

MÄLARDALEN UNIVERSITY
SWEDEN

School of Innovation, Design and Engineering

Exploring value proposition of service offerings in telematics system

Master thesis work
30 credits, Advanced level

Product and process development
Production and Logistics

Raghukulesh Achi

Supervisor (Company): Jagadish Suryadevara

Supervisor (University): Mälardalen University: Koteshwar Chirumalla

External Supervisor (University): Linköping University: Tomohiko Sakao

Examiner: Antti Salonen

ABSTRACT

Services are making a huge impact in the business sector especially in the developed countries. As services are customer-centric, there is a need for an enhanced process framework connected to integrated service development. Such a framework should ideally address value propositions meeting specific customer needs in identifying corresponding service offerings. In this context, this thesis aims to explore on how value propositions are defined, developed, and communicated during the introduction of service offerings and to identify the ways to improve the process of value propositions. The work is carried out in the context of a major (Swedish) manufacturing company within a specific product context, namely, the telematics system. The main data collection methods are personal observations, semi-structured interviews, meetings, and company documents. The study seeks to answer three questions: First, what are the value propositions addressed by the current service offerings in telematics system in the context of heavy-duty vehicle equipment? Second, how value propositions are created during the development of these services offerings? Third, how can the service offerings for telematics system be improved through the process of value proposition? The study found that two types of value propositions namely customer value proposition and stakeholder value proposition are addressed by the service offerings in telematics system. Additionally, it is found that value propositions are created in relation to service offerings. Finally, the thesis proposes a six-step conceptual framework to create better value propositions during the development of service offerings. The presented framework is applied to the current value proposition process at the case company and improvement suggestions are proposed, which can impact the service offerings in the near future. The thesis has contributions to enhance or create new service offerings through addressing the value propositions and applying them. The results are beneficial for managers and developers who work in developing the future state scenarios or business models.

Keywords: Value proposition, Service, Business model, Servitisation, Conceptual framework, Customer value proposition, Stakeholder value proposition, Value proposition process

ACKNOWLEDGEMENTS

My master studies at Mälardalen University has opened a new path I am not aware of in the past. Among which, importance of innovations, services and their trend settings are fascinating. The fun involved in learning these and the way they are used in the business environment are quite interesting, where several uncertainties are involved. Finally, I have learnt and used these concepts and it all happened only due to the encouragement from the staff at university.

To my academic supervisor Koteswar Chirumalla, I am so much pleased to the work and time he spent for making me to move especially in the tough times when I am stuck. Indeed, i am so grateful that he spent the amount of time rather than needed. His push and timely feedback, suggestions had really helped me a lot to finish the thesis. In addition, learnt many lessons from the interactions on how to approach the things to line up sooner. I feel that thanks is small word to say for the time he spent on correcting me. Anyways, thank you very much for your constant attention that made me to finish this thesis.

To the external supervisor Tomohiko Sakao, thank you for your time at the case company. Your suggestions have helped to make the things move in the right direction. The corrections are helpful for building up my level of writing.

At the case company, starting with Jagadish Suryadevara who believed in me and took for this project. I would like to express my gratitude to you because this area is not only interesting but also has opened a new avenue for me in the future. Additionally, some of the persons at the case company have really helped me to get some data and analyse it. Especially, M.Rosendahl., who has helped in collecting the necessary data required for my study. Petri.M., Veys.K, Ahmed.S., who has spent some of their time in making me to understand the situation at the case company.

Contents

LIST OF FIGURES	5
LIST OF TABLES	5
1. INTRODUCTION	6
1.1. BACKGROUND	6
1.2. PROBLEM FORMULATION	7
1.3. PURPOSE AND RESEARCH QUESTIONS	8
1.4. RESEARCH SCOPE AND LIMITATIONS	8
2. RESEARCH METHOD.....	8
2.1. RESEARCH PROCESS.....	8
2.2. LITERATURE REVIEW	9
2.3. DATA COLLECTION	10
2.4. DATA ANALYSIS	12
2.5. QUALITY OF RESEARCH	12
3. THEORETICAL BACKGROUND	13
3.1. SERVICE.....	13
3.1.1 <i>Concept of service</i>	13
3.1.2 <i>Servitisation</i>	14
3.2. BUSINESS MODEL.....	15
3.3. VALUE PROPOSITION	17
3.3.1 <i>Definition of value proposition</i>	17
3.3.2 <i>Value proposition process</i>	20
3.4. DIFFERENT TYPES OF VALUE PROPOSITIONS.....	21
3.4.1 <i>Customer value proposition</i>	22
3.4.2 <i>Stakeholder value proposition</i>	23
3.5. DIFFERENT PROCESS FRAMEWORKS TO CREATE VALUE PROPOSITIONS	24
3.5.1 <i>Value Proposition Builder</i>	24
3.5.2 <i>Forming value proposition through co-creative practice</i>	25
3.5.3 <i>The value proposition canvas</i>	26
3.5.4 <i>Building Value proposition</i>	27
3.6. CONCEPTUAL FRAMEWORK	30
4. EMPIRICAL FINDINGS	32
4.1. PRODUCT AND SERVICE OFFERINGS	33
4.2. TELEMATICS SYSTEM AND ITS SERVICE OFFERINGS	35
4.3. IDENTIFIED VALUE PROPOSITIONS IN TELEMATICS SYSTEM SERVICE OFFERINGS.....	37
4.3.1 <i>Broad view of value proposition</i>	37
4.3.2 <i>Types of value proposition</i>	38
4.4. THE CURRENT VALUE PROPOSITION CREATION PROCESS AT THE CASE COMPANY	40
4.5. IMPROVEMENTS OF SERVICE OFFERINGS IN TELEMATICS SYSTEM	42
4.5.1 <i>Strengths and weaknesses of the current value proposition process at the case company</i>	42
4.5.2 <i>The proposed conceptual framework for the value proposition creation process</i>	43
4.5.3 <i>Identified gaps between the case company's value proposition process and the proposed conceptual framework</i>	45
4.5.4 <i>Potential improvements of service offerings</i>	46
5. DISCUSSION.....	47
6. CONCLUSIONS AND RECOMMENDATIONS.....	50
7. REFERENCES	50

List of figures

- Figure 1: Overview on research process - 9
- Figure 2: The process for data analysis – 12
- Figure 3: Value proposition seen from both product and service side in Servitisation - 15
- Figure 4: Four main Business model elements – 16
- Figure 5: Conceptual business model framework - 16
- Figure 6: Overall (conceptual) view of the business model – 17
- Figure 7: The classic view of the value proposition process - 21
- Figure 8: Value proposition Builder – 25
- Figure 9: Co-creative practice in the formation of value proposition – 26
- Figure 10: Value proposition canvas - 26
- Figure 11: Building Value proposition - 28
- Figure 12: Proposed conceptual framework for the creation of value propositions - 32
- Figure 13: Division between hard and soft products at the case company – 33
- Figure 14: Three levels of services offered at the case company - 34
- Figure 15: Organisational structure for the case company – 35
- Figure 16: Division of Connected Services – 36
- Figure 17: Value propositions in terms of customer and stakeholder – 39
- Figure 18: The current value proposition creation process at the case company - 41
- Figure 19: Fit between service and value proposition - 42
- Figure 20: Proposed conceptual framework for the creation of value propositions - 43
- Figure 21: Value proposition process within the service creation process – 47
- Figure 22: The commonalities from the three authors to build a conceptual framework - 48

List of tables

- Table 1: Documents collected from the case company - 10
- Table 2: Methods in the process of collecting data from the case company - 11
- Table 3: Different definitions/ descriptions of value proposition proposed by researchers – 18
- Table 4: Description of the various customers situation addressed in literature - 19
- Table 5: Ten essential characteristics of great value propositions – 20
- Table 6: View of value propositions - 21
- Table 7: Four dimensions of customer value propositions – 23
- Table 8: Description of the Stakeholder value propositions in market – 23
- Table 9: Comparison and analysis of the identified processes of value propositions - 29
- Table 10: Identified value propositions related to each type of services offered through telematics – 37
- Table 11: Identified customer value propositions – 38
- Table 12: Strengths and weaknesses of the current value proposition – 43
- Table 13: Key activities (involved) for each step - 43
- Table 14: Identified gaps - 45

1. INTRODUCTION

This chapter provides the essence in the area of interest for this thesis. It starts with background section that comprises importance of services and its evolution in today's world. It explains, how value propositions can help to specify and deliver the service to the customers in an effective manner. Later on, the identified research gap is presented that gives a path for stating the purpose and research questions. The chapter concludes with the scope and limitations of the thesis.

1.1. Background

From the era of industrial revolution, manufacturers are focused in transactional relationships, creating immediate cash flows from the physical products that are produced by the manufacturing processes of a firm (Leroi-Werelds et al., 2017). In this context, the customer is treated as a passive recipient of the value by utilizing the physical product. In other words, the value is created via products that involves a series of steps containing tangible raw materials that embeds value in relation with the operand resources (Lusch, Vargo and O'Brien, 2007; Kuzgun and Asugman, 2015). However, in today's generation, many manufacturing firms involved in producing and delivering products are trying to make a tremendous shift to develop and provide (more) services i.e., moving from a (traditional) product-centric view to customer-centric view (Kuzgun and Asugman, 2015; Chirumalla, 2013). Because major economic activities are taken place through the contribution of services that in-turn creates an employment in the developed countries (Jong and Vermeulen, 2003). This is emphasized by Kindström and Kowalkowski, (2014), stating that service sector growth is about 70 percent of the total gross domestic product (GDP) in countries such as USA, UK, France, and Germany. Among which accompany of services are approximately 80 percent only in USA that makes a wake-up call for all the companies, governments and universities around the world for realization of how services are going to dominate the global economies and influence their economic growth (Bitner, Ostrom and Morgan, 2008; Kindström and Kowalkowski, 2014).

This forced companies to put their major innovation efforts for the creation of new services. However, the innovation in services has gained less attention (Lusch, Vargo and O'Brien, 2007). One of the reasons can be seen that tangible products are the main sources of innovation, making an impression that there is no tangible value for services (Kandampully and Butler, 2001). As services are created through a series of activities that results in to formation of an intangible value, there is a challenge in capturing and providing the value that is aligned with the customer requirements (Ericson, Bertoni and Larsson, 2009). Here, intangibles are those that cannot be touched but are felt and can be co-created with the presence of customers, employees and technology via relation with the static physical properties (Kandampully and Butler, 2001; Fernandes et al., 2018). In short, as services are not tangible, there exists many challenges for product-oriented firms in the process of creating new services (Kuzgun and Asugman, 2015).

The process of creating new services is done in a collaborative manner between the firm and their customers by laying major foundation on customer experiences. From which, a new business opportunity is evolved that is not only striving to provide a superior value for their core products but also pay a closer attention, via co-creation to their customer experiences and emotional bonds, thus causing to create a long-term business practice (Bitner, Ostrom and Morgan, 2008; Vargo and Lusch, 2008; Li and Found, 2017). The importance of co-creation is stressed by Vargo and Lusch, (2004a) in one of their foundational propositions (FPs), stating that customer is always the co-creator of value that can be fulfilled only when it is experienced.

Even though the concept of service acts as an intermediary activity between the customer needs and the firms' strategic decision, there are some mismatches between firms' intention to provide the service to the requirement or expectations of the customers. In short, there is a mismatch between what the firm's intention is with what the customer needs or wants. This can lead to the design of a poor business model (Meyer et al., 2002). A business model helps the firm to look over the requirements and activities in an aerial view. Thus, identifying any mismatches or gaps and minimizing them would be easier (Johnson, Christensen and Kagermann, 2008).

As a successful business model is needed during the introduction of services, the concept of value proposition is introduced that plays a pivotal role in the judgmental phase making an impact during the creation of services (Kindström and Kowalkowski, 2014). According to Rintamäki, Kuusela and Mitronen, (2007), a value proposition is a term that can help the firm to identify the customers', their needs, and what the firm should sell through which a clear picture can be seen by the firm from a customer perspective. Hence, value propositions act as an imperative decision factor for evaluating customer experiences. Since, customer experiences are considered as a preconceived notion during creation of value (Karpen, Bove and Lukas, 2012). Value proposition act as a magnetizing force in terms of buyer-supplier relationships and co-creation (Vargo and Lusch, 2004a, 2004b). Indeed, future success of the firms is judged through assessing the value propositions (Cavaleri, 2008). For instance, firms that can be able to develop the most compelling value propositions will have the best organizational performance (Lusch, Vargo and Tanniru, 2010; Parnell, 2006).

1.2. Problem formulation

From the background, it can be inferred that value proposition ensures to support customers in getting their job done (Vargo and Lusch, 2004a). In contrast, while creation of services there should be a proper channel for the engineers in identifying and communicating the intangibles in the early design phase of service development (Panarotto and Larsson, 2012). Henceforth, value proposition is introduced which is a critical element serving the business sector in recent years. However, frequency in the usage of value proposition is taken casually during the meetings instead of thinking on how it can change the strategic view of the firm (Camlek, 2010), suggesting that a proper approach is not clearly defined in the usage of value propositions (Payne and Frow, 2014b). This is extended by Skåln et al., (2014) stating that even though the term value proposition is used extensively, the research on it is limited.

In fact, Frow and Payne, (2011) mentions that less than 10 percent of the firms are successful in developing and implementing value propositions during the introduction of a service which is supported by a recent case study in relation to start-ups presented by Wouters, Anderson and Kirchberger, (2018). In addition, from a survey where value propositions are actively used within firms, a sample is drawn from 265 managers attending five executive events on three continents. The result mentions that even though the term value proposition is used by 65 percent of the firms, only 8 percent had formally developed and communicated value propositions effectively (Ballantyne et al., 2008). In a nutshell, firms can create value propositions (Vargo and Lusch, 2004a) but the success rate in developing and implementation of value proposition within the firm is less than 10 percent (Frow and Payne, 2011). Indeed, Frow et al., (2014) mentions it is due to limited understanding of value proposition. Also, during the creation of value, there is a limited discussion about value proposition between the stakeholders (Karlsson and Skåln, 2015).

Hence there is a need for more research in this area, especially in understanding what types of value propositions are addressed by firms and how are they created and communicated with the relevant stakeholders.

1.3. Purpose and Research questions

Based on the identified research gaps in the existing theory, the purpose of the thesis is defined. The purpose of this thesis is to explore how value propositions are defined, developed, and communicated in the introduction of service offerings in Telematics system, and to identify the ways to improve the process of value propositions in Telematics system.

To address the purpose, following three guiding research questions are formulated:

1. What value propositions are addressed by the current service offerings in telematics system in the context of heavy-duty vehicle equipment?
2. How value propositions are created during the development of these services offerings?
3. How can the introduction of service offerings in telematics system be improved through the process of value proposition?

1.4. Research scope and limitations

From the background section, it can be seen that the term value proposition can be used in products as well as services context. However, in this thesis the scope on products is given limited attention by focusing more on services. Henceforth, the focus of this thesis is limited to an overall view of the value proposition processes and how they are defined in the process of service development. Even though some services are considered, the process of service development is not under the scope of this thesis.

This thesis is structured through the contribution of information by the case company that is one of the Swedish heavy-duty vehicle equipment manufacturing companies. Moreover, the framework for value proposition process is a conceptual model that need to be implemented and tested in the near future. Based on the framework, the thesis is limited to suggesting the ways to improve the current value proposition process at the case company.

2. RESEARCH METHOD

This chapter provides the information on how the research is conducted. Starting with the research process where overview of the research is written. Further, the process of literature review, and data collection is presented. Taking these two as an input the data analysis is conducted. Lastly, quality of the research is presented.

2.1. Research process

The research process is carried out in five phases, overview is shown in figure 1. The first phase is "Define area to be studied" in which the value propositions and their processes are reviewed from literature. The outcome of this phase is problem formulation and addressed through three research questions. As case study can offer flexibility in exploring and building of theory to form a strong base on research (Voss, Tsirikrisis, Frohlich., 2002) that is supported by Eisenhardt (1989) in her widely accepted paper, claims that case study is the foundation to develop theory. So, in the second phase, "Data collection" is initiated from the case study conducted at one of the Swedish heavy-duty vehicle equipment manufacturing companies. Further, an exploratory study with an unstructured observation is taken place (Kothari, 2004) and during the study, the scope of the

research is re-addressed through analysing the acquired data. The exploratory study consists of personal observations, semi-structured interviews, meetings, discussions, and referring to company documents where the required data can be collected. In the third phase, analysis is initiated by comparing the theoretical data to the collected data in the case company through abductive process involving iterations (Dubois and Gadde, 2002; Kovacs and Spens, 2005). Outcome of this phase can be identification of gaps or theoretical suggestions. In the fourth phase i.e., discussion phase, the results are discussed, and overview of the objectives of the thesis are presented. The last phase, conclusions are drawn where the overview of the thesis is presented. During the first three phases, literature review is parallelly carried out.

