a result, the assessments may contain some subjectivity and may not fully reflect the customer’s actual skills or experience. In addition, the information in the CRM system is not always completely up-to-date, as its updating depends on the activities of the sales team and the timing of updates. As a result, some leads may be classified based on incomplete or outdated information, which can introduce measurement error into the variable.

A similar limitation is related to the measurement of electricity consumption. In the data, electricity consumption is presented in predefined consumption categories, rather than as precise verified consumption figures. These categories are based on estimates used in the CRM system, which may be based on, for example, public information, customer discussions or the salesperson’s own estimate. Therefore, the reported electricity consumption may not fully reflect the company’s actual consumption. Although the use of classifications corresponds to the case company’s practical way of assessing potential customers, it may still contain some measurement inaccuracy.

In addition to the limitations related to the metrics, the scope of the data also affects the interpretation of the results. The study is based on data from a single organization in the Finnish PPA market, which limits the generalizability of the results to other organizations or market environments. Sales processes, customer characteristics and market practices may vary between companies and industries, which is why the results should be interpreted primarily in the context of the case company. In addition, the relatively small size of the data (N = 73) requires a cautious approach to statistical significance and the magnitude of effects. With a small number of observations, individual cases can affect the results relatively much, which is why the results can be considered indicative rather than definitive conclusions.

Despite these limitations, the data based on the CRM system also has significant methodological strengths. The data is based on actual recorded sales opportunities rather than questionnaire responses collected afterwards, which reduces the risk of recall bias and better reflects the actual operations of the organization. Additionally, opportunity-level data allows for the examination of lead progression through a real sales pipeline. This strengthens the internal validity of the study and enables the analysis of the connections between lead characteristics and sales outcomes in a real business environment (Bell et al., 2022).

4 Results

This chapter presents the findings in their raw form. The next chapter interprets these findings in relation to the literature review.

4.1 Descriptive statistics

The final dataset consists of 73 grid-connected solar PPA sales opportunities within the Finnish market. Of these, 34 opportunities (46.6%) were classified in the nurturing stage, while 39 opportunities (53.4%) were in other stages of the sales process.

Table 2. Distribution of opportunities by stage (N=73).

Stage	Frequency	Percent
0	39	53.42
1	34	46.58

Cross-tabulation analyses were used to examine whether nurturing status differs by buyer maturity level, electricity consumption category, and industry group.

Buyer maturity level was strongly associated with nurturing status ($\chi^2(2)=19{,}03$, $p<.001$). The majority of nurturing opportunities (67.7%) fell into the low maturity category, while non-nurturing opportunities were more common among buyers with medium and high maturity levels.

Electricity consumption was also statistically significantly associated with nurturing status in a two-dimensional analysis ($\chi^2(2)=13{,}88$, $p=.001$). However, the distribution did not show a clear consistent increasing or decreasing trend between consumption categories.

Differences between industries were also statistically significant in the bivariate analysis ($\chi^2(2)=7{,}03$, $p=.030$). Nurturing opportunities were relatively more common in commercial and service-based companies compared to infrastructure and energy-intensive companies.

4.2 Logistic regression analysis

To examine the factors associated with the likelihood of opportunity ending up in the nurturing stage, binary logistic regression analysis was conducted.

4.2.1 Model 1

The first model included buyer maturity and electricity consumption as predictors. The model was statistically significant (Likelihood Ratio $\chi^2(2)=6{,}87$, $p=.032$), indicating that the predictors jointly improved model fit compared to the intercept-only model.

Buyer maturity level was negatively related to nurturing status ($\beta = -0{,}433$, $p = .030$). Corresponding odds ratio ($OR \approx 0{,}65$) shows that a one-level increase in buyer maturity level reduces the odds of being in the nurturing stage by about 35%.

Electricity consumption was not a statistically significant predictor ($p = .798$). The model's discrimination power was at an acceptable level (AUC = 0.735).

4.2.2 Model 2

A second model was estimated by adding industry as a control variable.

