Going digital

Business model innovation in omni-channel retailing

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To my parents,

Slavica and Ljubiša
Prologue

Imagine that you are browsing through your Instagram feed, and you happen to stumble upon an outfit you would be interested in buying. You open the post and see that the product you are interested in is tagged. So you click on the item and are redirected to the website. After searching for the right size and colour, you proceed to the checkout. You look for the payment provider that offers your preferred payment option, select it and place an order for delivery the next morning. However, at the last moment you decide to go and check out the physical store and therefore select the option to pay for and collect the product in-store. After a few days, you receive an email confirming that the item is ready for pick-up. You go to the store, try on a few additional items, decide to buy them, and head to the self-service check-out where you use your smartphone to pay, and then leave the store. Finally, you take a selfie, tag the retailer, and share it with your friends on social media.

What do you make of this? Does it sound too good to be true? Well, the described customer journey, while still possible, is very uncommon. There are several challenges for retailers, such as a growing variety and scope of retail channels and their integration, which if not adequately addressed inhibit such behaviour, as predominantly practised by younger generations. In other words, retailers need to rethink their business models (BM), from production and operations to sales and marketing; from doing everything on their own to partnering with different actors. This holds true not only for traditional brick and mortar, but also for purely online retailers. They generally opt-in to pursue an omni-channel strategy that would essentially allow the customer to engage with the brand seamlessly across different retail channels and touchpoints, whenever and wherever they wish to do so. However, further research is required into how to implement those strategies embodied within their BMs in a dynamic and uncertain retailing context. This thesis sets out to explore and address those challenges experienced by retailers and their partners in their omni-channel retailing endeavours. I hope that it will add to our understanding of contemporary retail management and related BM innovation activities, as well as answering some of the questions currently asked by many of the managers involved in providing customers with seamless customer experience.
Abstract

Over the last ten years, digital technologies have had immense effect on the way we live and work, on organizational forms, and on industrial trends. These effects have not left retail industries and their various actors untouched, but have rather forced them to adapt to the changing environment. At the same time, the digital age has brought new organizations that have leveraged ubiquitous Internet access and the pervasive adoption of smartphones which created new, previously non-existent mobile-based services. With these changes emerged the phenomenon of retail digitalization, a process of ongoing change through the integration of digital, primarily mobile, technologies into retailing.

Although the depicted transformation offers multifaceted opportunities for advancing organizational growth, it also represents fundamental challenges to our understanding of the dynamics of organizational change, intertwined with changes at both higher (inter-organizational) and lower (intra-organizational) levels. In particular, this thesis addresses the business model innovation efforts of retailers across different industry segments, as well as those of mobile payment providers as key partners of retailers in the complex and increasingly networked empirical context. Through the exploratory case-based research, this thesis makes three contributions. The first relates to the contribution to retailing literature by employing a business model perspective to emphasize particularly important aspects of the emerging transition to omni-channel retailing that allows the customer to engage with a retailer whenever and however they wish to. These are seamless and experiential shopping as a new value proposition, the use of technology-mediated interfaces to enhance customer experience, integrated data analytics as a potential source of competitive advantage, and the importance of partnerships for successful value delivery. Secondly, this thesis contributes to the emerging discussions on the dynamics of business models by providing empirical findings of the business model innovation process. Finally, this thesis suggests that a business model should be seen as a relational aggregator at a network level, i.e. a device to explain the interconnectedness of companies in the digital age, and highlights the need for a network-oriented view of business model innovations in such an environment.
Sammanfattning


Även om denna omvandling erbjuder mångfacetterade möjligheter till organisatorisk tillväxt, representerar den också grundläggande utmaningar för hur vi ska förstå dynamiken inom organisationsförändringar som är sammanflätade med förändringar både mellan (interorganisatoriska) och inom (intraorganisatoriska) företag. Denna avhandling berör primärt affärsmodellsinnovationer av detaljister i flera olika branscher och av mobilbetalningsleverantörer, vilka är nyckelpartners till detaljisterna i den komplexa och alltmer nätverkande affärsvärlden. Studien har flera bidrag där det första bidrar till detaljhandelslitteraturen genom att tillämpa ett affärsmodellperspektiv för att betona särskilt viktiga aspekter av en handlarens övergång till omni-channel retailing som gör det möjligt för kunden att samarbeta med en återförsäljare när och hur de vill. Detta innebär exempelvis sömlös och upplevelsefokuserad shopping som en ny värde proposition, användning av teknologimedierade gränssnitt för att förbättra kundupplevelsen, integrerad dataanalys som en potentiell källa till konkurrensfördelar samt vikten av partnerskap för att framgångsrikt leverera ett mervärde. Det andra bidraget bygger på nya diskussioner om affärsmodellers dynamik genom att tillhandahålla empirisk data om innovationsprocesser kopplat till affärsmodeller. Slutligen föreslår avhandlingen att affärsmodellen ska ses som en relationell aggregator, dvs. en mekanism som förklarar sammankopplingen av företag i en digital tidsålder, och därmed belyser behovet av en nätverktorierad förståelse av affärsmodellinnovationer i en sådan miljö.
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Milan Jocevski
Stockholm, December 2019
List of appended papers

This thesis is based on four papers that are enclosed in the end.

Paper A


An earlier version of this paper was presented at the R&D Management Conference. July, 2018. Milano, Italy.

Paper B


An earlier version of this paper was presented at the Colloquium on European Research in Retailing. July, 2018. Surrey, England.

Paper C


An earlier version of this paper was presented at the Scandinavian Conference on Industrial Engineering and Management. October, 2019. Stockholm, Sweden.

Paper D

Relevant publication (not appended)

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1. Introduction

1.1. Setting the stage

The development of the Internet and digital technologies has led to changes in every area of human life. In principle, information and communication technologies (ICT) have made information and knowledge available to the vast majority of people and organizations, thus shaping today’s digital and interconnected society (Castells, 2010, 2015). With wireless Internet access becoming omnipresent and the increasing number of smartphones, the digital transformation – seen through the use of mobile technologies that enable general connectivity – has transformational implications for people and companies adapting to the emerging digital world (Nambisan et al., 2019). In addition, daily use of smartphones, wearables, and similar mobile devices connected over the Internet has made them more than just communication devices, but rather everyday life tools. In parallel, many companies have embarked on a journey of digitalization, developing services enabled by ICT and leveraging mobile technologies in order to establish new business activities or improve and adapt existing ones (OECD, 2019).

Moreover, the digital agenda that aims to provide digital opportunities for people and businesses is one of seven pillars of the Europe 2020 Strategy set by the European Commission (2015). Its purpose is to foster innovation, economic growth and progress through products and services enabled by the ICT. Some of the aspects through which it has planned to achieve set goals are a single digital market, online security and interoperability, and trust. All these aspects are extremely important for national and international retailers operating in the European Union, and none of them have left retailers unaffected. In fact, their ongoing digital transformation has brought several significant changes to the way retailers operate (Hagberg et al., 2017). These changes range from creating value for digitally savvy consumers to the way retailers address their business relationships and organize their physical stores, enhancing customer experience and improving their businesses in the process. Subsequently, one attempt to address the changing environment and adapt businesses has been observed through the use of mobile technologies
for commerce (e.g. enabling shopping and payments through a mobile device), and their integration with online and physical stores (Brynjolfsson et al., 2013; Verhoef et al., 2015). Such integration activities and strategies that plan to leverage the synergetic management of the numerous channels and customer touchpoints has been described as omni-channel retailing (Rigby, 2011; Verhoef et al., 2015).

Digitalization has transformed the nature of interactions between consumers and businesses (Hagberg et al., 2016; Pousttchi and Dehnert, 2018). One of the most relevant retailer-consumer interactions throughout the omni-channel customer journey is the moment of purchase and payment (Lemon and Verhoef, 2016). This interaction is not only important from the point of exchange of economic value, but is also highly relevant in providing a unique and frictionless customer experience, one that relies on digital and mobile technologies and is characteristic of omni-channel retailing. Moreover, the replacement of cash with cards, and more recently with mobile payments, has been referred to as one of the important aspects of retail digitalization (Hagberg et al., 2016). However, due to the significant number of new digital and mobile payment solutions, increased competitiveness and a lack of coordination in the payment system, the realization of benefits for customers, retailers, payment providers and other relevant actors has been brought into question (Arvidsson, 2014). Therefore, acknowledging the payment aspect as a major element of each retailer-consumer interaction, and payment providers as significant actors in the retailer’s business environment, it is important to consider the role and effect of new payment services and offers created jointly with retailers on retail digital transformation.

Furthermore, this new way of conducting and organizing business has unlocked many opportunities for retailers, but has also created many challenges and increased the complexity of retailers’ business processes (Picot-Coupey et al., 2016; Yrjölä et al., 2018b). In particular, these challenges refer to the heterogeneity of shopper behaviours and the need to optimize operations to cater to such behaviours and create seamless customer experiences across different channels (Lemon and Verhoef, 2016; Souiden et al., 2019). In addition, an increasing number of touchpoints, i.e. episodes of direct or indirect contact with a brand or a retailer, creates difficulties for
retailers (Baxendale et al., 2015) and increases the importance of appropriate management practices in the use and integration of digital and mobile technologies into both online and offline operations (Chou et al., 2016).

Overall, the described ongoing process of retail digitalization, under the proliferation and usage of mobile technologies, makes the phenomenon of omni-channel retailing interesting but challenging for many actors who encounter it. Problems such as the growing variety and scope of retail channels and touchpoints, and their integration and management in order to provide a seamless experience across channels that matches the heterogeneous behaviour of contemporary consumers, have emerged recently. Thus, understanding how digital technologies impact on online and offline retailer-consumer interactions, as well as their consequences for retailers’ business organizations, partnerships and operations, is the “key for the future of retailing” (Grewal et al., 2017a).

1.2. Research background

Retail practices are shifting from traditional in-store transactions to multifaceted ones that involve many interaction points between retailers and consumers (Souiden et al., 2019). These new practices, which follow digital transformation trends in pursuit of omni-channel strategies, are the cornerstone of organizational changes in retailers’ businesses and retail management in general. However, retailers face challenges in relation to the multitude of available retail channels and touchpoints being used by consumers in order to shop and interact with retailers. On one hand, the scope and variety of channels is increasing, while on the other, the integration of channels is necessary in order to offer a seamless customer experience as part of the omni-channel strategy (Baxendale et al., 2015; Picot-Coupey et al., 2016; Verhoef et al., 2015).

To address the various challenges presented by these changes, in particular heterogeneous consumer shopping behaviour connected to the digitalization process, retailers should move away from previous business logics built around siloed nature of channels (Brynjolfsson et al., 2013) and allow their business models (BMs) to evolve (Grewal et al., 2017b). In other words, they
should be ready for a change in the value mechanisms and/or the architecture of key elements that constitute their BM (cf. Teece, 2010). This process is often referred to as BM innovation (Foss and Saebi, 2017) and differs from the established models of product/service and process innovations (Zott et al., 2011). In addition, in a retailing context, the process of BM innovation (BMI) is considered to be broader than simply addressing innovations in particular aspects or formats of retailing, thus involving core business logic changes (Cao et al., 2018).

Transition to omni-channel retailing, therefore, requires changes that span multiple BM value mechanisms. Looking at the general discussions on BMs, there are four value dimensions at the heart of a BM (Foss and Saebi, 2017; Johnson et al., 2008; Teece, 2010). Two of these have been the focus of current academic debates on BMs in retail – value creation and value appropriation (e.g. Sorescu et al., 2011). The other two – value proposition (e.g. Yrjölä et al., 2018a) and value delivery (e.g. Cao et al., 2018) – have only recently been recognized and discussed in relation to retailing. In this thesis all four value dimensions are considered, as they are all deemed to be important and relevant for the studied phenomenon of the emerging transition to omni-channel retailing.