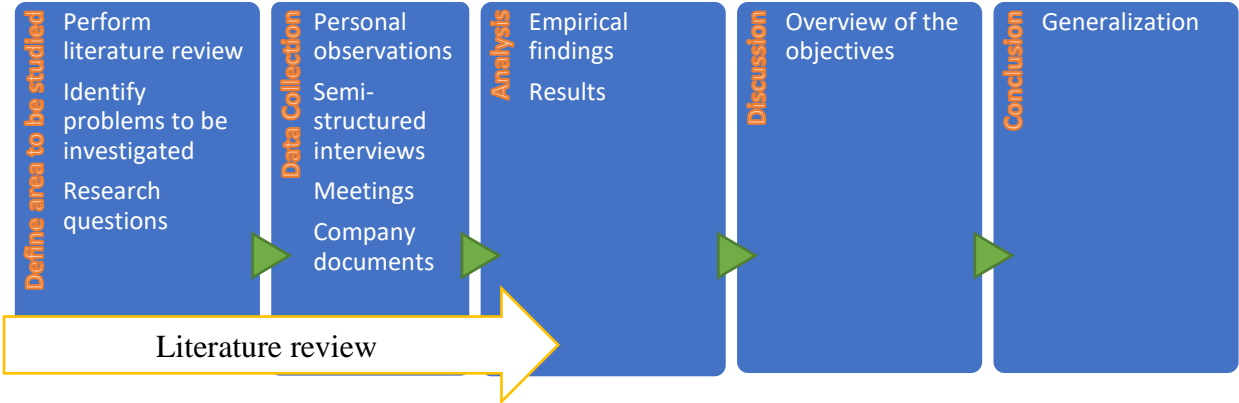


Figure 1: Overview on research process

2.2. Literature review

The literature review is initiated with keywords: Business model, Value proposition, Service. The information for the literature review is collected in a series of steps: the first step is through combination of these keywords in a search engine for extracting some scientific articles. One of the efficient search engines: Scopus was used to locate the scientific articles. Indeed, this search engine is capable in locating the scientific articles from scholarly databases such as Elsevier, Emerald Insight, IEEE Explore etc. The review is further refined by providing more keywords generated from the previous search of scientific articles. The used keywords are stakeholder, customer, co-creation, framework. The searches are done by limiting the time span of latest 10 years, i.e., those articles that are published before 2008 are seldom considered. This is due to the fact that the retrieved information is new and suitable for existing research. In addition, the articles are further filtered in the search engine by focusing on articles having “full-text” and “peer-reviewed”. Further, the subject area is restricted to the existing research i.e., articles focusing on social, science, math are neglected and articles in which subject area is related to business, management and accounting, economics, econometrics and finance, engineering, decision sciences are considered. Also, articles having language as English are selected. The second step is to select the articles those are relevant to the aim of this thesis and is done by referring to the abstract of the scientific articles. During this process, sometimes the conclusions and discussions are also referred for taking a decision on the articles. The third step is to review the articles and capture the relevant data to the existing research area of this thesis. The forth step is to summon the collected data and turn them into information that can add weightage to the existing research. Additionally, if there is any relevant information in the article; the source of that information is traced through the search engine: Google Scholar where the scientific articles can be found directly and easily. During this process, some articles published in the previous

years' i.e., going back to the stated timespan are considered. Also, the suggestions from the article databases are considered during the process of downloading the relevant article, this activity is carried out in only one database i.e., Elsevier. In addition, the citations for some articles are considered. Books are used to collect the information and for getting some inspiration. The relevant information is collected by reviewing table of contents, going through gist of the relevant chapters. In a nutshell, through this literature review development of a theoretical framework is done. That can be able to throw some light into the research area that indeed builds a strong argument within analysis for the case study.

2.3. Data collection

In the process of going through literature review, the data collection is initiated parallelly. As mentioned by Gibbert, Ruigrok, Wicki., (2008); data collection needs to start with the observation of the reality, that is followed at the case company starting from going through company records, and desk research followed by personal observations. The collected documents from the case company are listed in table 1.

Table 1: Documents collected from the case company

Type of document	Description
Organisational documents	These documents have the information relevant to the research area provided by the case company
	Information regarding: <ul style="list-style-type: none"> • Strategic framework for profitable growth • Process description- Product planning process • Vision 2020
Connected services	This information is gathered from the internal documents at the case company, and these are provided by the employees
	Information regarding: <ul style="list-style-type: none"> • Types of services • Connected services • Various platforms for services • Value propositions introduction • Telematics manual • Machine health report

Further, the data is collected through meetings, semi-structured interviews, and discussions. The details for each method are presented in table 2. Through meetings, the information related to telematics and connected services are gathered. And from semi-structured interviews details are gathered that helped in narrowing down the scope. And discussions are held where university supervisors are also involved that made to understand the present study.

Table 2: Methods in the process of collecting data from the case company

Methods	Number of meetings	Duration (in minutes)	Description
Meetings	6	60	<p>Through this the objective of the thesis is studied.</p> <p>Topics discussed:</p> <ul style="list-style-type: none"> • Objective of the thesis • Case study scope • Process flow <p>Collection of information: Note-taking</p> <p>Attendees: Telematics - Product specialist, Data analyst, Product manager, Product Quality</p>
Semi-structured interviews	4	60	<p>Interviews are conducted with persons who work in telematics area</p> <p>Interview Questions: See Appendix</p> <p>Collection of information: Notes</p> <p>Respondents: Global product manager- Aftermarket, Telematics - Product specialist, Product manager</p>
Discussions	3	60-90	<p>University supervisors visited the case company for their suggestions, a meeting is scheduled with the key persons to discuss the topic further and find the research scope.</p> <p>Topics discussed:</p> <ul style="list-style-type: none"> • Integrated product service • Classification of services • Process validation • Activities for value proposition <p>Collection of information: Recording and-Note taking</p> <p>Attendees: Supervisors from Mälardalen University and Linköping University, Global Product architect, Telematics - Quality engineer</p>

2.4. Data analysis

Data analysis is done through abductive process where the research is initiated by having iterations between the empirical and theoretical data (Dubois and Gadde, 2002; Kovacs and Spens, 2005). All the relevant data (presented in table 1 and 2) are combined in a systematic way and are grouped that has caused in evolving the theme ensuring that identified patterns are in a qualitative manner (Eisenhardt, 1989). The outcome can be having a strong base in empirical by providing detailed reflections from the literature review. The process is shown in figure 2.

Data analysis revealed that the case company is initiating to introduce value proposition concept within the firm under connected services. In order to answer the research question no. 1 regarding what value propositions are addressed in the services offered, data analysis focused on identifying the existing services those are offered through telematics system. Further, in order to answer another research question no. 2 regarding how value propositions are created during the creation of services, data analysis focused on how the current process is focused on. Lastly, in order to answer research question no.3 regarding on how service offerings are improved through the process of value proposition, through data analysis focused a suggestion is derived from the literature review.

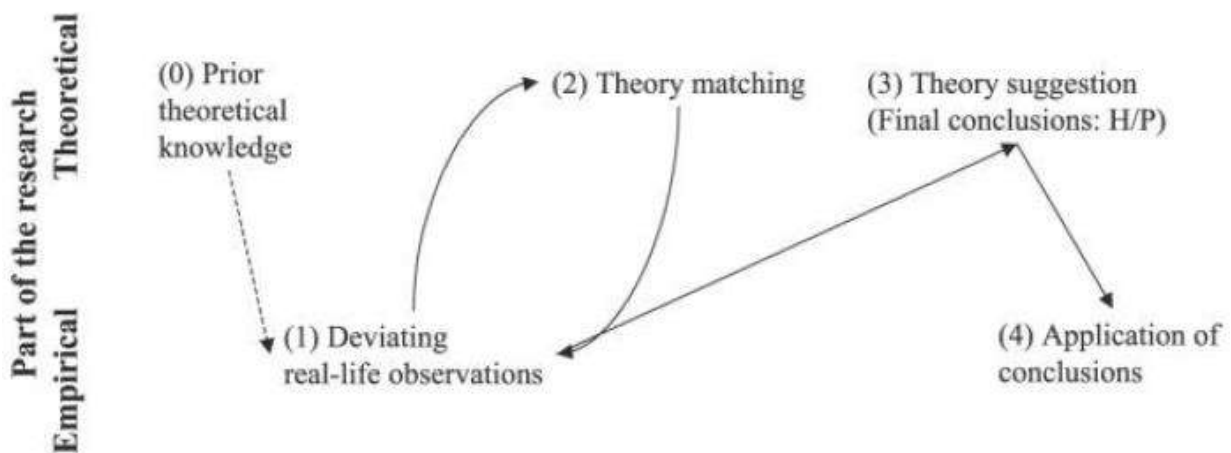


Figure 2: The process for data analysis (Source: Kovacs and Spens, (2005))

2.5. Quality of research

The quality of research for this thesis is relied on triangulation method. Precisely, the information gathering is done through investigations. Fielding and Schreier (2001) from their work, identifies three meanings for triangulation. First, *validity* implies that different methods are used for validating results. Second, *complementarity* model that describes the way of presenting a broader and complete picture of a research context. Third, *trigonometrical* model where combining of methods exists that represent research phenomenon founded by alternative measures. Among the three, this thesis relies on *complementarity* model, where value proposition for the service offerings in telematics system are presented in a broader context. That also includes the value proposition creation process.

The work of this thesis is relatable to the literature review, as there are many researchers who are paying attention to value propositions and focusing on its creation process whereas at the case company this area i.e., value propositions and their processes have gained little or no attention

among the employees. So the information gathered through various data collection techniques is a kind of investigative ones. For instance, the information collected at the case company is in the first-hand and no previous research had been done in this area. Through investigations, the reality at present is collected that ensures to help in validating the study. For data redundancy, collection of data is done through several methods i.e., company documents, organisational documents, meeting, semi-structured interviews, and discussions. Most of the process involved in data collection, and data analysis are done back and forth that ensures that defined problem statement is answered.

As mentioned, the research is carried out in one of the Swedish heavy-duty vehicle equipment manufacturing companies. At first, the information is collected through theoretical study i.e., more of a quantitative data that has helped in the formation of research questions. This is verified with the information collected from the case company, the (collected) information is qualitative (Eisenhardt and Graebner, 2007). Thus, objective of the study is derived. In the process of comparison between the theoretical study and information gathered from case company, there are some areas that needed special attention, but the thesis is limited to the defined scope. For instance, while exploring the value propositions in services offered the attention is gradually rooted to the service creation process that is not under the scope of this thesis. Hence, the information regarding those services are not gathered and less attention is paid.

3. THEORETICAL BACKGROUND

This chapter underpins the theoretical background to provide the detailed view of the stated problem. It starts with the general overview of service followed by the servitisation concept. The further step is to introduce business model and its elements. From here, one of the strategic elements: value proposition is introduced and explained in-brief. Later on, various kinds of value proposition are presented. Finally, the process frameworks from various authors are presented from which the conceptual framework of value proposition process is derived.

3.1. Service

The word Service can be interpreted in two ways, i.e., in singular form and plural form. In singular form, a service is a process in the usage of one's resources that can be beneficial to another entities (Lusch, Vargo and O'Brien, 2007). Whereas in plural form, services are stated as an intangible product that can deliver special type of output (Vargo and Lusch, 2008; Kuzgun and Asugman, 2015). In the thesis, the plural form is considered that is explained in the further sections.

3.1.1 Concept of service

In the modern economy, the growth in services is increasing in an incremental manner. Edvardsson et al., (2000) define the service concept as a detailed description of the customer needs to be satisfied through posing some intriguing questions; how they are to be satisfied, what is to be done for the customer, and how this is to be achieved.

Many firms are more inclined towards innovation in products that are tangible rather than services that are intangible in nature. This results in having (more) number of literature studies in product development compared with the service development. Since, product usually appears physically whereas services can't be touched physically i.e., intangible (Steiner and Harmon, 2009; Fernandes et al., 2018) and those can only be sensed through the output of the work done. For

instance, product can be produced by knowing the requirements of the customer and sell it to the respective customers', in contrast services are created only when there are definite requirements of the customer and then the created service can be sold. This can also be interpreted as when selling a product, value is created and sold but when selling a service, value is to be co-created (in-line with customer) (Payne, Storbacka and Frow, 2008; Lindhult et al., 2018) and sold. Henceforth, Services are characterized by intangibility, heterogeneity, perishability, and inseparability. For instance, when a product success can be achieved through the innovation comprising of human resources, teamwork then a service success can be achieved by paying close attention to the human resources, teamwork, and also user collaboration (Alam, 2002).

The future of marketing has a greater paradigm shift when moving from products to services. This can lead to a new dominant logic that integrates the goods with services and provides a stagnant position for the firm in the market (Vargo and Lusch, 2004a).

However, the concept of selling the services varies when compared with products i.e., the competences and skills can be different during the execution of services compared with products (Kindström, Kowalkowski and Alejandro, 2015). Although the concept of service can make a bridge between the customers and the firm, the chances of filling this gap is challenging (Meyer et al., 2002). The gap can be addressed through servitisation, through which the (traditional) manufacturing firm can provide more services or integrate products and services.

3.1.2 Servitisation

Servitisation is about providing (more) services along with the existing products. Indeed, servitisation helps in enhancing the services in a manufacturing firm (whose priority is in producing product, and selling a product, and also facilitating services) that helps the product to function in the long run. In fact, as services are intangible in nature, through the concept of servitisation the creation and distinguishing of services can be done in an efficient manner (Lerch and Gotsch, 2015). Opresnik and Taisch, (2015) adds that servitisation should be a business strategy for the manufacturing firm to enhance the competitive advantage. Indeed, Opresnik and Taisch, (2015), defines servitisation as "*a market package or bundles of customer-focussed combinations of goods, services, support, self-service and knowledge*" (pp175).

The phenomenon of servitisation came into limelight when manufacturing firms are introducing services in relation with the products. This created an opportunity for the manufacturing firms in addressing the unmet customer needs along with the provision of products. The hinge phase in the introduction of servitisation can be having a continuous contact with the customers that gives a proper base to the manufacturing firm in offering the necessary services (Lenka, Parida and Wincent, 2017; Chirumalla, 2016).

In a nut-shell, servitisation is the integration of product and services that distinguishes the various kind of services. Indeed, Grubic and Jennions, (2018) mentions it in three levels: (1) basic services, consisting of product sale, supplying spare parts, and repair, (2) intermediate services, consisting of maintenance, customer support, training, overhaul, (3) advanced services, consisting of integrated solutions. Coreynen, Matthyssens and Van Bockhaven, (2017) shows their findings through figure 3 that include three levels of servitisation addressed via value propositions as input, performance and result between the product and customer process (i.e., services).

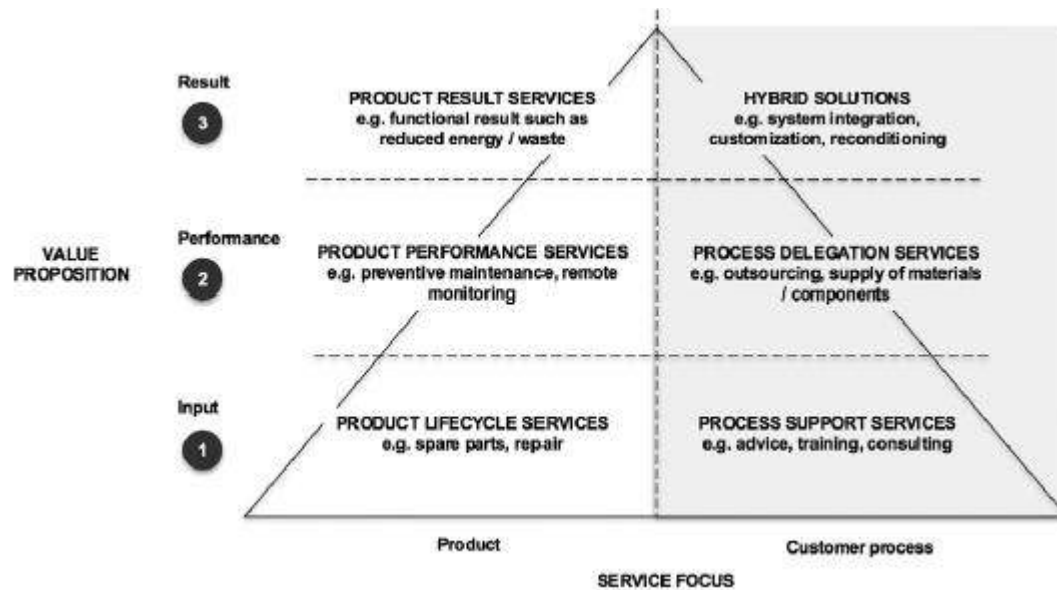


Figure 3: Value proposition seen from both product and service side in Servitisation. (Source: Coreynen, Matthyssens and Van Bockhaven, (2017))

Henceforth, the distinction between the types of services can help in identifying and addressing the unmet customer needs. However, in order to hit the market and to gain economic returns a detailed plan is necessary that can be supported by the formation of a business model. A business model can help to see different aspects of business plan in an aerial view. The details are mentioned in the further section.

3.2. Business model

Irrelevant of the product or service, a business model (BM) acts as a form of storyteller with some facts and figures that can convince top management to invest in the naive idea.

Chesbrough, (2007) suggests that business model should be properly defined as it can be a game changer in the market. Indeed, Chesbrough (2007) presents a working definition on the importance of business model: *"A better business model often beat a better idea or technology"* (pp.12). And came up with a statement, Chesbrough (2010) *"a mediocre technology pursued within a great business model can be more valuable than a great technology exploited via a mediocre business model"* (pp.354). It was justified by showing the examples of XEROX Corporation, and 3COM. Indeed, there is no value in presenting the technology if it is not commercialized through a good planning of the business model (Safarpour and Sillanpää, 2017). In short, business models are the design or the architecture of the way of working of a firm that is able to create, deliver and capture the value (Reim, David and Parida, 2017).

A business model can be created only when two important functions: value creation and value capture, exists. In value creation, the series of activities are performed starting from getting customer requirements to satisfying the customer by delivering the necessary product or service, causing to create a net value. Through value capture, the value is captured through the performed activities in the value creation function (Chesbrough, 2007).

A business model can be treated as a conceptual tool that comprises the set of elements and their relationships within a specific firm. Also, a business model for any firm stands on the four simple pillars that expresses: 'what' is offered by the firm, 'who' are their targets, 'how' is it realized, and 'how much' revenue can be generated, for the firm. Indeed, these pillars can form four main business model elements as shown in figure 4 (Osterwalder and Pigneur, 2003).

