

CASE STUDY: ROLE OF INTERNAL SERVICE QUALITY IN AFFECTING CUSTOMER LOAYLTY IN A PAYMENT SERVICE ORGANIZATION

Lappeenranta-Lahti University of Technology LUT

2023

Aleksi Tauru

ABSTRACT

Lappeenranta–Lahti University of Technology LUT LUT School of Business and Management Business Administration Master in International Business and Entrepreneurship

Aleksi Tauru

CASE STUDY: ROLE OF INTERNAL SERVICE QUALITY IN EFFECTING CUSTOMER LOAYLTY IN A PAYMENT SERVICE ORGANIZATION

Master's Thesis

2023

59 pages and reference list, 5 figures, 2 tables, and 0 appendices.

Keywords: Operations, Operations Management, Product-Service system, operational processes, Customer loyalty, internal service quality

Supervisors: Associate Professor, Docent Mikko Pynnönen, and Associate Professor Markku Ikävalko

The objective of this Thesis is to study the importance of internal service quality in an organization that operates in a payment service business by using internal service quality model and service-profit chain model for the analysis. The idea is to study the role of internal service quality in affecting customer loyalty in product-service system (PSS) organizations, how the case organization performs in terms of the themes related to internal service quality and how the case organization can develop its internal service quality in the future. This case study is conducted by taking an approach of qualitative semi structured interview model. Interviewed employees are operating in the frontline of the operations.

According to the findings of this Thesis it is clear that in the product-service system business model the customer loyalty is a very important objective for organizations to focus on and organizations that operate in that field should develop those actions that strengthen customer satisfaction and further customer loyalty to succeed in a competitive and constantly evolving business environment. For the case organization this Thesis emphasizes the significance of internal service quality and organizational culture and how the organization can develop its operating models, processes and tools in the future to increase customer loyalty.

TIIVISTELMÄ

Lappeenrannan–Lahden teknillinen yliopisto LUT LUT-kauppakorkeakoulu Kauppatieteet

Master in International Business and Entrepreneurship

Aleksi Tauru

TAPAUSTUTKIMUS: SISÄISEN PALVELULAADUN MERKITYS ASIAKAS-LOJALITEETTIIN JA SEN VAHVISTAMISEEN MAKSUPALVELULIIKE-TOIMINNAN ORGANISAATIOSSA

Kauppatieteiden pro gradu -tutkielma

2023

59 sivua ja lähdeluettelo, 5 kuvaajaa, 2 taulukkoa ja 0 liitettä.

Tarkastajat: Apulaisprofessori, Dosentti Mikko Pynnönen, ja Apulaisprofessori Markku Ikävalko

Avainsanat: Sisäinen palvelulaatu, tuote-palvelu -liiketoimintamalli, maksupalvelu, asiakaslojaliteetti

Tämän Pro Gradu tutkielman aiheena on sisäisen palvelulaadun merkitys maksupalveluliiketoiminnassa toimivassa organisaatiossa. Tarkoituksena on tutkia, mikä on sisäisen palvelulaadun merkitys asiakaslojaliteetin vahvistamisessa tuote-palvelu liiketoimintamallin organisaatioissa, miten tutkittavassa organisaatiossa suoriudutaan sisäisen palvelulaatuun liittyvissä teemoissa ja miten sisäistä palvelulaatua voitaisiin kehittää tulevaisuudessa. Tapaustutkimus on toteutettu puolistrukturoituina kvalitatiivisina teemahaastatteluina organisaation etulinjassa toimivien työntekijöiden ja managerien kanssa.

Tutkimuksessa saavutettujen havaintojen ja analyysin perusteella voidaan sanoa, että tuotepalvelu -liiketoimintakonseptissa asiakaslojaliteetti on merkittävä osa liiketoimintamallissa suoriutumista. Organisaatioiden, jotka toimivat kyseisessä liiketoimintamallissa, on tärkeää kehittää niitä toimia, jotka vahvistavat asiakastyytyväisyyttä ja siten asiakaslojaliteettia mahdollistaakseen menestyksensä jatkuvasti muuttuvassa liiketoimintaympäristössä. Tapausorganisaatiolle tutkimus antaa pohjaa sisäisen palvelulaadun ja organisaatiokulttuurin merkitykselle ja sille, kuinka sisäisiä palveluprosesseja, työkaluja ja toimintamalleja voitaisiin kehittää tulevaisuudessa entistä paremmin asiakaslojaliteetin vahvistamiseksi.

LIST OF ABBREVIATIONS

- **GDPR = General Data Protection Regulation**
- **ISQ = Internal Service Quality**
- **OM = Operations Management**
- **PSD2 = Payment Service Directive 2**
- **PSS = Product-Service System**

Table of contents

Abstract

List of abbreviations

1	INT	TRODUCTION1					
	1.1	Research Gap	2				
	1.2	Research Questions	4				
	1.3	Research methods and data	5				
	1.4	Theoretical Framework	7				
	1.4	1 Product-Service System	7				
	1.5	Key concepts and terminology	9				
	1.6	Delimitations and contribution	Э				
	1.7	Study Structure	1				
2	PR	ODUCT-SERVICE SYSTEM BUSINESS MODEL13	3				
	2.1	Lessons from the PSS research	3				
	2.2	Reasons for PSS business model adaption	5				
	2.3	Role of internal customer related operative excellence in PSS business model 10	5				
	2.4	Relationship between a payment service provider and a customer1	7				
3	RO	LE OF OPERATIONAL EXCELLENCE TO CUSTOMER LOYALTY18					
	3.1	Operational excellence	8				
	3.2	Value of a loyal customer	Э				
	3.1	Internal Service quality model	1				
	3.2	Service-profit chain	2				
	3.3	Service-profit chain in PSS context	4				
	3.4	Initiators of internal service quality	4				
4	RE	SEARCH METHODOLOGY	5				
	4.1	Methodology	5				
	4.2	Research Context	7				
	4.3	Case Organization	8				
	4.4	Business Context	9				

	4.5	Inte	erview Theme Structure	29
	4.6	Dat	a Collection	33
	4.7	Dat	a analysis	34
	4.8	Val	idity and Reliability	35
5	FIN	DIN	IGS AND ANALYSIS	37
	5.1	Ana	alysis of the themes	37
5.1.1 5.1.2 5.1.3		1	Organizational culture	37
		2	Communication between functions	40
		3	Meaningfulness and self-fulfillment opportunities	43
	5.1.	4	Leadership	46
	5.1.	5	Systems, tools, and processes	47
	5.2	Per	formance levels of the themes	48
6	DIS	CUS	SSION AND CONCLUSIONS	51
	6.1	nmary of the analysis	51	
	6.2	The	coretical Contributions	55
	6.3	Imp	plications for the case company	56
	6.4 Lin		nitations and Future Research	58
7	REI	FER	ENCES	60

1 INTRODUCTION

How much Operations Management (OM) affects organizations' success is not yet clear despite the centrality of the sector in organizations (Samson & Kalchschmidt 2019) and despite that operations management is a widely studied research area in Management study field. According to Taylor & Taylor (2009) the research in the Operations Management has shifted from individual sectors of operations such as manufacturing, scheduling, and inventory management towards more wholesome operations strategies as the economies are moving towards service-oriented business models.

According to study by Taylor & Taylor (2009), there has been increasing reliance on real context studies for example through direct observation more than simulation and modelling in OM field. This might occur because organizations are incomparable in nature in terms of products, culture, business models, and operations management, that there is an inevitable need for specific organizational studies to find out the right practices for individual organizations' own operations.

As Wang et al. (2021) note in their study, the business environment has shifted towards greater volatility and uncertainty as companies need to constantly evolve and take into account the technology leaps and customer demand heterogeneity in every industry. 'One solution for all' is most certainly not a successful business model in present business environment which raises a challenge for business operations as well. How can the operational functions be organized and developed to support companies in constantly changing environment is most certainly not an easy question to answer.

Constantly changing customer demand and environment have had an impact on the development of Product-Service System (PSS) as companies are attempting to increase the value of the business by creating products that are based on services (Tang et al. 2013). The goal of the PSS is to support infrastructure to stay on top of the competition, satisfy customer

needs and to be more environmentally friendly (Goedkoop et al. 1999), or as Wong (2004) describes, to involve both product and service side to deliver specific functionality. The functionality is not necessary owned by the customer but serving the needs of the customer nevertheless.

There is also more and more interest in the operations research field in how internal service quality can affect companies' profitability. As mentioned later in the Thesis, especially models like internal service quality model and service-profit chain model have been widely studied in the field as companies and researchers have shifted the focus from external service-side of the profit increasing possibilities in the organizations to the internal service-side.

1.1 Research Gap

Companies that operate in PSS business field, must move from product-thinking to systemthinking (Lee & AbuAli 2010). Taylor & Taylor (2009) noted that the operations sector research field must also emphasize more on the system-thinking from product-thinking. Employees must have the needed resources and connections to the customers to work efficiently and improve the provided functionality. PSS offering is often impossible without other companies being involved in it (Baines et al. 2007) and for this reason the functionality provided may work only when each contributor gives their stakes to the solution.

More research is still needed in the operations field. One research area that requires more contribution is the operational solutions of PSS. More empirical studies are needed to understand how PSS companies orchestrate their operations, what are their role in increasing customer satisfaction and loyalty, and further, organization's profitability (Baines et al. 2007) which is where this case study intends to find answers to.

In this case study the organization in question is operating in the payment industry market as a payment service provider for Finnish online merchants. Payment service providers can be assumed as Product-Service Systems as the functionality of the product-service offered is what keeps the customers using it, which is the definition of the PSS business model. Payment service providers are closely cooperating with the banking sector, regulative institutions, payment solution provider companies such as VISA and MasterCard and dozens of other companies but most of all with the merchants, the customers of the payment service functionality, who are using the provided functionality to offer multiple payment options to their customers.

The business environment of the payment service industry is definitely an uncertain business environment as the technology, systems and customer demands are constantly evolving. The regulations around the industry are controversially constantly tightening as, for example, in European Union, the GDPR regulations and Payment Service Directive 2 (PSD2 directive, Financial Supervisory authority 2019) have changed the business environment for payment service facilitators completely in the recent years. Operations of the payment service business must adapt to these changes in the regulations as well at the same time as they are fulfilling their customers' needs.

Operational processes have important role in customer satisfaction and customer loyalty. (Heskett, J. L. et al. 1994 and Kumar, Batista, & Maull, 2011). Kumar, et al. (2011) identify quality, dependability, and waiting time as the contributors of operational elements to the customer loyalty and Heskett, et al. (1994) employee retention and motivation which both emerge from internal service quality. Structured internal processes, high quality customer relationship management systems, and sufficient resources can enhance quality, dependability and promptness of the operational contributors to broaden customer loyalty. However there is a lack of knowledge in the field, on how can PSS companies orchestrate their operations to increase their customer loyalty (Beuren, et al. 2013). Payment service providers also must consider the regulation that affects their operations and how can they be organized and how the processes and systems and tools must be used to fulfill these regulations.