The entire model was statistically significant (Likelihood Ratio $\chi^2(4)=11.92$, $p=.018$), indicating that the explanatory variables improved the fit of the model. Buyer maturity level remained statistically significant ($\beta = -0.427$, $p = .035$), suggesting that the negative association between maturity level and nurturing status remains even when the effect of electricity consumption and industry is fixed.

Electricity consumption was not a statistically significant explanatory factor in this model either (p = .259).

Industry was not statistically significant overall in the multivariate model (Type III test, p = .092), suggesting that the industry differences observed in the bivariate analysis are weakened when the effect of buyer maturity level is taken into account.

Table 3. Logistic regression results (Model 2).

Variable	**β**	**Standard Error**	**Odds Ratio**	**p-value**
Buyer maturity	-0.427	0.203	0.65	0.035
Electricity consumption	0.219	0.194	1.24	0.259
Industry: Commercial & Services	1.352	0.893	3.86	0.130
Industry: Energy-intensive	0.063	0.824	1.07	0.939

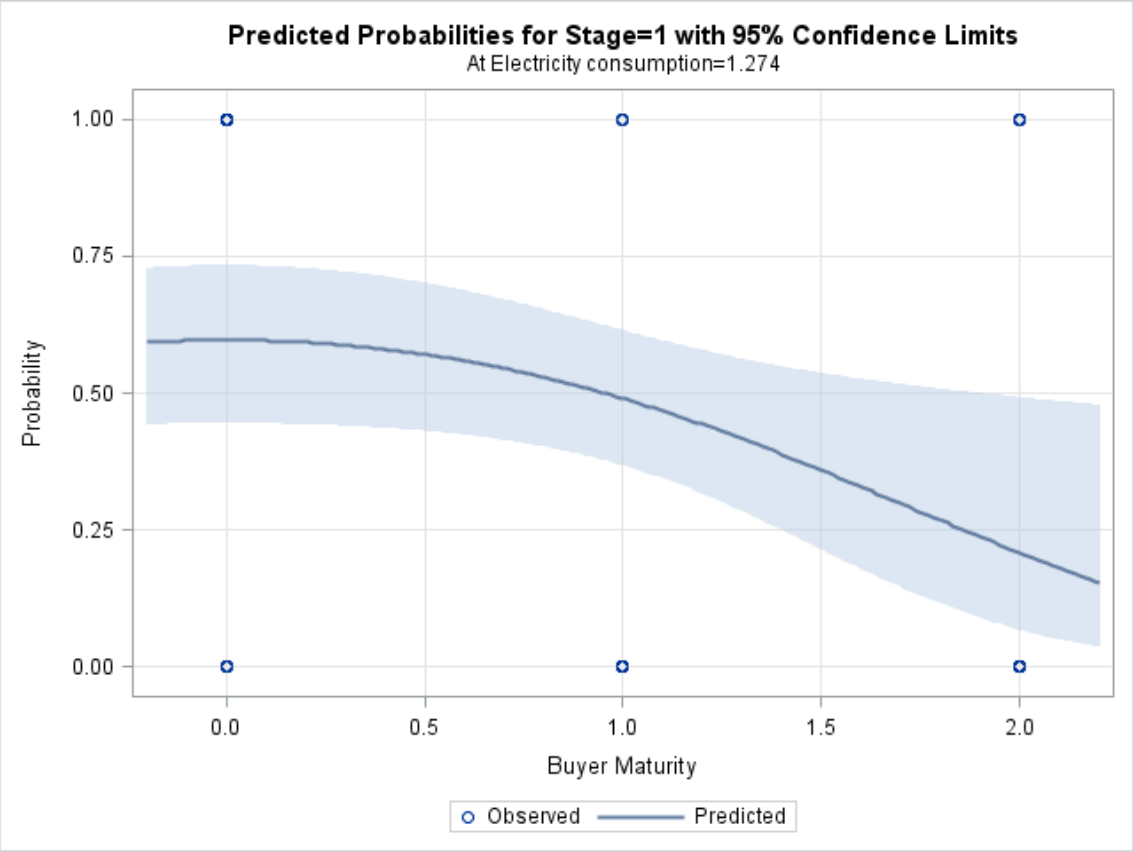

Figure 3. Predicted probability of nurturing by buyer maturity.