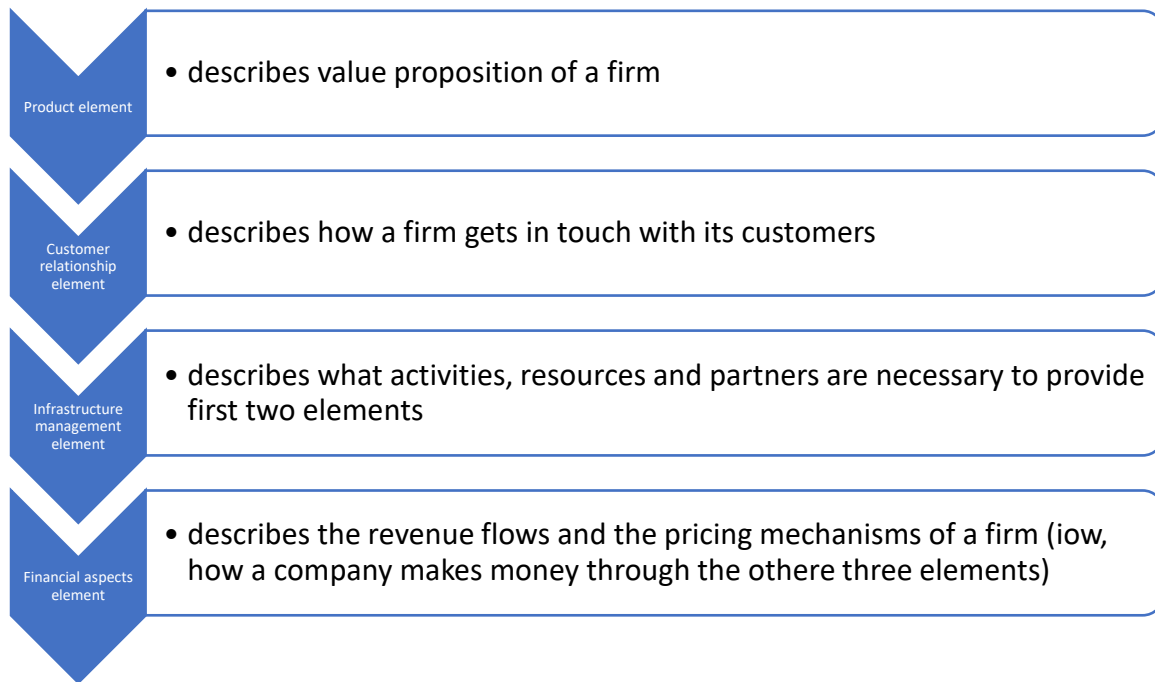


Figure 4: Four main Business model elements (adapted from Osterwalder and Pigneur, (2003))

Bocken et al., (2014) describes the business model structure as an activity-based system that includes series of activities. The activities are written by posing some intriguing questions starting with what, followed by how and finally who. From the addressed questions three categories are derived that are shown in figure 5.

Value proposition	Value creation & delivery	Value capture
Product/service, Customer segments and relationships	Key activities, resources, channels, partners, technology	Cost structure & revenue streams

Figure 5: Conceptual business model framework (Source Bocken et al., (2014))

In fact, Rossignoli and Lionzo, (2018) explains these elements as “*value proposition, which considers the value embedded in the product/service to generate economic return; value capture, which covers the revenue obtained from sales; and value creation and delivery, which embrace the exploitation of new business opportunities, new markets, and new revenue streams, as well as the distribution of this value among the stakeholders. These elements are the building blocks of a BM and their analysis allows us to understand how a firm does business*” (pp 695).

Summing up of all, figure 6 shows the overall (conceptual) view of how a business model can function through its elements.

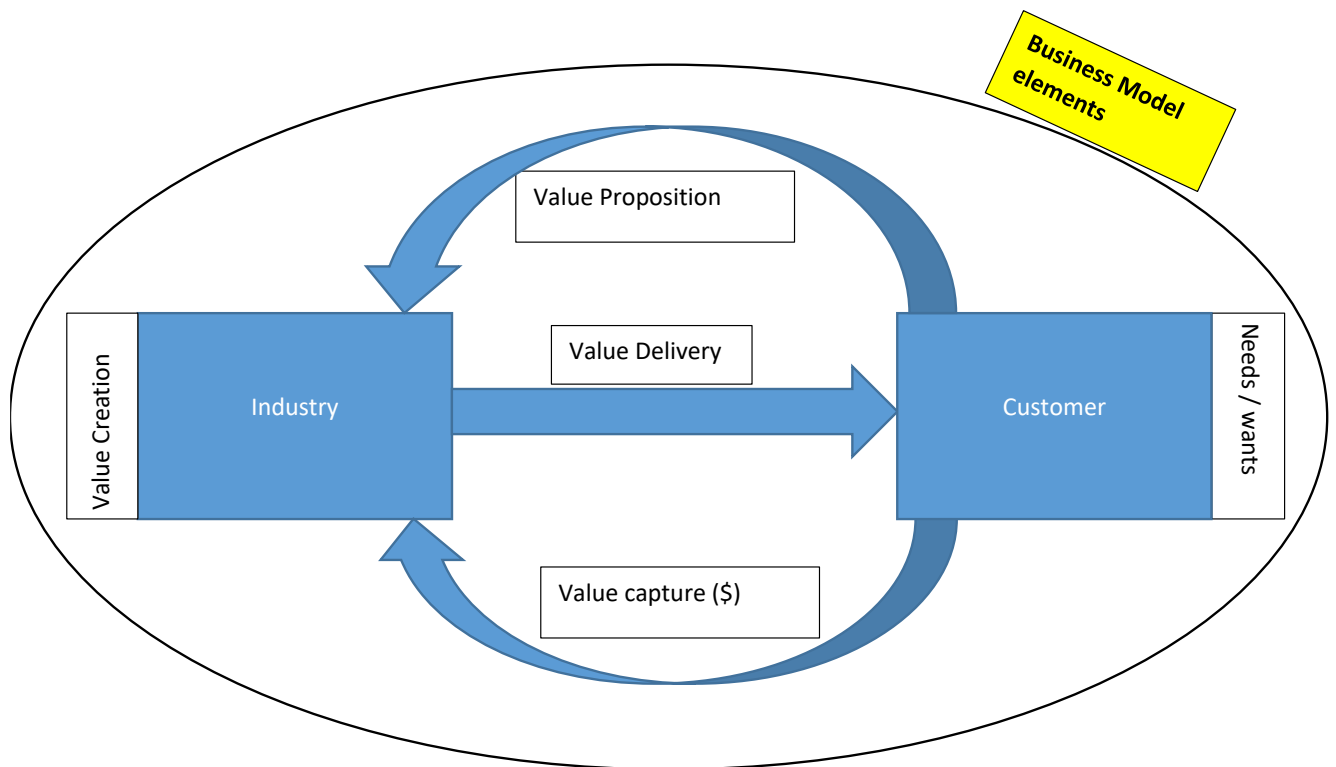


Figure 6: Overall (conceptual) view of the business model (Created by the author)

On a final note, *“Pursuing a new business model that’s not new or game-changing to your industry or market is a waste of time and money”* (Johnson, Christensen and Kagermann, 2008, pp.56). Value proposition helps in identifying that game changer, details are explained in further sections.

3.3. Value Proposition

The term value is interpreted as per its use, in short can be called as eye of the beholder. In other words, it is a vague term that changes its meaning as per the context. Similarly, for several times the value proposition is used in a loose manner and the meaning of it leads to nothing (Camlek, 2010). From this section, starting with value proposition and its uses, different types of value propositions are stated that ensures reader to understand the importance and proper usage of the term value proposition.

3.3.1 Definition of value proposition

Value proposition as a noun is an innovation, service, or feature intended to make a company or product attractive to customers. For the development of the firm in terms of building value to their customers through capturing experiences, the concept of value proposition is introduced that indeed causes to create a profitable customer value (Barnes, Blake and Pinder, 2009). Barnes, Blake and Pinder (2009) mentions *“by building a value proposition you will provide profitable and superior customer value, more profitable and more superior that if you hadn’t built one. The whole object is to generate wealth. By providing superior and profitable customer value you are increasing your own wealth”* (pp. 23). Especially, Frow et al., (2014) in his work try to explain the term value proposition through metaphors that makes reader to understand the importance of it. The identified metaphors in a single word or sentence are:

Promises, proposals, invitation to play, bridge connecting our worlds, wild card, and journey to a destination. Various author(s) view of the term value proposition are presented in table 3.

Table 3: Different definitions/ descriptions of value proposition proposed by researchers

Author(s)	Definition/ description of value proposition
Osterwalder and Pigneur, (2012)	"The Value Propositions [...] describes the bundle of products and services that create value for a specific Customer Segment [...]. A Value Proposition creates value for a Customer Segment through a distinct mix of elements catering to that segment's needs. Values may be quantitative (e.g. price, speed of service) or qualitative (e.g. design, customer experience)." (pp. 22-23)
Bocken et al., (2014)	"value proposition is typically concerned with the product and service offering to generate economic return, in a sustainable business, the value proposition would provide measurable ecological and/or social value in concert with economic value" (pp. 43)
Viswanadham, (2018)	"the value proposition should show to targeted customers the uniqueness of your way of solving the problem and how is it better than competition." (pp. 988)
Rossignoli and Lionzo, (2018)	"value proposition, which considers "the value embedded in the product/service to generate economic return;" (pp. 695)." The value proposition revises from 'what' participants produce/ offer to 'how' they do it." (pp. 701)
Schmitz, de Mattos and Correia, (2018)	"Value proposition is an approach to help product definition. The unique value that your product or your company offers encourages your customers to buy it." The value proposition summarizes what the product is and who the target customers are. This differentiates what is being offered to the market. It is also closely related to the way the product aims to be seen by customers." (pp. 132)
Safarpour and Sillanpää, (2017)	"Value proposition must be compelling enough for the prospective customers to agree to cooperate with the firm." (pp. 37)
Åkesson et al., (2016)	" Value propositions [...] communicate, to both customers and employees, what value is expected from a service and constitute an invitation to co-create value. As promised value-in-use, value propositions consist of integrated resources offered to customers to support their value-creation process" (pp. 341)
Karlsson and Skålén, (2015)	"Value propositions are configurations of resources aiming to support customers' value creation in use and have been described as a firm's value creation promises to customers." (pp. 1348)
Payne and Frow, (2014a)	"value proposition is an organization's offering to customers, representing a promise of benefits of value that customers will receive during and after the usage experience. It identifies both product and experiential benefits and costs (or sacrifices) that result from the relationship between customer and organization." (pp. 240)
Grubic and Jennions, (2018)	"A value proposition provides the compelling reason for a customer to purchase a product or service or both." (pp. 6)
Frow et al., (2014)	"successful value proposition provides the means of achieving differentiation and forms the foundation for the ongoing supply-customer relationships." (pp. 329)

From the above table, value proposition can be understood as a promise given by a firm to their customer that the outcome from their products or services or solutions can be able to improve customers' work i.e., getting their job done in an easier way.

This leads to an interpretation that value proposition can be used as a synonym to the benefits or offerings given from the firm to their customers'. However, value cannot be derived only through benefits, it should also have sacrifices or cost incurred (Ulaga and Chacour, 2001; Kuzgun and Asugman, 2015). It is further refined by Safarpour and Sillanpää, (2017), who state that value can be created only when the benefits of an activity exceeds the incurred cost, as shown in the following equation:

$$\text{Value} = \text{Benefits} - \text{Expenses} \dots\dots (1)$$

Therefore, the nature of value varies as per the application. Similarly, value proposition can have the weightage only through (particular) situation (Barnes, Blake and Pinder, 2009). Among them, customer experience or situation is the first building block during the creation of value proposition (Rintamäki, Kuusela and Mitronen, 2007). The different sets of customers situations are addressed in literature which are shown in table 4.

Table 4: Description of the various customers situation addressed in literature

Customers situation	Description	Example	Author(s)
Getting the job done	Customers who needs help to get their job done	Rolls Royce airlines	(Osterwalder and Pigneur, 2012); (Johnson, Christensen and Kagermann, 2008); (Rintamäki, Kuusela and Mitronen, 2007)
Design	Customers who are more into design	Fashion and consumer electronics	(Osterwalder and Pigneur, 2012)
Brand/ Status	Customers value is defined through the brand they use	Rolex	(Osterwalder and Pigneur, 2012); (Rintamäki, Kuusela and Mitronen, 2007); (Skälén et al., 2014)
Price	Customers value is defined through low prices	Southwest, easy Jet, and Ryanair, Nano	(Osterwalder and Pigneur, 2012); (Rintamäki, Kuusela and Mitronen, 2007)
Cost reduction	Customers value is defined through helping them in reducing the costs they spent	Salesforce.com	(Osterwalder and Pigneur, 2012)
Risk reduction	Customers value is defined through the assessing level of risk a product or service has.	Car buyer	(Osterwalder and Pigneur, 2012)
Accessibility	Customers value is defined through making the usage of products or services to many.	NetJets, mutual Funds	(Osterwalder and Pigneur, 2012)
Convenience/ usability	Customers value is defined through making the things convenient to use.	iPod and iTunes	(Osterwalder and Pigneur, 2012)

From table 4, it can be seen that identifying the customer situation is simple. But, defining the most important attribute for the customer’s situation is challenging (Johnson, Christensen and Kagermann, 2008). The next step can be customizing value proposition to match the identified attribute which can be equivocal sometimes. Indeed, a great value proposition cannot be created in the first iteration itself, it needs lots of revisions and audits. For instance, Osterwalder and Pigneur et al., (2014) in their book mentions the ten essential characteristics of great value propositions, which is presented in table 5.

Table 5: Ten essential characteristics of great value propositions (Source: Osterwalder and Pigneur et al., (2014))

Are embedded in great business models	Align with how customers measure success
Focus on the jobs, pains, and gains that matter most to customer	Focus on jobs, pains, and gains that a lot of people have or that some will pay a lot of money for
Focus on unsatisfied jobs, unresolved pains and unrealized gains	Differentiate from competition on jobs, pains, and gains that customers care about
Target few jobs, pains, and gains, but do so extremely well	Outperform competition substantially on at least one dimension
Go beyond functional jobs and address emotional and social jobs	Are difficult to copy

Vargo and Lusch, (2008) mentioned the existence of value propositions under foundational premises i.e., Fp7 of service-dominant logic. FP7 states that firms can only offer value propositions. However, the nature of value proposition changes as per the need of the customer as shown in table 2. Therefore, value propositions are directly proportional to the customer jobs that recalls another foundational premise i.e., FP6: customer is always the co-creator of value. The various customer segments are mentioned in table 4 that can make an insight in how to interpret the value propositions.

Hence, value proposition when defined in relation to the value. Value; like beauty, is in the eye of the beholder. Similarly, value proposition is related to the customer situation. The aerial view of the value proposition process is mentioned in the below section.

3.3.2 Value proposition process

In the process of explaining value propositions, Rintamäki, Kuusela and Mitronen, (2007); Frow et al., (2014) states that one should follow three approaches in the process of developing value propositions. Those are listed as follows:

1. Identifying the overall benefits a firm can offer to their customers’;
2. Identification of the benefits offered relative to their competitors;
- and 3. Identification of the specific benefits that are imperative to the selected customers. Among the three approaches, the third approach is given prominent role since it clearly focuses on a (precise) customer and provides the benefits suitable for them. The classic view of the value proposition process is presented in figure 7 that shows the overall factors to be considered and what are the expected outputs through the process.

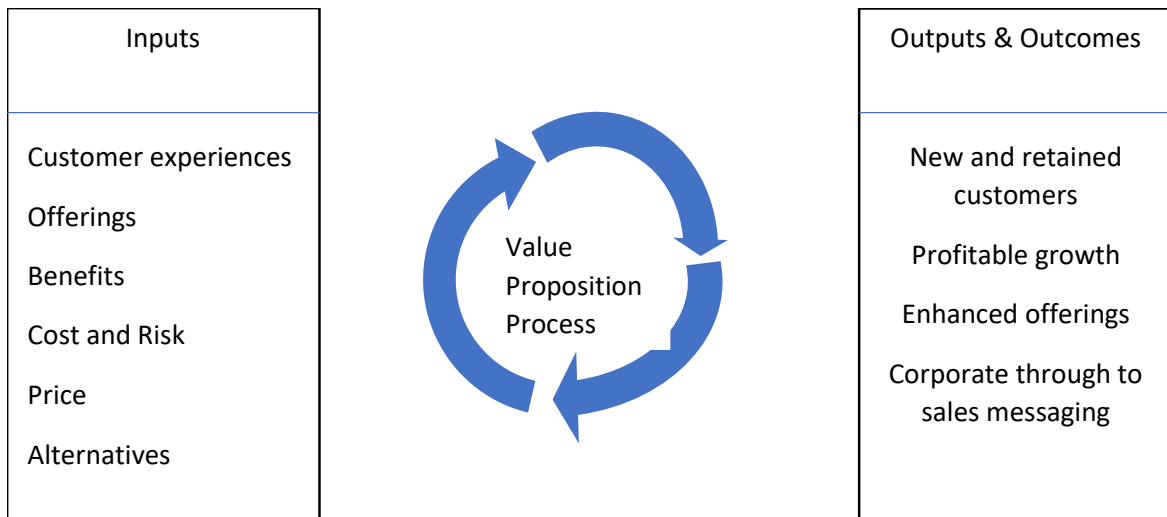


Figure 7: The classic view of the value proposition process (Source: Barnes, Blake and Pinder, 2009)

From the above figure, the following equation can be derived:

$$\text{Value proposition} = \text{Problem} + \text{Solution} + \text{Unique approach} \dots\dots (2)$$

Therefore, a firm can create value proposition that acts as a communication channel while interacting with their customers'. However, value propositions are further divided into different types. The different types of value propositions are presented in the next section.

3.4. Different types of value propositions

From section 3.2, it can be inferred that value propositions are stated as one of the strategic elements during the creation of a business model that particularly addresses the hidden customer needs. However, many authors have viewed and interpreted the word “value proposition” in many ways. Some of the most common are listed in table 6.