In this study, I am conducting a current-state analysis case study of a certain PSS organization's (later 'Case company') operational processes, especially focusing on the internal processes, systems, and resources that can have an impact on customer satisfaction and loyalty. The target is to find out problematic areas in the internal processes to enhance customer loyalty and to shed light on the Product-service system field of OM research, how the operations can be structured in PSS field and how could they be developed.

1.2 Research Questions

My case study of Company's operations intends to shed light on the previously highlighted research gaps in OM sector (Beuren, et al. 2013) and tries to find out what should be emphasized in PSS field operations and how can they be developed in future. My main research question is the following:

How the organizing of operations enhance customer loyalty?

Because this question is hard to answer without knowing the current situation supportive questions are needed. Firstly, the organization is a payment service provider in a Fin-tech industry, more specifically a payment provider which operates in a highly regulated business environment (Financial Supervisory Authority 2019 & Eur-lex.europa.eu. 2015) and because of that, the case company is a unique organization in many ways in comparison to other organizations which are not that heavily regulated. Secondly, the case company also has a young brand as it has only been operative for two years now and the processes and systems of the organization are constantly developing. Hence, the first supportive question is:

How have the operations of the case organization evolved in time?

The second supportive question is needed to analyze what works in this organization's operations and where the possible issues are occurring especially in the frontline of the operations where employees and customers are in contact. There could already be a hint of

what has worked and what has not as the employees have already had time to form their ways of working. The operations of the Company are scattered around two distant cities in Finland: Lappeenranta and Pori. This is why the findings can also deliver insight for other multi-located companies as when the employees work in different locations it is impossible to meet face-to-face daily with all the people in the operations function. Hence the following sub-question was needed:

What is the current status of organization's frontline operations?

Also, it needs to be understood how much internal service quality and the operations affect customer loyalty in general according to the existing literature. Thus the final supportive question is:

What is the role of internal operations in enhancing customer loyalty in PSS context?

The figure 1 below gives a clear picture of the main research question and the supporting sub-questions.

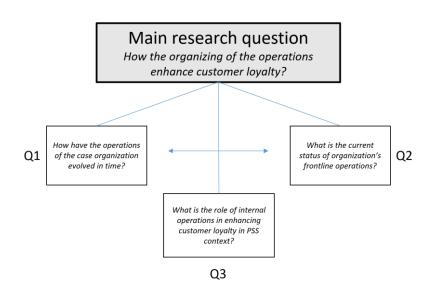


Figure 1- Research questions

1.3 Research methods and data

Qualitative method and semi-structured theme interview model is selected to be used in this case study to find answers to the designated research questions as it is essential to understand the actors' perspective (Alasuutari 2010) in the heart of the operations of the case organization. It would be impossible to understand how the operations of the organization formed in the beginning without the people involved in it and without studying how the employees experience the challenges in their operational work.

As the eventual objective and the context of this study is to understand case organization's individual operational journey and to increase the customer loyalty of a single organization, a current situation analysis case study is an appropriate method to investigate this phenomenon (Crowe et al. 2011). To highlight the specialty of the payment industry there are only few other organizations providing payment services in Finland for merchants (Pyylampi 2021) so the competition is scarce.

The objective in this case study is to interview different employees in the operations function in Pori and Lappeenranta to find out what is working in operations cooperation between the two locations and what should be developed. The idea is to organize semi-structured interviews with different employees from different operational jobs and also with their managers to understand the administrative perspective too. I interviewed five employees and two managers for this case study. Semi-structured interview model gives the interviewer an opportunity to guide the discussion to the topics that are in question but does not stress the interviewee too much to obtain information from different angles (Crowe et al. 2011) which is why semi-structured interview model was selected for this case study.

1.4 Theoretical Framework

The concept of Product-service systems (PSS) and the concept of operational excellence focusing on two different models: internal service quality and service-profit chain model work together as the framework for the thesis. The objective of the Thesis is to understand how to organize the operational solutions to enhance customer loyalty in a PSS organization. The framework is described shortly in following chapters.

1.4.1 Product-Service System

Product-Service system research has increased recently as organizations are seeking new opportunities to create competitive edge and alternative ways for their business models while also decreasing their environmental burden at the same time (Beuren, et al 2013). The idea of the PSS business model is to provide innovative functionality for the customers who do not necessarily need to own the functionality but do have the right to use it (Goedkoop, et al. 1999). Both the product and the service side must work flawlessly together to keep the customer loyalty high at any time. The customers can switch the provider if they are not satisfied for the functionality provided.

Product-service system is a unique business case of servitization which means creating new business models from offering products as services. In PSS business model, the product and the services together form a functionality (Figure 2) which the customer does not necessarily need to own but can use it to satisfy their needs. In many definitions of PSS business model it includes the idea of competitiveness and satisfaction of customer's needs in a turbulent business environment by continuous improvement, and by creating a business model with lower environmental impact than solely product-oriented businesses (Baines, et al. 2007).

PSS development project from a service-centric standpoint was introduced by Kim et al. (2015). It consists of four layers which are 1) Strategic planning, 2) Idea generation and selection, 3) Service design, and 4) Product development. According to the authors of the

study, the model was needed because the PSS business model research focus was on specific phases of PSS and often had a product-centric view of manufacturers. This model is, according to the authors, still not fully completed as more research from the real successful business cases and operational solutions is needed. (Kim et al. 2015)

Customer loyalty

As the goal of this Thesis is to understand the role of operational excellence in increasing the customer loyalty in the case organization in PSS business model context, the theories related to the customer loyalty are creating a framework for this case study. Two different models are explored: 1) Internal service quality model (ISQ), and 2) the service-profit chain model. ISQ model is introduced firstly as it is a key part in the service-profit chain model. As this case study uses these models in PSS business model environment some emphasis can be made for other models depending on the suitability for this business environment.

According to the study of Watson, G. F. et al. (2015) the customer loyalty is a combination of certain attitudes together with purchase behavior which are systematically in favor of one service provider over others in the competitive market. Customer satisfaction is a key driver for customer loyalty and companies should focus on fulfilling their customers' needs (Yang & Peterson 2004) as the experienced value from the product, service, or, as in the case of the PSS business model, functionality together with high level of customer satisfaction can lead to a loyal customer relationship (Kotler & Armstrong 2014, p 29.).

Internal service quality model (ISQ model)

Internal service quality model comes from marketing research area and it emphasizes the role of internal service quality in affecting the service quality as many of the other service quality models focus more on the external side of the organizations. The model perceives the employees as the 'internal customers' and the role of satisfying these internal customers' needs is a road to success in organizations (Sharma, et al. (2016)). Employees in a certain

organization provide services to each other and hence can also influence the external value positively or negatively. In their study, Sharma, et al (2016) argue that internal service quality has a constructive outcome on employee satisfaction, commitment and wellbeing.

Service-profit chain model

Service-profit chain model is related to the internal service quality model as it connects the findings of the internal service quality model to the external value. Service-profit chain suggests that there is a relationship between the internal quality and the external quality. The model suggests that by affecting its internal service quality, organization can also affect its customer's perceived value and further the organization's profitability (Heskett, et al. 1994).

1.5 Key concepts and terminology

As there are many concepts and terminology used in this case study it is essential to explain the concepts in general to get a complete picture of the Thesis context. The concept of Operations Management is the background of the Thesis and hence must be explained here. Payment service provider must also be explained as it is used in this Thesis to understand the business model of the organization better. It is also important to understand how customer loyalty is produced which is why the key terms are shortly explained in the following sub-chapters.

Operations Management (OM):

The objective of Operations Management is to put organization's plans into action and deliver the goods or services to the customer. It consists of 1) planning of the different tasks, 2) controlling the mechanisms in delivering these actions, 3) ensuring the management of the services to guarantee accessibility for the customers, 4) inventory management, 5) implementation strategies to design the operational processes, 6) project management to select, plan, and deliver the projects, 7) quality control to ensure that the customers get the best product or service as possible, and 7) ensuring the continuous improvement of the

operations (Greasley 2008 p 3.). Hence operational management is crucial for organizations to deliver their value promise.

Payment service provider (PSP):

Payment service providers offer different payment methods for merchants to accept payments from their customers or for individuals to process their finances. By using payment service provides companies and merchants can focus on their core businesses as they do not need to concentrate on how to process the transactions as an example. The payment industry is highly regulated, few examples being PS2D directive and national laws on payment providers and security (Europa.eu 2021). There are also other responsibilities that are mandatory for payment service providers to practice their business such as ensuring that anti-money laundering and counter-terrorism policies and procedures are in place and are practiced appropriately (Eur-lex.europa.eu. 2015).

1.6 Delimitations and contribution

There are certain delimitations for case studies in general as they are specifically designed to study a certain phenomenon in a certain business environment. This case study is no exception because the results cannot be easily transmitted to other contexts. Firstly, the payment industry is highly restricted and regulated as stated previously and therefore cannot be compared to many other industries. Secondly, the focus of this study is in individual organization's operations, which in itself creates delimitations.

Nevertheless this study can give important knowledge to the PSS field of operations management as there is a need for empirical studies to understand how different industries' and organizations' PSS operations can be designed to enhance customer loyalty and further create new business opportunities and increased profitability. This case study is by purpose limited to the internal side as the goal is to study the operations function and the frontline between employees and customers. However in the future it is important to study also the

external side to understand more completely the service chain and how to develop the organization as a whole in the future.

1.7 Study Structure

Firstly, the main theories selected for this case study are introduced. Product-service system business model stands as the basis for the Thesis. The concept of a payment service provider is also explained. The second theoretical concept chosen for this Thesis is internal service quality model as the target is to understand the role of internal customer service related operations to enhance customer loyalty. Hence also the concepts of customer loyalty, and service-profit chain are introduced to recognize this relationship between the internal and external side. After these theories and concepts are introduced, I conclude the theory part in taking these concepts into the context of the PSS business model and evaluating the importance of the customer loyalty in that specific field.

After the selected models are enlightened the case research methodology is explained and reasoned. Also the research context is explained and the limitations of the study are represented. After that the data collection procedure and data analysis are concluded and validity and reliability of the findings are estimated and research process is presented.

Thirdly, the findings and analysis are presented in the case study organization's business context and the findings of the interviews are analyzed and represented. Finally, the research contributions and implications for the case company and for the PSS research field are discussed and concluded. In the last chapter of the Thesis the sources used are presented.

This case study is designed for the case company to be used in its own operations and as a decision-making insight to plan further the development of the operations functions of the organization and hence certain aspects of the study must be protected like the names of the individuals interviewed and the name of the case company. It is also important to note that certain areas of the business like trade secrets must be excluded from the text. However, in

general there were not any issues or restrictions to conclude this Thesis and find answers to the research questions.

2 PRODUCT-SERVICE SYSTEM BUSINESS MODEL

In this chapter the target is to clarify what is Product-service system and to describe the research around PSS and the reasons why the model has emerged and gained interest in the research field. It is important to understand the PSS business model as the case company operates in PSS field and because the business model highly influences how the customer-related operations are designed and how the other models are suited in the case company.