4.3 Summary of results

Overall, the results show that buyer maturity is the most important factor associated with accumulation in the nurturing stage. Higher buyer maturity statistically significantly reduces the likelihood that an opportunity will remain in the nurturing stage of the sales pipeline. In contrast, electricity consumption was not found to be associated with nurturing status, and the effect of industry weakened when buyer maturity was constant in the analysis. The results suggest that accumulation in the nurturing stage is more strongly related to buyer readiness characteristics than to market structural factors.

5 Discussion

5.1 Overview of findings

This study examined factors associated with stagnation in the B2B sales process. The empirical analysis was based on CRM data from a renewable energy company and specifically examined the likelihood of an opportunity moving into the nurturing stage. In this study, the nurturing stage was interpreted as a form of stagnation in the sales pipeline. The results showed that almost half of the opportunities examined ended up in the nurturing stage. This is a surprisingly high proportion of opportunities that remained stagnant during the sales cycle. The finding that nearly half of all opportunities end up in a stagnant state highlight that stagnation is not a marginal issue, but a central characteristic of a complex B2B sales processes. This finding is consistent with Haque (2019), where many leads were found to stay in one stage for their entire lifecycle. A similar phenomenon was also observed in this study.

Based on these findings, the sales process of the case company may not fully correspond to a clear step-by-step model, in which leads systematically progress towards a purchase decision. In previous research, B2B sales processes have often been described as step-by-step structures. For example, Smith, Gopalakrishna, and Chatterjee (2006) presented a three-step model consisting of lead generation, converting leads into sales meetings, and converting meetings into sales. A similar step logic was also applied by Jaramillo and Marshall (2004) in the banking context. In addition, Paschen, Wilson, and Ferreira (2020) presented a more detailed seven-step sales process, which includes prospecting, pre-approach, approach, presentation, overcoming objections, close, and follow-up.

The sales process of the case company differs from these models in terms of the nurturing phase, which has not been explicitly identified in the previous literature reviewed in this study. One possible explanation for this difference may be related to the specific characteristics of the business environment of the case company, where sales are based on complex and long-term contracts, such as PPAs. In such complex B2B sales situations,

decision-making processes can involve multiple stakeholders and long evaluation periods that may explain the existence of the nurturing stage in the case company's sales process. Rodríguez et al. (2020) stated that complex B2B sales processes typically involve multiple actors on both the selling and buying sides, often organized as buying centers, which frequently results in extended sales cycles. However, neither they nor others have identified this type of nurturing stage in the sales process literature, suggesting that it may be unique. On the other hand, Virtanen et al. (2015) describe a similar stage phenomenon with the term "cancelled", which refers to the end of the sales process without a purchase decision. According to Virtanen et al. (2015), this outcome is typical in situations where customers consider different options without committing to a purchase, decision-making is fragmented, real needs are difficult to determine, and long lead times delay or prevent the final decision. Although the nurturing phase used by the case company is conceptually different from the cancelled phase described by Virtanen et al. (2015), both reflect the uncertainty and complexity of complex B2B sales processes.

Notably, the existence of a separate nurturing phase may indicate a different management practice for handling uncertain sales opportunities. Unlike the cancelled phase described by Virtanen et al. (2015), where the sales process ends without a purchase decision, in the nurturing phase the sales opportunity remains in the sales pipeline. In this case, the opportunity has not been actively pursued, but it has not been definitively closed either. In complex B2B environments, where purchasing processes can be lengthy and customer needs evolve over time, such a phase may allow potential future deals to be preserved rather than classifying sales opportunities as prematurely closed.Alternatively, from an operations management perspective, keeping a large number of such opportunities in the pipeline can also lead to the accumulation of partially processed units in the system. In the operations management literature, such units are referred to as work-in-progress (WIP), units that have already entered the process but have not yet reached the final outcome (Tan et al., 2018).