Table 6: View of value propositions

Value proposition view	Description	Author(s)
Customer Value proposition	A strategic phase that communicates with customers the benefits having a greater economic return. Focuses on the effectiveness i.e., what to be delivered	(Johnson, Christensen and Kagermann, 2008; Ballantyne et al., 2011; Payne, Frow and Eggert, 2017)
Stakeholder Value proposition	Achieving the customer expectations through resource integration	(Ballantyne et al., 2011; Frow and Payne, 2011; Karlsson and Skålén, 2015; Åkesson et al., 2016)
Brand Value proposition	Attracting the costumers through reputation	(Ballantyne et al., 2011; Frow and Payne, 2011; Karlsson and Skålén, 2015; Åkesson et al., 2016)
Reciprocal value proposition	Exchange of value for the price or vice versa is possible	(Ballantyne et al., 2011)

From the table, it clearly shows that many authors have mentioned their view of value proposition. However, the scope of this thesis is limited to addresses only two value propositions i.e., customer value proposition and stakeholder value proposition. In other words, even though value proposition helps in defining the customer needs that in turn causes to assigning of proper resources for the execution, the mentioned two value propositions are technically related, but a silver line difference exists between them. These terms are explained in the further sections.

3.4.1 Customer value proposition

“A customer value proposition [...] is a strategic tool that is used by a company to communicate how it aims to provide value to customers” (Payne, Frow and Eggert, 2017, pp. 467).

Customer value proposition is an offer/service provided by the firm in terms of monetary value to a specific customer. Indeed, the offer/service that includes technical, economic, and (social) benefits are delivered to the customer in return to the agreed price by the firm. Here, there is a difference between value and price in the offer. If the price of the offer changes then there are less chances that there is a change of value for the customer (Wouters, Anderson and Kirchberger, 2018). It is obliged by Eggert et al., (2018) stating that *“the customer value proposition is more than an operational advertising concept; it is a statement constituting the firm's core strategic decisions”* (pp. 85).

Another author Rintamäki, Kuusela and Mitronen, (2007) view on customer value proposition as a buying factor relying on the positive and negative consequences of the service. Indeed, it is a decision factor that links the firm and the customer in terms of quality and loyalty. Also, customer value proposition is grounded with customer value (that should be defined from customer perspective) and competitive advantage. The customer value is identified in the form of attributes, those attributes can be the consequences of experience that customer faces. For instance, one customer thinks whether the value is low price and for another value is equal to the price. Therefore, through defining the attributes of customer experiences, the initial step of customer value is defined. The experiences can be on how the customers make use of the offered service in their day-to-day life, in short value-in-use. Further step can be recording the positive and negative consequences obtained from the attributes in customer experience. If the customer is fully satisfied and get benefits of the service, it can be written under positive consequences. Whereas if the price is high (from customer perspective) in attaining the benefits, i.e., sacrifice then it is written under negative consequences. The final step can be evaluating the positive and negative consequences. The customer value is created only when the benefits are more compared with the sacrifices in the process of purchasing and usage of the offered service (Rintamäki, Kuusela and Mitronen, 2007). Additionally, Vargo and Lusch, (2004b) tried to explain the nature of customer value by defining it under value co-creation. The competitive advantage is determined by showing the consistency in the process of delivering superior value to its customers. It can be done through assigning proper resources that can be interpreted as a capability (Rintamäki, Kuusela and Mitronen, 2007), obtained through focusing on knowledge and skills, that comes under operant resources (Vargo and Lusch, 2004a). In short, customer value relates to the value delivery whereas competitive advantage relates to the creation of value. In addition, Rintamäki, Kuusela and Mitronen, (2007) from their framework, draws four dimensions of customer value proposition as shown in table 7.

Table 7: Four dimensions of customer value propositions (Adapted from (Rintamäki, Kuusela and Mitronen, 2007))

Sr No	Dimensions of customer value proposition	Reflection	Decision factor
1	Economic	Utilitarian value	Price is the decision factor. E.g., Wal-Mart
2	Functional		Convenient solutions. E.g., Tesco
3	Emotional	Subjective and abstract	Both price and convenient solutions E.g., Stop & Shop
4	Symbolic		Self-expression E.g., Target

Therefore, defining the customer value proposition and the way it can deliver a whole package of an offer from the firm to their customers' (which cannot be refused) is presented. However, the other side of this delivery of whole package is to consider what operations are needed internally in the firm to provide such an offer. It can be addressed through stakeholder value proposition, which is explained in the next section.

3.4.2 Stakeholder value proposition

Before jumping into the concept of stakeholder value proposition, there is a need to understand stakeholder at first place. Frow and Payne, (2011) tries to explain the concept of stakeholders through a model where there are six groupings for understanding the concept of stakeholders. The groupings and their explanation are presented in the table 8. Through classifying the stakeholders as per the group there are chances to build the successful relations within each market thus leading to increase productivity of the firm through enhancing the performance. By knowing this model, stakeholder value propositions are defined.

Table 8: Description of the Stakeholder value propositions in market (Source: Frow and Payne, (2011))

Sr No	Value propositions in multiple stakeholder markets	Description
1	Recruitment market value propositions	It explains about the way to attract the right employees for the firm
2	Internal market value propositions	It explains about how to retain the most talented employees
3	Referral market value propositions	It explains about customer referrals that are initiated by the advocate or a company.
4	Influence market value propositions	It explains about the identification of value co-creation within varied networks
5	Supplier and alliance market value propositions	It explains about the opportunities in value creation through collaboration with the suppliers.

From the mentioned details in table 8, this thesis focusses on the influence market value propositions i.e., point no.4 in which identification of value co-creation exists. This is supported by Karlsson and Skålén, (2015); Vargo and Lusch, (2004a) stating that employees who are always

in continuous contact with customer are able to create the value to the firm through co-creation. Indeed, their contributions leads to integration of resources for creating the value. Since this thesis scope is limited to services, stakeholder value proposition present in influence market is considered i.e., employees who are responsible for co-creation.

Therefore, this section draws the ideas of different types of value proposition and explains customer value proposition and stakeholder value proposition. The silver line difference is that customer value proposition focuses purely on customer side (i.e., talking like a customer) whereas stakeholder value proposition focuses on the resource integrations so that customer value is derived (i.e., talking with customer). In short, both the propositions are inter-related, but the interpretation varies as per the context. In order to derive these propositions a detailed process has to be followed. Hence, the creation of value proposition process presented by various authors are presented in the next section.

3.5. Different process frameworks to create value propositions

From the above sections it can be inferred that value proposition is created through identifying the touch points of customer value and further articulating them into offerings. The firms are able to influence their customers by presenting the services through (stating) value propositions. The following sections presents the various authors process to present value proposition.

3.5.1 Value Proposition Builder

In their research, Barnes, Blake and Pinder (2009) explain the importance in the creation of value proposition and explained how it can transform the organizational functions strategically. Figure 8 presents the framework in the creation of value propositions using six step iterative process. This framework begins with the market study and ends with the creation of a potential value proposition that communicates the credibility of that product/service to the customers. This framework can help the employees in the firm to identify, crystallize, and implement value propositions to their customers.

Barnes, Blake and Pinder (2009) begin the six-step iterative process with market analysis where the (anticipated) offering can be overlooked over various market segments or customer and finding out how they are benefitted and what are the costs incurred. The suggested market (step one) analysis start with the firm-centric questions. For instance, "*Where does our organisation figure in the marketplace? Is it where we want to be? Which markets or customer types offer the best opportunities for profitable growth?*" (pp.62-63). Further, probing customer-centric questions. For instance, "*What are the customer needs? What keeps them awake at night? What are their points of pain? What risks do the customers perceive when choosing our organisation?*" (pp.62-63).

In the second step, the value experience is done through ascertaining the customer values through their response from the offerings. The questions are: "*what are the most important factors when your customers are looking to purchase (product/ service)? What do they value beyond price/ cost?*" (pp. 73).

The third step concentrates on the offerings that are to be thoroughly understood and categorized. The categorization is done in four layers: component (bottom), offer, solution and co-created value (top) (Barnes, Blake and Pinder, 2009).

The fourth step consolidates the benefits obtained through the experiences of value from customers and staff. At this step, the core service and its expected potential benefits are presented (Barnes, Blake and Pinder, 2009). This can result in making a strong argument in why customers should choose our offering instead of competitors.

The fifth step encompasses of choosing the substitute of the offering. As Barnes, Blake and Pinder, (2009) mention that value proposition on the offerings is the way to compete with the rival companies instead of focusing on products/services. The generated value proposition should be compelling enough that it beats and nowhere matches to the competitors' offering.

The last sixth step focusses on the proof that backs up the created value proposition, i.e., showing that the created value proposition is critical in the developed offering through some of the techniques: case studies, customer testimonials, ROI or cost-benefit (Barnes, Blake and Pinder, 2009).

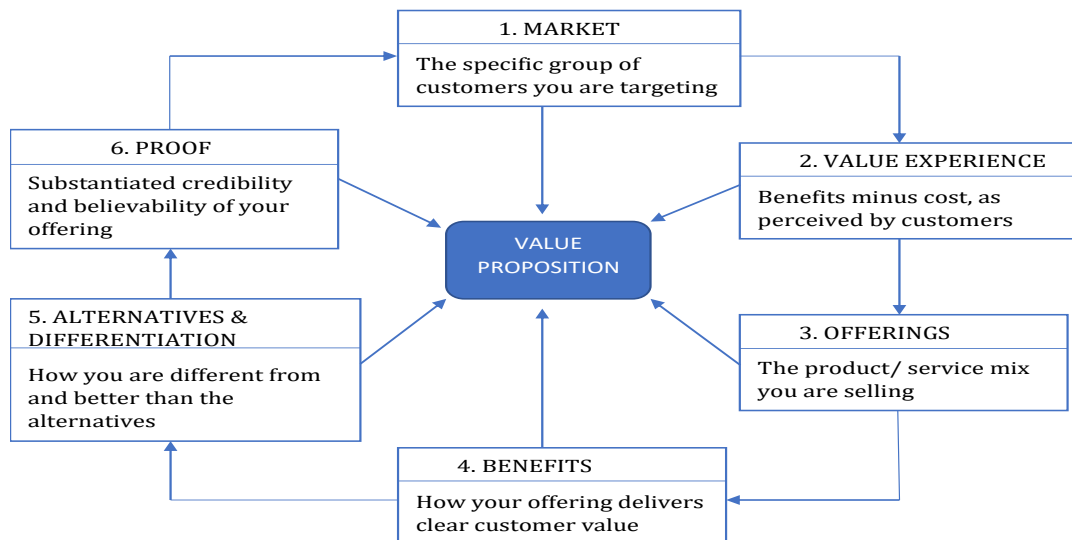


Figure 8: Value proposition Builder (Source: Barnes, Blake and Pinder, (2009))

3.5.2 Forming value proposition through co-creative practice

Kowalkowski et al. (2012) created a value proposition process through an attempt in creation of a customer loyalty card and communicating it to the market. The value proposition is formed by going through intricacies, i.e., through analysis of the series of activities those are revolving around resource integrator as shown in figure 9, where resource integrators are customers. Among which the understandings mention about the knowledge and skills, i.e., know-how, and gathering experiences from customers, who acts in resource-integration. The procedures mentions about the practices that resource-integrator should follow where the practices such as rules, principles, and cultural norms are applied. Lastly, engagements mention about the commitment of each resource-integrator that can be goals, wants, and needs. The actions of these different resource-integrating actors lead to co-creation. The framework is presented in figure 9.



Figure 9: Co-creative practice in the formation of value proposition (Source: Kowalkowski et al., (2012))

3.5.3 The value proposition canvas

Osterwalder and Pigneur et al., (2014) explains the process under value proposition canvas and mentions through presenting two blocks: value proposition and customer segment. As shown in figure 10, each block contains three elements that can be addressed through involvement of employees from various departments, commonly it is done through workshop. In the workshop, the respective blocks are to be filled, for instance; using sticky notes and rank them accordingly. After the session, outcome should be to prioritize the most important activities that are most concerned by the customers. Also, the elements presented in value proposition block should be able to address the elements in the customer segment block. In short, two blocks represent the aerial view of what the firm provides that matches to their customer needs. Finally, a proper fit between the value proposition and customer segment should be achieved that encompasses the overall process framework for value proposition.

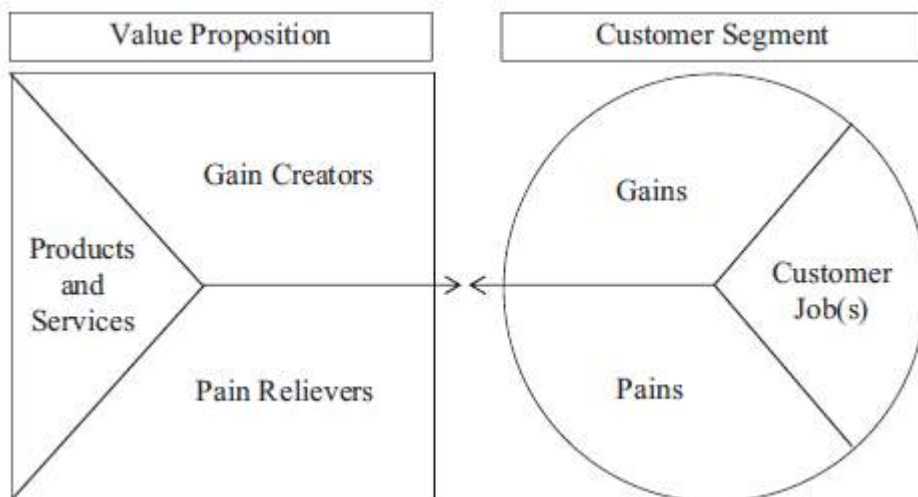


Figure 10: Value proposition canvas (Source: Osterwalder and Pigneur et al., (2014))

3.5.4 Building Value proposition

Payne and Frow (2014b) propose the value proposition process in a detailed procedure that comprises of five steps, shown in figure 11.

1. **Core proposition development function:** As an initial step, a detailed specification of the proposal is to be developed. It can be done through involvement of cross-functional team, proceeding with further steps: first, define proposition- transitioning of business opportunity into a detailed specification. Second, business case evaluation- determine the introduced proposition through financial evaluation. Third, research-led leading – through test methods considering focus groups and customer surveys that helps in evaluating more than one aspect of the potential/promising value proposition.
2. **Develop proposition:** For executing the planned value proposition, cross-functional activities should be initiated. The scope and content can be changed depending on the proposition.
3. **Market testing:** Through this, delivering the created value proposition to a set of target customers in a specified manner. That helps to identify the explicit characteristics of the developed proposition. This process can be applied, in general, to the services instead of products.
4. **Launch solution:** Through this process, the entire solution developed through value proposition is given to the customers.
5. **Review proposition:** When the solution is launched, after a certain period of time it has to be reviewed to ensure that the stated value proposition are still in association with the customer needs. In this review process, all the aspects are examined as per the forecasts. The result from this process is transferred to the management for taking the decision in future.

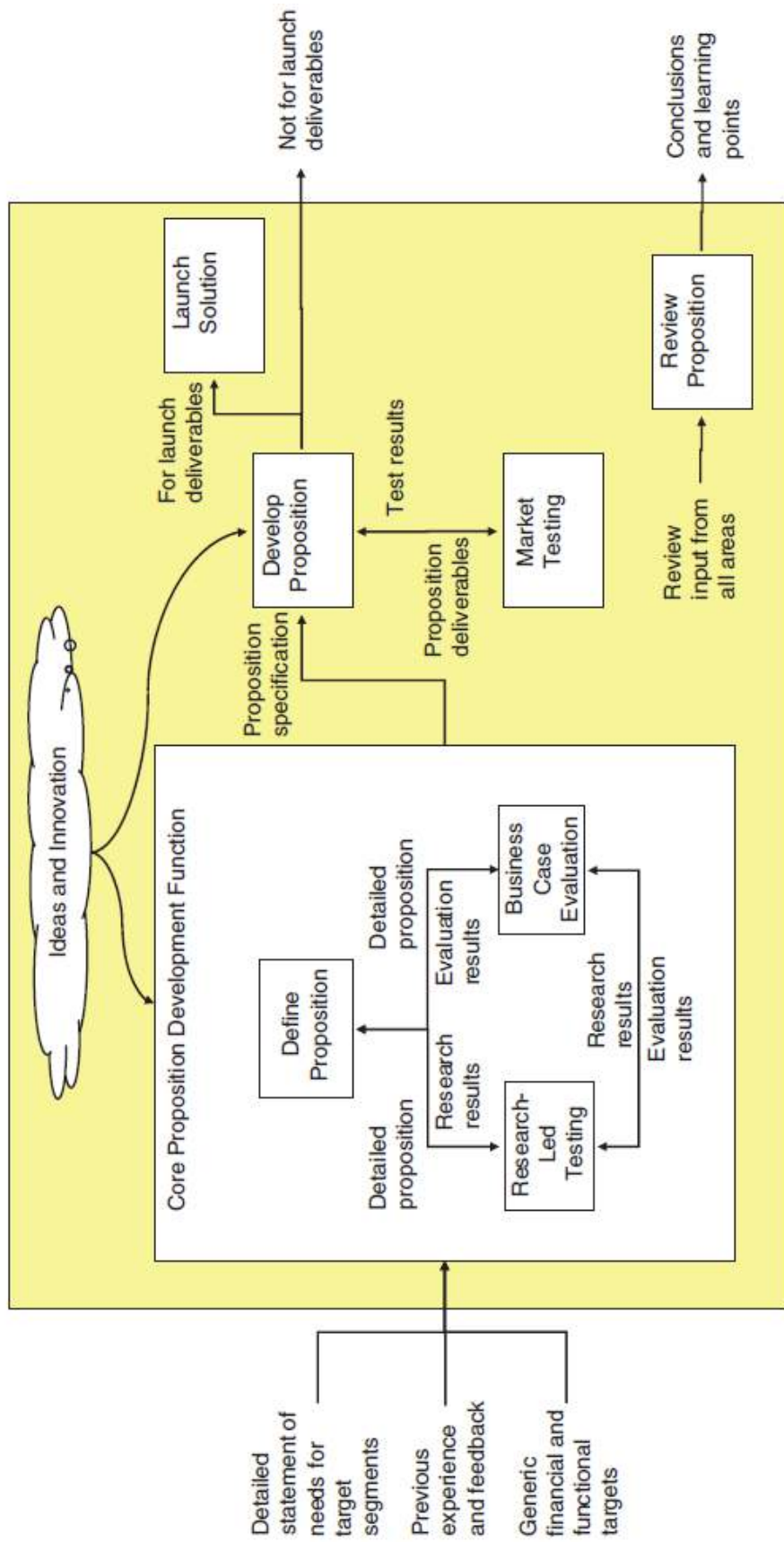


Figure 11: Building Value proposition (Source: Payne and Frow (2014b))

From the above four processes, commonalities are identified from the three processes. The theme in these three frameworks suits to the scope of this thesis. Based on the view point of various author(s) a customized framework is proposed as shown in table 9.