Although the existing literature has mostly taken a static BM approach (Foss and Saebi, 2018; Wirtz et al., 2016), it only provides a limited understanding – or a snapshot – of the business logic, neglecting the elements of change and dynamics which are crucial in the studied context. Moreover, several studies have found that BMI is an important dynamic vehicle for noting organizational transformation and renewal (e.g. Demil and Lecocq, 2010; Sosna et al., 2010). A BM perspective that assumes the possibility of adaptation and innovation of the BMs of retailers and their partners is essential for the work carried out within this thesis. It is in line with this assumption, which takes into account environmental antecedents (e.g. consumer behaviour, the proliferation of mobile technologies) and the positive impact that BMI has on the performance of firms (Spieth et al., 2014), that the importance of further research into the processes and outcomes of BMIs is emphasized (Foss and Saebi, 2017).
Rapid advances in ICT that facilitated new technology-mediated interactions between actors in the interconnected retail context (Grewal et al., 2017b) have also led various companies to change the way they “do business”. A greater number of retail channels, different customer touchpoints and inter-organizational interactions have contributed to the changed notions of value mechanisms that determine BMs and value flow in different networks of actors. Moreover, Fjeldstad and Snow (2018) suggested that firms need to reconsider and modify their BM design elements and their alignment when environmental threats and opportunities dictate that the organizational logic of doing business must be changed. This reasoning is in line with the current state of retailing, and BM is therefore an important lens to use in order to consider the way companies organize their activities and conduct their business in relation to different actors in the retail ecosystem (Zott and Amit, 2009).

There is a lack of studies on the dynamics of BMs, and the predominant view of a BM has a focus on a single firm’s value architecture which limits the analysis of connected businesses in the described retail environment (cf. Bankvall et al., 2017). Although some authors have explored networked forms of value creation connected to a systemic perspective on how to do business, the concept of BM has been considered as the logic of the firm (e.g. Casadesus-Masanell and Ricart, 2010). Admittedly, the BMs are referred to as “boundary spanning” in terms of relating a company’s activities within the firm’s boundaries to those found in the external environment (Spieth et al., 2014; Zott et al., 2011; Zott and Amit, 2010), but this is different to a more open minded attitude towards different levels of BM analysis (Mason and Spring, 2011). Therefore, this limitation represents an important aspect of a BM concept, in terms of its delimited view of a firm’s value architecture, which thus needs to be addressed, especially in the increasingly networked world of people and businesses where BMI seeks to align design elements of firms’ BMs within the same environment (Fjeldstad and Snow, 2018).

To conclude, retailers are engaging in the process of transitioning to omni-channel retailing where they face different challenges pertaining to their BM design (Grewal et al., 2017b), particularly in connection with the management and integration of increasingly complex and varied retailer-consumer
interfaces. Although some authors apply a BM perspective in the retail setting (e.g. Cao, 2014; Sorescu et al., 2011), the dynamics of BMs is still insufficently addressed in scholarly discussions (Foss and Saebi, 2018). In addition, persistence in neglecting the interconnectedness of actors in the increasingly networked business environment represents an additional aspect of BM change to be considered. Therefore, the presented dynamic and network BM perspectives offer suitable approaches for studying the transition to omni-channel retailing and are therefore adopted in an effort to further our understanding of the presented phenomenon.

1.3. Research aim and question

The ongoing development of digital technologies has had a strong influence on businesses, which have found themselves in a complex and dynamic environment and in a need to change and adapt rapidly (De Bruijn and Ten Heuvelhof, 2018). In such an environment, where retailers face changing consumer behaviour, increasing variety and scope of retail channels, and a need to create partnerships, one of the strategies that retailers have opted for as part of their digitalization has been to engage in the pursuit of omni-channel retailing models. However, such a process requires rethinking the way they do business, and is thus not without challenges for the core business logic, i.e. a retailer’s business model (Grewal et al., 2017a; Hagberg et al., 2016).

Therefore, the aim of this thesis is to explore the emerging transition to omni-channel retailing. To do so, a business model perspective is employed. In other words, the emerging pursuit of an omni-channel model is seen as a BMI that happens within a complex retailing ecosystem enriched by information and communication technologies and characterised by the interdependence of various actors therein. In order to achieve the research aim, this thesis poses the following overarching research question:

*How can a BM perspective explain a retailer’s transition to an omni-channel model?*
In order to answer the research question and identify different aspects of the emerging transition to an omni-channel retailing model, seen as a BMI, the thesis employs two perspectives related to the retailer’s BM. The first is its dynamics, i.e. the process of BMI. In doing so, this thesis intends to pinpoint key aspects of BMI, as well as related activities of an organization engaged in the pursuit of reaching an omni-channel retailing model, via the use of mobile commerce. The second perspective involves the network perspective, assuming the interconnectedness of a firm’s BM with other firms’ BMs in a network of actors. The ambition is to consider the co-evolution of different firms’ BMs that join with retailers in providing a seamless customer experience and customer journey, as part of the omni-channel retailing model. By addressing the BMI process in omni-channel retailing, a digitally-infused interconnected context, this thesis intends to contribute to both retail management and business model literatures.

1.4. Outline of the thesis

The thesis is composed of the cover essay and four appended papers. The structure of the thesis is outlined in the Figure 1.

The cover essay consists of eight chapters. Chapter 1 introduces the empirical setting and presents the research problem and question. This introductory chapter is followed by a description of the phenomenon of retail digitalization, which has occurred amid a proliferation of digital technologies and changes in consumers’ behaviour. This chapter describes the empirical context of this study. Chapter 3 addresses the theoretical underpinnings used to study the phenomenon of omni-channel retailing. Chapter 4 provides an overview of the research design of the thesis, including the data collection process and units of analysis. Chapter 5 offers a short summary of the appended papers and their individual contributions to the thesis, and Chapter 6 provides a synthesis of these contributions and discusses the findings. Finally, Chapter 7 discusses the implications of the thesis’ findings for research and practitioners, while Chapter 8 provides brief conclusions, limitations and suggestions for future research.
Figure 1. Structure of the thesis
2. Retail digitalization

Retail digitalization, as a digital transformation process, is not a new phenomenon for retailers. It has been an important part of changes to retailing business since the 1970s: barcodes, electronic payment systems, data acquired at the point of sale, etc. (Hagberg et al., 2016). The adoption of most of these, like barcodes, had nothing to do with consumers. They were placed on products to store specific information, and to help with supply chain management. Today, the digitalization of retailing business has as much to do with end-consumers as it does with retailers (Verhoef et al., 2015). These same barcodes can now be used by consumers, for example to scan and search online for extra information they need, or to select a product and pay via a mobile via their preferred online means of payment. However, even this process of consumer digitalization is not an entirely new phenomenon.

Consumers have undertaken their own digitalization journeys ever since personal digital devices (e.g. radio and TV sets) first entered their homes. They have equipped themselves with personal computers and learnt how to use the full potential of the Internet, obtained credit cards and used them online and offline, and started up their own small online businesses and developed new apps. However, since both retailers and consumers are simultaneously experiencing digitalization, the process now involves an interaction between retailers and consumers.

Therefore, there is an emerging digital retail logic that leads to adjustments in retailing concepts and calls for further research within the topic. For example, there is a need to understand the emergence of new retailing channels, e.g. mobile and social channels (Yumurtacı Hüseyinoğlu et al., 2017), and the integration with traditional channels (Verhoef et al., 2015), as well as the consequences for the retailer’s BM and the added value it creates for digital consumers (Rosengren et al., 2018). For example, it can enhance their experience and support their use of mobile payments in their daily shopping (Taylor, 2016). Retail companies can also benefit from digitalization opportunities and ultimately create the right conditions for sustainable growth and profitability (Hagberg et al., 2017).
2.1. Consumer and the smartphone in a shopping process

Increased use of digital devices across all daily routines, including shopping, has become an evident phenomenon (Rosengren et al., 2018). However, it is important to differentiate between smartphones (that run on operating systems, are wirelessly connected to the Internet and support mobile apps) and other mobile phones and wearable digital devices that have limited uses in the shopping process. Smartphones, and their usage and integration into the shopping process by consumers, have been reported to affect in-store shopping activities and to encourage the reconfiguration of physical retail spaces by retailers (Fuentes et al., 2017). This is why significant attention should be paid to smartphones, due to their observed influence on the way people shop and interact with retailers (Hagberg et al., 2016).

For example, consumers can read about brands and obtain information before stepping into a physical store. They can read additional information once they are in store or share pictures of products they want to buy through social media, choose appropriate combinations, compare prices online, or perform purchases in store with mobile payments. Therefore, smartphones are not only practical artefacts to be used in a certain way, but are rather active devices that shape the way consumers do shopping and the way retailers should organize consumers’ journeys in this respect.

Smartphones also indirectly influence established activities performed by retailers. Traditionally, sales assistants would assist consumers within physical stores, but due to consumers using their smartphones to browse for information or make social calls, the need for assistants, or their role, can be questioned. The growing number of smartphones that consumers bring to stores also drives the number of digital devices placed in a store by retailers (Pantano and Timmermans, 2014). Therefore, as a result of the digitalization of consumers and the new role smartphones play in their lives, there are two parallel processes – the transformation of retailers and the digitalization of in-store shopping (Fuentes et al., 2017).

In addition, Bäckström & Johansson (2017) show that retailers face challenges when faced with the new, increasingly sophisticated demands of consumers.
They argue for further research into channel integration and the consequences of using digital devices within shopping processes, and to explore new store concepts where innovative ways of using traditional physical store attributes and digital technology elements are employed.

2.2. Omni-channel retailing

Under the digitalization process, traditional retailing practices are undergoing substantial changes and new ones are being established. One way forward for the retail industry that has been highlighted by both practitioners and academics is the notion of omni-channel retailing.

As a Latin prefix, “omni-” stands for all, and in combination with “channel”, in the retail context, it refers to a state in which customers can shop across all or multiple channels, anytime and anywhere, seamlessly. The use of the omni-channel concept first appeared in 2010 (Beck and Rygl, 2015), while many authors still use similar concepts, such as multi-channel retailing. Beck and Rygl (2015) showed that the prefix “multi-” is often used with channels that are not interconnected. Therefore, multi-channel retailing is seen as a set of activities related to selling goods and services to consumers across more than one separately functioning channel (Zhang et al., 2010). In addition, some authors use an integration continuum to refer to different levels of channel integration (e.g. Frasquet and Miquel, 2017), with multi- and omni-channel retailing representing two poles.

It is obvious that a degree of integration of channels is an important characteristic that differentiates omni-channel retailing from others. Another differentiating characteristic is that the multi-channel focus is on the coordination of different channels, while the omni-channel focus is on the creation of synergies between different channels and touchpoints (Juaneda-Ayensa et al., 2016; Piotrowicz and Cuthbertson, 2014; Verhoef et al., 2015). High levels of integration and synergy are the key to unlocking the seamless shopping experience, which is the main proposed value of the omni-channel model. Particularities of the two ends of the continuum (multi- and omni-channel retailing) are presented in Table 1.
Table 1. Multi- vs. omni-channel retail approaches

<table>
<thead>
<tr>
<th></th>
<th>Multi-channel retailing</th>
<th>Omni-channel retailing</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Concept</strong></td>
<td>Division between channels</td>
<td>Integration of all channels</td>
</tr>
<tr>
<td><strong>Retail channel scope</strong></td>
<td>Store, website and mobile channel</td>
<td>Store, website, mobile channel, social media and other customer touchpoints</td>
</tr>
<tr>
<td><strong>Objectives</strong></td>
<td>Channel objectives (sales per channel, experience per channel)</td>
<td>All channels work together to offer a holistic customer experience</td>
</tr>
<tr>
<td><strong>Channel management</strong></td>
<td>Per channel Management of channels geared towards channel coordination and optimizing the experience within each one</td>
<td>Across channels Synergetic management of the channels and customer touchpoints geared toward optimizing the holistic experience</td>
</tr>
<tr>
<td><strong>Customers</strong></td>
<td>Use of channels in parallel</td>
<td>Use of all channels simultaneously</td>
</tr>
<tr>
<td><strong>Retailers</strong></td>
<td>No possibility of controlling the integration of all channels</td>
<td>Control full integration of all channels</td>
</tr>
<tr>
<td><strong>Sales assistants</strong></td>
<td>Do not adapt selling behaviour</td>
<td>Adapt selling behaviour depending on each customer’s needs and knowledge of the product</td>
</tr>
</tbody>
</table>

Based on Beck and Rygl (2015); Juaneda-Ayensa et al. (2016); Piotrowicz and Cuthbertson (2014); Verhoef et al. (2015)

Due to the importance of channel integration, the very notion of channels in omni-channel retailing has ignited deep discussions. Previously, while referring to multi-channel retailing, Neslin et al. (2006, p.96) referred to a channel as “a customer contact point, or a medium through which the firm and the customer interact”. In recent years, and in relation to omni-channel retailing where increased use of mobile devices and social networks have blurred the lines between traditional physical and online channels (Piotrowicz and Cuthbertson, 2014), the notion of touchpoints was proposed. That is, a broader scope of interaction was introduced since the customer touchpoint represents an episode of direct or indirect contact with a firm (e.g. retailer).
(Baxendale et al., 2015; Verhoef et al., 2015). This means that touchpoints also include “word of mouth” as a way to exchange information about a brand among consumers (Verhoef et al., 2015). In other words, the scope of channels is now broader and includes not only two-way interactions (e.g. Neslin et al., 2006) but one-way interactions among retailers and customers, and interactions between customers, too (e.g. Juaneda-Ayensa et al., 2016).