2.1 Lessons from the PSS research

Baines et al. (2007) have described the concept of PSS as a special case of servitization as it extends the original functionality of the product in adding the services to it. In PSS business model the marketing emphasis is shifted from 'sale of product' to 'sale of use' (*see Figure 2 for an example*). Customers give up on the ownership of the product which has certain benefits for the customers in terms of decreasing the level of responsibility and related risks. Manufacturers can also benefit from retaining the ownership for themselves as they can then utilize the product life cycle as they desire. They can also protect and control the functionality better, and add services and features to the functionality which all together can increase competitiveness and creativity. Baines et al. (2007)

PSS business model research started in 1990s when Goedkoop (1999) introduced the idea of Product-service system in his article. Goedkoop introduced concepts and tools to understand the emerged product-service systems. He noticed that the product-service systems are a true phenomenon, practical examples exist, and that PSS can be beneficial for the environment too. Goedkoop focused his studies on the shift of pure manufacturing firms to the servitization and its environmental benefits.

In the early 2000s the PS system research focused on environmental side and practical examples of the concept (Manzini & Vezzoli (2003), and Mont (2002). Mont (2004)

describes product-service system strategies as a potential choice in decreasing the environmental costs of different manufacturing firms and in decreasing the whole life-cycle environmental impact of industries. Mont continued the research in the Journal of Cleaner Production which was the main PSS research platform in the 2000s. In 2006 she and Tukker concluded that the PSS had not thus far built scientific field of its own and more research was needed especially in linking different case studies together for cross-sectional analyses (Mont & Tukker 2006).

In the most recent research development of product-service systems Pirola et al. (2020) included the digitalization perspective to the PSS research field and describes the concept of a Smart Product-Service system. Pirola argues that the traditional PSS model that Baines et al. (2007) described is not sufficient to create competitiveness in the modern unstable business environment. The smart digitalizing solutions and practices to 'generate innovative combinations of products and services' and to create intelligent new solutions or functionalities are needed.

PS system research is yet an abecedarian research field hence there are still ongoing debate about the distinctions in it and new terms are constantly emerging in the research field (Mont & Tukker 2006). As the time has evolved certain research strings are more and more investigated. PSS definitions vary quite much also. What is common in the definitions are firstly, PSS is a combination of products and services and secondly, PSS business models are more and more common due to the servitization and digitalization of business environments. Pirola et al. (2020)

In the figure 2 below is an example of a PSS business model. In the figure I represent how the services and products of an organization together as assets procedure a functionality which is then delivered to the customer to use. The functionality represented here is a combination of product and services and the customer can use it based on a subscription fee which gives the customer the possibility to use the product and at the same time benefit from the services that the organization offers for example to tailor the functionality from other users to make it fit better for the customer.

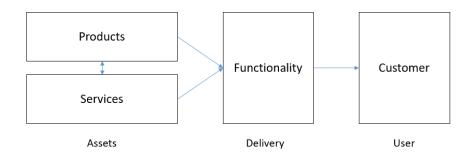


Figure 2 - PSS business model example

2.2 Reasons for PSS business model adaption

Why do companies have an initiative to adopt PSS business model? At least three different reasons exists according to the research: 1) economical, 2) environmental, and 3) social dimensions of PSS which together can create new innovations and competitive edge in a market (Reim et al. 2015 & Tukker 2004). These dimensions are explained in the following chapters.

Economical dimension

Already in the 1990s PSS was defined to include cost reduction target as the companies that adopted PSS business models wanted to reduce the costs of the customer targeting (Baines et al. 2007). When products are not only commodities that are only sold once, the life cycle of the relationship between the companies and the customers can be expanded from single payment to a continuous relationship that is mutually useful for both sides. This has increased the reliance on loyal customers in PSS companies.

Environmental dimension

As the customers are more and more demanding on companies' sustainability the adoption of PSS business model is an option for companies because of the life cycle thinking that is often described as a key part of PSS business model (Tukker 2004). As in PSSs customers do not need to own the product, the disposal or recycling are not on customers' shoulders. The company has more resources and knowledge about their products' life cycle and have an initiative to make the product so that the recycling is as convenient as possible for them. This is especially relevant in manufacturing businesses.

Social dimension

Social aspect of PSS is also an important reason why companies may select PSS business model. As the customer acquisition is a time-consuming and expensive business operation, lengthening the customer relationship can lead to new innovations and more profitable business models especially if the customers can see themselves as part of the business community and have a feeling of making an impact in the product/service they are consuming. (Martinez et al. 2010)

Even if there are seemingly many benefits in adopting PSS business model it is noted in different studies that the transformation from traditional business models to PSS business model can be difficult as it is required to have major changes at the company's value chain and industrial level to shift to a PSS (Martinez et al. 2010).

2.3 Role of internal customer related operative excellence in PSS business model

Product-service system customer related process excellence is one of the key elements for the business model to create competitiveness in the market besides the technological aspects (Toma & Naruo 2017 & Pirola et al. 2020). PSS business model is based on strong and continuous customer relationships. This implicates that the first steps in the customer relationship after the agreement: establishing the contract and the first months of successful customer experience, are essential for the organizations that have adapted the business model to succeed. (Reim, Parida & Örtqvist (2015).

If the operative excellence expectations are not met it can lead to a situation where the customer starts to question the relationship with the PSS provider as in that case the provided functionality's disadvantages are greater than the advantages. Difficulties and delays in customer relationship establishment should be avoided (Reim, Parida & Örtqvist (2015).

2.4 Relationship between a payment service provider and a customer

Payment service providers (PSPs) control and own the functionality they offer to their customers and the customers are the users who pay recurring fees for using the provided functionality. Payment service providers are no exception to other PSS providers in terms of the competitive challenges that relate to PSS business environment. Because of these reasons, the relationship between the functionality's provider and the customer is tenuous and it must be preserved, nourished and developed even further than the expectations to keep the customers satisfied and loyal (Bartelt & Hommel 2021).

As the payment service functionality can easily be changed for another provider's functionality (Bartelt & Hommel 2021), without having operational excellence in the payment service provider's frontline operations, and developing the product to stay relevant in the market, the customers may begin to search other payment service providers to fulfill their needs (Bartelt & Hommel 2021). Strong operations can generate customer satisfaction if the processes, user experience and services around the provided functionality are operatively well established, managed, and controlled. This is especially important in PSS business environment (Toma & Naruo 2017).

Because excellent operations and great internal service quality are important for PSS business model (Toma & Naruo 2017) and hence for the payment service providers, the concept of internal service quality has been selected for this Thesis as a supporting theory. In the next chapter the operative excellence and internal service quality are explained and further, their role in customer satisfaction and loyalty by adapting the concepts of internal service-profit chain to the PSS business model business context.

3 ROLE OF OPERATIONAL EXCELLENCE TO CUSTOMER LOYALTY

The PSS-system providers operate in a rapidly changing, highly competitive business environments, where loyal customers who are satisfied with the functionality and the service quality are the key to success in the market (Reim, Parida & Örtqvist (2015). In this chapter the target is to determine answers to the sub research question 3: *What is the role of internal operations in enhancing customer loyalty in PSS context?*

To answer this research question, firstly, the concept of operational excellence is represented as it is important concept in operational management. Secondly to understand the objective, the concept of customer loyalty is familiarized. To understand how these two concepts can be related I represent the concepts of Internal Service Quality (ISQ) and service-profit chain later in the chapter.

3.1 Operational excellence

The idea of operational excellence was getting attention when Peters and Waterman (1982) were studying and documenting operationally successful companies in the United States in 1980s. They desired to understand what was behind the operational success stories of that time. Carvalho et al. (2017) argue that operational excellence field should be seen as a framework which companies can use in their operations to enhance operational success more than as an approach for seeking a change. Moreover, the operational excellence should be seen as the highest possible quality and performance in all operations of an organization (Hammer 2004).

Dahlgraad & Dahlgaard (1999) introduced 4Ps of operational excellence: 1) People, 2) Partnerships, 3) Processes, and 4) Products. People refers to the excellent employees of an organization who construct the culture of excellence and who deliver the products and services to the external customers. Partnerships refers to internal functions and external partners, such as customers, suppliers and other stakeholders. These two Ps are held together by the third P, processes, which guide all the operations inside-out. By creating operational excellence in all of these 3 different Ps, organization can create excellent products (P4) which can be then delivered to the customers. (Dahlgraad & Dahlgaard 1999)

Operational excellence is linked to other excellence studies such as organizational excellence and business excellence. The roots of the concept are in the Lean movement which was getting attention amongst the researchers in 1990s. According to Womack and Jones (2010 p. 13-17) Lean Thinking has 5 principles: 1) Specifying the value of the perspective of a customer, 2) identifying the value stream, 3) making the value-creating steps flow, 4) being at the pull of the customer and, 5) striving for perfection. Lean thinking focuses on the tools of creating operational excellence more than in the organizing the operations themselves. (Womack & Jones 2010)

Based on the research conducted in Shingo Institute in 2000s, Found et al. (2018) stated in their literature review that operational excellence principles were shifting the paradigm from tools, such as the Lean-model, to the principles behind the tools of operational excellence. According to their research, these principles are the following: 1) Focusing on results and behaviors, 2) behaviors flow from the principles of the governing results, 3) principle of underlying the culture that supports the results in the long term, 4) Creating principle-based cultures requires alignment of the management systems and, 5) Tools of Lean model can be seen as enablers and should be used carefully, strategically and appropriately to drive the excellence in achieving results. Found et al. (2018) argue that based on these principles customer satisfaction, quality and productivity improvement, lead-time reduction and, ultimately, increased profits are the objective for operational excellence performance seeking organizations. (Found et al. 2018)

3.2 Value of a loyal customer

Loyalty in business is determined as a fundamental declaration of a customer to repeat making new purchases from a same company even if there are fluctuations in the business environment and competition. Oliver (1997 p. 34) According to the literature review by Karunaratna & Kumara (2018) customer loyalty is affected by multiple factors such as *customer satisfaction, perceived value, trust, corporate image, service quality, loyalty programmes and switching costs.* As stated by Oliver (1999) even as customer satisfaction is broadly accepted as a contributor to customer loyalty in some circumstances where there are certain restrictions for customers to change the provider such as in the situations where the customers have tied certain bonds with the service provider the satisfaction factor is less meaningful.

The importance of loyal customers has been a research topic in many business research studies especially in the marketing field. It has been described as a 'key business outcome' (Ali et al. 2018) and 'a long-term asset' for companies (Kandampully et al. 2015). Its role in creating competitive advantage is also recognized (Wu & Ai. 2016).

The role of the customer loyalty has increased during the past years because of the turbulent and constantly changing business environment as described earlier. New products, services and functionalities are emerging constantly in the global market and it is easier to get finance for new business ideas than in the past because of the technological advance and political choices. There is more competition emerging in the globalized and technologized world than ever before. It is not enough for companies to only attract new customers as it is more expensive than keeping the old ones (Aaker 1991). However companies can struggle to maintain loyal customers especially in highly competitive markets (Nyadzayo & Khajehzadeh 2016).