Table 9: Comparison and analysis of the identified processes of value propositions

Barnes, Blake and Pinder, (2009)	Osterwalder and Pigneur et al., (2014)	Payne and Frow, (2014b)	Customized framework (created from the theoretical analysis)
Market: Questionnaire on firm-centric and customer-centric	Customer job(s): Customer requirements in running their business	-	Identify target customers
Value experience: Ascertain customer value	Pains: Efforts customers put to get the job done	Core proposition development: Writing a detailed specification of the offer	Analyse customer needs
-	Gains: Advantages in getting their job done	-	
Offerings: Categorize into 4 layers	Product/ Service Offering: Providing technology/ solution in terms of product/ service	Develop proposition: Involvement of cross-functional activities	Create value proposition
Benefits: Experiences are recorded under 4 ways	Pain relievers: Solve the customer pains through the offered technology/ solution	-	Value demonstration
Alternatives & Differentiation: Strong statement is given	Gain creators: Make customers to be successful in their business through the offered technology/ solution		
-	-	Market testing: Preliminary test i.e., trial run	Testing
Proof: Presenting value proposition results	-	Launch solution: The created offering is released to the market	Launch & review proposition
-	-	Review proposition: After some time, feedback is taken about the offer	

3.6. Conceptual framework

The conceptual framework is created by considering the three framework processes, presented in table 9. The commonalities are considered and refined that matches to the requirements of the case company. The six steps of the conceptual framework can be seen below:

1. **Identify target customers:** The first step creates the foundation for the framework as customers are the one who are responsible for initiating any kind of business. The customers are identified by following the initial and basic phase i.e., market study. Through market study, bringing of the customers hidden needs into limelight is possible. It can be initiated through imposing some questions at the firm level and dividing the jobs of the customer into functional, social, and emotional through which basic needs can be recorded (Barnes, Blake and Pinder, 2009; Osterwalder and Pigneur et al. 2014). This can be done through questionnaire or workshop.
2. **Analyse customer needs:** After targeting the customers and their needs, it's imperative to make a statement on what are to be addressed among the recorded needs. This can lead to creation of business opportunities. The identified business opportunities are further evaluated through segregating them into respective areas. This area includes listing out all the customers' pains, gains and make a priority of all (Osterwalder and Pigneur et al. 2014; Payne and Frow, 2014b).
3. **Create Value Proposition:** From the identified business opportunities, the prioritized business opportunities are the real needs of the customers. However, creation of a value proposition is successful only when there are proper returns for the proposed business opportunity. So, financial evaluation is included while evaluating the business opportunities. Overall, after creation of value proposition, it should be satisfying the characteristics of the great value propositions mentioned in table 5. This can impact potentially in driving the customer value (Patala et al. 2016).
4. **Value demonstration:** After creation of the proposition, the customer should be able to understand the importance of it, otherwise the created value becomes waste. Hence, value demonstration step is must (Baines and Lightfoot, 2013). The importance can be demonstrated through benefits. The benefits explain about the value that can be delivered through the offered service, for the amount charged. This consists of balancing the pain relievers and gain creators for the created proposition. Through pain relievers, the developed proposition addresses the customer specific pain that makes a summary on eradicating the things annoying the customers in the process of completing the job. The benefits message contains savings, customer feelings, and eliminating the common mistakes that customers can make. Further, in gain creators, the developed proposition addresses the gains that customer can get. It can be in the form of utility, productivity etc... (Osterwalder and Pigneur et al., 2014). As said by Rintamäki, Kuusela and Mitronen, (2007) when the benefits of the proposition are more compared to the sacrifices for the customer, then it can be called as customer value. This is the basis to form a strong statement that is dominating the value provided by competitors.

5. **Testing:** The created value proposition can be tested in two ways. First, it can be done within an enterprise. Åkesson et al., (2016) proposes three types to test the value proposition; cognitive, practical, and discursive. In cognitive testing, after co-creation of value with the customer on value proposition, the employee cross-checks whether integration of resources is done properly or not. Through this, hidden problems can come to surface for a (particular) service and ensuring that integration of resources is done effectively. Hence, occurrence of the same problem is eliminated. For practical, a team is formed to evaluate the prototype of the value proposition. It can be done through simulations etc. In short, through practical value proposition, the employee can be able to see whether the developed proposition boosts the value co-creation. At discursive type, the value proposition can be tested through usage of linguistic abilities. It can be done through meetings where during the discussion they come up with the fact that some resources are not properly integrated as per the plan. Second, can be called as market testing where the (created) value proposition can be presented to a selected number of customers in a controlled way for the feedback. The feedback contains testing of specific aspects that makes to arrive at a decision point (Payne and Frow, 2014b). After passing this step, the process continues else it is rerouted to step 3 i.e., create value proposition. It is because, as Osterwalder and Pigneur et al., (2014) highlight: *“Your customers are the judge, jury, and executioner of your value proposition. They will be merciless if you don’t find fit”* (pp. 43).

6. **Launch and review proposition:** After going through all the steps, the proposition can be launched to the market, making it available to the customers. Later on, value propositions created under each service are to be reviewed after their launch. Henceforth, after this step, the process is routed to step 2 i.e., analyse customer needs. Through this the examination of value proposition is done by seeing the performance of it (Payne and Frow, 2014b), and is routed to the management for taking necessary decisions in the future.

These six steps are shown in figure 12. From the framework, each step is presented in such a way that detail that there are less chances to miss any kind of minor information. Also, for making the framework stronger, the views of some more authors is also presented. From the above mentioned six steps, an improvement can be seen, i.e., after testing, if the created proposition is not successful then process is routed to third step i.e., ‘create value proposition’ so that the outcome of the created value proposition should always match to the customers requirement. Also, linking sixth step i.e., launch and review proposition to the second step i.e., analyse customer needs shows that the presented conceptual framework works in a cyclic manner. This results in continuous improvement of the created offering. Thus, ensuring that it is always updated as per the customer needs.

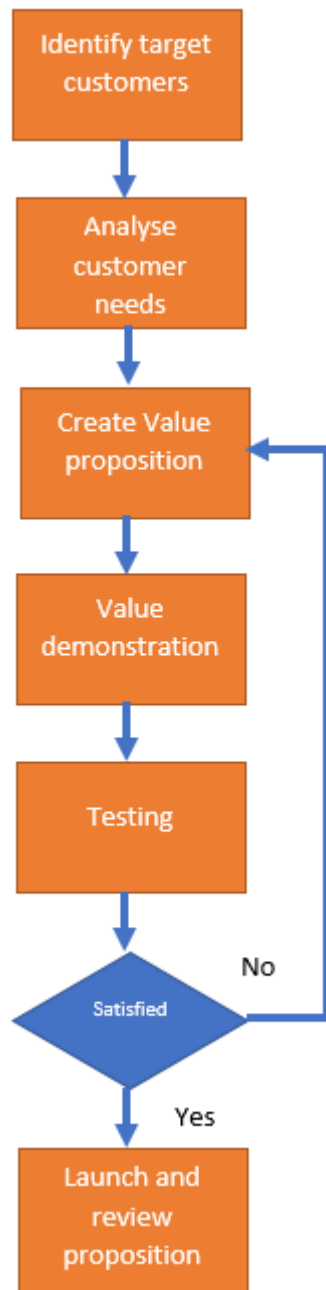


Figure 12: Proposed conceptual framework for the creation of value propositions

4. EMPIRICAL FINDINGS

This chapter presents the findings gathered from the case company and the necessary improvements for the current process. It starts with introducing the division (where this thesis is performed) in the case company and their strategic objectives in the future. Value propositions are defined for the identified service offerings. Further, the current value proposition process at the case company is presented for which the necessary (potential) improvements are suggested.

4.1. Product and service offerings

The case company, Swedish manufacturing firm has a wider scope on product-centric perspective within automotive industry having a global footprint in terms of sales and customers retention. Since it is a large manufacturing firm, there is a massive organizational structure. The vision for this case company is summoned into three points as listed below:

1. Should be the first choice for demanding customers.
2. Understanding customers differing business needs.
3. A total solution of hard and soft products.

Here, hard products are the machines and soft products are the services provided in relation to the hard products. The details can be seen in figure 13.

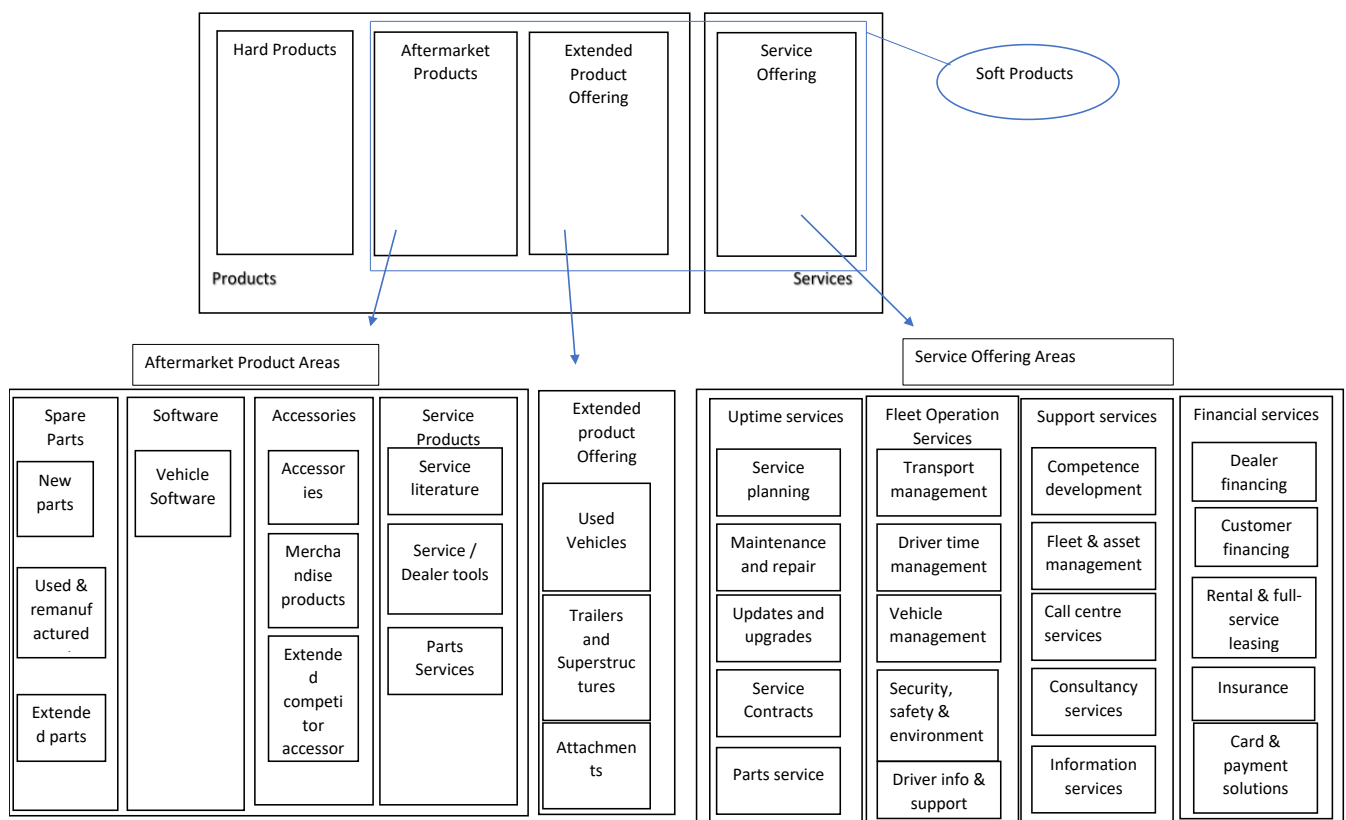


Figure 13: Division between hard and soft products at the case company

Reckoning figure 13, the hard products are machines whereas the soft products are the combination of products and services those are necessary for enhancing the customers experience and retaining them. Figure 13 represents soft products, those are further divided into three domains: 'Aftermarket,' 'Extended Product Offerings' and 'Service Offerings' and within these domains it is further divided into specific areas. All these domains are functioned under various departments/divisions.

For soft products development, telematics service is one of the enablers. It can be also called as CareTrack that acts as a product enabler. The functions of CareTrack or telematics is discussed in

further sections. Under soft products, the services are classified into three levels as shown in figure 14.

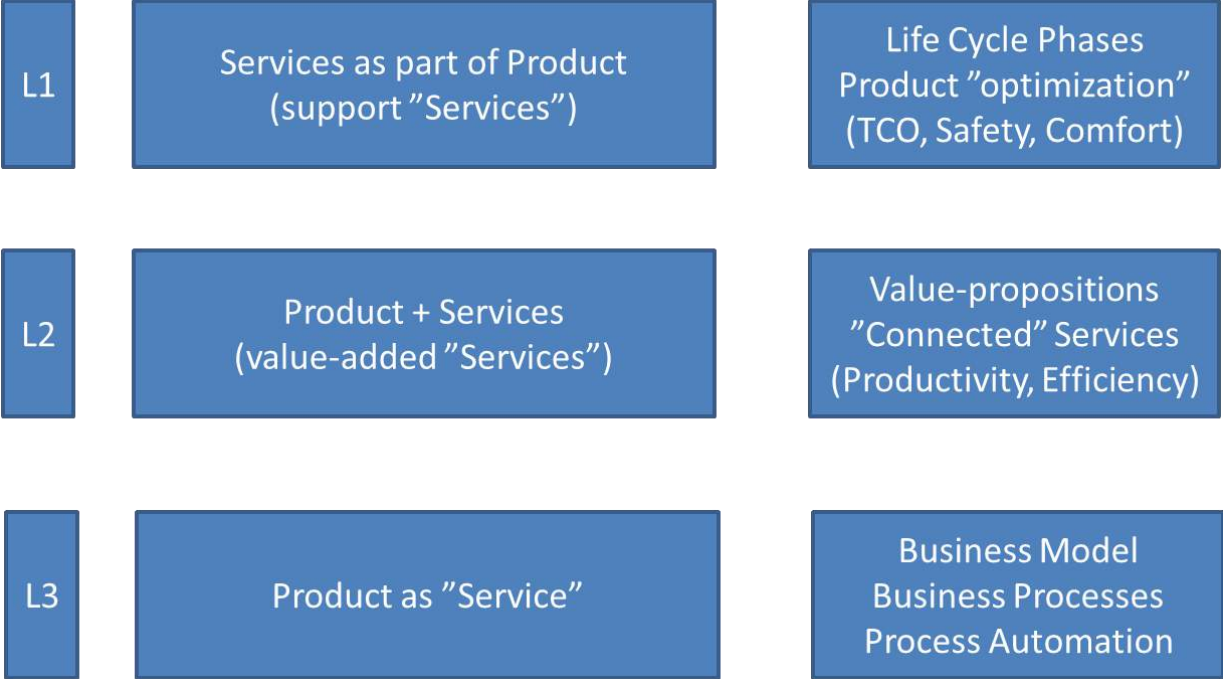


Figure 14: Three levels of services offered at the case company

The description of each level is mentioned below:

- Level 1: the products are sold and services (aftermarket- spare parts etc.) are provided in association with the products that are sold. Ownership of the product is passed on to customer.
- Level 2: along with products and services, solutions are provided to enhance the customer's productivity. Ownership of the product is passed on to customer.
- Level 3: only services are provided with the presence of products. Ownership of the product is retained by the company.

The level 2 service phase i.e., providing solutions to enhance customer's productivity, can be called as customer-centric, where planning of more services is done that not only generates revenue but also gives a strong competition to their rival firms through retaining more customers under them. This level is called as "connected services". These services are executed through product enablers. In these product enablers: three platforms exist, namely Telematics (a.k.a. CareTrack), Co-pilot, and Soft Offer Management. In short, these three platforms are the enablers of service. Value proposition can act as a touch point at this level that mainly focuses on productivity and efficiency.

Presently, the case company is at level 1 and having some portion of level 2, focusing on the level 3. Therefore, in order to attain level 2 and 3 there should be a paradigm shift from offering only products and basic services to the advanced services. The next section presents the brief overview of telematics system and the services offered through them whereas the other two platforms are not considered as they are not under the scope of this thesis.

4.2. Telematics system and its service offerings

The overview of the departments those are considered under this thesis is shown in figure 15. The case company addresses the services in two ways. First, through customer solutions who are always in contact with the customers and are responsible for short term goals. It is further divided into connected services and sales. Connected services addresses the various kind of offerings provided to the customers in relation with the machines. Whereas sales address the basic needs of the customer after selling the machine. Second, services and solutions act as per the customer needs by taking inputs from customer solutions department and are responsible for long term goals. In other words, their main goals are in predicting the future needs of the market and customer, taking necessary actions in advance to meet the demands (in the future). It is further divided into MAPP (Marketing and Product Portfolio) who are responsible for developing the tools and techniques i.e., process development that ensures that supply is available during the tenure of demand.