In this thesis, the notion of channel is tied to the medium that facilitates the interaction between the retailer and the consumer, namely the physical channel (via physical retail space), the online channel (via a fixed digital device, e.g. a personal computer) and the mobile channel (via a mobile device, usually a smartphone). The first channel usually reflects traditional commerce, the second has been referred to as electronic commerce (e-commerce), and mobile commerce (m-commerce) takes place within a mobile channel. However, acknowledging the growing number of touchpoints, such as social media, and developing discussions in retailing literature on the topic makes it clear that touchpoints are viewed as important interaction points between different actors. Here, they are not considered as separate entities, but rather as belonging to one of the previously mentioned channels.

The management of channels in an omni-channel retail approach is defined by Verhoef et al. (2015, p.176) as “the synergetic management of the numerous available channels and customer touchpoints, in such a way that the customer experience across channels and the performance over channels is optimized”. This customer experience is conceptualized by Lemon and Verhoef (2016) as the journey of the customer through an entire purchasing cycle (i.e. pre-purchase, purchase and post-purchase stages). The first stage relates to the exchange of information (e.g. advertising, word of mouth, social media posts) that can happen between firms and customers, or between customers themselves. Second, an economic exchange, i.e. a transaction, occurs via the purchase of a product or a service, which commonly takes place between a firm and a consumer. Finally comes the delivery, or the exchange of the promised value, which typically includes the retailer’s partners, as well as the consumer.
On this customer journey, consumers expect consistent, uniform and integrated service regardless of the channel (McColl-Kennedy et al., 2015). Therefore, the synergetic management of channels in an omni-channel model is supposed to enable just that – seamless movement back and forth across all channels and touchpoints along a single customer journey. In other words, this movement in omni-channel retailing replaces the mere switching between the channels (a characteristic of a multi-channel approach) and represents a potential customer journey within one unique medium of interaction.

2.3. Leveraging the advantages of mobile commerce

The development of information systems enabled difficulties in collecting and consolidating information from different retail stores to be overcome and sophisticated inventory systems to be put in place (Levy et al., 2019). It allowed large retail firms to thrive, and paved the way for new e-commerce businesses. Ever since the dot-com era and the emergence of e-commerce, there has been a significant shift in how retailing business is conducted. Pauwels et al. (2011) reflect that websites that acted as informational mediums appeared, also challenging how tasks and activities are performed within the retail channels (Burt and Sparks, 2003). A similar shift is seen with the introduction of m-commerce (Ngai and Gunasekaran, 2007), only now with different opportunities and benefits unlocked for different actors (e.g. consumers, retailers, payment providers). This represents unprecedented flexibility and convenience for consumers, and new opportunities for companies to interact with customers, enhance their collaboration with partners and execute business transactions (Head and Yu-Zen Li, 2009). Furthermore, Clarke (2001, p.41) claims that m-commerce is an opportunity for e-commerce to “expand beyond the traditional limitations of the fixed-line personal computer”. One way to do so is to leverage the essential features of m-commerce (Mahatanankoon et al., 2005). These are:

1. Ubiquity and convenience: Enabling shopping at any physical location at any time, i.e. having continual access to commerce. This would mean reducing waiting time in a physical retail space and shopping wherever one is located (Balasubraman et al., 2002; Chen and Nath, 2004).
2. Localization: Offering location-based marketing and services, e.g. coupons, discounting and emergency services (Åkesson, 2007). This type of offering depending on consumers’ geographical position was not possible with wired e-commerce. As Goldfarb (2013, p.62) said, “the Internet killed distance, mobile phones brought it back”.

3. Personalization: Providing targeted marketing and relevant offers. Since mobile devices are primarily used by a single person, data mining can be used to offer personalized services (Eastin et al., 2016).

Even though m-commerce was initially referred to as a subcategory of e-commerce (Kreyer et al., 2003; Ngai and Gunasekaran, 2007), it has recently been reported to be on the rise and an epicentre of the ongoing digitalization process (Pousttchi et al., 2015). Furthermore, with the spread of smartphones and wireless connections, it is becoming clear that m-commerce can potentially have a greater impact on retail operations and consumer shopping experience than e-commerce previously had, enabling faster and broader availability of information, shopping regardless of place and time, and more relevant promotion and offers (Grewal et al., 2017a; Hagberg et al., 2016; Head and Yu-Zen Li, 2009).

Finally, researchers have conceptualized m-commerce to encompass various activities (Hew, 2017). Some suggest that it refers to all business activities conducted via wireless telecommunication networks (e.g. Zhang et al., 2012), while others limit its scope to a monetary exchange through the mobile Internet (e.g. Wu and Wang, 2005). In this thesis, conducting commerce via a wireless device is referred to as m-commerce (Ngai and Gunasekaran, 2007) and is believed to have two operation modes: the information delivery mode and the transaction mode (Chong et al., 2012; Mahatanankoon et al., 2005). While the former refers to information sharing regarding the offer via a mobile channel (which can be classified as the pre-purchase stage of a customer journey), the latter refers to mobile payments or the purchasing part of the journey. In other words, m-commerce assumes the mobility of devices and their users (retailers or consumers) in the process of enabling, supporting or conducting any of the two operation modes, i.e. the information delivery mode and the transaction mode (Pousttchi et al., 2015).
2.4. Mobile payments

While information delivery may be managed solely by retailers, the provision of payments is almost impossible without payment service providers and the wider industry behind it. Therefore, the transactional aspect of m-commerce, i.e. mobile payment (m-payment), becomes increasingly important when the interconnectedness of actors in the networked environment and the aim to enable a seamless customer experience across the customer journey are taken into account.

Keeping in mind recent developments of the phenomenon, several definitions of m-payments are available in the literature. One of the earlier definitions is that mobile payments are any payment where a mobile device with a connection (e.g. mobile phone, wireless tablet, wearable device) is used to initiate, authorize and confirm an exchange of financial value in return for goods and services (Au and Kauffman, 2008). For example, whenever a flight ticket or a mobile app is bought using a smartphone, or a phone is used to scan a code in a physical store to buy a cup of coffee, or a text message is sent to buy a bus ticket, a mobile payment is performed. These situations are examples of the ubiquity and convenience that are particular to m-commerce, as well as the shopping situations in which consumers might find themselves in an omni-channel environment. Thus, they are also the starting point for one of the retailing challenges of creating and managing an omni-channel experience, especially due to an increasing number of different m-payment services (e.g. Swish, Klarna).

In a categorization of m-payments, Slade et al. (2013) distinguish between remote and proximity m-payments. Remote m-payments are used for online digital content purchases, i.e. for shopping “over the air”. Examples include early premium rate text messages and mobile payment applications (e.g. mobile wallets). Proximity m-payments, on the other hand, have enabled consumers to perform m-payments in various proximity scenarios. For instance, plug-in card terminals are an example of a mobile payment where the retailer has a mobile device and a consumer uses his or her own card or phone to make a payment (e.g. iZettle). There are also consumer smartphone apps that use near field communication technology to perform payments in a
physical retail space. However, these two categories are now converging – especially in an omni-channel context. For example, one can be in a physical store but proceed with a purchase via a remote payment in an online store. An example of a service that works in both situations is Apple Pay.

Building on these vast options for how to use m-payments in the shopping process and the growing literature suggesting the beneficial effects of m-payments, it can be inferred that m-payments present significant opportunities to advance consumers’ shopping experiences and streamline retailers’ processes (Taylor, 2016). With these various use cases and configurations of different solutions, m-payments have attracted the attention of many businesses in the payment market and state initiatives but have not been widely accepted by retailers (Apanasevic, 2018). Typically, m-payment providers are mobile device manufacturers, over-the-top companies, financial institutions (banks, card issuers), service providers, mobile network operators and even sometimes retailers themselves (Arvidsson, 2019; Karnouskos and Fokus, 2004).

Retailer adoption of m-payment services, which would support their omni-channel strategy, is very much dependent on the benefits of these services and their interoperability with an existing payment infrastructure (Kazan and Damsgaard, 2013). These benefits need to be greater than just being a means of payment: they also need to leverage various advantages of m-commerce (Kreyer et al., 2002; Mennecke and Strader, 2003). For example, in-app promotional offers can be better optimized by analysing customers’ shopping preferences. Therefore, the creation of added value on top of providing means of payment for both retailers and consumers (as two customer groups of m-payment providers) is an important part of a service provider’s business.

These two customer groups – consumers and retailers – are depicted within the user (lower) level in Figure 2, along with the m-payment service provider (above). The proliferation of m-payments and thus the success of m-commerce are dependent on both retailers and consumers adopting m-payments. Therefore, one way to see an m-payment provider’s business is as a multi-sided platform, i.e. a way of organizing that fosters network effects.
between the service’s multiple customer groups (Gawer and Cusumano, 2015; Hagiu and Wright, 2015). In other words, the more consumers and retailers adopt an m-payments platform, the more the platform will grow and the more it will become valuable to the platform provider and to each of the groups.

![Diagram showing two customer groups of an m-payment platform](image)

**Figure 2. Two customer groups of an m-payment platform**

In essence, the adoption of m-payments and the implementation of m-commerce by retailers are important aspects for both the payment industry and the retail industry. On one side, they enable payment providers and the financial sector to grow and succeed, and on the other, they enable retailers and their supply chain partners to pursue omni-channel strategies. The utilization of a mobile channel throughout the customer journey has become a critical business opportunity, and payment providers play a major role. Similarly, retailers occupy an important position in the platform and as such need to develop business relationships with m-payment providers that are in line with their strategies. This is why a business relationship (between the m-payment provider and the retailer) and its evolution are essential for the creation of new value for all actors.
2.5. Summary of the chapter

In this chapter, the process of digital transformation in the retail sector is introduced by elaborating on changing consumers behaviours and emerging new retail practices developed by retailers and their partners (Grewal et al., 2017a; Hagberg et al., 2016). Furthermore, mobile commerce is presented as part of a newly identified mobile retail channel, with three particularities that enable retailers to pursue new opportunities: ubiquity and convenience, localization, and personalization. These three features of mobile commerce have begun to change customer shopping journeys, from pre-purchase, to purchase, and onwards to the post-purchase stage, thus encouraging retailers to adapt to the changing business environment. Hence, omni-channel retailing is presented as a destination for many retailers that aim to achieve integration and synergetic management of various identified retail channels, in turn facilitating the seamless movement of consumers across all channels and touchpoints along the same customer journey (Verhoef et al., 2015). In other words, this replaces a multi-channel approach where consumers are expected to switch between the channels, instead introducing a customer experience characterized by one medium of interaction between consumers and retailers. Finally, this process of transitioning to omni-channel retailing presents struggles and challenges for retailers (Hosseini et al., 2018; Piotrowicz and Cuthbertson, 2014). An additional aspect to be considered is the collaboration with other business actors that may assist with their services in providing a seamless shopping experience. One example is that of mobile payment providers and their services as a transactional part of the new mobile channel (Taylor, 2016).
3. Theoretical outline

3.1. The starting point for business models

The first notions of a BM date back to Drucker’s (1954) discussion on what a business is and how it operates. Fjeldstad and Snow (2018) claim that most of today’s discussions on the concept of a BM relate to the original ideas from the 1950s. In addition, they highlight Forrester’s (1958) discourse as one of the first to address firms’ adaptation activities in line with the changing environment by modifying BM elements, i.e. through the dynamics of a BM. Further academic discussions came with the information technology advances of the late 1990s. New technology shifts in terms of using the Internet to conduct business led academics to consider the concept of a BM as a logic for value creation in e-businesses (e.g. Amit and Zott, 2001). Thereafter, Wirtz et al. (2016) claimed that the concept received significant attention from strategic management and entrepreneurship as well as technology and innovation management scholars, which is understandable in view of Spieth et al.’s (2014, p. 242) note on BMs as complex entities that “link dimensions of organizational strategy, technological management and innovation processes of the firm”. In addition, Ritter and Lettl (2018) saw the BM concept as a membrane between different fields, where the dynamics seemed to be an inherent characteristic, which Groeger et al. (2019) use to point to the concept’s small footing in evolutionary economics.