Furthermore, the results show that buyer maturity is the most important factor associated with stalling. Opportunities with lower buyer maturity levels were significantly more likely to remain in the nurturing stage. In contrast, higher buyer maturity levels reduced the likelihood of stalling. Electricity consumption and industry were not statistically significant predictors of stalling in the multivariate analysis. According to Storbacka and Pennanen (2014), high readiness reflects customers' ability to function in the market, carry out required transactions, and make use of the purchased offering in their own operations. The results of this study further support these findings.

The results suggest that stalling in B2B sales processes is not necessarily primarily related to the structural characteristics of the deal or the market environment. Instead, stalling appears to be more related to the readiness of the buying organization to move forward in the buying process. From a process perspective, this means that opportunities accumulating in the sales pipeline may be primarily due to a lack of demand-side readiness, rather than sales management factors. However, the phenomenon is unlikely to be entirely straightforward, as the accumulation of opportunities may also be influenced by factors on the seller side of the sales process. Although buyer maturity appears to be an important explanatory factor, it is important to note that the observed relationship may also be due to other, unmeasured factors. For example, the salesperson's actions, the quality of the customer relationship, or the internal priorities of the sales organization may influence whether an opportunity is actively pursued or moved to the nurturing phase. Therefore, the results should not be interpreted solely as buyer-related factors, but rather as part of a broader whole, in which buyer readiness and the choices made by the salesperson work together. The following sections examine these results in relation to the literature on B2B sales processes, buyer readiness and operations management.

5.2 Explaining stagnation from a buyer readiness perspective

5.2.1 Customer-side explanation

The results of this study suggest that pipeline stalling is strongly related to buyer maturity. Opportunities that were related to customers with lower maturity levels were significantly more likely to remain in the nurturing phase. This finding supports the view that stalling may be caused by the buyer's side of the sales interaction.

Previous literature emphasizes that organizational readiness plays a key role in complex B2B purchasing decisions. Storbacka and Pennanen (2014) link customer readiness to an organization's ability to make sense of the offering, collect needed information, and effectively execute the purchase decision. When this readiness is limited, the decision-making process can slow down as internal stakeholders within the organization evaluate alternatives or strive to form a common vision. Vaittinen et al. (2019) further conceptualize service readiness as an organization's willingness to adopt and its ability to utilize new services. They argue that even if the service provider recognizes the value of the offering, the customer organization may not necessarily perceive this value. Consequently, this raises the question of whether, even if buyers are not yet mature, stagnation in the process could also be influenced by more effective communication of value. As Vaittinen et al. (2019) argue, value may be clear to the seller but not necessarily to the buyer, suggesting that the successful communication of value may play a role in preventing opportunities from stalling.

Importantly, Vaittinen et al. (2019) state that customer organizations need to have a certain level of service readiness in order to be able to adopt new services. This finding could also be supported by the results of this study, which showed that sales opportunities related to customers with lower maturity levels were more likely to end up in the nurturing phase. This suggests that if the customer organization is not sufficiently ready to adopt the offered solution, the sales process may stall. However, it is unlikely that this alone explains all leads, given their substantial number. It is also possible that the

proportion could have been reduced through sales activities more strongly focused on value communication.

A similar explanation to service readiness can be found in the Technology Acceptance Model (TAM), which states that system features influence its adoption through two key factors: perceived usefulness and perceived ease of use (Marangunić & Granić, 2015). Perceived usefulness refers to the extent to which an individual believes that using a system will improve their job performance, while perceived ease of use describes how easy the system is perceived to be to use (Marangunić & Granić, 2015). From this perspective, opportunities that reach the nurturing stage may be related to situations where the customer's technology acceptance is lower, which in turn may reduce the willingness to move forward in the buying process. In this case, lower customer maturity may also reflect a lower readiness to adopt new technologies or services.

All of the above-mentioned interpretations are also in line with the information asymmetry perspective presented by Habel et al. (2025). According to this view, stagnation can arise in situations where buyers and sellers do not have sufficient information about each other's needs and capabilities. If the customer organization has not yet clearly defined its needs or evaluated possible solutions, sales opportunities may remain in a waiting state until sufficient understanding of the situation is developed to support decision-making.