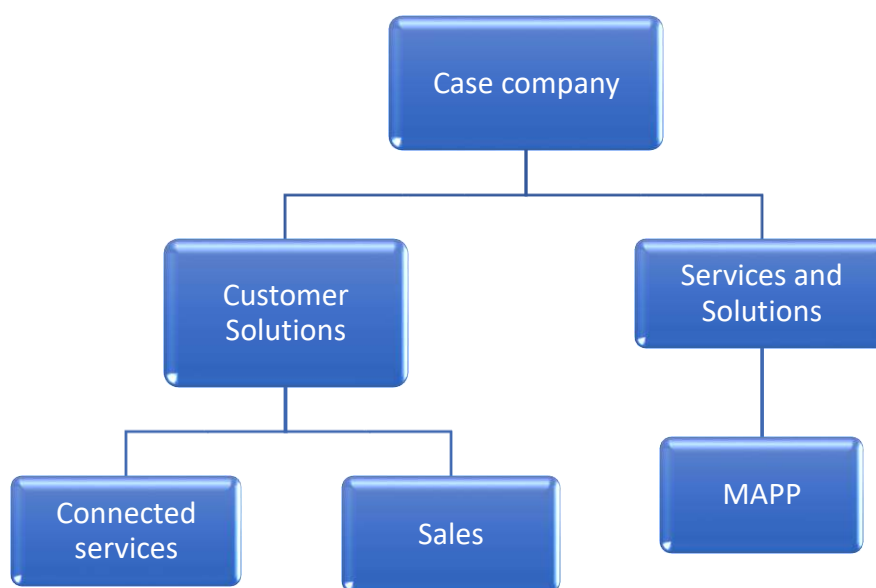


Figure 15: Organisational structure for the case company

MAPP division motto is to have a strategic step towards future. Their vision is to remain as the first choice for demanding customers who are looking to improve their profitability. It is planning to make a strategic shift in providing more services with the existing products i.e., making an era in shifting from product-centric to customer-centric. One of the reasons is to sustain in the present global market by staying ahead of their competitors. Irrelevant with the characteristics of a product, service utilization can be different that is based on varied customer's needs.

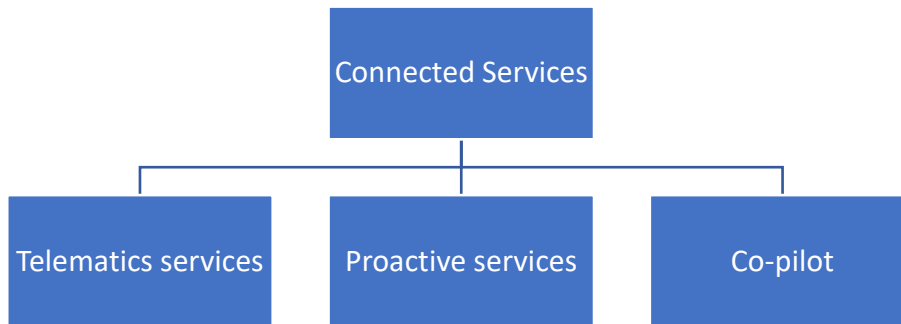


Figure 16: Division of Connected Services

Under connected services, there are three platforms: Telematics services, Proactive services, and Co-pilot as mentioned in the figure 16. Among these three, the thesis focuses on telematics services that can be called as telematics or telematics system.

Telematics is the use of electronic and communication technologies to provide mobility services for the users. The service is intended to promote fuel efficiency, uptime, productivity and safety/security in relation to the delivered machine.

It relies on a wireless communication link and often includes a positioning system. Examples of areas where Telematics is used are fleet management, rescue and breakdown calls. A Telematics system is built up by a unit in the machine containing a mobile phone, a GPS unit, a computer and sometimes a satellite modem.

The unit is communicating over the mobile network through 3G, GPRS, SMS and other wireless communication bearers with applications and databases containing information. The information is displayed on a password protected website from which a user also can interact with a machine.

The empirical analysis shows that there are six types of services offered through telematics systems:

- Mapping and Tracking
- Machine information
- Operation reports
- Service management
- Anti-theft
- Machine reports

Presently, the case company is capturing the production reports of the machine on-site through enablers and through data identifying the gaps/improvements opportunities. However, capturing the real needs is still challenging. Case company has recently introduced value propositions to address them i.e., knowing/noting down the imperative requirement of the customer and the stakeholder. In a nutshell, through enablers the customer concerns can come into limelight and those concerns are addressed through identifying the better value propositions that takes a lead in creation of services.

Additionally, machine health reports are generated through telematics as per customer demands and sent to the respective customers, to make them notified about the status of the machine. The machine health report consists of fuel usage, whether machine is running on power or heavy mode. This can caution the customer in training the operator for maintaining the machine condition. The mentioned six types of services come under intermediate services presented at level 2 in figure 14.

On a bottom note, the case company is focusing more on services to attract new customers and retain existing customers, making a strong foot print in the competitive world. This has motivated the case company to move into the concept of value propositions and their respective outcomes.

4.3. Identified value propositions in telematics system service offerings

This section answers research question no.1: What are the value propositions addressed by the current service offerings in telematics system in the context of heavy-duty vehicle equipment?

The stated question is answered in two ways: First is with an explanation about value proposition and linking/matching them to the existing services offered in the case company. Second is by presenting the value propositions in the form: customer value proposition and stakeholder value proposition, and also presenting difference between them.

4.3.1 Broad view of value proposition

At the case company, various kind of services are offered to their customers in order to get their jobs done through focusing on their key activities. As mentioned in the above section, through telematics system various kind of services are offered starting from mapping and tracking, machine information, operation reports, service management, anti-theft, and finally to machine reports. These service offerings are enablers for their customers' in improving work output. For instance, mapping and tracking helps their customers to ensure that the machine is working within the region the customer is interested in. Machine information provides the entire technical details of the machine. Operation reports mentions how much work is done by the machine. Service management ensures to see the usage of the machine that leads to on-time service. Anti-theft is to prevent any kind of thefts. And lastly machine reports that comprises of documents with the weekly or monthly usage of the machine i.e., how it has been utilised. This reflects that their customer situation is more of "getting the job done" (that is supported by (Rintamäki, Kuusela and Mitronen, 2007; Johnson, Christensen and Kagermann, 2008; Osterwalder and Pigneur, 2012)), and it is achieved through involving in their value creation process that is done through value proposition (Karlsson and Skålén, 2015). The entire details of the service offerings to the value propositions are mentioned in table 10.

Table 10: Identified value propositions related to each type of services offered through telematics

Types of services offered in telematics system	Value propositions
Mapping and Tracking	Enables to track the vehicle status
Machine information	Provides information about the machine
Operation reports	The output of the machine is recorded
Service management	Timely maintenance of the machine for the uptime
Anti-theft	For preventing thefts
Machine reports	Stating that whether machine is running in power or heavy mode, fuel efficiency

It can be seen from table 10 that value propositions are able to explain what benefits the customer gets during the usage of their services. However, this is presented in a broader context. The real essence of the term value proposition can be integrated via two kind of concepts: customer value proposition and stakeholder value proposition. The details and the relations with the case company data is provided in the further section.

4.3.2 Types of value proposition

Customer value proposition:

At the case company, the offered services through telematics system are presented through benefits (for their customers’). Examples: uptime, efficiency, and safety are the medium to demonstrate the benefits. For instance, uptime ensures that the machine is always available whenever the customer needs. Efficiency reflects the overall performance of the machine, that can be in fuel usage, number of operations, power etc. Lastly, safety that is on pivot whenever the machine is utilized, as the wellbeing of the operators is necessary. Among these three, through uptime and efficiency the benefits can be communicated in terms of economic return and productivity whereas the benefits under safety are related to wellbeing of the operator. All these benefits are covered under customer value and competitive advantage, these are related to customer value proposition. To recall, customer value proposition is a tool in communicating benefits in term of technical, economic, and social to their customers (Payne, Frow and Eggert, 2017; Wouters, Anderson and Kirchberger, 2018). Table 11 shows the division of customer value proposition with the benefits from the service offerings.

Table 11: Identified customer value propositions

Customer value proposition	Service Offerings	Benefits
Customer value	Uptime	Economic returns
	Efficiency	Productivity and economic return
Competitive advantage	Safety	Wellbeing of the operator

From table11, customer value is attributes of the consequences from the customer experiences and competitive advantage is consistency in the process of delivering superior value (Rintamäki, Kuusela and Mitronen, 2007). For instance, for a particular service offering, the value is delivered in terms of uptime, efficiency through which the benefits are noted. Whereas the safety that is provided by machine causes the operator to deliver the superior value through successful operations. In short, customer value proposition precisely addresses customer buying criteria.

Stakeholder value proposition:

At the case company in order to achieve the customer experiences, they need to surpass the internal targets circulated among them. The internal targets to achieve customer experiences are quality, customer satisfaction, customer insight. The sales people are responsible to record these data and circulate within the case company that ensures every departments priority to work on. This is reflected by Frow and Payne, (2011) who mentions that stakeholder value propositions are addressed by the employees who are in continuous contact with the customers, ensures to allocate proper resources to achieve those targets. Supported by Karlsson and Skálén, (2015), stating these employees are the co-creators of value. The value is created through integration of

operand with the operant resources. Requirements and needs can be the customer experiences (Bitner, Ostrom and Morgan, 2008; Li and Found, 2017) recorded through close observation of customers whereas resources are competences (i.e., knowledge and skills) needed to execute for the respective offerings.

Co-relation between customer value proposition and stakeholder value proposition:

From the above, the difference between customer value proposition and stakeholder value proposition can be observed. First, customer value proposition focusses more on effectiveness (e.g., doing right things). Second, stakeholder value proposition focusses more on the efficiency (e.g., doing things right), figure 17 outlines these two differences. Hence, it can be corelated with the service offerings in telematics system where the accountability of the offered services is divided into two types. First, presenting on what the case company can give for which their customers are benefited, to name a few: uptime, efficiency, safety. These are customer value propositions at the case company. Second, circulating within the case company of what they can do to retain their customers', to name a few: quality, customer satisfaction, customer insight. These are stakeholder value propositions at the case company.

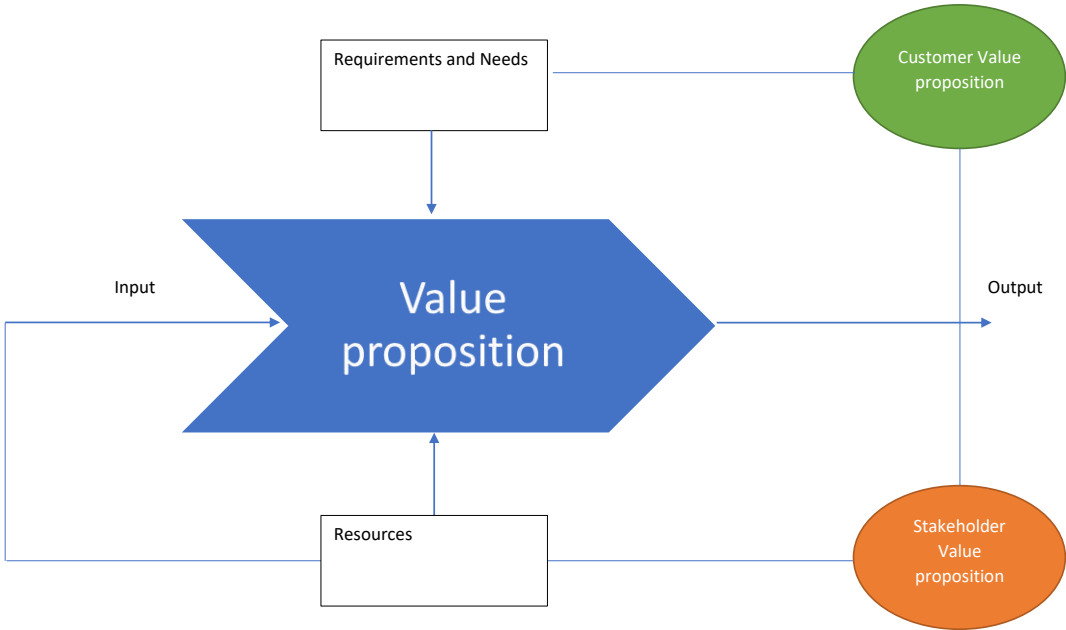


Figure 17: Value propositions in terms of customer and stakeholder (figure adapted from (Bengtsson and Salonen (2016))

In the hindsight, problem raised by Frow and Payne, (2011) i.e., less than 10 percent of the companies are successful in communicating value propositions has been addressed by presenting these two-broad view of value proposition and types of value proposition. Indeed, figure 17 provides the clarity in identification of the silver line difference between these two value propositions.

4.4. The current value proposition creation process at the case company

This section answers research question no.2: How are value propositions created during the development of these services offerings?

Every service is uniquely defined that serves the sole purpose of the customer. The case company has addressed this through introducing “connected services” as shown in figure 16. Under connected services, the case company is purely focusing on (future) services, that covers maximum portion of level 2 and some portion of level 3 is presented in figure 14 whereas level 1 is already existing.

Even though telematics is well known to their customers and usage of the services offered through telematics are high, the identified challenge is “*Customers are not able to understand the benefits of the Telematics system even though it’s been effectively utilized*”- coined by Product Manager, Telematics system. It is further extended by one of the employees whose designation is Global Product architect claims that “*Value proposition framework is a way to evaluate things*”. These challenges should be addressed during the creation of value proposition process. This value proposition process is created under MAPP division who are responsible for tools and techniques of the processes.

The current value proposition process comprises of six steps. They are:

1. **Target customer:** The target customer is identified through market input from regions, where the regional offices send the information to the sales people. Another method is to capture the ideas through interactions with the customers where more of an open-ended question are asked, followed by survey that can identify the hidden needs of the customer. In addition, information from the telematics system is the basis for setting the target customer.
2. **Customer dilemma:** Information obtained from the target customer is recorded and verified that opens up to create a requirement. The requirement should be able to explain the customer concerns on getting their job done and how the firm should act in order to target that concern and solve it in an optimal way. Finally, prioritizing the requirement that concerns most to the customer. In short, it can be called business opportunity description.
3. **Service:** Business opportunity description is verified with the existing services; else necessary allocations are done for creation of the service. Thus, when a service is created it should match or solve the customer concerns.
4. **Customer benefits:** The outcomes from the service are anticipated and noted down. And the advantages are written from the customer point-of-view. For instance, advantages can be productivity, monetary value, doing more work in less time etc., are considered.
5. **Alternative offering:** The benefits from the created service is compared with the competitor’s offering that could help to arrive at a decision point where suggestions for enhancing the service can be shown. In other words, through alternative offering the case company can make a deal with their customers by comparing their offering with the competitors.

6. **Differentiation:** After comparing with their competitors offering, the case company arrive at a strong statement that mentions why their offering is superior compared with the competitor. This step gives a clear picture on what can be communicated to the customer that makes him to accept the service.

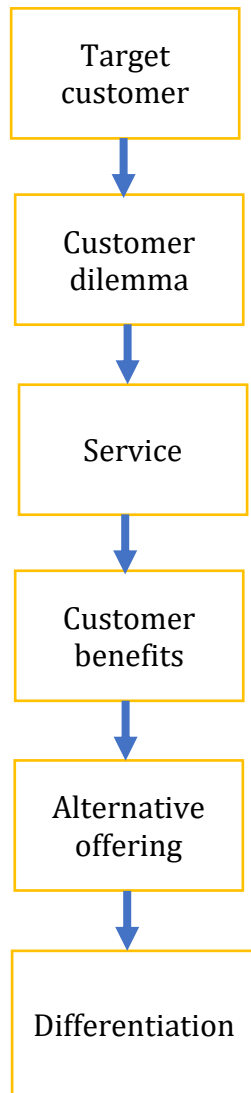


Figure 18: The current value proposition creation process at the case company

By providing proper inputs for each step, a promising value proposition can be derived that gives a base to the service (i.e., in the creation) and a strong reason (on its importance) when presenting to their customers. As shown in figure 19, obtaining a perfect fit between the value proposition and the respective service makes the sales people to motivate their customers to purchase the service.

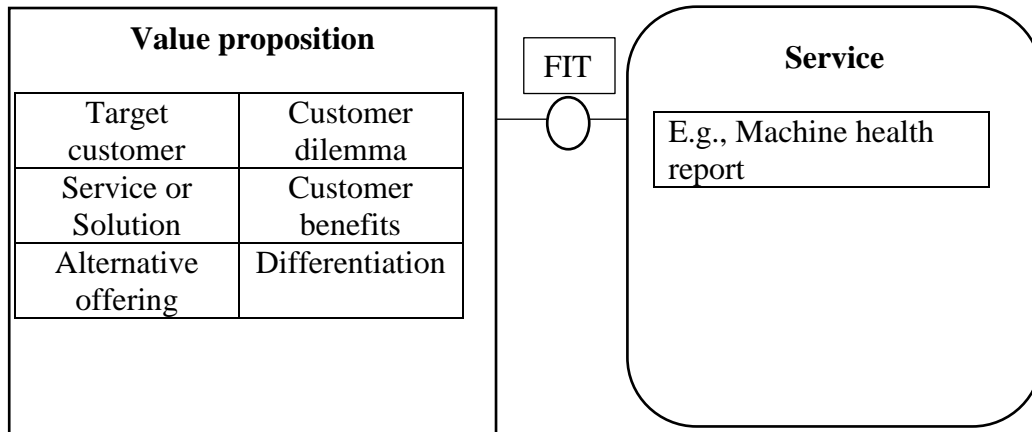


Figure 19: Fit between service and value proposition

Hence, the current value proposition creation process consisting of six steps at the case company is presented followed by achieving a fit between the value proposition creation process and the respective service.

4.5. Improvements of service offerings in telematics system

This section answers the research question no. 3: How can the service offerings for telematics system be improved through the process of value proposition?