Research of customer loyalty is highly weighted on the marketing research area, and external studies. Many researchers such as Heskett et al. (1994) and Caruana (2002) point out that

the internal aspects such as the management of service operations impacting the customer loyalty should be more studied. Heskett et al. (1994) describe customer loyalty as the most important factor in profit creation. Their conclusions suggest that, as the customer loyalty is recreation of customer satisfaction, the customer satisfaction should be the focus of every management to improve. Their service-profit chain model shows the link between internal operations and external consumers. According to the model by increasing the employee satisfaction and employee loyalty, the customer satisfaction and loyalty can also be increased. In the following chapter the model is represented. (Heskett et al. 1994)

3.1 Internal Service quality model

Researchers were interested in studying the role of the network of internal functions of a company in delivering services to external customers (Marshall et al. 1998). This paved the way for the Internal Service Quality (ISQ) model in 1990s in Total Quality Management literature. Different employees in different internal functions together deliver the service to the external customers and it is important to understand what the role of these functions is in creating customer value (Marshall et al. 1998).

According to the Internal Service Quality model, different internal functions can be understood as internal customers for each other and in this chain the final customer is the external consumer (Finn et al. 1996). These service chains are important in changing information from these different internal and external customers. These information flows between internal functions can impact external perceived quality as the service chain extend from internal service chains to external service chains.

External service quality literature is dominated by marketing focused literature, most famously by the SERVQUAL model (Parasuraman et al. 2013). According to this model the service quality is the gap between customers' expected service quality and the perceived service quality. The team revisited the original concept from 1990s and re-concepted the model to the e-business (Parasuraman et al. 2013). In the novel e-SEVQUAL model the

focus is on external service quality in terms of efficiency of the websites, fulfillment of the promises the website offers, availability of the website, privacy and security and feel of a human touch (Parasuraman et al. 2013).

There has been a debate in the research field if the focus should be more on the gap between expected service quality or more on the perceived service quality. It is not yet clear how these external measurements should be implemented to the internal context (Reunoso & Moores 1995, Frost & Kumar 2000) as there is a limited amount of research around internal service quality due to the marketing dominated service quality research area (Iacobucci et al. 1994). In the next chapter the service-profit chain model is introduced to understand better the internal service quality and its role in the value creating chain.

3.2 Service-profit chain

Service-profit chain model emphasizes the role of front-line employees of organizations and their management in creating value and profit for an organization. The model shows the links between internal service quality and external service quality. According to the model the profitability and revenue growth of the business is created from customer loyalty which is generated from customer satisfaction which is delivered from external service value of the profit chain. (Heskett et al. 1994)

In this model (Heskett et al. 1994), external service value on the other hand is influenced by organization's employee retention and employees' productivity. Satisfied employees are those who are motivated for their work, who feel comfortable at their workplace, who have good tools to perform their work and who are getting rewards and recognition, and who have professional working colleagues and development opportunities inside the organization. According to the model (Heskett et al. 1994) the employees who appreciate their work deliver the best results for the organization in the frontline where the internal service value influences the external service value. The service-profit chain is shown in the figure 3 below to get the complete picture of the different value chains. The internal parts of the service

chain are highlighted in grey color. In the next chapters the internal service quality and external service value of the model are explained.

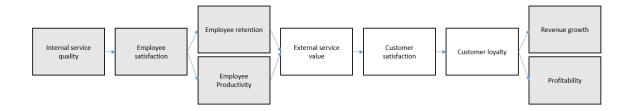


Figure 3 - Service-profit chain (Heskett et al. 1994))

The internal service quality (Figure 3) describes everything inside an organization that can influence employee satisfaction. These factors in the model are argued to be workplace design, job design, employee selection and development, employee rewards and recognition and tools for serving the customers (Heskett et al. 1994). Satisfied employees are staying longer in the organization and they are more productive than dissatisfied employees. In the frontline between internal and external parts of the model, productive and professional employees deliver the best results in creating external service value and further customer loyalty. (Heskett et al. 1994)

External service value (figure 3) is influenced by the internal chain effects in an organization. By creating high external service value organization's customer are satisfied for the service and satisfied employees can become loyal ones. Loyal customers do care about the company, give development ideas and inevitably create profits and revenue growth for the organization. The model suggests that internal service quality delivers external service value. (Heskett et al. 1994)

In the next chapter the service-profit chain model is brought to the context of a productservice system business model as it is important for the reasoning of conducting this case study as the case organization is operating in the product-service business environment as described earlier.

3.3 Service-profit chain in PSS context

By adding together the Product-service business model (Figure 2) and service-profit chain (Figure 3), it can be understood better, how the internal customer related operations could affect customer loyalty in the PSS context. Product-service systems provide a functionality for the customers which is a combination of a product and a service as described previously. As the PSS business value is built on strong customer relations, the customer loyalty is a key influencer in PSS business profitability. Service profit chain and PSS business model are combined in the figure 4 below.

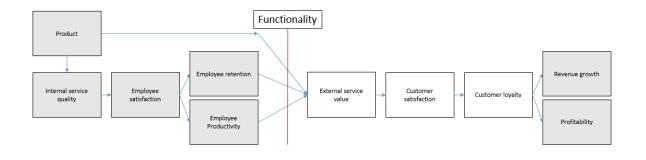


Figure 4 - Service profit chain in PSS business model context (modified version of Heskett et al. 1994)

In the figure 4 I have added the product function to the service-profit chain, which role in PSS organization is to create the core of the business, the product itself. Together with the operational functions and internal service chains the product function forms the functionality of the PSS business model which creates external service value and which the external customers can use. The red line in the figure 4 describes the frontline between internal and external parts in the service chain in PSS business model.

3.4 Initiators of internal service quality

Frontline employees are those who work between the different internal functions and external customers. Frontline employees can have an impact on how the offered functionality quality is perceived and external service value is determined. They can also get insight from the external customers how should the functionality be developed in the future. (Ferdous et al. 2021) By taking the PSS business model to the context of the service-profit chain model the research sub-question can be answered. It can be argued that the role of customer loyalty is crucial for the revenue growth and profitability and hence the internal service chain must be studied to understand better the phenomenon behind it.

In this case study the objective is to interview employees in the frontline and their managers to understand how, in this organization, internal service quality can be increased and what helps these employees in creating external service value. The main focus is on functions arrangements, communication between functions, meaningfulness and self-fulfillment opportunities, processes and tools, leadership and organizational culture as these themes are closely related to the suggestions of the model (Heskett et al. 1994).

4 RESEARCH METHODOLOGY

In this chapter the methodology for this Thesis is introduced and reasoned. Also the research context for the study is important to be opened to understand why the particular methodology has been chosen. After the research context is introduced, the data collection procedures and related aspects are clarified. In the end of this chapter the reliability and validity of the study are considered.

4.1 Methodology

This case study is conducted by using qualitative research methodology as this Thesis is conducted for one case organization's needs and not to conclude general study for an industry or research area more widely. Case study, as the chosen methodology, fits the Thesis well as the objective is to understand this case organization's internal practices in its internal customer service related operations of how they have formed and what should be improved in the future. Any potential results of this Thesis can give insight only for the case organization in its own business context and cannot be completely generalized for the whole industry or organizations having similar business models.

Case study approach allows the researcher to study complex issues in real-life situations. Case study approach is especially useful when there is a need to study a certain phenomenon, event or issue in its natural context. This is the reason that the case study is splendidly recognized approach in business research as there are many different business cases, phenomenon, and events that cannot easily be generalized. (Crowe et al. 2011)

Holistic single case study perspective is chosen for this Thesis. Single case study fits for a holistic perspective study as the goal is to study one case as a whole and not as a sum of its different parts. This case study takes a descriptive study standpoint as the target is to describe

the studied phenomenon in its own unique business context, more specifically, the customerrelated internal processes of the organization in PSS business model context.

4.2 Research Context

As this study is conducted for a specific organization and its objective is to understand this organization's specific internal customer-service related operations the case study approach is clear choice for the study. The objective of this Thesis is to study one payment provider's internal customer related operations to further increase customer satisfaction and customer loyalty as they are important concepts for this PSS business. To study these internal operations, interviews are conducted with the frontline employees and managers to understand where the company is good at and where are the things that should be improved in its customer related operations.

The case organization was reformed in early 2021 after an acquisition process. All the employees interviewed were working in this newly reformed organization from the start or already before it in the acquirer organization. It is interesting to study, how the customer-related processes and working habits formed in the beginning of the new organization and how have they been improved during this one year-period and what could be improved in the future.

Business model of the organization follows the PSS business model concept introduced in the previous chapters. The organization has a product and together with the services provided the organization offers a functionality for its customer to be used. Customer loyalty is important for the organization as its customers do pay recurring fees for using the functionality. If the customers are not satisfied with the product or the service, customers may change the service provider for other competitors in the market and it can be hard to retain them back.

4.3 Case Organization

The case organization is a Finnish payment service provider based in two Finnish cities. The company was originally founded in 2012 and has been acquired twice first in 2015 and then again in 2020 after which the novel organization structure was formed and the product was rebranded as the brand it is today. The company has under 30 employees and operates only in Finland.

The organization studied is operating in the payment provider industry and is specialized in small and medium-sized companies' payment solutions. The organization was merged to another big tech company in 2021. Two different organizations were combined at that time, and new employees were recruited. Different internal customer-related processes were carried from the previous organization and adjusted to the newly formed environment.

Legislation and regulation are greatly present in the payment provider industry. There are many national legislations considering providing payments such as Finnish Payment Services Act (30.4.2010/290) and Finnish Anti-money laundering Act (28.6.2017/444). Also European Union has tightened its regulation around payment services. Especially important is the Payment Service Directive 2 (PSD2) which entered into force in 2015 and was implemented to Finnish legislation in 2019. According to the PSD2 directive, payment service providers must be regulated and supervised by national financial supervisory authorities. PSD2 gave third party payment service providers that have a license to operate, an opportunity to have an access to previously closed accounting banks' information of customer bank accounts and initiate payments on behalf of the banks. (Financial Supervisory Authority 2019)

What is common for all the payment service providers is that they need to follow certain legislations and regulation in their customer related processes which can be difficult for the sales and application handling teams as the customers may not understand why certain information about them must be obtained before payment services can be provided. This is also the reason why it is especially important to have good policies, processes and understanding in how to operate in the frontline.

4.4 Business Context

It is important to understand how the new organization was formed in the beginning of 2021 to understand how the operations were organized from the start and why they are organized in the way they are today. For this reason it was important for me to select employees that were there from early 2021 to understand this phenomenon better.

The payment service had been part of a different organization before 2021 and it was acquired by another company in 2021. It came clear from the interviews that many of the operational processes were directly imported to the new organization. All of the operative employees in the frontline changed so everything needed to be taught from scratch. New employees also got the old open customer emails that the old customers had sent before the acquisition but were not yet been replied to. Interviewed employees and managers described this as a hectic period and there was not much room for development in the beginning as the worktime went to clearing the email queue. Some described that it took over half a year before there was any time for any improvements planning in the operations.

4.5 Interview Theme Structure

The selected interview themes are represented in the figure 5 below. The objective of the interviews is to find out do these themes affect internal service value in the case organization. In the next chapter these themes are briefly defined and the choice for selecting these themes is reasoned.