In summary, these perspectives suggest that stagnation in the sales pipeline can often be caused by factors on the buyer side. Especially in situations where the customer organization lacks sufficient readiness, understanding, or the necessary information to support decision-making, sales opportunities may remain in a waiting phase during the sales process. However, it is clear that such a large proportion of stagnation cannot be explained solely from the buyer's perspective, there must also be explanations and ways to reduce and prevent it from the seller's side, which will be discussed next.

5.2.2 Seller-side explanation

Although the maturity level of the buying organization appears to be a key factor in the stagnation of sales opportunities, factors related to the operations of the sales organization can also influence how stagnation manifests itself in the sales pipeline.

Previous research has suggested that structural factors in the sales process can lengthen sales cycles and lead to stagnation. For example, Trailer and Dickie (2006) identify factors such as increased complexity on the buy side and mismatches between the buying and selling processes that can slow down the sales process. However, the results of this study suggest that observable characteristics of the sales opportunity, such as industry or electricity consumption, do not significantly explain stagnation when the maturity level of the buying organization is taken into account. This suggests that stagnation in the sales pipeline may be more related to the readiness of the buying organization to move forward in the buying process than to the structural characteristics of the sales opportunity itself. In other words, while structural factors may influence the length of sales cycles at a broader process level, the results of this study suggest that at the level of individual sales opportunities, buyer readiness appears to be a more central factor in explaining why sales opportunities remain in a pending state.

At the same time, the practices of the sales organization can influence how such stalled opportunities are handled in the sales pipeline. Previous research highlights that stagnation can arise in situations where opportunities are not actively managed or systematically nurtured through the different stages of the sales process. Beam (2006) suggests that even a full sales pipeline will not produce results if sales teams do not consistently nurture opportunities and monitor their progress through the different stages of the process. In the case company examined in this study, moving an opportunity to the nurturing stage would seem to mean a situation where the opportunity is no longer actively nurtured in the sales process. Instead, the opportunity remains in the sales pipeline without systematic follow-up until circumstances change. In this sense, moving an opportunity to the nurturing stage can be interpreted as a decision not to actively nurture

the opportunity at that time. From this perspective, Beam's (2006) findings seem to be well applicable in the context of this study as well. However, it cannot be conclusively stated that leads in the nurturing stage are not systematically reactivated. The inclusion of a nurturing stage in the case company's sales pipeline may be strongly related to the nature of complex B2B sales, where sales cycles are long. As a result, many leads may indeed require time to mature before closing a deal becomes possible. This interpretation is supported by the findings of Rodríguez et al. (2020), who state that complex B2B sales processes typically involve multiple actors on both the selling and buying sides, often organized as buying centers, which frequently leads to extended sales cycles. It could therefore be argued that such sales environments inherently require a form of nurturing.

This aligns with an alternative interpretation where some of the waiting in the sales process may also be intentional. Liu et al. (2015) and Leach et al. (2016) describe the concept of active waiting, in which sales organizations consciously maintain relationships with potential customers while waiting for a more favourable time to make a purchase decision. In long and complex B2B sales cycles, sales teams may intentionally keep sales opportunities in the sales pipeline while the customer's internal readiness to move forward in the purchase process develops. This perspective may partly explain the high number of leads in this study that fall into the nurturing phase. As the name suggests, the purpose of the nurturing phase may be to maintain contact with potential customers and reactivate the sales opportunity when the timing is more favourable from the customer's perspective. For this reason, stagnation in the sales pipeline should not always be interpreted as a sign of inefficiency. In some situations, waiting may rather reflect strategic timing decisions or the natural progression of purchasing processes in complex organizations. However, it remains questionable whether this is entirely reasonable from a business process perspective, given the large number of active and incomplete sales opportunities. This can also be seen as slowing down the overall process, which will be examined next through the lens of operations management literature.