To answer this question, firstly the strengths and weaknesses of current value proposition process at the case company are discussed (i.e., section 4.5.1). Secondly, the proposed conceptual framework for the creation of value propositions is presented (i.e., section 4.5.2). Thirdly, the gaps are identified while comparing the value proposition creation process at the case company and the proposed conceptual framework (i.e., section 4.5.3). Finally, based on this analysis and the observations, potential improvement possibilities are suggested to improve the service offerings in telematics system by applying the proposed framework (i.e., section 4.5.4).

4.5.1 Strengths and weaknesses of the current value proposition process at the case company

It is said that value proposition is a good validator during the creation of services, i.e., able to validate whether the respective service is created according to the customer needs or not. The existing six step process at the case company can clearly distinguish their service offerings with respect to their competitors. Indeed, intriguing their customers for the services offered. However, there are some weaknesses identified from the current value proposition process, these are presented alongside with the strengths in table 12.

Table 12: Strengths and weaknesses of the current value proposition creation process

Strengths	Weaknesses
<ul style="list-style-type: none"> • The current value proposition creation process delivers the promising statement in the process of creating services and selling them. • The current value proposition addresses the unique issues like capturing the customers dilemma and offering a service that differentiates them from their competitors • Can work in the product development also (if needed) • Gives the ability to dive more deeper when needed 	<ul style="list-style-type: none"> • It addresses the customer needs but not the financial aspects of the case company • It doesn't include prototype testing before launching the service • Requires a lot of work before delivering to the customer • Doesn't cover the needs of the case company • Doesn't consider the iterative loops, e.g., feedback loops in the process

Table 12 presents that even though all gaining points are considered during the creation of value proposition for the respective service offerings, there are some important steps that are to be considered, namely:

- the financial aspect
- the prototype testing
- iterative loops in the process

Henceforth, the proposed conceptual framework addresses the weaknesses of current value proposition creation process at the case company. This could help the case company in defining a good value propositions which can attract new customers' and retain the existing ones.

4.5.2 The proposed conceptual framework for the value proposition creation process

Recalling the proposed conceptual framework presented in section 3.6. The key activities involved in each step of the six steps are presented in table 13:

Table 13: Key activities (involved) for each step

Conceptual framework steps	Key activities
Identify target customers	Market analysis, Customer job(s)
Analyse customer needs	Identifying customer(s) pains and gains, ranking them, and turning it into business opportunity
Create value proposition	Creating after the financial evaluation

Value demonstration	Benefits, through evaluating pain relievers and gain creators
Testing	Firm level testing and market testing
Launch and review proposition	Releasing. After some time, feedback is taken

The identified key activities are compared with the current value proposition creation process and similarities are noted down, as shown in figure 20.

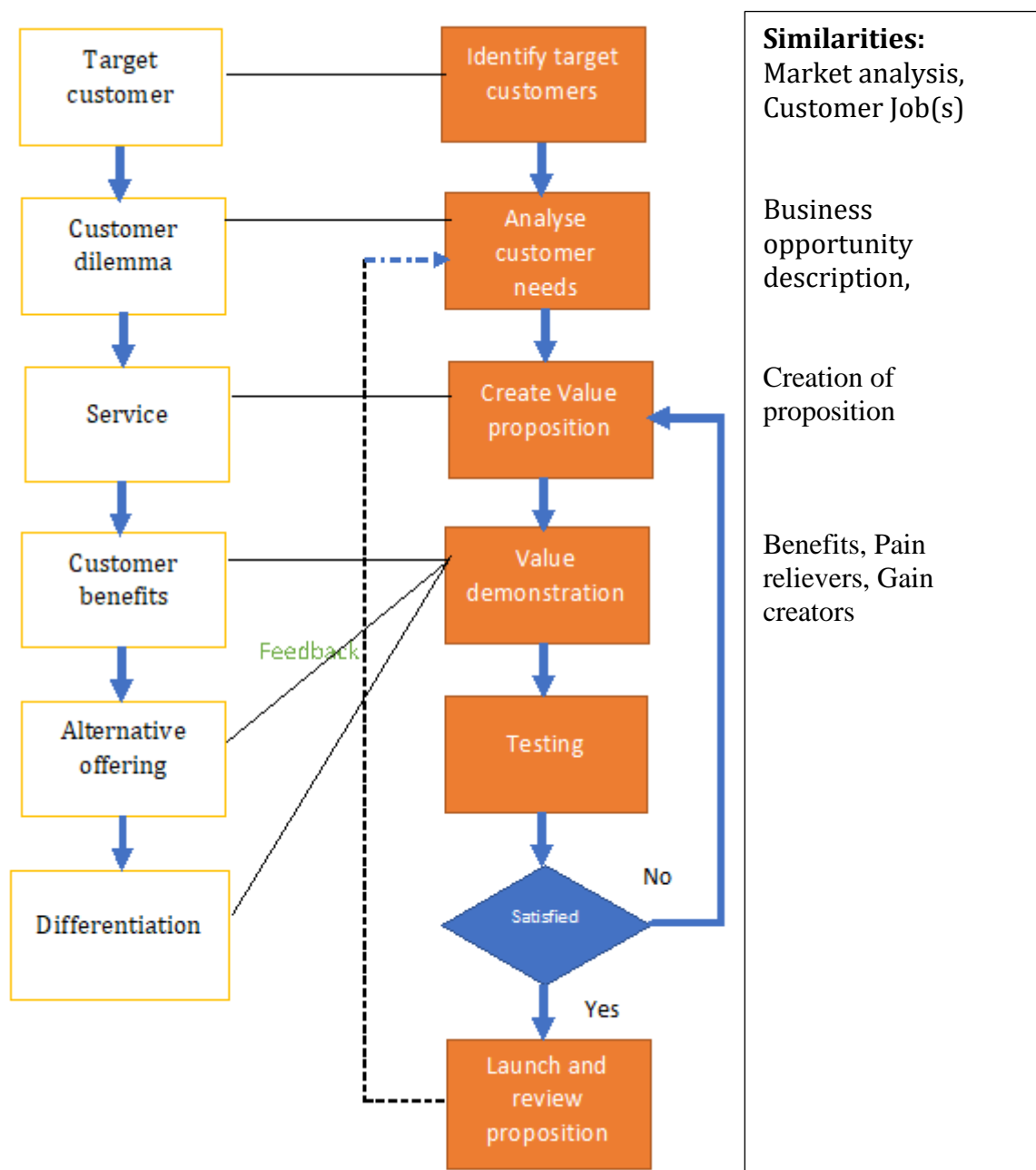


Figure 20: Comparing the current value proposition creation process with the conceptual framework

Henceforth, figure 20 shows that the current value proposition creation process has similarities with the first four steps of the conceptual framework. This states that there is a room for improvement for the current value proposition creation process. However, the challenge is that the great value propositions are not derived at once, it needs go through many iterations (Osterwalder et al., 2014). But, once it was formed then the firm will be the most competitive player in the market. This is covered through the cyclic loop created in the conceptual framework.

4.5.3 Identified gaps between the case company's value proposition process and the proposed conceptual framework

From figure 20, many similarities can be seen between the current value proposition process and the conceptual framework. However, some gaps exist that needs to be filled, causing to improve the current value proposition process at the case company. The identified gaps through comparison between conceptual framework and current value proposition process are presented in table 14.

The identified gaps are as follows:

- Financial evaluation is not performed
- Demonstrating the value (so that customer can understand the real need)
- Testing phase is not present, where customer experiences can be recorded
- Review of the proposition is not there
- There is no feedback loop for continuous improvement

Table 14: Identified gaps

The proposed conceptual framework of value proposition process	The current value proposition process at the case company	Gaps
Step 1: Identify target customer	Target customer	-
Step 2: Analyse Customer needs	Customer dilemma	-
Step 3: Create value proposition	Service	Financial evaluation is not performed
Step 4: Value demonstration	Customer benefits Alternative offering Differentiation	Demonstration
Step 5: Testing	-	Testing
Step 6: Launch and review the proposition	-	Reviewing after certain period

From table 14, it is seen that excluding first two steps, the gaps are identified for the rest of the steps. For instance, at step 3 even though there is a difference in the title, the similarities are same. However, the hidden gap is financial evaluation that can be a base point during the creation of the proposition. Similarly, at step 4 even though customer benefits, alternative offering, and differentiation combines to demonstrate the created value, somehow the case company is facing difficulties in presenting the benefits through the offered service that is claimed by one of the

stakeholders. Further, it is clearly seen that step 5 and 6 i.e., testing, launch and review proposition are not seen while addressing the value proposition creation. Finally, even though many similarities exist between the first two steps, not so important hidden gaps can be found but it is given less preference in this study. The next section provides the necessary potential improvements for the identified gaps.

4.5.4 Potential improvements of service offerings

How can the proposed framework help to improve the service offerings in telematics system?

The proposed framework can help the current value proposition creation process through filling the existing/identified gaps, that in turn provides an opportunity to improve the service offerings in telematics system. Thus, moving to more of customer centric. In other words, as value proposition improve the service offerings in telematics system, if that value proposition process is improved then it directly influences the service offerings.

The following points are highlighted that makes a foundation to improve the service offerings in telematics system:

- a. Address the (right) unmet needs of customers
- b. Financial evaluation
- c. Demonstrate the value embedded in the service offering
- d. Testing to understand the impact of the service offering to the customers
- e. Feedback loop that makes a foundation to continuous improvement philosophy

From the above points, as the customers and their requirements are not stable at any market. The proposed conceptual framework can act as a step-up to the existing value proposition creation process, leading to have attention for minor details also. In addition, as every business runs over finances that change the stability in the market, including financial statement in the process is helpful for the case company to understand the cost incurred to the revenue generated for the respective service offering. Unlike products, as services are intangible in nature where value is derived only from usage, demonstrating the created value is equally important that helps in making to educate customers while presenting the offers. In the conceptual framework, two methods for testing are suggested. These can make the service more effective when releasing to the market. As always, the customer requirements always changes as per the situation. Hence, a feedback loop can enhance the existing service offering that pleases the customer to utilise more of these services. In short, services are to be updated as per the needs of the customer.

Additionally, instead of trying to make a fit between the value proposition creation process and the service offerings, the value proposition creation process should be within the service creation. In other words, instead of attempting to match the value proposition to the respective service offering, the value proposition process should be created within the service creation process as shown in figure 21. It derives an analogy, working by the customers' perspective and working with the customers' perspective. Thus, ensures that all the hidden needs (even customer isn't aware of) come to the surface, and also there won't be any deviation in the process of creating the service.

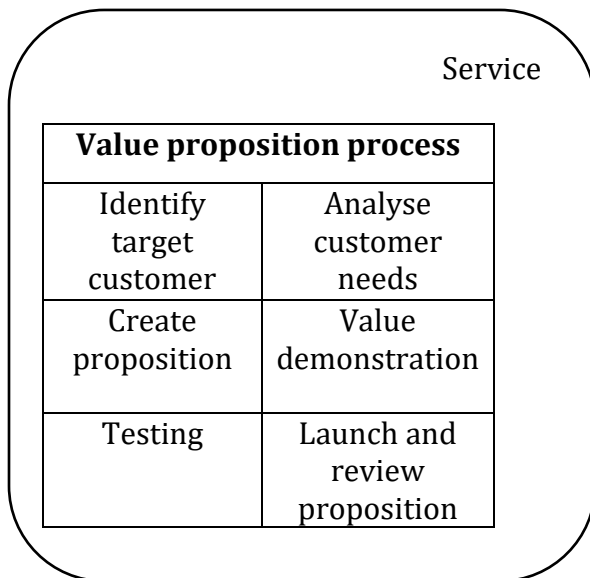


Figure 21: Value proposition process within the service creation process

To wind it up, this section starts with strengths and weaknesses of the current value proposition process and proposed conceptual framework. Later on, the gaps between the current and proposed value proposition process are identified and the potential improvements are suggested that can enhance the value proposition creation process for the respective service offerings.

5. DISCUSSION

This chapter provides the reflections from the thesis, it starts with the problem identified and how it has been solved through the research questions following implications.

The thesis is intended to provide lime light in the importance of services and how value propositions can help for developing services in a product centric company. It starts by stating the importance of services within manufacturing firms especially in the developed countries (Leroi-Werelds et al., 2017; Kindström and Kowalkowski, 2014; Bitner, Ostrom and Morgan, 2008). Further, the concept of business model is introduced (Johnson, Christensen and Kagermann, 2008) in particular focus on value proposition on which the entire thesis is relied on.

Starting with the identified problem, Frow and Payne, (2011) mentions that only 10 percent of the firms are successful in developing and implementing value proposition. Therefore, a proper approach is not clearly defined in the usage of value propositions (Payne and Frow, 2014b). This is observed at the case company as well, where the same problem arises.

Henceforth, this thesis is built on these challenges and tried to address them theoretically, indeed verifying with the case company and is done through formulating three research questions. The outcome of the three research questions lead to two contributions.

First, the thesis is built on the theoretical study for addressing value propositions for the provided service offerings through telematics system at the case company. This resulted in identifying the value propositions for the related service offerings. In addition, a silver line difference between the customer value proposition and stakeholder value proposition is indicated that helps the case company in communicating efficiently. For instance, customer value proposition provides a strong base in attracting and retaining customers whereas stakeholder value proposition is doing the kind of work that is able to satisfy the customers. This solves the problem raised by Karlsson and Skålén, (2015) who suggests that during the creation of value, there is a limited discussion about value proposition between the stakeholders. Finally, as Payne and Frow, (2014b) mentions

a proper approach is not clearly defined in the usage of value propositions is also covered. Indeed, argument arises with Vargo and Lusch, (2004a) who states that enterprise can create only value propositions.

Second, the current value proposition process at the case company is presented followed by identifying the strengths and weaknesses. Then a conceptual framework derived from Barnes, Blake and Pinder (2009); Osterwalder and Pigneur et al., (2014); Payne and Frow, (2014b) is presented. Even though four different process frameworks are studied, only three author frameworks are relevant to this thesis, covering most of the areas. The three authors have uniqueness in their way of presenting their works. For instance, Blake and Pinder (2009) work is derived more through questionnaires i.e., creating the proposition through questions that can be asked within the firm and their customers whereas Osterwalder and Pigneur et al., (2014) work is derived through workshop i.e., creating the proposition through workshop where multiple stakeholders are involved where brainstorming session takes place and finally Payne and Frow, (2014b) work is derived through a standard procedure i.e., creating the proposition through procedure where list of activities are stated. In a nut-shell, the commonalities of three unique approaches helped in creating a conceptual framework as shown in figure 22.

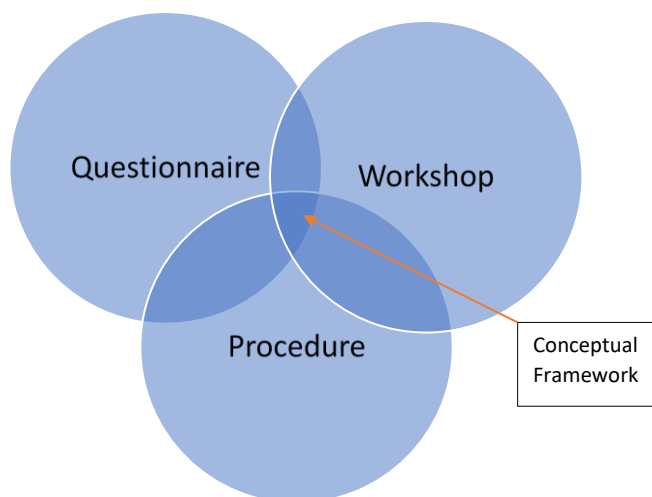


Figure 22: The commonalities from the three authors to build a conceptual framework

Further, through comparing the current value proposition creation process with the conceptual framework some gaps are identified that can potentially improve the creation of value proposition process in the service offering. Indeed, a suggestion i.e., instead of making a fit between the value proposition and the service offering its better to have a value proposition within the service offering is provided. This can enhance the value proposition creation process where the hidden needs come to the surface

In addition, the dilemma presented by the product manager of telematics system i.e., *Customers are not able to understand the benefits of the Telematics system even though it's been effectively utilized*, has been addressed by introducing value demonstration step in the conceptual framework. This can help them in communicating the benefits to their customers for the services

offered. For instance, as Cavaleri, (2008) mentions that future success of the firms is judged through assessing the value propositions.

Finally, the findings from this thesis can be an argument for Vargo and Lusch, (2004a) who states that enterprise can create only value propositions whereas from this thesis not only potential value propositions are created but also communication channel is also presented.

Summing up, theoretical gaps mentioned by various authors presented in section 1.2 are answered. For instance, Frow et al., (2014); Ballantyne et al., (2008) mentions most of the firms have limited understanding of value propositions and aren't able to communicate effectively. This is explained in research question 1. Also, Frow and Payne, (2011); Wouters, Anderson and Kirchberger, (2018) claims that less than 10 percent of the firms are successful in developing and implementing value proposition. For which the above presented results from research questions 2&3 can be a strong argument.

Theoretical implications:

Even though value proposition concepts are explained, there are some areas that needs to be further explored. For instance, in table 4, various customer situations are presented, among which 'getting the job done' is considered for this thesis, and rest of them are to be further researched. In table 6, even though different views of value propositions are presented, but only customer value proposition and stakeholder value proposition are considered for this thesis that gives an avenue to the researches to explore the other value propositions. Indeed, as customer value proposition and stakeholder value proposition are introduced, further studies can be helpful. As mentioned, value proposition is the first step in the creation of business model. And to reach the customers, a proper business model is to be created that needs further exploration. Further, various stages of servitisation is mentioned for making the users to understand the importance of services. However, the research on it should also be extended further. Overall, this thesis can be a reference point for many researchers to explore further in the mentioned areas.