Over the years, the concept of a BM has not received a unique understanding, but has rather developed in silos (Massa et al., 2017; Wirtz et al., 2016; Zott et al., 2011). In one of the latest literature reviews on BMs, Massa et al. (2017) – in addition to pointing out different interpretations of the meaning and function of a BM – also discuss the relationship between strategy and BM. To some extent, authors tend to agree that BM represents the implementation of a firm’s business strategy (e.g. Casadesus-Masanell and Ricart, 2010; Dahan et al., 2010), as well as a way to bridge strategic planning and operational activities (e.g. Nielsen and Lund, 2013; Shafer et al., 2005). In a sense, the strategy is what drives the design of a BM (Hedman and Kalling, 2003; Teece, 2018), which then provides a way for a strategy to be inscribed in firms’
processes and structures (Priem et al., 2018). For example, an omni-channel strategic direction based on environmental changes from other actors in the network inspires the retailer’s BM layout and adaptation, and therefore the activities and organization of the business itself.

Finally, the BM and the process of BM innovation that is studied in this thesis is considered as part of the general discussions on strategic innovation management. In particular, independent strategy formulation is considered to make very little sense (Baraldi et al., 2007; Mason and Spring, 2011; Tantalo and Priem, 2016) in terms of “no business is an island” (Håkansson and Snehota, 1989). Thus, strategy formulation and the related BM changes are seen as a process that is interactive, evolutionary and responsive to the environment (Hacklin et al., 2018; Håkansson and Ford, 2002).

3.2. Conceptualizing a business model

Different interpretations of the term BM exist in the academic literature (Klang et al., 2014; Wirtz et al., 2016; Zott et al., 2011). Recently, Massa et al. (2017) have categorized the major interpretations into three groups: BMs as attributes of real firms, as cognitive/linguistic schemas, and as formal conceptual representations of how business functions. Each of these explains a conceptually distinct role of a BM. The first points to how firms do business. The second aims to explain how the way a firm does business is interpreted by managers, and the third explains how the BM is formally conceptualized (e.g. via a symbolic, mathematical or a graphical depiction).

Even though the discourse has developed in silos, as mentioned previously, the prevailing conceptualization refers to Teece’s (2010) articulation of a BM as an architecture of activities underlying the firm’s creation, delivery and appropriation of value (Foss and Saebi, 2017, 2018). In addition to these three value mechanisms, as Teece originally referred to them, the value proposition has also found its place as an important dimension of the BM concept (Chesbrough and Rosenbloom, 2002; Ghezzi et al., 2015; Osterwalder and Pigneur, 2010; Teece, 2018). Therefore, the four dimensions of a BM (value proposition, value creation, value delivery and value appropriation) and their architecture will be considered, in line with Massa et al.’s (2017)
categorization, as a formal conceptualization of how a business is organized and functions.

The value proposition is the offering, i.e. a bundle of products and services that fulfils a user’s needs (Johnson et al., 2008; Osterwalder and Pigneur, 2010). It is the reason why consumers turn to one business instead of another (Yrjölä et al., 2018a). Value creation, delivery and appropriation are a combination of activities that support the proposed value. To distinguish between value creation and delivery, Magretta (2002) suggests that BMs are embodied in activities set on two paths: one that is associated with designing and creating, and one with distributing and delivering. Thus, value creation concerns the resources, capabilities and processes needed to develop the offer (Cortimiglia et al., 2016; Teece, 2010). It is also noted that customers increasingly engage in value co-creation process, moving the locus of value creation away from the single “producer” (Eggert et al., 2018). Value delivery explains how a business is articulated so that the value proposition reaches its consumers, and relates to different channels and the key resources and activities that an organization has in place (Osterwalder and Pigneur, 2010; Schön, 2012; Visnjic et al., 2018). In addition, Storbacka et al. (2013) argue that delivery should be seen as a collaborative effort between different actors in the value network. Finally, value appropriation is a set of activities that explains how the firm will capture value, i.e. its part of the total value, by fulfilling the delivery of the offer (Amit and Zott, 2001; Ryall, 2013). In addition, viewing these three BM dimensions (value creation, delivery and appropriation) as activities that support the value proposition is supported by the thinking of a BM as a boundary-spanning activity system (Demil et al., 2015; Zott and Amit, 2010). In this way, the BM explains which activities transcend the focal firm’s need to be performed, how, and by which actor in the value network. These actors include both partners and customers, as discussed by Demil et al. (2015).

Furthermore, Foss and Saebi (2018, p. 10) note that since BMs are “not directly observable”, researchers tend to observe constellations of activities embodied in value dimensions in order to talk about BMs (and their innovation). In this thesis, BM dimensions are seen through nine design elements of one of the most recognizable BM frameworks, the Canvas BM
(Osterwalder and Pigneur, 2010), which has been recognized as one of the most comprehensive frameworks (Teece, 2018). These nine design elements are value proposition, key activities, key resources, key partners, customer segments, customer relationships, channels, cost structure and revenue stream (Osterwalder and Pigneur, 2010). They emerged from Osterwalder et al.’s (2005, p. 17) original idea, which proposed that a BM should express the business logic of a specific firm by describing “the value a company offers to one or several segments of customers and of the architecture of the firm and its network of partners for creating, marketing, and delivering this value and relationship capital, to generate profitable and sustainable revenue streams”.

Finally, once a firm’s BM has been mapped using the Canvas BM, it can be seen as a static representation of the BM elements and their coherence, but can also be appreciated as a tool for following the change and innovation of the model itself (Demil and Lecocq, 2010; Schneider and Spieth, 2013). In this thesis we adhere to the latter, and use the framework to follow the innovation of the BM.

**Business Model Innovation — a dynamic perspective**

In the BM literature, there is little discussion of their inherent dynamics and changes due to the predominantly static view adopted in the literature (Foss and Saebi, 2018). Nevertheless, such a discussion is existent and emerging (Wirtz et al., 2016), and authors refer to it in many ways, such as BM adaptation (Saebi et al., 2017), BM development (Schneider and Spieth, 2013), BM evolution (Groeger et al., 2019) and BM reconfiguration (Massa and Tucci, 2014). Furthermore, BMs are argued to be learned over time through experimentation (Achtenhagen et al., 2013; McGrath, 2010), a process that leads to BM innovation through trial-and-error learning (Sosna et al., 2010).

Indeed, one prevailing notion that reflects a dynamic perspective has been extensively conceptualized as BM innovation (BMI). It is ostensibly claimed to be a new source of innovation (Foss and Saebi, 2017), one that complements existing dimensions of innovation, such as product/service or process innovation (Zott et al., 2011). In essence, it is a novel and more holistic form of organizational innovation that is tied up with the organization’s strategy (Gambardella and McGahan, 2010; Nardelli and
Rajala, 2018), the overarching business logic (Foss and Saebi, 2017), and is sometimes believed to be the source of competitive advantage (Morris et al., 2005; Teece, 2010). It refers to the creation or reinvention of existing business models by proposing new value propositions, designing novel value-creation systems, and building original value-capturing mechanisms (Cortimiglia et al., 2016; Foss and Saebi, 2017). This thesis uses the definition that builds on the BM that stresses the importance of changing more than one BM dimension and/or the architecture of activities that support the BM. Following Foss and Saebi (2018) and their previous works, BM innovation is seen as a novel and nontrivial change in the design elements of the BM and/or the architecture linking them.

Furthermore, Foss and Saebi (2018) point out that there is a disagreement in the literature in terms of how much a BM needs to change in order to constitute an innovation. For some researchers these changes are incremental, occurring in existing BMs, while for others they represent more radical forms of innovation where new BMs are disrupting market conditions (Foss and Saebi, 2018). The latter have been linked to radical technological innovations (Teece, 2010). In addition, some researchers acknowledge a single element change as an innovation, while others argue that the entire architecture or way of thinking needs to change (Foss and Saebi, 2017). Therefore, Foss and Saebi (2017) offer a BMI topology in terms of novelty and scope of innovation, including both incremental (i.e. new to the firm) and radical (i.e. new to the industry) innovations. In this thesis, organizations with architectural changes at firm level (i.e. they implemented changes that were not entirely new to the industry) were studied. This type of BMI was regarded by Foss and Saebi (2017) as adaptive to the changing external environment.

Moreover, BMI is often connected with technology innovations, where firms often need to acknowledge and adapt to new technology shifts (Baden-Fuller and Haefliger, 2013; Darwish, 2019). These technology shifts also change the value network as firm’s environment (Tongur and Engwall, 2014), which is claimed to be the key in a high-tech context (Groeger et al., 2019) and to enhance circularity of products and business processes (Ünal et al., 2019). To clarify, the term “value network” is commonly used in the literature and has a concrete definition in Christensen’s (1997, p. 32) work as “the context
within which a firm identifies and responds to customers’ needs, [...] reacts to competitors and strives for profit” within a socio-economic environment. Moreover, in a networked world, according to Ramirez and Mannervik (2016), it is no longer possible to define fixed positions for firms based on a set of activities along a value chain, so the focus should be on the overall value network. This argument is also important for the discussion on BMs, since a firm’s interconnectedness with other firms should be embodied in some way within the BM concept itself.

**Interconnected Business Models – a network perspective**

To some authors, the concept of a BM is closer to the firm (e.g. Casadesus-Masanell and Ricart, 2010), while others place it closer to the network (e.g. Tapscott et al., 2000) and yet others describe it as firm-centric yet boundary-spanning (e.g. Zott and Amit, 2010). For example, Zott et al. (2011) acknowledge BM as a unit of analysis that is centred on the focal firm, but that also encompasses the resources and capabilities of the firm’s partners or customers, i.e. their ideas or maybe even technologies through “open” BMs (Chesbrough, 2006). Similarly, Chesbrough and Rosenbloom (2002) consider a firm’s positioning within the value network as part of the BM concept, since failure to align the firm’s BM with the value network may result in an unwelcome dissipation of value.

Furthermore, Wirtz et al. (2016) state that some authors take a network perspective when discussing BMs and highlight the importance of value creation through a network model. Few authors have been vocal about the possibility that a concept of a “networked” BM may provide a wider conceptualization of a new networked value creation (Palo and Tähtinen, 2013). In another words, since value networks emerge around new products/services, new activities that are part of BM dimensions also emerge. Thus, a networked BM can be used as a device to help better understand business planning in a network and explain complex processes of value creation (Bankvall et al., 2017; Doganova and Eyquem-Renault, 2009). In addition, Storbacka et al. (2012) stress that value delivery should be seen as a collaborative effort of several actors while Ehret et al. (2013) argue that value proposition is a unique contribution of a business within the value network.
One particular well known business logic (Ritter and Lettl, 2018) that relies on the participation of as many distinct customer groups and partners as possible for the creation of value (Massa et al., 2017) is referred to as platform BM (Osterwalder and Pigneur, 2010). Organizing a firm as a platform implies that all customer groups are affiliated with the platform and interact through it (Hagiu and Wright, 2015). The more users in each customer group, the more valuable the network will become to each of the groups (Evans, 2003). This notion of increasing the benefits of the network based on the number of users within each of the customer groups is referred to in the platform literature as a “network effect” or “network externality” (de Reuver et al., 2018). This is important to highlight, since network externalities are the cornerstone of the platform business (Rochet and Tirole, 2003). Moreover, m-payment providers are considered to have a platform BM, where retailers are one customer group and consumers are the other (Kauffman and Ma, 2015). Therefore, it is important to highlight two types of network effects. When the number of users in a customer group (for example, retailers) increases, direct network effects emerge (Jacobides et al., 2018). This means that users in the same customer group value the fact that others (e.g. retailers) use the same platform (e.g. a particular m-payment service). However, in order for a platform to be successful, there also need to be indirect network effects. These occur when the number of users from different customer groups increases, and benefits offered through the various customer groups’ presence therefore emerge. In addition, m-payment providers offer a digital platform for their customers, which means that they aim to facilitate transactions through some means of digital technology mediation and thereby create value for all (Hedman and Henningsson, 2015; Stabell and Fjeldstad, 1998). In connection with the previous discussion of the importance of the value network, Eisenmann et al. (2006) stress that the dynamics of a platform BM is dependent on all actors in the network, and it is therefore understandable that innovation will usually involve BM innovation of all actors in the platform setting (Gawer and Cusumano, 2014).