5.3 Operations management perspective

Although the previous sections mainly examined stagnation from the perspective of buyer-seller interactions, the phenomenon can also be understood from an operations management perspective. In the industrial management literature, organizational operations are often viewed as processes in which units move through multiple stages toward a final outcome (Schmenner & Swink, 1998). Although these concepts have traditionally been applied to manufacturing systems, they can also provide useful perspectives for examining B2B sales processes. Literature from the same areas suggest also that waiting and non-value-added activities represent waste and reduce process efficiency (Rahani and Al-Ashraf, 2012). The data in this study suggest that a considerable amount of waiting occurs within the sales pipeline, which may negatively affect the overall efficiency of the process.

From this perspective, the sales opportunities that are in the waiting stage in nurturing can be interpreted as units progressing through a step-by-step business process. Instead of physical products, the units in the system consist of sales opportunities that move through the various stages of the sales pipeline toward the conclusion of the deal. Opportunities that remain in intermediate stages without progress can therefore be conceptualized as WIP units (Tan et al., 2018). Spearman (1997) explicitly argues that waiting times originate from excessive WIP, noting that when additional work-in-progress is introduced into a system, flow times increase. It could therefore be possible that when a lead is placed in the nurturing stage, it increases the level of WIP in the pipeline, which in turn may slow down the progression of other opportunities through the process. However, this is not entirely clear, as the nurturing stage is not strictly part of the sales stages, since not all leads pass through it, unlike in industrial production lines where all units move through the same stages. It is still evident that these represent incomplete sales opportunities and can therefore be considered as WIP units.

This relationship can also be explained by Little's Law, which states that the number of units in the system is determined by the throughput rate and the time that units spend

in the system (Sato & Kawai, 2007). In the context of the sales pipeline, this means that as opportunities stay in the system longer, the amount of WIP increases. If opportunities placed in the nurturing stage remain in the pipeline for a long time, the time they spend in the system increases, which in turn increases the total amount of WIP. As the amount of work in progress increases, the responsiveness of the process can decrease and the progress of opportunities through the pipeline can slow down. However, this cannot be said to be that straightforward, because the throughput rate is not constant in the case company's sales process, as the sales process lasts from 6 to 12 months before the opportunity is closed. Sato and Kawai (2007) stated that when the throughput rate remains constant, additional WIP will inevitably lead to an increase in the wait time. This calls into question the application of WIP to B2B sales contexts, because these are rarely constant. The question therefore concerns how constant the throughput rate must be for Little's Law to be applied perfectly. Industrial production processes, to which this principle is often applied, are by nature more precise in terms of throughput times, which likely also partly explains why WIP has not been applied as frequently to other types of processes. Nevertheless, in this study, as nearly half of the opportunities remained in the nurturing stage, it could be argued that there is a considerable amount of WIP in the process. Based on Little's Law, this suggests that there must be some effect on throughput time, since these nurturing-stage leads are periodically reactivated and pushed toward completion.

From this perspective, a large number of opportunities in the nurturing stage can affect the flow of the entire sales process. While individual opportunities may be intentionally held in a waiting state to develop customer readiness, their accumulation can still have an impact on the efficiency of the sales pipeline. In other words, while waiting is often a natural part of complex B2B sales processes, the accumulation of unfinished opportunities can make it difficult to manage and advance other opportunities in the sales pipeline. This suggests that stagnation in the nurturing stage may not only reflect buyer readiness but may also have broader implications for the efficiency and flow of the entire sales process. However, it is important to remain critical regarding the direct application of

WIP and Little's Law to sales processes, given that throughput times are rarely constant, particularly in complex B2B sales.

6 Conclusion

6.1 Summary of findings

This study provides new insights into why sales opportunities stagnate in B2B sales processes by demonstrating the central role of buyer maturity. The research question was answered well, and the set research objectives were mostly met. In particular, the study succeeded in identifying a key explanatory factor for stagnation and in connecting the literature on sales and operational management.