Managerial implications:

Through this study, managers at the case company benefits by the findings presented in the thesis. For instance, value proposition could be a proper channel for them to communicate and deliver the results in the process of making their customers' happier. As mentioned, since the case company is a product oriented that focuses on delivering value (in terms of product and basic services) to their customers, through the usage of value proposition their way of working can be more of customer centric. Thus, customers don't think of any of the case company's competitors because they are most satisfied and pleased. In addition, as potential value proposition can be identified through the suggested process, a business model can be created easily. Finally, MAPP who are responsible in development of tools and techniques for the process developments can take this conceptual framework and save it into their central database where the various process flows are displayed.

To conclude this chapter, value proposition is a (unique) way of expression that impacts everyone within the firm to stay on the same page to achieve the (common) goal that is customer satisfaction.

6. CONCLUSIONS AND RECOMMENDATIONS

The purpose of this thesis is to explore value proposition of service offering in telematics system, improvement of the existing value proposition process. This thesis starts by explaining about the impact of services in the developed countries and how it has come to the lead role in a product centric firm is presented. Later on, the challenges in creation of services when compared with the products are taken as an initial step to introduce the concept of value proposition. In other words, as services are always customer centric, there is a need to capture the customer experiences and turn it into business requirements, are addressed through value propositions. Knowing the importance of value propositions, many firms are using the concept in a loose manner that motivated to write this thesis. By making it as a problem statement, different types of value proposition are presented that motivates the reader to use the term value proposition in a proper way. In addition, the framework is presented that is compared with case study and improvements are suggested. Framework can be a step-by-step process for arriving at a possible statement of unique and appreciated value proposition. The results can be verified by presenting it to the case company and validating with the current on-going service process.

Further recommendations can be to explore the various types of value propositions individually and see how they can transform the current working process. As this thesis focusses on value propositions, the attention paid on the service creation process is less. Hence, the service creation can be also done in future.

7. REFERENCES

Åkesson, M. et al. (2016) 'Value proposition test-driving for service innovation: How frontline employees innovate value propositions', *Journal of Service Theory and Practice*, 26(3), pp. 338–362. doi: 10.1108/JSTP-10-2014-0242.

Alam, I. (2002) 'An Exploratory Investigation of User Involvement in New Service Development', *Journal of the Academy of Marketing Science*, 30(3), pp. 250–261. doi: 10.1177/0092070302303006.

Baines, T. and Lightfoot, H. (2013) *Made to Serve*. John Wiley & Sons Ltd. 2013. doi: 10.1002/9781119207955

Ballantyne, D. et al. (2008) 'Service-dominant logic and value propositions : Re-examining our mental models', *Otago Forum*, 2(March 2016), pp. 41–60.

Ballantyne, D. et al. (2011) 'Value propositions as communication practice: Taking a wider view', *Industrial Marketing Management*. Elsevier Inc., 40(2), pp. 202–210. doi: 10.1016/j.indmarman.2010.06.032.

Barnes, C., Blake, H. and Pinder, D. (2009) *Creating and Delivering Your Value Proposition*

Bengtsson.M and Salonen.A, 'Requirements and Needs—A Foundation for Reducing Maintenance-Related Waste', *Proceedings of the 10th World Congress on Engineering Asset Management*, pp. 105 - 112

Bitner, M. J., Ostrom, A. L. and Morgan, F. N. (2008) 'Service Blueprinting: A Practical Technique for Service Innovation', *California Management Review*, 50, No . 3, pp. 1–31.

- Bocken, N. M. P. et al. (2014) 'A literature and practice review to develop sustainable business model archetypes', *Journal of Cleaner Production*. Elsevier Ltd, 65, pp. 42–56. doi: 10.1016/j.jclepro.2013.11.039.
- Camlek.V (2010) 'How to spot a real value proposition', *Information Services & Use* 30, pp. 119–123 DOI 10.3233/ISU-2010-0615
- Cavaleri, S. A. (2008) 'Are learning organizations pragmatic?', *Learning Organization*, 15(6), pp. 474–485. doi: 10.1108/09696470810907383.
- Chesbrough, H. (2007) 'Business model innovation: it's not just about technology anymore', *Strategy & Leadership*, 35(6), pp. 12–17. doi: 10.1108/10878570710833714.
- Chesbrough, H. (2010) 'Business model innovation: Opportunities and barriers', *Long Range Planning*. Elsevier Ltd, 43(2–3), pp. 354–363. doi: 10.1016/j.lrp.2009.07.010.
- Chirumalla .K (2013) 'Managing Knowledge for Product-Service System Innovation: The Role of Web 2.0 Technologies', *Research-Technology Management*, 56:2, pp. 45-53. DOI: 10.5437/08956308X5602045
- Chirumalla .K (2016) 'Organizing lessons learned practice for product–service innovation', *Journal of Business Research* 69 (2016) pp. 4986–4991
- Coreynen, W., Matthyssens, P. and Van Bockhaven, W. (2017) 'Boosting servitisation through digitization: Pathways and dynamic resource configurations for manufacturers', *Industrial Marketing Management*. Elsevier Inc., 60, pp. 42–53. doi: 10.1016/j.indmarman.2016.04.012.
- Dubois, A. and Gadde, L.E. (2002), "Systematic combining: an abductive approach to case research", *Journal of Business Research*, Vol. 55 No. 7, pp. 553-560
- Edvardsson, B. et al. (2000) 'The effects of satisfaction and loyalty on profits and growth: Products versus services', *Total Quality Management*, 11(7), pp. 917–927. doi: 10.1080/09544120050135461.
- Eggert, A. et al. (2018) 'Conceptualizing and communicating value in business markets: From value in exchange to value in use', *Industrial Marketing Management*. Elsevier, 69, pp. 80–90. doi: 10.1016/j.indmarman.2018.01.018.
- Eisenhardt.K.M and Graebner.M.E (2007), 'Theory building from cases: opportunities and challenges', *Academy of Management Journal*, Vol.50, No.1, pp.25-32
- Eisenhardt KM. 1989. Building theories from case study research. *Academy of Management Review* 14(4): 532–550.
- Fernandes, S. D. C. et al. (2018) 'an Initial Prototype of a Tool for Defining Value Proposition in the Product-Service System (Pss) Design', *International Design Conference*, pp. 281–292. doi: 10.21278/idc.2018.0433.
- Fielding.N, Schreier.M,(2001) Introduction: on the compatibility between qualitative and quantitative research methods, *Forum: Qualitative Research* 2(1),
- Frow, P. et al. (2014) 'Value propositions: A service ecosystems perspective', *Marketing Theory*, 14(3), pp. 327–351. doi: 10.1177/1470593114534346.

- Frow, P. and Payne, A. (2011) 'A stakeholder perspective of the value proposition concept', *European Journal of Marketing*, 45(1), pp. 223–240. doi: 10.1108/03090561111095676.
- Gibbert.M, Ruigrok.W, and Wicki.B (2008), 'Research notes and commentaries what passes as a rigorous case study?', *Strategic management journal*, 29, pp. 1465 - 1474
- Goldring, D. (2017) 'Constructing brand value proposition statements: A systematic literature review', *Journal of Marketing Analytics*. Palgrave Macmillan UK, 5(2), pp. 57–67. doi: 10.1057/s41270-017-0014-6.
- Grubic, T. and Jennions, I. (2018) 'Remote monitoring technology and servitised strategies–factors characterising the organisational application', *International Journal of Production Research*. Taylor & Francis, 56(6), pp. 2133–2149. doi: 10.1080/00207543.2017.1332791.
- Johnson, M. W., Christensen, C. M. and Kagermann, H. (2008) 'Reinventing your business model', (December), pp. 50–60.
- Jong, J. P. J. and Vermeulen, P. A. M. (2003) 'Organizing successful new service development: a literature review', *Management Decision*, 41(9), pp. 844–858. doi: 10.1108/00251740310491706.
- Kandampully, J. and Butler, L. (2001) 'Managing Service Quality Emerald Article : Service guarantees : a strategic mechanism to minimise customers ' perceived risk in service organisations Techniques
Service guarantees : a strategic mechanism to minimise customers ' perceived risk in service o'.
- Karlsson, J. and Skålén, P. (2015) 'Exploring front-line employee contributions to service innovation', *European Journal of Marketing*, 49(9–10), pp. 1346–1365. doi: 10.1108/EJM-10-2012-0568.
- Karpen, I. O., Bove, L. L. and Lukas, B. A. (2012) 'Linking Service-Dominant Logic and Strategic Business Practice: A Conceptual Model of a Service-Dominant Orientation', *Journal of Service Research*, 15(1), pp. 21–38. doi: 10.1177/1094670511425697. (BM)
- Kindström, D. and Kowalkowski, C. (2014) 'Service innovation in product-centric firms: A multidimensional business model perspective', *Journal of Business and Industrial Marketing*, 29(2), pp. 96–111. doi: 10.1108/JBIM-08-2013-0165.
- Kindström, D., Kowalkowski, C. and Alejandro, T. B. (2015) 'Adding services to product-based portfolios an exploration of the implications for the sales function', *Journal of Service Management*, 26(3), pp. 372–393. doi: 10.1108/JOSM-02-2014-0042.
- Kothari. C.R. (2004) *Research Methodology Methods and Techniques*. New Age International (P) Ltd
- Kova'cs, G. and Spens, K.M. (2005), "Abductive reasoning in logistics research", *International Journal of Physical Distribution and Logistics Management*, Vol. 35 No. 2, pp. 132-144
- Kowalkowski, C. et al. (2012) 'The co-creative practice of forming a value proposition', *Journal of Marketing Management*, 28(13–14), pp. 1553–1570. doi: 10.1080/0267257X.2012.736875.

- Kuzgun, E. and Asugman, G. (2015) 'Value in Services – A Service Dominant Logic Perspective', *Procedia - Social and Behavioral Sciences*. Elsevier B.V., 207, pp. 242–251. doi: 10.1016/j.sbspro.2015.10.093.
- Lenka, S., Parida, V. and Wincent, J. (2017) 'Digitalization Capabilities as Enablers of Value Co-Creation in Servitizing Firms', *Psychology & Marketing*, 34(1), pp. 92–100. doi: 10.1002/mar.
- Lerch, C. and Gotsch, M. (2015) 'Digitalized Product-Service Systems in Manufacturing Firms: A Case Study Analysis', *Research-Technology Management*, 58(5), pp. 45–52. doi: 10.5437/08956308X5805357.
- Leroi-Werelds, S. et al. (2017) 'Does communicating the customer's resource integrating role improve or diminish value proposition effectiveness?', *Journal of Service Management*, 28(4), pp. 618–639. doi: 10.1108/JOSM-11-2015-0366.
- Li, A. Q. and Found, P. (2017) 'Towards Sustainability: PSS, Digital Technology and Value Co-creation', *Procedia CIRP*. The Author(s), 64, pp. 79–84. doi: 10.1016/j.procir.2017.05.002.
- Lindhult, E., Chirumalla, K., Pejvak, O. and Parida, V. (2018) "Value logics for service innovation: practice-driven implications for service-dominant logic", *Service Business: An International Journal*. Vol. 12, Issue. 3, pp 457–481
- Lusch, R. F., Vargo, S. L. and O'Brien, M. (2007) 'Competing through service: Insights from service-dominant logic', *Journal of Retailing*, 83(1), pp. 5–18. doi: 10.1016/j.jretai.2006.10.002.
- Lusch, R. F., Vargo, S. L. and Tanniru, M. (2010) 'Service, value networks and learning', *Journal of the Academy of Marketing Science*, 38(1), pp. 19–31. doi: 10.1007/s11747-008-0131-z.
- Meyer, S. et al. (2002) 'The Service Concept; the Missin Link in Service Design Research', *Journal of Operations Management*, 20(2), pp. 121–134. doi: 10.1016/S0272-6963(01)00090-0.
- Opresnik, D. and Taisch, M. (2015) 'The value of big data in servitisation', *International Journal of Production Economics*. Elsevier, 165, pp. 174–184. doi: 10.1016/j.ijpe.2014.12.036.
- Osterwalder, A. and Pigneur, Y. (2003) 'Modelling Value Propositions in E-Business', *Proceedings of the 5th International Conference on Electronic Commerce*, pp. 430–437. doi: 10.1145/948005.948061.
- Osterwalder, A. and Pigneur, Y. (2012) *Business Model Generation*, Self-Published. Available at: BusinessModelGeneration.com.
- Osterwalder, A. and Pigneur, Y. (2014) *Value Proposition canvas*. John Wiley & sons
- Panarotto, M. and Larsson, T. C. (2012) 'Intangibles in design of PSS value propositions', *CIRP IPS2 Conference*. doi: 10.1007/978-3-642-32847-3.
- Parnell, J. A. (2006) 'Generic strategies after two decades: A reconceptualization of competitive strategy', *Management Decision*, 44(8), pp. 1139–1154. doi: 10.1108/00251740610690667.
- Patala, S. et al. (2016) 'Sustainable value propositions: Framework and implications for technology suppliers', *Industrial Marketing Management*. Elsevier Inc., 59, pp. 144–156. doi: 10.1016/j.indmarman.2016.03.001.

Payne, A. F., Storbacka, K. and Frow, P. (2008) 'Managing the co-creation of value', *Journal of the Academy of Marketing Science*, 36(1), pp. 83–96. doi: 10.1007/s11747-007-0070-0.

Payne, A. and Frow, P. (2014a) 'Deconstructing the value proposition of an innovation exemplar', *European Journal of Marketing*, 48(1), pp. 237–270. doi: 10.1108/EJM-09-2011-0504.

Payne, A. and Frow, P. (2014b) 'Developing superior value propositions: A strategic marketing imperative', *Journal of Service Management*, 25(2), pp. 213–227. doi: 10.1108/JOSM-01-2014-0036.

Payne, A., Frow, P. and Eggert, A. (2017) 'The customer value proposition: evolution, development, and application in marketing', *Journal of the Academy of Marketing Science*. *Journal of the Academy of Marketing Science*, 45(4), pp. 467–489. doi: 10.1007/s11747-017-0523-z.

Reim, W., David, R. S. and Parida, V. (2017) 'ADOPTION OF PRODUCT-SERVICE SYSTEM (PSS) BUSINESS MODEL INNOVATIONS IN GLOBAL DISTRIBUTER NETWORKS', in 24th International Product Development Management Conference IPDMC, pp. 1–18.

Rintamäki, T. and Kirves, K. (2017) 'From perceptions to propositions: Profiling customer value across retail contexts', *Journal of Retailing and Consumer Services*, 37(September 2016), pp. 159–167. doi: 10.1016/j.jretconser.2016.07.016.

Rintamäki, T., Kuusela, H. and Mitronen, L. (2007) 'Identifying competitive customer value propositions in retailing', *Managing Service Quality*, 17(6), pp. 621–634. doi: 10.1108/09604520710834975.

Rossignoli, F. and Lionzo, A. (2018) 'Network impact on business models for sustainability: Case study in the energy sector', *Journal of Cleaner Production*. Elsevier Ltd, 182, pp. 694–704. doi: 10.1016/j.jclepro.2018.02.015.

Safarpour, N. and Sillanpää, I. (2017) 'A Dual Perspective of Value in a Bundle of Product and Service', *Management and Production Engineering Review*, 8(4), pp. 27–41. doi: 10.1515/mper-2017-0034.

Schmitz, F. V., de Mattos, B. S. and Correia, A. R. (2018) 'Value proposition analysis applied to military training airplane design concept', *Journal of the Brazilian Society of Mechanical Sciences and Engineering*. Springer Berlin Heidelberg, 40(3), pp. 1–16. doi: 10.1007/s40430-018-0974-2.

Skålén, P. et al. (2014) 'Exploring value propositions and service innovation: a service-dominant logic study', *Journal of the Academy of Marketing Science*, 43(2), pp. 137–158. doi: 10.1007/s11747-013-0365-2.

Steiner, F. and Harmon, R. (2009) 'The impact of intangible value on the design and marketing of new products and services: An exploratory approach', *PICMET '09 - 2009 Portland International Conference on Management of Engineering & Technology*, pp. 2066–2079. doi: 10.1109/PICMET.2009.5261890.

Uлага, W. and Chacour, S. (2001) 'Customer Value in Business Markets', *Industrial Marketing Management*, 30, pp. 315–319. doi: 10.1016/S0019-8501(01)00151-1.

Vargo, S. L. and Lusch, R. F. (2004a) 'Evolving to a New Dominant Logic for Marketing', *Journal of Marketing*, 68(1), pp. 1–17. doi: 10.1509/jmkg.68.1.1.24036.

Vargo, S. L. and Lusch, R. F. (2004b) 'The Four Service Marketing Myths: Remnants of a Goods-Based, Manufacturing Model', *Journal of Service Research*, 6(4), pp. 324–335. doi: 10.1177/1094670503262946.

Vargo, S. L. and Lusch, R. F. (2008) 'Service-dominant logic: Continuing the evolution', *Journal of the Academy of Marketing Science*, 36(1), pp. 1–10. doi: 10.1007/s11747-007-0069-6.

Viswanadham, N. (2018) 'Performance analysis and design of competitive business models', *International Journal of Production Research*. Taylor & Francis, 56(1–2), pp. 983–999. doi: 10.1080/00207543.2017.1406171.

Voss.C, Tsikriktsis.N, Frohlich.M, (2002) "Case research in operations management", *International Journal of Operations & Production Management*, Vol. 22 Issue: 2, pp.195-219, <https://doi.org/10.1108/01443570210414329>

Wouters, M., Anderson, J. C. and Kirchberger, M. (2018) 'New-technology startups seeking pilot customers: Crafting a pair of value propositions', *California Management Review*, 60(4), pp. 101–124. doi: 10.1177/0008125618778855

APPENDIX:

1. What is your job role in the company?
2. Do you offer different types of services for different customer segments?
3. What is the strategic vision of the company when it comes to services?
4. Where can you find the value in the mentioned services?
5. Which strategies company has to develop for new services?
6. What kind of challenges do you see when developing a new service?