Therefore, BM as a unit of analysis does not necessarily need to focus on a firm, but can instead be focused on a firm’s dyadic relationship or a firm’s entire value network. This is especially true since the digital economy has given firms the potential to experiment with novel forms of value creation,
which are networked in the sense that value is created in accordance with a firm and a plethora of partners, and sometimes even for distinct customer groups (Zott and Amit, 2009).

3.3. Business models in retailing

In retailing literature, several authors aspire to adapt generic interpretations of a BM in line with the particularities of the industry. One starting point was Sorescu et al.’s (2011) consideration that retailers’ BMs should focus more on the retailer-consumer interface and how to sell products or services, rather than on what is being sold. This is based on an assumption that retailers largely sell products manufactured by other actors. In any case, the how aspect in the omni-channel retailing is important since the customer experience in response to a retailer’s offering is one of the main arguments behind an omni-channel BM (Rigby, 2011). In addition, Burt et al. (2016) stress that both the actual “place” where a transaction happens (e.g. a physical retail space, or an online or mobile store) and the retail format need to be considered as aspects of a retail business model. Here, the place refers to the point of commerce and the retail format describes a combination of different elements (merchandise and services offered, pricing policy, advertising, store design and visuals, and customer service) used to organize selected retailing activities (Levy et al., 2019; Sorescu et al., 2011). While discussing BMs in relation to retail formats, Reynolds et al. (2007) point to researchers’ diverging focus on different elements when it comes to retail formats.

Sorescu et al. (2011) referred to the BM as an organizing logic of a firm that creates value for its customers and appropriates value for itself and its partners. Building on this, Cao (2014) acknowledges the need to consider value proposition and value delivery as additional BM dimensions. In line with the general BM discussions, value proposition is about the bundle of products and services that satisfies the needs and values of the customers. Particularly, value proposition explains shopper value, or why a consumer should shop at particular retailer (Cao et al., 2018). Value creation and delivery explain the activities that lead to joint creation and planned delivery by a retailer and its partners (actors in the value network). The governance aspect of these different actors, as they carry out their roles in fulfilling the customer
experience, has also been recognized by other authors (e.g. Burt et al., 2016; Sorescu et al., 2011). Similarly, value appropriation is sometimes directly and sometimes indirectly assumed to be part of the value dimensions, but is always present as a business’s profit formula. The Canvas BM is not foreign to this field of research, and has been used to map out value dimensions and track the changes in a retailer's business (e.g. Burt et al., 2016).

Finally, it is interesting to observe that the idea of organizing a business as a platform has not escaped retailers. For example, shopping malls can be conceptualized as non-digital platforms, as discussed by de Reuver et al. (2018), relying on physical retail spaces to provide a means to connect two customer groups – retailers who rent space in a mall, and consumers who come to shop (Eisenmann et al., 2006). However, these multi-sided market spaces are limited in terms of the amount of network externality they can create. In other words, the usefulness of the platform is limited since the physical space that can host users is limited. Both the number of retailers and number of visitors are constrained by the physical space. However, digital technologies have enabled new business models – digital retail platforms (e.g. Hänninen et al., 2019) – which, based on the Internet and online hosting (which has much higher capacity than a shopping mall, or a flea market), can unlock new value creation and appropriation mechanisms.

3.4. Summary of the chapter

This chapter has examined important characteristics of a BM concept and has positioned the study within a discussion on BMs within retailing research.

The chapter started by mentioning the antecedents of the growing contemporary discussion on BMs and continued by addressing two facets that are the core of this thesis: the business model innovation as a representation of a BM’s dynamic characteristic, and the interconnectedness of BMs as a perspective that can potentially shed light on the governance of different actors and activities within a value network. The former enables the study to follow the process of transitioning to omni-channel retailing throughout different BMI activities that are often connected to changing organizational designs (Foss and Saebi, 2015). For example, in the retail setting, Sosna et al.
(2010) exemplified a way of studying BMI as a trial-and-error organizational learning process. The latter allows for different interdependencies and co-adaptation activities between studied companies to be appreciated, and provides the basis for investigating how the desired consistency of the BMs of each partner firm (Adner, 2017) may allow for the provision of a seamless customer experience and customer journey as part of the omni-channel BM.

Finally, the thesis follows the third identified interpretation of how a business is organized and functions (Massa et al., 2017), and adopts a conceptualization of a BM as a value architecture of four dimensions: value proposition, value creation, value delivery and value appropriation (Teece, 2010, 2018). However, in order to address these four dimensions, the nine design elements of the Canvas BM (Osterwalder and Pigneur, 2010) are used in appended papers to map a BM of a particular studied business and then relate it to the value dimensions.
4. Research approach and methodology

This chapter addresses the methodological choices and overall research design enabling the study to answer the overarching research question. After introducing the overall research design and explicating the case study and the literature review approach, the chapter details the level and unit of analysis of the study, lists different data collection methods and provides an insight into the tools used for data analysis.

4.1. Overall research design

This PhD thesis takes the form of a compilation of papers. As such, each appended paper follows its own methodology and answers its own research question(s), while simultaneously addressing the thesis-specific research question set in Chapter 1. Therefore, Table 2 provides a summary of approaches in the appended papers, including details of the research methodologies and the theoretical perspectives taken.

A case study approach

Myers and Avison (2002) state that a case study approach is good for studies where the knowledge of practitioners needs to be captured in order to develop and/or generate new theory. Multiple case studies provide an opportunity to capture dynamics and change (Eisenhardt, 1989; Halinen and Törnroos, 2005; Yin, 2014), and a case study mixed method approach has therefore been chosen as a research strategy in all three empirical papers (i.e. Papers A, B and C). Furthermore, the use of multiple methods for data collection from multiple sources promises solid holistic descriptions of the empirical context. Details about the data collection are provided in subchapter 4.3, but what is important to highlight at this point is that textual data, interviews and visual data were used to examine the particularities of the phenomenon occurring at different “field sites” (Burrell, 2009), i.e. in different environments, such as mobile apps or physical retail stores. Rival explanations that stemmed from different views created a basis for fruitful discussions and a more complete view of the phenomenon (Poole and van de Ven, 1989).
A case study approach is generally considered appropriate when a “how” research question is posed about an emerging phenomenon (Yin, 2014), as in this thesis. In addition, the explorative character of research is in line with the identified research problem, and so the appended empirical papers are explorative in nature and provide relevant insights into the field of omni-channel retailing in general and mobile commerce in particular. With this in mind, and understanding that the research is contemporary and the empirical field was changing during the study, an “abductive” approach was chosen (Dubois and Gadde, 2014, 2002). In this way, no hypotheses were made prior to the data collection, while the initial literature review and interviews, which have yielded new information based on collected data, have served as the basis for updating the theoretical research framework and the further collection of data. Such a logic of inquiry also allowed the author to add to the development of theoretical concepts by investigating empirically new phenomenon (Meyer and Lunnay, 2013).

Moreover, a case study is commonly used in research regarding networks of businesses, due to its ability to capture the views of many sides and provide in-depth insights into the context of the researched phenomenon (Halinen and Törnroos, 2005). However, there are some limitations to this approach, which are mainly associated with the nature of studying connectedness. First of all, there is the issue of delimitating the boundaries of what commonly happens to be a complex system of interrelated companies. Then, due to the dynamic nature of networks, temporal delimitations matter. In other words, it is important to point out that the research is contemporary at the moment of observation and that when a case is “declared” there is always a relationship between history and data (Ragin, 1992).

Bearing in mind that omni-channel retailing is an empirical phenomenon that has only recently emerged, this thesis studies the organizations in the early phases of the transition to omni-channel retailing. It does so by exploring several contemporary initiatives, events and activities carried out by retailers and their key partners, mostly focusing on different aspects that would enable a transition to omni-channel retailing (Van De Ven and Poole, 2005). In Paper A, the process of change and innovation is particularly characterized by a temporal dimension (Langley et al., 2013; Poole and van de Ven, 2004).
A literature review approach

Systematic literature reviews (SLRs) have a longer history in medical sciences than in other fields of research, such as management (Tranfield et al., 2003). Furthermore, SLR as a scientific analysis method for relevant studies on a specific topic have recently become a common part of doctoral theses (e.g. Giuffrida, 2019; Karakaya, 2015; Miterev, 2017). In particular, SLRs are employed as they limit the bias by adopting a detailed and transparent procedure (Murlow, 1994; Tranfield et al., 2003). In this thesis, an SLR is used in Paper D as an information source for a theoretical discussion on BMs in an ICT context. Such a delimitation to a particular context is made since many new offers that are based on ICT are proposed, created and delivered in collaboration with different actors in a network; an aspect critical for the work in this thesis. In addition, an SLR helps to reconcile a somewhat sparse array of propositions of BM conceptualizations (cf. Ordanini et al., 2008).

The SLR included searching online bibliographic databases and a snowballing process. A full description and flow chart of the literature search and inclusion for the review may be seen in Paper D. Such a procedure, which included a snowballing process, was carried out in order to increase the comprehensiveness of the review and minimize biases against relevant articles that were not found in the online search (Santos and D’Antone, 2014). In employing such a procedure, twenty five publications were ultimately identified and were subsequently thoroughly reviewed in order to answer the research questions posed in the paper (see Table 2). The literature analysis and synthesis yielded several interesting observations regarding the concept of a BM at a network level, and in relation to other levels of analysis (firm and dyad levels). Therefore, the SLR provided this thesis with a relevant discussion on a network-oriented view of a BM that shed light on actors’ relationships that were also discussed in other appended papers. It has also provided the thesis with certain aspects identified in other emergent empirical fields that are also based on ICT development.
### Table 2. Summary of methods in the appended papers

<table>
<thead>
<tr>
<th>Topic</th>
<th>Paper A</th>
<th>Paper B</th>
<th>Paper C</th>
<th>Paper D</th>
</tr>
</thead>
<tbody>
<tr>
<td>Exploring BMI in the mobile payment ecosystem</td>
<td>Exploring omni-channel retailing strategies</td>
<td>Investigating retail BMI regarding channel digitalization processes</td>
<td>Evaluating the state of the art of research on business models at a network level</td>
<td></td>
</tr>
<tr>
<td>Level of analysis</td>
<td>Firm</td>
<td>Firm</td>
<td>Firm</td>
<td>Network</td>
</tr>
<tr>
<td>Unit of analysis</td>
<td>Platform provider’s business model</td>
<td>Retailer’s business model</td>
<td>Retailer’s business model</td>
<td>Network-level business model</td>
</tr>
<tr>
<td>Specific research approach</td>
<td>Multiple case study</td>
<td>Questionnaire &amp; mini case studies</td>
<td>Multiple case study</td>
<td>Systematic literature review</td>
</tr>
<tr>
<td>Theoretical perspective</td>
<td>Digital platform &amp; BM innovation</td>
<td>Business model</td>
<td>BM innovation</td>
<td>Network perspectives</td>
</tr>
<tr>
<td>Research questions (RQs) in the papers</td>
<td>How do m-payment providers redesign their BMs to address the growth challenge of an m-payment platform?</td>
<td>What kind of changes in the business model design elements are required in the process of transitioning to omni-channel retailing?</td>
<td>What are the possible BMI activities that can address the omni-channel retailing challenge related to the future of a physical store?</td>
<td>Q1. How do researchers refer to the concept of a business model at a network level? Q2. What are the particularities of the network-oriented view of a business model?</td>
</tr>
<tr>
<td>Considered BM aspect</td>
<td>Dynamics (primarily), interconnectedness</td>
<td>Dynamics</td>
<td>Dynamics</td>
<td>Interconnectedness</td>
</tr>
<tr>
<td>Thesis RQ</td>
<td>How can a BM perspective explain a retailer's transition to an omni-channel model?</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
4.2. Unit and level of analysis

A network is a complex structure represented by nodes and links. In the context of this thesis, the nodes are actors (e.g. retailers or payment providers) and the links connecting the nodes are referred to as business relationships (Håkansson and Ford, 2002). In other words, a network is a set of companies that are connected to each other for the purpose of doing business. Such connections have been referred to as value chains, but Normann and Ramírez (1993) suggest that it is not always possible to define fixed activities for actors along a value chain. Rather, the term “value network” is preferred as an alternative since it emphasizes the web structure of companies’ relationships as opposed to a simple linear and sequential structure. Such an arrangement is furthermore highlighted in today’s networked world (cf. Ramírez and Mannervik, 2016), where it has become critical to acknowledge a firm’s embeddedness within a value network when studying its adaptation and transformation process.