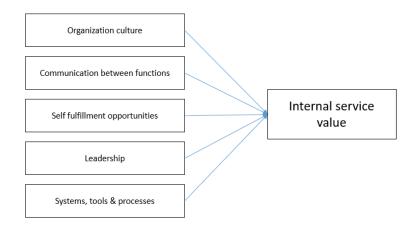


Figure 5- Selected interview themes – internal service quality initiators

Organizational culture

In their literature review Shahzad, Luqman, Khan, & Shabbir (2012) find that organizational culture impacts the processes and employees in organizations. Based on the literature review and the results of different studies in their review, the authors conclude that organizational culture has an impact on organization's performance. The main finding is that the employees who are having the same values as the organization can increase organization's performance by being dedicated to work towards the objectives of the organization. Authors suggest that managers should focus on highlighting organization's own values and goals and create a workspace where employees can commit to them to achieve the best results. According to the literature review and its findings (Shahzad et al. (2012)) the employment phase is also an important platform to recruit new employees that have the same values as the organization, and that are suitable for the organizational culture, can make a positive effect to the whole organization.

Communication between different business functions

Communication between different functions, or business units, was selected as one of the interviewing themes because the case organization's business functions are located in two different locations so it is very important to understand how these functions succeed in their communication and how the organizational culture can be embraced in such conditions.

Internal communication between different business units and especially amongst the frontline employees is studied by Ferdous et al. (2021) to be crucial in achieving customeroriented behavior in an organization. Frontline employees are normally the ones that the external customers face in organizations ((Ferdous & Polonsky (2014). Gounaris (2008) finds that internal marketing tools can be utilized to increase positive responses in the frontline to achieve internal service quality. These tools include for example training, employee empowerment, rewarding, and participation of decision-making (Gounaris 2008).

Overall Ferdous et al. (2021) conclude that internal communication is referred as the best way to motivate and engage employees in organization. If the internal communication channels are effective it can have a positive impact in the frontline and in the external communication as well. If the frontline employees can communicate customers' issues quickly to the correct place and have a rapid response back, the external communication gets faster and hence more effective.

Self-fulfillment opportunities and meaningfulness

As I explained in the previous chapters the motivation and engagement of employees are important to be taken into account in organizations to achieve their goals. This is why the next interview theme selected is self-fulfillment opportunities of the employees and meaningfulness of their work in the case organization. It is important to understand how employees can develop in the case organization and where they find motivation and experience meaningfulness in their everyday work.

It is studied by Panda et al. (2022) that employees that find their jobs meaningful are the most engaged emotionally, psychically, and cognitively in achieving their objectives and develop the organization. This is why it is important for this case study to interview what motivates and gives meaning for the employees in the frontline.

Leadership

The impact of good leadership can be great for organizations to succeed. However according to an interesting study by Hui et al. (2007) the leadership matters the most when the climate in the organization is bad but does not have that much importance when the organizational service climate is good. Moreover, if the other initiators of internal service quality are balanced the role of the leadership is not that important in achieving external service quality. If on the other hand these initiators are performing badly the role of the leadership in the frontline is more important and organizations should focus more on that side depending on the situation.

Tools, systems, and processes

As per the studies of Shahzad et al. (2012) the organizational culture can have an effect on organization's processes. By having processes in place that reflect the organizational culture, organizations can have the best outcome and reception in the frontline when new processes are introduced. According to the study of Singh et al. (2021) variety of tools and different digital options and interfaces are emerging constantly. It is important to understand this development in the frontline too and constantly re-evaluate which communication channels should be used to increase customer engagement. This is why it is important for different organizations to listen to the frontline employees' experiences and conversations with customers to find insight of these customer preferences in this constantly changing area Singh et al. (2021). In this study it is intended to understand frontline employee and managerial experience of how the tools used in the frontline are functioning and how they could be developed in the future to increase customer satisfaction.

In this case study the focus is on internal aspects of PSS business model service chain in one specific organization. I understand that the perspective is limited and that the external part of the service chain must be studied further for example by using the SERVQUAL model questionnaire in later studies to understand the complete picture. However by understanding the internal service chains the organization can get valuable information that can be used in its external studies in the future.

4.6 Data Collection

Four different employees and two managers from the case organization were interviewed. Interviewees were in diverse positions in customer related operations in the organization, mostly in the front-end operations such as customer support and sales but also in managerial positions. The interviews were organized as semi-structured interviews and that lasted from twenty to forty minutes.

Semi-structured interviews are a good option for phenomenal studies as they do not limit the flow of the interview excessively but include a certain structure and themes that are discussed (Polit & Beck 2010). Semi-structured interviews help the organizer and interviewees to feel relaxed as they can express themselves as they best desire about the phenomenon studied. The best practice for semi-structured interviews is to interview the participants with themes selected before-hand. The idea is to get different viewpoints from the same themes related to the phenomenon studied.

The chosen themes for this case study interviews were 1) Organizational culture, 2) Communication between different functions, 3) Self-fulfillment opportunities in the organization, 4) Leadership, and 5) Systems and tools based on the service-profit chain and internal service quality model proportions as the effectors to internal service quality (Heskett et al. 1994). These themes were analyzed in three different timelines: past, now and future as to study the phenomenon it was important to understand how the internal operations were organized in the first place, where is the organization now and how the organization should improve in the future in terms of these 5 themes affecting operative excellence in the organization. The themes were chosen to reflect the fundamentals affecting customer loyalty according to the service profit chain model and internal service quality model introduced in the chapter 3.

As it is important for the case company to protect the identity of the participants, the names of the interviewees or any other aspect that could possibly reveal their identity are not presented. The name of the case company is not mentioned and information which is not relative in the analysis is excluded. In the table 1 below are listed every interviewed person and their positions in the organization.

Interviewee	Function / Job area
Α	Customer support, boarding
В	Customer support, boarding
С	Manager
D	Manager
Е	Customer acquisition
F	Customer acquisition

Table 1 - Interviewed employees and their positions in the organization

Any insider information, knowledge, financial information, or any other sensitive information for an interviewee or the company were not discussed and are not presented. Interviews were organized in April 2022, they were from 20 to 40 minutes long and were organized as face-to-face meetings in the office meeting room in Pori, at work time, and the interviews were recorded by using a phone with a permission and knowledge of the interviewees.

4.7 Data analysis

Data analysis was conducted after the interviews were recorded. Interview recordings were transcripted to a certain text processing tool manually. After the transcription was completed, the interviews with different employees were grouped by the themes and to the different timelines. The interviews were listened to and read for multiple times in order to understand the nuances and feelings behind the spoken words of the interviewes and to avoid any misunderstandings. It was important to listen to and read the interviews thoroughly to deeply understand the themes discussed so that it would be possible to analyze the interviews thoroughly.

As reading the interviews, notes were taken, and labeling was formed to highlight interesting parts in terms of patterns, themes, topics and other aspects. After labeling and note taking, the interviews were listened to and read once again accurately to ensure that no mistakes had occurred. Transcription process was completed manually. Data collection and transcription were conducted and concluded by using good scientific practices and the data was systematically and objectively analyzed.

4.8 Validity and Reliability

Data reliability is measuring how repeatable the results of a study are in different circumstances if everything else remain unchanged. Validity on the other hand means the difference between what we think we measure versus what we actually intended to measure (Roberts & Priest 2006). To justify the conclusions of a study, validity and reliability of the results should be considered carefully and positioned as high as possible.

As the target of this study is to understand the internal customer related operations only internal employees were interviewed to focus on this perspective. To construct more reliability several different interviews were conducted and employees from different positions were chosen to be interviewed. All the interviewed employees have worked in their positions for a long time and are experienced in their work so the expertise of the topics discussed was high amongst all of the interviewees.

The interviews were conducted in Finnish, the native language of the interviewer and the interviewees, to ensure the validity of the responses. The setting for the interviews was carefully considered. The location was familiar for the employees as they work in the same facilities in their everyday work. Interviews were organized in the middle of the workday and the employees had possibilities to influence the timing of their interviews. The interviewees were also familiar with the interviewer from their work so it was easier to open up about the topics discussed as the atmosphere was relaxed and familiar.

There are always different biases that need to be considered when producing qualitative studies. Firstly, the objectivity of the researcher must be carefully analyzed. As in this case study the interviewer works in the same company, one needs to be aware of the bias that the interviewer might have for the topics discussed. However the interviewer and the interviewees did not have any managerial relationships when the interviews were conducted. Interviewees were aware that their names or sensitive discussions would not be published. This gave reliability amongst the interviewees when discussing the themes selected.

5 FINDINGS AND ANALYSIS

The goal of this study is to understand case organization's internal operations in customer frontline and how to improve the customer satisfaction and loyalty by affecting the internal processes. In this chapter the findings of the analysis are presented. Firstly, the case organization is described based on the interviews and secondary sources. Secondly, the business context is demonstrated and connected to the results. Thirdly the relationship between operational excellence and its effects on customer satisfaction and further customer loyalty are presented based on the analysis of the interviews and described operational excellence concepts. Lastly the performances of the selected themes in the case organization are presented.

5.1 Analysis of the themes

The following subchapters demonstrate the findings from the interviews of the selected themes in the case organization: 1) organizational culture, 2) Communication between functions, 3) Meaningfulness and self-improvement opportunities, 4) Leadership, and 5) Systems, tools, and processes. Quotations are given for additional evidence for the analysis when seen relevant. In the last chapter I provide a summary of the performance levels of the themes in the organization. This chapter aims to answer my research question (Q2) *What is the current status of organization's frontline operations?*

5.1.1 Organizational culture

At the beginning of each interview I asked the background of each employee and manager. All the interviewed employees and managers had started their employment in the formation of the new organization and at the time the organization introduced the new brand for the product in the beginning of 2021 or had started already in the acquirer organization before the acquisition. Their backgrounds were different as some had already worked at the acquirer organization before the acquisition of the new product and others joined the organization after the acquisition.

The acquisition process in 2020-2021 was a quite hectic period according to the interviews as it was the time for introducing the new brand to the former and new customers. Also, new employees were selected to the operations function and new organization structure was formed at that period of time. It was important to find out how the organizational culture developed during that time to understand better the current situation.

C: 'Right after the acquisition the new management visited the premises and after only a few weeks I visited the (acquired) organization to understand the product and the processes and to understand what is related to the risk management...'

As the acquisition period was hectic and employees jumped to a moving train there was a need for fast decision-making, openness, and flexibility as the frontline was heavily employed. The organization adapted fast-paced low structured and low hierarchy managing style to address the needs of existing customers as well as the new ones. This worked well according to the interviews as all the old customer tickets that had piled up were handled. However because employees in the frontline were occupied in solving the ticket queue there was only little to no time at all to focus on developing the work.

C: 'The first year was hectic but we managed it well, but (as we did not have time) we did not concentrate enough in working on data and reporting to understand where the problems were...'

Based on the interviews good organizational culture is very important for the employees and managers. Many of the interviewed employees said that they prefer more working at the office than remotely because of meeting other colleagues and because of the facilities that the organization offers for employees to work at.

E: 'I prefer working at the office because of the people and also the facilities are great.'

However some of the employees felt that if there is a task that needs concentration on it is better to work from home without having any interrupts. Flexibility is also valued as an example being the possibility of working some days from home and having flexible hours is important for balancing the life between work and spare time.

E 'If there are tasks that need more focusing on it is nicer to be home because we have quite a loud working space for the sales team...'

The organizational culture was also related to the trust factor that the employees have with each other. Employees told that the colleagues around them who they can say to be their colleagues are a great motivator to work at the office as well.