The empirical results clearly showed that the maturity of the buyer organization is the key factor explaining the ending of sales opportunities in the nurturing phase, in other words, stagnation. A higher maturity level statistically significantly reduced the probability that a sales opportunity will remain in the waiting state. In contrast, electricity consumption and industry did not prove to be significant explanatory factors in the multivariate model.

In light of the interpretations in the Discussion chapter, the results particularly support the buyer-side explanatory models. Stagnation appears primarily as a phenomenon related to the readiness of the buying organization, as presented in terms of service readiness, technology acceptance and information asymmetry. At the same time, the results suggest that the practices of the selling organization, such as a possible lack of active monitoring or strategic “active waiting”, can affect how stagnation manifests itself in the sales pipeline.

From an operations management perspective, the results support the idea that sales opportunities can be seen as work-in-progress units, the accumulation of which slows down the flow of the entire process. Thus, the study succeeded in theoretically combining two different areas of literature and providing a new perspective on stagnation in the sales process. However, the direct application of WIP and Little’s Law to sales processes

should be approached with caution, given that throughput times are rarely constant, especially in complex B2B contexts.

6.2 Implications

The study has significant managerial and theoretical implications. From a managerial perspective, the key finding is that sales organizations should pay special attention to assessing customer maturity levels early in the sales process. The results show that customers with low maturity levels are significantly more prone to stagnation, which can lead to inefficient allocation of resources. This highlights the need to develop systematic assessment practices and allocate sales resources more efficiently, for instance, to early-stage qualification and prioritization. In addition, organizations should actively develop customer readiness understanding, for example through communication and training, so that the sales process progresses more smoothly.

At the same time, the results emphasize the importance of active management of the sales pipeline. Simply maintaining sales opportunities without systematic progress can lead to the accumulation of work-in-progress units and weaken the efficiency of the process. On the other hand, the study shows that not all stagnation is necessarily negative, but some of it can be strategic waiting related to the temporal nature of the customer's buying process.

From a theoretical perspective, the study contributes by combining B2B sales literature and operations management concepts. In particular, applying the work-in-progress perspective to the sales process offers an alternative way to view sales opportunities as moving units in the process. The study extends previous literature by showing that stagnation is not only a structural problem of the process but is significantly affected by the capabilities of the buyer. In addition, the study refines the concept of stagnation by distinguishing between passive delay and strategic waiting.

6.3 Limitations and future research

The study has several limitations that should be considered when interpreting the results. First, the data is based on CRM data from one company in one market, which limits the generalizability of the results. Second, the size of the data is relatively small, which may affect the reliability of statistical analyses and the robustness of the results. In addition, the key variables are partly based on estimates and classifications, which may contain measurement error. In particular, buyer maturity is a subjective assessment that can vary between sellers and may not fully reflect the customer's actual readiness. Measuring electricity consumption through categories can also simplify reality.

Future research would be useful to examine the phenomenon with larger and more diverse data and across different industries, in order to improve the generalizability of the results. In addition, longitudinal research could provide a deeper understanding of how stagnation develops over time at different stages of the sales process. Qualitative research methods could, in turn, help to better understand the interaction between the buyer and seller sides in stagnation situations.

In addition, further research would be suggested to examine the role of active waiting in more detail and to distinguish more systematically between strategic delay and unwanted stagnation. It would also be useful to examine in more detail the impact of other factors on stagnation, such as the operating methods of the sales organization, the quality of communication, and decision-making structures. More broadly, the findings suggest that improving sales performance in complex B2B environments may require a shift from process optimization toward better assessment and understanding of customer readiness.

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Appendices

Appendix 1. Use of artificial intelligence

Artificial intelligence (AI) tool ChatGPT was used in a limited capacity to support the writing process of this thesis. Specifically, AI was utilized for language refinement and improving the academic tone of the text. Prompts such as “enhance this text academically” were used to revise phrasing and clarity.

The use of AI was restricted to editing and improving existing text written by the author. AI was not used for generating original research content, designing the study, conducting analysis, or interpreting the results.

All content was critically reviewed and approved by the author, who retains full responsibility for the final text and its accuracy.