Bearing in mind the research aim to explore the emerging transition to omni-channel retailing by leveraging synergy between different retail channels, particularly the channel that relies on mobile technologies, instead of focusing on a retailer, one of the papers shifts its focus to another actor. Considering the interconnectedness of firms in the network and the importance of payment service providers in creating an omni-channel experience for consumers, the discussion switches its focus to include mobile payment providers’ BMs. Another paper takes a network level perspective in order to explore a network of BMs of companies participating in a joint value proposition e.g. omni-channel shopping. Therefore, a multi-level analysis was performed. Such an approach is also in line with the multi-perspective and multi-level approach called for by Dahlberg et al. (2015).

The unit of analysis in this thesis is a BM, as it has been previously discussed as a “new” unit of analysis (Zott et al., 2011). The focus of the thesis is on a firm-level BM, but in Paper D the discussion revolves around the network-oriented view of BMs. When studying the BMs of retailers and payment providers, the Canvas BM proposed by Osterwalder & Pigneur (2010) has been used for data collection and analysis.
4.3. Data collection and analysis

The data collection within the case study approach was focused on obtaining evidence of actions taken by retailers in their transition effort towards an omni-channel retailing model, and actions taken by m-payment providers towards growing their network of business customers (i.e. retailers). Furthermore, the data collection process included identifying multiple sources of evidence and employed different data collection methods as summarized in Table 3.

Data were collected from three primary sources: semi-structured interviews, author observations and additional methods, such as questionnaires and unstructured discussions with practitioners and experts in the field. In addition, archival data from publicly available company documents, industry analysis reports and online articles or news reporting have also been used. This mix of data collection methods helped the author to achieve a robust and holistic perspective on the researched phenomenon. The majority of data was used to produce the appended papers, but some of semi-structured interviews were used to gain a broader understanding of the studied phenomenon and the current thinking of the practitioners.

Not all the gathered data aimed at generalization, but rather at deepening our understanding of the phenomenon to extend existing theory (Eisenhardt and Graebner, 2007; Flyvbjerg, 2006; Yin, 2014). With regard to the selection of companies and interviewees, a theoretical sampling process was used (Eisenhardt, 1989). In other words, the selection was such that exemplary companies of the researched phenomenon that maximize the utility of available information and provide a means for extending existing theory were chosen (Flyvbjerg, 2006). All the companies had an international presence, but their operations were analysed in Swedish (Papers A and C) and Italian (Paper B) markets. In addition, as the objective of the study was not specific to a particular retailing industrial sector, three segments have been considered extensively (fashion, consumer electronics, and books and media) and two other segments (fast food chains and fast-moving consumer goods) have served to gain an additional understanding of the phenomenon. The choice of segments and companies was influenced by the difficulty of finding
retailers with established omni- or multi-channel strategies and that have had clear approaches to mobile commerce. Nevertheless, interviewed employees and experts in the field have always been in managing positions, or advisors, dealing with digitalization and/or business development processes within companies. Finally, bearing in mind that m-payment platform providers also represent one of the important actors in the ecosystem, Paper A specifically focuses on m-payment providers and their relationships with retailers.

Field work has also been performed, in which the author engaged in a planned data collection process through observations and participation, acting as the participant-as-observer (Easterby-Smith et al., 2015). What this means is that physical retail spaces have been visited, and online stores and mobile apps have been followed through their changes. The author sometimes engaged actively as a mystery shopper, and sometimes passively observed different elements of the store design (e.g. in-store technology, the presence of products from collaborating partners, how other shoppers interacted with products). These techniques are not new in retail research and have been shown to be beneficial for monitoring changes and collecting additional enriching data (Rudkowski et al., 2019). When it came to mystery shopping (Healy et al., 2007), the idea was to engage in the shopping experience to further understand available services, but also to study other shoppers’ behaviour in the experiential environment. The idea behind such an unobtrusive interaction technique is that by not disclosing the observation process, staff and other shoppers would not change their behaviour simply because they were being observed, which could reduce the validity of the research findings (Desai, 2002). Similarly, by using the observed businesses’ mobile apps, the author followed and reviewed changes in functionality over time. In addition, some informal communication took place in retail stores with sales staff with the aim of further understanding the phenomenon and the availability of new services, such as m-payments. Finally, in order to document these observations and interactions, field notes were taken in terms of audio notes as reflective recollections of the events and photographs as snippets of information that allowed the author to capture the peculiarities of each of the retail spaces visited (Czarniawska, 2007, 2014). The photos also enabled the author to document the changes in store layout and to convey important characteristics to readers (as in Paper C).
Table 3. Summary of data collection

<table>
<thead>
<tr>
<th>Data collection method</th>
<th>Data collected</th>
</tr>
</thead>
<tbody>
<tr>
<td>Semi-structured interviews</td>
<td>Sixteen interviews with CEOs, digital development managers, experts, and physical retail space and e-commerce managers</td>
</tr>
</tbody>
</table>
| Participant-as-observer  | The author carried out observations with little (if any) interaction with the employees or customers of the studied businesses.  
  - Field notes from physical and online store visits  
  - Audio notes as reflective recollections  
  - Photographs as snippets of information  
  - Informal communication with staff                                                                                                                                                                                                                                               |
| Additional methods       |  
  - Questionnaire answered by 13 managers  
  - Eight research-related unstructured discussions with practitioners and experts in the field  
  - Workshops, roundtable discussions and tech-fest events with representatives from retail and payment industries (approx. 70 hours)                                                                                                                                 |
| Documents and online content procurement methods |  
  - Overview presentations  
  - Annual and interim reports  
  - Press releases  
  - Industry reports and analyses  
  - Information on the companies’ websites, mobile apps and social media accounts                                                                                                                                                                                                 |

The obtained data was analysed qualitatively through within-case analysis, as well as cross-case analysis and pattern matching (Eisenhardt, 1989). First, case write-ups allowed for the particularities of each of the analysed companies to be appreciated and to generate the necessary insights into the issues under scrutiny. These were produced using the framework of analysis that was developed based on theoretical perspectives and units and levels of analysis for each of the papers (see Table 2). In Paper A, a chronological timeline of a series of key BMI activities and events was produced as a visual mapping vis-à-vis each provider’s BM changes (Langley, 1999). Additionally, Canvas BM was used (Osterwalder and Pigneur, 2010). In Paper D, a systematic
literature review was carried out and tables were constructed using the literature streams that addressed the interactions between businesses and their environments, which later helped when comparing and contrasting publications and their contributions (Miles and Huberman, 1994).

In addition, observations served as a conscious commentary on what was happening in the field, and allowed the author to probe emergent themes and design-specific questions for the future interviews. In addition, during these observations and between interviews, a partial analysis was carried out by recognizing patterns across the different sources of data. This overlap of data collection and analysis provided a head start in finding cross-case similarities and differences, and in acquiring hunches about relationships between concepts. This is particularly highlighted in Papers A and C, where the data collection process spanned a time period longer than a year.

Finally, several mechanisms were employed in order to ensure research quality and rigor. First, for the validity and robustness of results from case studies conducted within this thesis, multiple sources of information and the same operationalization of theoretical constructs used in different papers were employed in order to strengthen it (Miles and Huberman, 1994; Yin, 2014). A triangulation technique involving multiple sources of evidence (e.g. observations, archival data) was also used to ensure that the findings were not subject to bias, especially in cases where only a few interviews were conducted per analysed company. In each of the co-authored papers, alternative explanations for the findings were also considered before reaching the final explanation. This is why following the chain of evidence was important in order to eliminate “rival” explanations and to reach the final explanation and conclusions. Finally, in order to ensure reliability, the author worked to achieve both transparency and replicability (Gibbert et al., 2008). Therefore, data collection, storage and analysis protocols were put in place, i.e. data collection was preliminarily designed and analysis followed robust, well-known mechanisms, such as pattern matching. More details regarding case study notes, documents and interviews conducted are given for each of the papers in the brief summaries in Chapter 5, and in each of the appended papers. The names of the companies were also disclosed where possible.
5. Summary of the appended papers

This chapter briefly presents the summaries of the four appended papers.

5.1. Paper A

**Purpose** – The power of platform business models has grown as our economies have become increasingly digital, but how firms adapt to changes in the digital ecosystem and bring innovations to their business models still remains unclear. We therefore aim to understand the different aspects that m-payment platform providers engage with so as to change a BM built on an m-payment platform, with the intention of obtaining a critical mass of retailers and platform growth.

**Methodology** – This study adopts a case study research design, which is used extensively in research on payment services. This approach allows us to obtain field-based insights into the actions of key actors in the payment industry – m-payment providers – and also to explore processes relating to innovation of their BMs. We analyse two cases with two diverse strategies for collaboration with retailers; the first aspired to grow quickly and in an early phase, while the second opted for slower, geographically bounded growth.

**Findings** – Our study shows how m-payment platform providers meet the platform growth challenge by deploying a BM innovation process that follows different geographic approaches in regard to the choice of key partners. On several instances it has been seen that a provider needs to build a network of relationships with other actors in the ecosystem and often change its own role within it, in order to grow the platform.

**Practical implications** – Practical implications suggested in this paper could be easily implemented by other technological innovation providers in digital platform industries. Highlighting specific Canvas BM design elements within each identified overarching aspect is an effective tool that managers can use to understand which aspects of the BM should be innovated in order to overcome particular challenges and sustain platform growth.
Originality/value – We suggest that the mutual adaptation of BMs of platform-associated actors leads to improved diffusion of the platform offering, which highlights the need for researchers to revisit innovation diffusion and technology adoption theories by acknowledging the importance of the BM of the offer side.

Contribution to the thesis – The paper discusses how service providers’ BM innovation can address the challenge of platform growth and foster adoption of the platform service by business customers. Different aspects for addressing the challenge are discussed, where forming partnerships to complement the offer and to deliver the proposed value are highlighted. Analysed cases provide the basis for a way of thinking about the BMs of companies attached to the platform as inter-connected and co-evolving.

Keywords – Business model, case study, digital transformation, fintech, mobile payments, platforms
5.2. Paper B

**Purpose** – Digitalization has been identified as a driving force behind retail sector transformation. The purpose of this paper is to provide a deeper understanding of how omni-channel strategies link to the digitalization phenomenon. The study is explorative in nature and aims to expand existing knowledge by using a business model (BM) perspective.

**Methodology** – The study is based on a qualitative approach. Data collection involved a questionnaire that was answered by thirteen firms from three retail segments, i.e. fashion, consumer electronics and bookstores and media, as well as one group discussion with senior managers. The data was supplemented with information retrieved from websites, online available reports and mobile apps.

**Findings** – The findings present empirical insights into different strategic and BM approaches to omni-channel retailing and highlight examples of pioneering retailers from the Italian market. The proposed framework consolidates earlier studies and puts forward three dimensions for a successful transition to omni-channel BMs: a seamless customer experience, an integrated analytics system and an effective supply chain and logistics.

**Practical implications** – Managers can employ an overview of mobile commerce usage to manage the process of integrating channels, within their BMs, alongside the customer journey. Particular attention should be paid to the development and use of data analytics tools as one of the dimensions with a significant impact on omni-channel management.

**Originality/value** – First, this paper applies a BM perspective as a novel approach for analysing a transition to omni-channel retailing. Second, it is based on an empirical analysis of three retail segments, which provides new insights into omni-channel strategies in the retailing literature.

**Contribution to the thesis** – The paper contributes to the thesis by highlighting three dimensions that characterize the successful coordination and integration of retail channels to enable a transition to omni-channel retailing through BMI. By explicating these three dimensions for a successful
transition to omni-channel strategies, the study also shows how mobile commerce and channel integration have contributed to retailers’ organizational changes. Finally, value proposition and value delivery are also identified as two value mechanisms that need to be considered to a greater extent.