B: 'There are many people who have worked more than 10 years (in the organization), so that tells something'

One employee had been working in the organization before and changed to another company. However the employee wanted to come back to this organization because of the organizational culture. Interviewed employees also said that good organizational culture also reflects from the frontline to the customers as interacting between other employees and sharing the feelings can lower stress levels and impact the frontline confluence.

A: 'At my time of being here only X has changed position here (in the frontline) but others have stayed the same, few people have left and few have started.'

Also, the interviewed employees said that in the recruiting phase it is important to take attention to the organizational culture and introduce it right away to the possible new employees in the interviews so that they get the general vibe of the organization and wayof-working and can beforehand think for themselves if the organization fits their personality and the style of working.

B: 'It would be interesting to see if there was a new person who joined the team and to see how they would adapt but on the other hand I trust that recruiters can select someone who fits the group.'

Another interesting remark from the interviews was that according to the interviews a good organizational culture also affects employees in a way that they are more ready to be open to each other and ask work related questions with low threshold without thinking if it is appropriate or not.

F: 'The atmosphere forms a space for open discussion about difficult things which is important'

D: 'We could not develop anywhere if we could not openly discuss and look at things together.'

5.1.2 Communication between functions

Related to the open organizational culture it is interesting to understand how the communication between different functions work especially for the matter that half of the employees do work in different locations so often meeting in person is impossible in the every-day work.

Interviewed employees experience in general that the communication between different functions works well even between two different cities. There are different tools for communication and in many cases a conversation in a chat is sufficient enough to solve daily problems.

A: 'It is effortless (to use chat) because it is easy and fast to reach others.'

There are different chat groups for different functions to communicate with each other and between other functions as well.

F: 'I follow the chat channel and it seems that there are quick responses to questions so it seems ok for me.'

As effortless as using a chat-tool for conversations is, the interviewed employees also wished for more regular meetings and information notes especially if there are new features for the product or other new processes, or news that relate to employees' ways of working or any other work-related matter so that employees could get the bigger picture where the case company is going to and how the frontline employees can use that information in their work the best possible way.

Interviewed employees told that chatting is good for getting responses to specific questions but sometimes to understand the bigger picture regular meetings would help and be good for their work.

F: 'I have to say I am not that on the track (about new features) so I do not know what happens in the development function...'

F: 'I believe having meetings in which I'd be informed about new features and the release dates of them would help me for example if I noticed in some discussion with a possible customer that telling them about some new features that we are going to release would help selling our service to them.'

A: 'Sometimes there is a need for it (regular meeting), because usually the development team only gives responses to specific questions but I would like to understand the bigger picture and then when I ask additional questions I may notice that we are not necessary speaking the same language.'

It came clear from the interviews that by having an open discussion about different topics help them to understand why certain decisions are made even if the employee would disagree with a certain decision. Trust factor and open organizational culture to discuss between employees is important for the interviewed employees as they can feel heard even if there were disagreements with the final decisions.

Interviewed employees told also that it is also important that employees can show their frustration at work internally so that they do not need to express their frustration for the customers. As the payment industry is heavily regulated there are certain processes that are very demanding for the employees and for the customers. To have a possibility to question these processes and have an understanding why they are sometimes made difficult helps employees to accept them. It also helps the employees when they can share their feelings with each other and openly discuss about the challenges they are facing. Having discussions about the issues and disagreements is important. Even if it does not change it by any means sharing the troubles with others may be helpful implicitly.

It was also important that same questions could be asked again from other functions if there was something not clear or if the previous answer was already forgotten. Also using a chattool enables a feature to look at the conversation history and check if any other employee has asked the same questions so they can read the responses from there themselves. Another important factor is to have clear responsibilities for each function in situations when issues need to be escalated further to other functions. When responsibilities are clear it is easier to do escalation decisions. It was also important for the interviewed managers that there was data for different cases and the escalation points so that later it would be possible to see if the escalation for example to the risk function or to the technical support was made at the right time.

Employees in general feel that the responsibilities in the organization and between each function and employee are clear. Managers wished more data about the escalation cases so they could guide their employees better in the escalation decision making situations. Employees also wished for more information about the new features which they could use in their sales pitches and customer service.

5.1.3 Meaningfulness and self-fulfillment opportunities

Environment for self-fulfillment opportunities in an organization is an important attraction factor for employees to stay at an organization for a long period of time. The greater the employee turnover the greater the resource load and time loss are for the organizations in general. It is important to study how employees in this particular case organization feel in general about how they can develop themselves in their work.

Interviewed employees had very different backgrounds from sales and marketing to head of department stores to accounting pedagogy and tourist industry. Frontline employees are titled as software specialists and sales specialists in this case organization. What was common for the interviewed employees was that they work now in frontline positions in direct customer contact or as the managers of these positions.

Interviewed employees in general feel that their backgrounds have helped them to adapt in to this organization and their work. Some employees have worked in the acquirer organization before the acquisition of the new organization. It has helped these employees that they know the culture already. Employees told in the interviews that in general they enjoy doing their work. Especially the small changes in the work shift keep the employees motivated. For example frontline customer service employees also work in application handling half of the time so there is actually two different jobs that these employees can do in their work daily.

Employees also felt that good resourcing and flexibility are important for them to enjoy their work. Also as rewarding was mentioned that there are every day new problems to be solved with the customers so they feel that they can always develop themselves in this job and no case is exactly the same as the previous ones.

B: 'Sometimes there are really challenging cases, while it is also nice to have those easy routine cases, sometimes you get this victorious feeling when you solve a challenge even though sometimes it feels like I do not know anything but in the end I actually do.'

Employees feel that they can develop themselves in their current positions because there are so many changes occurring in the organization and in their processes. Employees also feel that they can make an impact to their own work and that they are not forced to do their daily tasks in a way they do not have influenced.

Employees mentioned that they would like to create their career in the organization rather than change their employer if there were opportunities for them in this organization.

B: 'I do not know if my current studies end up being useful in this firm but I like this firm and I would like to develop things here in the future.'

It is a great asset for organizations to have motivated and loyal employees who want to stay at the company and build it going forward. Organizations should notice employees' ideas in their processes and procedures because it shows that these employees care about the company to suggest improvements. If these ideas are not received in the company employees might feel that they are not heard.

What comes to the career development opportunities, the interviewed employees were interested in hearing about the opportunities that the organization can offer. Many of the interviewed employees were telling that they would like to develop themselves in the future and change to different job positions with different responsibilities in the case organization.

A: 'I would absolutely want to move forward and somehow it is very motivating to have a vision of where I am heading and I am seeing the path there...'

One employee told that they would like to expand their job description and take some responsibilities from the upper level because they see that there are a lot of burden in the upper levels and that would benefit the organization too if the workload was shared.

Overall it can be seen from the interviews that employees in general are happy with their job in the case organization. The resourcing in a normal situation is balanced but when there are sick leaves the workload may end up being quite heavy. However the employees are also motivated to move forward when they see opportunities for a possible change. Based on the interviews the employees are seemingly loyal to the organization and would like to see their career develop inside it rather than move to another organization. The management should be aware and on top of what their employees are looking from their career.

5.1.4 Leadership

Quality leadership is an important factor in employee loyalty which is why it was important in this Thesis to also find out what kind of leadership the organization has in the frontline. As operational excellence is about loyal and motivated employees it can also help in developing the customer satisfaction and loyalty. It was important for me to understand the employee perspective but also the manager perspective.

Employees in general feel that they are satisfied with the leadership in the organization. They mentioned flexibility, trust and open organizational culture as the most important signs of a quality leadership. Employees told that their managers trust in their employees that they can do their work and that the employees themselves know the best ways to do it.

Manager perspective was that the road and the processes towards the goal is not that important for them as achieving the goal itself. Employees feel that they can themselves influence their way of working and that is an important motivating factor. In an open work environment with a quality organizational culture there is trust amongst the employees and management.

Managers told in the interviews that in general it is easy to manage their teams. They also told that as the organization is still quite small, it is easier to shift towards new ways of working and change the direction of the strategy than in a bigger corporate working environment.

The managers wished also more reporting possibilities so that they could guide their employees better and see where there are things that can be discussed and developed. Reporting and reporting based discussions can also help the employees when they can get direct feedback from their work and can see where they can develop themselves in the future.

5.1.5 Systems, tools, and processes

Operational quality model suggests that the systems and tools are important in enhancing operational excellence. Without excellent systems and tools and processes it is hard to thrive to operational excellence as they are part of employees' everyday work. When the systems, tools and processes work they can be unnoticed but when there are flaws and difficulties in using these systems or in understanding the processes, they can affect the whole organization negatively. These are the reasons why I selected systems, tools, and processes as one theme of the interviews. They also relate to each other. Processes are the guideline of achieving a goal in a system by using different tools.

This theme indicated the most controversial results based on the interviews. Employees were not fully satisfied with the current systems and tools as they found them difficult to use, especially the customer relationship management system. Many of the employees were used to the previous system which they had learned to use and the new one has been difficult for them because of the differences in the user experience. Also, as the new customer relationship management system has been implemented in 2021, there has not yet been time to develop it enough to have the quality reporting in place at the time of the interviews and some of the processes are difficult to pass as there are many manual steps.

A: 'I think the CRM system is now clear but in the beginning it felt quite blocky and not very intuitive...'

The processes relating to the application handling and risk management and customer service were found to be functional and useful in everyday work. There are a lot of different processes and the employees felt that the novel system where the processes can be found from the same place has been well organized. However as there are so many different processes employees felt that it is hard to locate the correct instructions especially if they needed to check them only seldom. Employees that use these processes and check them often felt that there were not difficulties to find them. Especially for the new recruitments it might be difficult to locate the correct processes because of the large number of them. Employees also feel that the process arrangement is clearer than before as the processes are all in one place.

Employees also feel that they have enough influence in conducting the processes in a way they are most useful and easy for them as said in the previous chapters. As in the payment service industry there are many legal terms, and also technical terms, the employees felt that by coming to the work outside IT and payment industry it is easier to explain things to customers as they might be as clueless about the officialise language of the terms so it is easier to spread understanding when the employees can relate to the customers and use easier language when communicating.

A: 'In the beginning there were challenges in understanding the terms such as interface but more and more I familiarize with them and if there are things I do not understand I ask about them from the tech team.'

Employees and the managers especially in the sales function require more data to use in their work as the more the employees in the sales understand about their customers' behaviour the more easier it is to suggest them new functionalities that suite them in different sales campaigns.

5.2 Performance levels of the themes

As a conclusion, by finding out how these five themes of the internal service quality reflect the quality performance in this case organization, the perceived internal quality can have an influence in enhancing the external service value, customer satisfaction and further customer loyalty. In this chapter I conclude the findings from the analysis. Organizational culture gets a lot of positive insights in the interviews from the employees. Employees told about the openness and flexibility in the organization as good thing. Employees also felt motivated to work at the office because of the organizational culture. It can be seen from the interviews that the employees are also loyal to the organization as some employees had been in different roles in the same organization for a long period of time or as returnees from other organizations back to this one. Others told that they would love to see their career to develop in this organization rather than seeking opportunities elsewhere. Employees also felt important that the organizational culture is discussed openly with the possible new employees already in the recruitment phase when new employees are needed as by having employees that enjoy this kind of organizational culture can boost the whole work community.

Communication between the functions was experienced to be good even when half of the employees work in a different city. Employees and managers are happy with the technical solutions in communication and especially open and direct chat between the functions was mentioned as a positive factor in this theme. However employees felt that there could be more information about the forthcoming features so that employees would feel connected to the development and see where the organization and the product is developing in the future.

Interviewed employees told that they feel their job as meaningful and inspiring. They were also keen to give development ideas to the organization in things they felt important for them. The loyalty to the organization was high amongst the interviewed employees. They described that if the organization had to offer them a career path they would probably follow it rather than see themselves changing the organization.

Employees described the leadership culture as open and employees also described that they feel that they are trusted by the top management in them knowing the best how to handle their own work in the frontline. Managers felt that they could be better in directing their employees if there were more reporting and data opportunities. Employees also felt that it is good for them to categorize different tickets to get better data for reporting even if categorizing might be taking a bit of their time from other things.

Systems, especially the customer relationship management system, was described as unintuitive and blocky. Employees who had been working with a different CRM system were describing it as a difficult system. Employees were delighted with the new process organizing as all the support and application and risk management processes can all be found from a same place. Employees that work the most with these processes were the most happy with them and employees who seldomly need those processes and guidelines were most lost with them. Employees described the communication tools as functional. In the following table I have summarized the performance reviews positive feedback and criticism.

6 DISCUSSION AND CONCLUSIONS

In this chapter the results of the interviews are concluded in comparison to the implications of the PSS business model studies in relation to the internal service quality model and service profit chain model suggestions. I am also concluding answers to my research questions. I will also give the contributions of this Thesis to the science community and recommendations for the case organization on how the internal operations could be organized in the future to enhance internal service quality in the best possible way and in that way boost the external service quality, customer satisfaction and loyalty.

6.1 Summary of the analysis

The interview themes were selected based on the implications of internal service quality model and service profit chain model. These models suggest that internal operative way-of-working has a meaning also in external terms by creating external service value. In a healthy organization the excellence in the operations reflect the customer experience positively. Hence my sub-research question (Q3) '*What is the role of internal operations in enhancing customer loyalty in PSS context?*' can be answered. According to the studies in the operations field by examining ISQ model (Finn et al. 1996 and Marshall et al. 1998) and service profit chain model (Heskett et al. 1994) there is a relationship between the internal service quality and external service quality in organizations.

Service-profit chain in PSS business model (Figure 4) suggests that by influencing positively the employee satisfaction, an organization can keep its employee retention and employee productivity as high. High employee retention and productivity can have an impact on the frontline between internal operations and external customer experience which can have a chain effect on customer satisfaction, customer loyalty and furthermore to profit generation and revenue growth. Hence it was justified to study this case organization's internal operations and the level of the internal service quality. My next supportive research question was the following:

(Q1) How have the operations of the case organization evolved in time?

To answer this research question I organized interviews between employees that were in the operations during and after the acquisition in 2021 to find out how the operations were formed in the beginning of the new organization. The interviewed managers were there at the time of the acquisition and worked in the acquirer organization before. As described in the business context chapter 5.2., the acquisition period was very hectic and the processes and way of working were implemented from the acquired organization.

Operations functions are organized in the case organization in a way that the development and risk management are in a different location than the supportive functions, such as sales, finances, marketing and customer support because the supportive functions are internally outsourced to different business unit and the supportive function employees were the ones that changed from the previous organization as they were provided by it. There is regulation around the payment service providers as how the functions must be organized for example payments providers need to have different levels of defense in their risk management from the operative level to compliance. These regulations shape payment industry organizations and hence the case organization as well.

There are also certain policies and processes that payment facilitators have to follow the law and regulation especially related to the risk management and customer identification and transaction monitoring. These processes and policies must be taken into account when payment service providers are planning their operations functions' way of working.

One interesting comment in the interviews was that even that there are a lot of regulations and guidance on how the operations and customer boarding process must be organized it is eventually easier for the management to justify the related processes in the frontline to the employees and customers as they give a strict framework in which everything must be done. In an organization where there are not as strict rules and policies some processes that are important for the management can be harder to implement in the frontline as there is no higher meaning from the authorities to do them in a specific way. This was a good initiative as regulations are often described as restrictive for work, which came up in the other interviews as well.

Overall it can be said that as this case organization is quite small and there has only been a little time for development, many of the processes have been taken as arranged. Perhaps it has not been the most structured way of organizing the functions, processes and way of work. Interviewed employees described the development of the operational processes as 'need-based' when there is a problem it is solved.

Thirdly, my analysis of the themes answered my last sub-research question: (Q2) *What is the current status of organization's frontline operations?* In the table below are shown the summary of the performance of the themes in a table format.

Theme	Positives	Negatives
Organizational culture	Openness and trust	
	Way-of-working	
Communication between	Good communication tools	
functions	Distance is not an issue	
	nowadays	
Meaningfulness and self-	Change of work tasks	
fulfillment opportunities	Opportunities to influence	
	the way-of-working	
Leadership	Flexible working	No enough data or
	opportunities	reporting possibilities
Systems, tools and	Written processes are clear	Unintuitive systems
processes	for employees	

Table 2 – Summary of the interview findings on the selected themes influencing internal service quality

Lastly, based on the findings for the previous research question my main research question was the following:

How the organizing of the operations enhance customer loyalty?

As suggested by the internal service quality model and service profit chain there is a relationship with internal service quality and external service quality which is the main objective of the case organization to improve in the future. Especially as the case organization's business model follows product-service system business model, the service-side is as important as the product-side from a customer's perspective. By investing in internal service quality and to the external service quality the case company can increase the customer satisfaction and loyalty as well which is important in PSS organizations.

As suggested by the interviewed employees the frontline processes and used systems should be built in a way they increase internal service quality. Intuitive systems and quick communication channels are highlighted by the employees to be important in their everyday work. An organization that is flexible, gives employees opportunities to plan their own work tasks and processes, that can balance its employees' work life and free time and that employees can grow and develop their skills constantly in the organization can increase their employees' satisfaction which according to the studies can increase employee retention and productivity. Open discussion about the challenges experienced in the organization or outside of work is also important for the interviewed employees. By taking the internal service quality to the strategy planning the case company can have an impact on their employee satisfaction and hence increase their external service quality.

6.2 Theoretical Contributions

The objective of this Thesis was to find out the role of operational excellence in PSS organization in enhancing customer loyalty by studying the role of internal operations in the frontline and their role in creating customer value and satisfaction as there is a lack of understanding how can PSS organizations orchestrate their operations to enhance customer loyalty (Beuren, et al. 2013).

Firstly, the research questions were determined. The idea was to first find out relevant theories and to study what is the role of operational excellence in general and is there an effect and relationship to customer loyalty and is it important for organizations to give focus on enhancing operational excellence. Secondly, the goal was to understand how the case organization has formed its operations and does it support operational excellence. Finally the main goal was to find out how the operations can be designed in a way that it thrives for operational excellence and hence customer loyalty in PSS business environment.

In this Thesis I use the results of the previous studies of operational excellence, more specifically, concerning the internal service quality model and service profit chain and use

them in a product-service system business model environment context as there is no previous research that has combined these models in that area. Furthermore it was important to understand firstly the concept of PSS business model and find out if the organization of this case study operates in that business field. After reasoning these choices I researched the studies around these models and found out that according to these models there is a connection between internal operative excellence and customer loyalty. It was then reasoned to find out what exactly in the operations sector generate excellence.

The idea of this Thesis was to interview employees that work in operations functions in the case organization and to conclude a case study to understand how the operations functions and related processes and the way of working have been formed in the organization in the first place, how they should be developed in the future and what motivates employees to stay in the organization and to give their input in the development processes and customer satisfaction.

The results of this Thesis are showing what PSS organizations should focus on their internal operations. This Thesis has given input for the operations field in finding how PSS business model organizations can possibly organize their operations, what is important for it to approach operational excellence by affecting the internal service quality and how internal service quality can be increased to also increase the external value of the organization. This Thesis can give further understanding to PSS research field and operations' role in having a successful business in that business environment.

The implications for the case organization are evaluated in the next chapter and, finally, in the last chapter the limitations and future research opportunities are proposed.

6.3 Implications for the case company

Based on this case study and the interviews conducted in 2022, the case organization has a thriving organizational culture and employees are very happy of their job. All of the

interviewed employees gave positive feedback from the organizational culture. Employees also felt that in general great organizational culture is a motivating factor in staying in an organization and give development ideas for it. The case organization should continue to give attention to a good organizational culture that draw itself from the values of the organization also in the future as the organizational culture is maybe the most influential factor amongst interviewed employees in feeling satisfied in their work. Especially values such as openness and trust were mentioned numerous times. The case organization should also bring its culture and values up already in the recruitment phase and seek employees that share the same values as the case organization.

Employees feel that the communication works between different functions even if the employees are working in different locations. Employees felt that open organizational culture and knowing each other is important for the communication to work. Employees felt that it is important to have a possibility to ask questions directly from the employees who have the best knowledge of the topic.

Employees in the frontline wished more information about the upcoming releases so that they know which features they could offer for their customers before the actual release. Employees are also feeling that by having their voices heard in the development of their work related processes and in customer journey form application to termination is increasing their experience of meaningfulness.

Employees are very motivated in developing their careers in this organization if there are opportunities for it. Employees also strongly feel that their job is meaningful and challenging both in the support and in the sales functions. The case organization should focus on finding career paths for the employees that are motivated to see new challenges as, according to the service profit chain model, keeping the employee retention high companies can also create value externally. Leadership is strongly related to the organizational culture and employees feel in general that they are lead well in the organization. Especially important for the employees is the flexibility of combining their free time and work time and trust that the managers do not need to micro-manage employees but trust that they know best how to do their daily work tasks. Managers wished for more reporting opportunities so that they could better guide their employees. The case company should evaluate how the reporting can be improved so that managers could continue open dialogue with their employees that is based on the data.

Interviewed employees were, in general, satisfied with the systems and tools that the organization has offered them to do their work. Especially the communication possibilities and flexibility in terms of working at the office or from home were appreciated. However employees felt that the customer relationship management tool is not very intuitive and sometimes slows the work when there is a lot of administration work to be done. Managers also needed more data and more reports to guide their employees better.

The case organization should focus on developing and automatizing the processes that can be automatized to diminish the administrative tasks. The case organization should also ensure that the frontline processes are clear and easy to complete. For example the human errors are common in processes with a lot of manual work. Errors of negligence in manual data recording is away from the correctness of the reporting. The case organization should locate these manual processes and automatize them to lower the rate of human error and data loss.

6.4 Limitations and Future Research

The focus of this Thesis was in the internal aspects and their effect in increasing customer satisfaction and loyalty. I deliberately did not study the external aspects in this Thesis. In the future I suggest that the organization implements market research of its business environment and studies its current customers and potential customers to also understand the external point of view.

As the interviews in this Thesis were conducted in a certain time the result reflect that time and in the future it could be conventional to conduct more interviews on the same themes as in this Thesis on how they have evolved in time.