**Keywords** – Italy, business model, digitalization, mobile commerce, omni-channel, multi-channel
5.3. Paper C

**Purpose** – Traditional retail practices are under stress as retailers contemplate various ways of developing a sustainable omni-channel model. A major challenge in this endeavour corresponds to the focus and purpose of physical retail spaces. Therefore, the purpose of the paper is to explore examples of BM innovation activities pertaining to an exploration of alternative physical retail spaces in omni-channel retailing.

**Methodology** – The study is based on case study research design. The study examines three distinct examples of two fashion retailers (ASKET and H&M) and one consumer electronics firm (DUSTIN) in depth. The case selection was due to the nature of the investigated phenomenon, i.e. addressing the challenge of transitioning to omni-channel strategies by (re)designing alternative physical retail spaces – a process all three retailers were going through during the study. Materials from public data, documents and news articles were used, as well as field observations and interviews with business development managers and CEOs.

**Findings** – In this paper, an overview of BM innovation activities vis-à-vis five key innovation areas is provided. The areas that emerged during data analysis are in-store technology, the role of sales assistants, leveraging a mobile channel, data analytics and collaborations. The findings contribute to retail literature by addressing a gap in empirical evidence of transforming retail formats and offerings, and by providing a theoretical understanding of BM innovation in the retailing sector. In addition, physical retail space is put forward as an aggregation hub that connects various retailer-customer interaction points across physical and digital spaces.

**Practical implications** – These mainly involve a call to: (i) restructure departments and establish positions for managers that will guide the organization towards its omni-channel strategies; (ii) carefully plan customer interfaces across all channels and touchpoints to foster seamless and inspiring customer experience that matches customers’ needs and values; and (iii) train sales assistants in line with the omni-channel vision and the focus and purpose of a physical retail space.
**Originality/value** – The obtained results indicate the importance of a physical store for both brick and mortar and purely online retailers. The study highlights new ways of collaborating to establish physical retail spaces for an omni-channel experience, and ties them to innovations of retail BM elements and overall organizational value architecture.

**Contribution to the thesis** – The paper discusses BMI activities based on different retailing practices pertaining to an exploration of alternative physical retail spaces in line with omni-channel strategies. It does this by addressing underpinning value dimensions behind the firm’s value architecture.

**Keywords** – Business model, collaboration, customer experience, innovation, omni-channel, retailing
5.4. Paper D

**Purpose** – This study seeks to provide a review of the emergent literature in order to advance the current understanding of the business model (BM) concept in a context in which more than one actor is actively involved in the development and delivery of a joint offer based on information and communication technologies.

**Methodology** – The paper employs a systematic literature review approach. The initial search in the Web of Science and SciVerse Scopus databases, excluding publications that appeared in both databases and incomplete entries, resulted in 55 publications. After several steps of reading and checking whether the papers satisfied our research criteria, and employing an additional snowballing process, the final number of publications to be reviewed was 25. This study is therefore based on an analysis of 25 systematically selected publications published between 2000 and 2018.

**Findings** – The authors found several alternative conceptualizations of a BM at a network level, which highlighted different elements as core components. Based on these, our findings suggest that the literature has a fragmented view of what the BM concept entails at a network level, and of which actors are relevant. Conversely, there is a consensus that a single-firm view is inadequate for describing and studying joint value architectures due to its inability to consider all involved actors and their activities and resources. Therefore, a possible way forward is a network-oriented view, which represents a way of seeing a BM as a relational aggregator, i.e. a device that can help to explain the interconnectedness of different actors and related joint value architecture at a network level.

**Practical implications** – This review provides an overview of the employed conceptualizations of a BM at a network level, which can be used to inform managers about existing BM design elements and ways to think about their alignment. In addition, by establishing a link between different assumptions concerning inter-firm connectedness and the concept of a BM, the article enables managers to broaden their views and consider an alternative mindset to viewing a BM as a single-scale device.
Originality/value – The study contributes to the current understanding of a BM concept at a network level and suggests three viewpoints from which to interpret value architectures at different levels of analysis: a single-firm view, a dyadic-level view and a network-oriented view. Furthermore, the authors highlight several gaps to be studied and provide avenues for future research opportunities for scholars.

Contribution to the thesis – The paper emphasizes the network-oriented view of a BM as a complementary view to the predominantly used single-firm view. Furthermore, the analysis of the underlying assumptions in the reviewed literature showed that BM designs seen from the three different viewpoints (i.e. single-firm view, dyadic-level view and network-oriented view) co-exist and co-evolve over time. This, therefore, infers the interconnectedness of actors around a common value proposition through their firm-level BMs; a point that is argued in this thesis.

Keywords – Business model, business relationships, ecosystem, services, value dimensions, value network
6. Synthesis of the results

The aim of this thesis is to explore the emerging transition to omni-channel retailing by taking a BM perspective. This process is seen through BMI activities that help further our understanding of the process that occurs within a complex retailing ecosystem enriched by information and communication technologies, and by mobile technologies in particular. In order to address these aspirations, the chapter synthesizes different results from appended papers that together address the overarching research question.

6.1. Changing retailers’ business logic

The process of digitalization is a multi-faceted phenomenon. The particular focus in this thesis was on an ongoing effort of organizational adaptations to the emerging technological innovations and consumers’ changing behaviour with regard to the use of m-commerce. In doing so, the findings from the appended papers revealed, in line with several recent reports (Brynjolfsson et al., 2013; Grewal et al., 2017a), that retailers engage in creating an omni-channel retailing environment. This has been seen, for example, through their use of technologies in physical stores, the development of mobile apps, the adoption of mobile payments, the establishment of new pure online retailers, and greater awareness of the new digital trends and the need to embrace them, as reported in Papers B and C. Bearing in mind that these two studies have been performed in two different markets (Italy and Sweden), this thesis has suggested that, in general, retailers have similar tendencies and activities regarding the process of transitioning to omni-channel retailing, as well as associated changes to a retailer’s business logic. This involves exploring the possibilities offered by mobile technologies, namely enabling customers to shop wherever, whenever and however they want, on one hand, and offering them personalized and relevant offers and content based on their previous interactions, on the other. The (re)design of physical retail spaces has also been noted as another effort by retailers to bridge the divide between separate channels and to establish a synergetic management of numerous channels and touchpoints, thus establishing an omni-channel BM (Paper C). Similarly, payment providers have also realized the potential of integrating different retail channels, and have themselves launched some services within their own
apps which could be characterized as retailing efforts (Paper A). These attempts to transcend channel boundaries and enable consumers to use smartphones for payments in different settings, offering something that is occasionally referred to as omni-channel payments, has not been recognized by consumers to a great extent (at least not in the markets analysed in this study) and has thus remained neglected.

Nevertheless, the findings from three empirical papers (A, B and C) build a strong basis for a discussion on BMI efforts as a way to cope with emerging changes brought about by digital technologies. The effects of using mobile commerce (or the lack thereof) are reported in Paper B, where different practices across three different retailing segments are presented – fashion, consumer electronics, and books and media. Moreover, the three identified dimensions for a successful transition to an omni-channel strategy, as presented in Paper B, highlight the critical elements of BMs and extend the reasoning for BM reconfiguration that would follow omni-channel strategies and give a competitive advantage (Grewal et al., 2017b). These findings, which are valid across all retail channels, were further complemented with possible areas of innovation for the exploration of alternative physical retail spaces in Paper C. These addressed fashion and consumer electronics retailers and proposed activities that drive the dynamics of value dimensions constituting retailers’ BMs. Finally, discoveries made in relation to the BMI process in Paper A, which addressed different activities corresponding to the evolution of m-payment platform providers’ BMs, suggest that the BM innovation process approach may be helpful when addressing digital platform challenges. In addition, these discoveries highlight a strong relationship between the providers of m-payment platforms, on one side, and retailers, on the other, as a necessary condition for achieving success on both sides (Jocevski et al., 2019c).

Therefore, building on these findings, the thesis offers three specific insights into BMI activities in the transition to omni-channel retailing, which mobile digital technologies have brought to retailer’s business models (depicted in Figure 3): (i) digital technology-mediated interactions as a way to offer customers various options to interact seamlessly with the retailer, (ii) using big data to learn about customer behaviour and create relevant experiences,
content and promotions for a customer, and (iii) collaboration with different actors in the ecosystem in order to deliver a seamless customer experience.

Technology-mediated interactions enabled by digital technologies are found in both physical and online domains. In line with Hagberg et al. (2016), who propose a conceptual framework to delineate the transformation of retailer-consumer interfaces, Papers B and C suggest that BM innovations allow that transformation to happen. This means that since retailers engage in providing online and mobile experiences, as well as redesigning physical retail spaces, e.g. equipping them with different technologies, consumers are enabled to interact with a retailer through several touchpoints, starting, for example, with the shopping process in a physical retail space, and ending on a mobile device. Even pure online retailers that leverage their lack of a physical space, allowing them to offer lower prices, have enabled consumers to start the shopping process via mobile devices and finish it later on a computer (Paper C). These alterations represent examples of BMI activities that may lead to omni-channel retailing.

Integrating different channels and touchpoints is not easy, especially for traditional retailers that have operated for many years with physical stores and have only recently engaged with exploring an online and/or mobile channels (Paper B). The activities performed in order to have an integrated management of various channels and achieve an omni-channel BM are a long and complicated process. Nevertheless, these “back-end” efforts that are not seen by consumers are the cornerstone of retail digitalization and the new offerings of contemporary retailers and their partners. Furthermore, these activities embodied in a retail format, which often considers different elements, such as customer service and store design, are represented in Figure 3 as part of the value proposition dimension.

In addition, Paper C addresses alternative physical retail spaces, where the role of a physical retail space is identified not simply (or only) as a fulfilment, but rather as an experiential and inspirational retail space. The paper also shows that employee engagement represents an important managerial task that can be tied to new value-creating activities that retailers must pay attention to (see Figure 3). For example, employees are trained to use in-store
technology and to transfer this knowledge to consumers, enabling consumers to experience shopping in alternative physical retail spaces in a new and digital technology-mediated way (see Figure 3). This, along with data-driven analytics capabilities, represents one of the cornerstones of the value creation dimension and can attest to the changing BM elements.

Secondly, the vast amount of data that is generated throughout consumers’ shopping processes can be gathered using mobile technologies and analysed in order to learn about their behaviour and make data-driven decisions. Paper C emphasizes the use of big data as a driver for value creation, while Paper A discusses data analytics as a way of leveraging competitive advantage. Although the papers do not address in detail how these activities are carried out in each of the analysed companies, practices for using data analytics are suggested. Paper C suggests that data analytics may be used for internal purposes, creating personalized offers and relevant services (see Figure 3), and Paper A reveals that consumer behavioural data can be used to provide incentives for growing the business-to-business customer base of digital platforms. Furthermore, the assumption is that data analytics needs to be coordinated across all channels, and therefore, as seen in Paper B, retailers engage in developing capabilities for coordinated data analytics (see Figure 3). These development activities are seen as part of the value creation dimension, since they enable data-driven value propositions.

Finally, collaboration with different actors in the ecosystem in order to deliver a proposed seamless customer experience represents the third aspect of the BMI process faced by retailers. These partnerships can alter established retailers’ ways of managing any of the three stages of the customer journey defined by Lemon and Verhoef (2016). In the first, pre-purchase stage, collaborating with influencers may lead to greater exposure among potential consumers on social media (which was not possible before mobile technologies), or to providing inspirational events that present relevant and complementary products or services and can be seen as a source of value creation (Paper C). In the second stage, where purchasing and payment are supposed to be basically frictionless, partnering with digital payment providers, i.e. actors from the payment industry (e.g. fintechs, banks), can provide strong actor bonds that unlock access to resources and capabilities.
that are not otherwise available (Paper A). Such a partnering would constitute an engagement with different actors in order to deliver the proposed value by potentially outsourcing the operation of digital technology elements (see Figure 3). In return, by being affiliated with specific payment platforms, the retailers would unlock access to the other side of a platform’s customer network – the consumers – and thus increase their reach. Lastly, the same principle of an exchange relationship can also be established in the post-purchase stage where delivery and returns are managed by other actors within the network. In this stage, it is important that information systems are integrated and effective in the sense that they are equipped to handle real-time inventory and tracking services, since these provide added value for both retailers and consumers (Paper B). To deliver this added value, investments in digital technologies (e.g. radio frequency identification – RFID) that can increase operational effectiveness and efficiency are needed (see Figure 3).