It would be also interesting from a scientific point of view to understand the effectiveness of service-profit chain model in PSS business model and also in the external parts of the model. How the customers evaluate the satisfaction rate of the functionality the organization offers them and how the functionality can be improved product-wise as well is an interesting study field in the future.

7 REFERENCES

Aaker, D. A. (1991) *Managing brand equity : capitalizing on the value of a brand name*. New York: Free Press.

Alasuutari, P. (2010) The rise and relevance of qualitative research. *International journal of social research methodology*. [Online] 13 (2), 139–155.

Ali, F. et al. (2018) Make it delightful: Customers' experience, satisfaction and loyalty in Malaysian theme parks. *Journal of destination marketing & management*. [Online] 71–11.

Baines, T. S. et al. (2007) State-of-the-art in product-service systems. *Proceedings of the Institution of Mechanical Engineers. Part B, Journal of engineering manufacture*. [Online] 221 (10), 1543–1552.

Bartelt, N. & Hommel, U. (2021) The evolving role of the 'collecting model' in the payment service provider market. *Journal of payments strategy & systems*. 15 (3), 250–259.

Beuren, F. H. et al. (2013) Product-service systems: a literature review on integrated products and services. *Journal of cleaner production*. [Online] 47222–231.

Caruana, A. (2002) Service loyalty: The effects of service quality and the mediating role of customer satisfaction. *European journal of marketing*. [Online] 36 (7/8), 811–828.

Carvalho, A. M., Sampaio, P., Rebentisch, E., Carvalho, JA., and Saraiva, P. (2017). Operational excellence, organisational culture and agility: The missing link? *Total Quality Management & Business Excellence*. Published online 16th September 2017, 1-20.

Crowe, S. et al. (2011) The case study approach. *BMC medical research methodology*. [Online] 11 (1), 100–100.

Dahlgaard, J. J. & Su Mi Park Dahlgaard (1999) Integrating business excellence and innovation management: Developing a culture for innovation, creativity and learning. *Total quality management & business excellence*. 10 (4/5), S465

Eur-lex.europa.eu. (2015) DIRECTIVE (EU) 2015/2366 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL. Accessed 20 March 2023. Available at: https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX%3A02015L2366-20151223

Europa.eu. (2021). European Union. Accessed 22 February 2022. Available at: https://europa.eu/youreurope/business/running-business/digitalising/setting-up-online-shop/index_fi.htm

Ferdous, A. S. & Polonsky, M. (2014) The impact of frontline employees' perceptions of internal marketing on employee outcomes. *Journal of strategic marketing*. [Online] 22 (4), 300–315.

Ferdous, A. S. et al. (2021) Internal communication and the development of customeroriented behavior among frontline employees. *European journal of marketing*. [Online] 55 (8), 2344–2366.

Financial Supervisory Authority. (2019). PSD2. Accessed 28 September 2022. Available at: <u>https://www.finanssivalvonta.fi/en/regulation/regulatory-framework/psd2/</u>

Finn, D.W., Baker, J., Marshall, G.W. and Anderson, R. (1996), Total quality management and internal customers: measuring internal service quality. *Journal of Marketing Theory and Practice*. Vol. 4, Summer, pp. 36-51. [Online]

Found, P. et al. (2018) Towards a theory of operational excellence. *Total quality management & business excellence*. [Online] 29 (9-10), 1012–1024.

Frost, F. A. & Kumar, M. (2000) INTSERVQUAL - an internal adaptation of the GAP model in a large service organisation. The Journal of services marketing. [Online] 14 (5), 358–377.

Goedkoop, M., M., van Haler, C., te Riele, H., and Rommers, P. (1999) Product Service-Systems, ecological and economic basics. *Report for Dutch Ministries of Environment*. (VROM) and Economic Affairs (EZ).

Gounaris, S. (2008), "Antecedents of internal marketing practice: some preliminary empirical evidence", *International Journal of Service Industry Management*, Vol. 19 No. 3, pp. 400-434.

Greasley, A. (2008) Operations management. Los Angeles, California: SAGE.

Hammer, M. (2004) Deep change - how operational innovation can transform your company. *IEEE engineering management review*. [Online] 32 (3), 42–42.

Heskett, J. L. et al. (1994) Putting the service-profit chain to work. *Harvard business review*. 72 (2) (1994), 164-174. [Online]

Hui, C. H. et al. (2007) The effects of service climate and the effective leadership behaviour of supervisors on frontline employee service quality: A multi-level analysis. *Journal of occupational and organizational psychology*. [Online] 80 (1), 151– 172.

Iacobucci, D., Grayson, K. A. & Ostrom, A. L. The Calculus of Service Quality and Customer Satisfaction Theoretical and Empirical Differentiation and Integration. *Advances in Services Marketing and Management*. Volume 3. (1-37). [Online]

Kandampully, J. et al. (2015) Customer loyalty: a review and future directions with a special focus on the hospitality industry. *International journal of contemporary hospitality management*. [Online] 27 (3), 379–414.

Karunaratna, A. C. & Kumara, P. A. P. S. (2018) Determinants of customer loyalty: A literature review. Journal of customer behaviour. [Online] 17 (1), 49–73.

Kim, S. et al. (2015) Development of an Innovation Model Based on a Service-Oriented Product Service System (PSS). *Sustainability (Basel, Switzerland)*. [Online] 7 (11), 14427– 14449.

Kotler, P. & Armstrong, G. (2014) *Principles of marketing*. 15th ed, global ed. Boston, Mass: Pearson.

Kumar, V., Batista, L. & Maull, R. 2011. The Impact of Operations Performance on Customer Loyalty. Service Science 3(2), pp. 158-171, © 2011 SSG. . [Online] Accessed 12 February 2022.

Lee, J. & AbuAli, M. (2010) Innovative Product Advanced Service Systems (I-PASS): methodology, tools, and applications for dominant service design. *International journal of advanced manufacturing technology*. [Online] 52 (9-12), 1161–1173.

Manzini, E. & Vezzoli, C. (2003) A strategic design approach to develop sustainable product service systems: examples taken from the 'environmentally friendly innovation' Italian prize. [Online] 11 (8), 851–857.

Marshall, G. W. et al. (1998) Exploring internal customer service quality. *The Journal of business & industrial marketing*. [Online] 13 (4/5), 381–392.

Martinez, V., Bastl, M., Kingston, J. & Evans, S. (2010) Challenges in transforming manufacturing organisations into product-service providers. *Journal of manufacturing technology management*. [Online] 21 (4), 449–469.

Mont, O. (2002) Clarifying the concept of product service -systems. *Journal of cleaner production*. [Online] 10 (3), 237–245.

Mont, O. (2004) Product-service systems: Panacea or myth?. The International Institute for Industrial Environmental Economics. Lund, Lund University

Mont, O. & Tukker, A. (2006) Product-Service Systems: reviewing achievements and refining the research agenda. *Journal of cleaner production*. [Online] 14 (17), 1451–1454.

Nyadzayo, M.W., & Khajehzadeh, S. (2016). The antecedents of customer loyalty: A moderated mediation model of customer relationship management quality and brand image. Journal of Retailing and Consumer Services, 30, 262-270. [Online]

Oliver, R. L. (1997). Satisfaction: A Behavioural Perspective on the Consumer.

Oliver, R. L. (1999) Whence Consumer Loyalty? Journal of marketing. [Online]

Panda, A. et al. (2022) Job meaningfulness, employee engagement, supervisory support and job performance: a moderated-mediation analysis. *International journal of productivity and performance management*. [Online] 71 (6), 2316–2336.

Parasuraman, A. (2013) Finding Service Gaps in the Age of e-Commerce: SERVQUAL Revisited. *IESE insight*. [Online] (17), 30–37.

Pirola, F. et al. (2020) Digital technologies in product-service systems: a literature review and a research agenda. *Computers in industry*. [Online] Vol.123 p.103301

Polit, D.S. & Beck C.T. (2010) *Essentials of Nursing Research. Appraising Evidence for Nursing Practice*, 7th edn. Lippincott-Raven Publishers, Philadelphia. Pyylampi, S. (2021) *Verkkokaupan maksunvälityspalvelut vertailussa*. Kupli. [Online] Accessed 20 March 2023. Available at: <u>https://www.kupli.fi/verkkokaupan-</u> <u>maksunvalityspalvelut-vertailussa/</u>

Reim, W., Parida, V. & Örtqvist, D. (2015) Product–Service Systems (PSS) business models and tactics – a systematic literature review. *Journal of cleaner production*. [Online] 9761–75.

Reunoso, J. & Moores, B. (1995) Towards the measurement of internal service quality. *International Journal of Service Industry Management*. ISSN: 0956-4233. [Online]

Roberts, P. & Priest, H. (2006) Reliability and validity in research. Royal College of Nursing Publishing Company (RNC). [Online]

Samson, D. & Kalchschmidt, M. (2019) Looking forward in operations management research. *Operations management research*. [Online] 12 (1-2), 1–3.

Shahzad, F., Luqman, R. A., Khan, A. R., & Shabbir, L. (2012). Impact of organizational culture on organizational performance: An overview. Interdisciplinary Journal of Contemporary Research in Business, *3*(9), 975–985.

Sharma, P. et al. (2016) Internal service quality as a driver of employee satisfaction, commitment and performance: Exploring the focal role of employee well-being. *Journal of service management*. [Online] 27 (5), 773–797.

Singh, J. et al. (2021) One-Voice Strategy for Customer Engagement. *Journal of service research : JSR*. [Online] 24 (1), 42–65.

Tang, J. et al. (2013) Investigating the effects of business process orientation on organizational innovation performance. *Information & management*. [Online] 50 (8), 650–660.

Taylor, A. & Taylor, M. (2009) Operations management research: contemporary themes, trends and potential future directions. *International journal of operations & production management*. [Online] 29 (12), 1316–1340.

Toma, S. G. & Naruo, S. (2017) Total Quality Management and Business Excellence: The Best Practices at Toyota Motor Corporation. *Amfiteatru economic*. 19 (45), 566–580.

Tukker, A. (2004) Eight types of product-service system: eight ways to sustainability? Experiences from SusProNet. *Business strategy and the environment*. [Online] 13 (4), 246–260.

Wang, S. et al. (2021) A Review of Flexible Processes and Operations. *Production and operations management*. [Online] 30 (6), 1804–1824.

Watson, G. F. et al. (2015) Building, measuring, and profiting from customer loyalty. *Journal of the Academy of Marketing Science*. [Online] 43 (6), 790–825.

Womack, J. P. & Jones, D. T. (2010) *Lean thinking : banish waste and create wealth in your corporation*. Second edition. New York: Free Press.

Wong, M. (2004) Implementation of innovative product service-systems in the consumer goods industry. PhD Thesis, Cambridge University.

Wu, H.-C. & Ai, C.-H. (2016) Synthesizing the effects of experiential quality, excitement, equity, experiential satisfaction on experiential loyalty for the golf industry: The case of Hainan Island. *Journal of hospitality and tourism management*. [Online] 2941–59.

Yang, Z. & Peterson, R. T. (2004) Customer perceived value, satisfaction, and loyalty: The role of switching costs. *Psychology & marketing*. [Online] 21 (10), 799–822.