In essence, these three aspects speak for the recently suggested usefulness and necessity of seeing the BM as a dynamic device rather than a static representation of design elements (Sosna et al., 2010). When engaging with each of these aspects, retailers make certain changes that lead to the changing value architecture and BMI. In other words, they engage in a process which intrinsically requires a perspective that allows for a constant revision and innovation of BM dimensions to be appreciated. Therefore, the suggestion of seeing the BM as a dynamic device is rather a call to move away from thinking of a BM as fixed framework, and to acknowledge its changing nature. In connection with the discussed transition to omni-channel retailing, value proposition is supported by the remaining three value dimensions: value creation, delivery and appropriation through the various activities summarized in Figure 3. These activities range from the use of in-store technologies and data gathering and analytics, to developing a digital skill set of physical store sales assistants, and the orchestration of different partnerships within the ecosystem that surrounds the process of commerce.
Figure 3. Three BMI aspects of omni-channel retailing
Finally, while offering an omni-channel experience constitutes a new value proposition to digital consumers, the delivery of this value is dependent on many actors from the retailer’s ecosystem. Different companies with their own BMs participate in this joint delivery and affect other companies and their BMs, therefore engaging in a mutual adaptation and co-evolution of the BMs of all collaborating firms. The need to combine the efforts and competences of different firms through collaboration has arisen in the digital era, and each firm should consider its value architecture and its position within the value network (Basole, 2009). One of the functions of a BM, according to Basole (2009), is to describe the firm’s position in that network. Similarly, Sorescu et al. (2011) mention the government of actors as part of the retail BM. In the same manner, the findings from the appended papers suggest that since collaborations and new organizational forms (such as digital platforms or marketplace-based physical retail spaces) bring complexity or have different rules, a different perspective of a BM is needed so as to fully grasp the innovation process of a retailer’s BM. The following subchapter thus discusses the findings from a literature review (Paper D) on a network-oriented view of a BM and from Paper A which addresses this topic to some extent.

6.2. The interconnected nature of BMs

The digital age has brought challenges that affect companies in various domains (Hess et al., 2016). Different consumer-oriented companies are undergoing their own organizational transformations within the digitalization trend, as are some of the companies that collaborate with retailers and provide complementary services. For example, m-payment providers, whose business would not be possible without ICT technologies and the use of mobile devices, face challenges pertaining to their evolving BMs and their organizational design as digital platforms. A critical aspect of firms’ efforts with such a design relates to the growth of digital platforms, i.e. simultaneous adoption by two customer groups (Paper A), retailers and consumers. Therefore, the BMI activities of m-payment platform providers also have direct implications for retailers. By studying m-payment providers’ BMI activities as they strive to achieve a stronger customer base (i.e. retailers), the
findings pinpoint strong partnerships and the co-evolution of different partners’ BMs as important factors to be considered in the process of transitioning to omni-channel retailing.

For example, for a retailer adopting a payment service, accepting a certain means of payment involves joining a payment provider’s platform. They could collaborate to arrange various services to provide, for example, frictionless checkout, digital receipts or connected loyalty accounts (Paper A). For payment providers, this represents a way to co-create value with retailers for consumers, who are also customers of platform providers. Collaboration represents a way for retailers to establish a feedback loop with consumers, and to use the mobile channel to receive instantaneous feedback through the payment service (Paper A). This enhances the relationship with the consumer and, at a later stage, allows retailers to offer relevant services based on analysing rich data. For payment providers, data generated by users and their mobile devices represents a source of competitive advantage. With a strong customer base and related data traces, and with developed data analytics capabilities, payment providers can offer retailers various insights which constitute incentives for retailers to be associated with a specific platform. Conversely, with a strong customer base of retailers, payment providers can use one strong side of the platform (i.e. retailers) to attract the other (i.e. consumers). Therefore, data generated through digitalization and mediated via mobile channels strengthen the resource ties of the business relationship between a retailer and a mobile payment provider.

Moreover, the growth of the platform to which retailers, customers and different actors are associated is not simply a challenge for the platform provider, it is also an omni-channel challenge for all involved actors. Thus, different network actors, their decisions and their activities are important since the failure of one actor to perform brings the entire value architecture that spans firm boundaries into question. As mentioned, one of the pillars of a retailer’s omni-channel BM is a seamless customer experience (Jocevski et al., 2019b). Linking many services and related activities into efforts to provide such an experience requires joint value creation and delivery being in place.
These challenges pertaining to BM adaptations and joint value propositions are shown in Paper D to be hard to understand from a single-firm viewpoint, due to its inability to consider all the involved actors and their associated activities and resources. Several literature reviews on BMs (e.g. Foss and Saebi, 2017; Wirtz et al., 2016; Zott et al., 2011) have pointed out how dangerous it can be to neglect a firm’s environment and to base one’s BM solely on the firm’s capabilities and resources, in isolation from its network and other firms’ BMs. Therefore, in the light of findings from Papers A and D, this thesis proposes an idea of a BM as a multi-level device. In other words, as inferred from Paper D, a BM can be used to focus on one of the three different levels (firm level, dyadic level or network level) in order to interpret various value architectures. At a firm level, the focus is on a single firm’s BM (e.g. a retailer’s BM), while when zooming out to the relationship level between two actors, i.e. the dyadic level, one may focus on actor bonds and resource ties. Finally, the third and highest level corresponds to a network-oriented view of a BM, which can be a useful tool in a networked environment. Therefore, at each of the levels of the analysis, a specific viewpoint can be taken on value architecture (see Figure 4).

At the first level, the focus can be placed on the individual firm’s BM, where a single-firm view can explain the particularities of each individual actor’s value architecture. The BM at this level of analysis determines how much value is captured for the firm in question, in relation to the overarching network appropriated value. Palo and Tähtinen (2013) suggest that each company enters the network with a ready-formed single-firm BM, and then participates in the development of business relationships and eventually the networked BM. The second viewpoint relates to the dyadic level, and is considered as a linking agent between two actors (Paper A) devoted to analysing value mechanisms that exist at a business relationship level (cf. Bankvall et al., 2017). Finally, Paper D proposes that a network-oriented view regards a joint offering (i.e. a value proposition) and the alignment of value mechanisms that are needed to support such an offering. Namely, it considers a joint value creation, coordinated value delivery and value appropriation for a network of actors (see Figure 4). In other words, the BM may serve to

1 A first draft of Figure 4 is presented in Laya et al. (2016).
aggregate interactions embodied in different relationships between the actors at a network level, and thus to map the value exchange therein. At this level of analysis, a BM can be seen as a relational aggregator; a tool orchestrating interactions and relationships within the value network (cf. Laya et al., 2016). In this way, a better overview of the actors involved in creating and delivering the joint proposed value and the interactions between them can be offered. Such an overview would allow for a more comprehensive understanding and design of the value flow, which represents different value exchanges between the actors in the pursuit of the joint offering.

Figure 4. Alternative viewpoints of a business model

In short, stemming from the need to adapt the retailer’s BM in the light of an emerging omni-channel transition process and the activities of different partners, alternative viewpoints are presented as a way to address these adaptations and to highlight the interconnected nature of a BM (Jocevski et al., 2019a). Moreover, the previously highlighted importance of partnering in an omni-channel environment, which would enable tapping into each other’s resources and capabilities in order to fulfil customer needs and deliver proposed value, is shown to be a barely understood phenomenon from a single-firm view. Therefore, a network-oriented view provides both a way to
address retailers’ adaptation challenges and a way to overcome the limitations of a single-firm view.

6.3. Summary of the chapter

The findings of the papers raise questions about the retailing formats of the future, the activities needed to support them, and the governance of different actors within the ecosystem surrounding the commerce process. In particular, it has been suggested that neither physical nor digital retail spaces will remain the same, that they will be driven by mutual channel interdependencies, data-driven decision-making and collaborations with new (previously unexplored) actors. It has also been suggested that there is a need to further engage in-store employees, and to create consumer engagement over digital technology-mediated interfaces. In addition, the presented Figure 3 summarizes three BMI aspects of omni-channel retailing, which if engaged with would have the consequences of changing retailing formats, new activities being performed and business relationships evolving with different partners. In other words, retailers would face the innovation of their overall value architecture and undergo their organizational transformation. Furthermore, the ideas of a BM at a network level are explored, and the findings of the appended papers suggest that a network view may help to understand the adaptation and co-evolution of BMs of actors that work on joint value propositions and the underlying value creation, delivery and appropriation dimensions.

Finally, the transition to omni-channel retailing, seen as a business model innovation, unfolds through the establishment of a seamless and experiential customer experience as a new value proposition, through the use of digital technology-mediated interfaces and big data to create value and achieve a competitive advantage and through collaboration with different actors in order to support the value delivery.
7. Implications

In the previous chapter, the results from the four appended papers are synthetized and presented as the findings of the thesis. Here, building on those findings that address the research question and put forward the network-oriented view of a BM, several specific implications are described for existing retail management and business model literatures, as well as for management practice. This chapter presents and discusses those implications.

7.1. Implications for retail management literature

Retail digitalization, as a process of the digital transformation of organizations within the retailing context, is a contemporary phenomenon that is highly relevant for the future of retailing (Grewal et al., 2017a). As such, it has been at the centre of attention for academics and practitioners (e.g. Bell et al., 2015; Brynjolfsson et al., 2013; Jennings, 2017). However, ways in which to manage the increasing number of channels and touchpoints and their integration towards omni-channel retailing models remain underdeveloped (Verhoef et al., 2015). This thesis therefore employs a BM perspective to outline previously neglected aspects of the omni-channel phenomenon and to highlight particularly important aspects of the transition to omni-channel retailing.

Previous research predominantly stressed value creation and value appropriation in a retail setting (Sorescu et al., 2011; Yrjölä et al., 2018b), while sporadically acknowledging value proposition and value delivery (Burt et al., 2016; Cao, 2014). However, in this thesis, and as summarized in Figure 3, all four dimensions of a BM have been studied in order to progress the research on omni-channel retailing. In particular, the discussion is extended with the value delivery dimension, which together with value creation and value appropriation is argued to be a mechanism that supports the new value proposition and pertaining BMI. Taking a similar approach to Cao et al. (2018), who rather than focusing only on certain BM dimensions have aimed for a broader discussion, this thesis further extends our understanding of the transition to omni-channel retailing by studying it through four BM dimensions.
Moreover, observed BM innovation aspects indicate that seamless and experiential shopping is a new value proposition, the use of technology-mediated interfaces enhances the customer experience, and integrated data analytics is a potential source of a competitive advantage. The thesis also indicates the importance of partnerships for successful value delivery, as the interconnected nature of a BM concept allows the importance of the joint value delivery aspect of the retailer’s BM to be identified. These findings reveal certain aspects of the changing business logic of retailers that can be appreciated by taking a BM perspective.

Furthermore, the findings imply a need to reconsider previous conceptualizations of retail channels as two-way interaction contact points (Neslin et al., 2006) and to broaden their scope in omni-channel retailing to include one-way communication (Verhoef et al., 2015). In order to do so, consumers’ changing behaviour needs to be considered and understood. For example, when a consumer pays for a product in a physical store with a smartphone, they are making an m-payment in a physical retail channel. The question that arises here for the understanding of channels and omni-channel management is whether the purchase should be considered as m-commerce (since it was performed by using a mobile device) or as regular commerce (since it happened in a physical retail space). Findings suggest that the practice of separately managing channels and channel-based customer segmentation (Neslin and Shankar, 2009) are not in line with the new status quo. Although synergetic channel management has been suggested (Verhoef et al., 2015), it is still based on established thinking in terms of different retail channels.

A potential way forward is to move away from the notion of channels altogether and to consider an alternative way of thinking in which the discussion does not address different channels, their integration, or synergetic management, but rather the use of touchpoints as different retailer-consumer interfaces. Although these touchpoints may, for example, exist in a physical space, or be enabled by mobile technologies, they are considered to co-exist in one all-encompassing medium of interaction between a retailer and a consumer. In this way, the technology-mediated interactions that exist in all channels require a unified value proposition and hence a BMI process that
does not exist in different channels separately, but rather is unique across the entire medium of interaction.

Finally, although previous research (e.g. Hänninen et al., 2019) has considered digital platforms as new retail BMs in the digital world, this thesis includes findings related to non-digital retail platforms as part of the omni-channel design. That is, it showcases alternative marketplace-based physical retail spaces that serve as experiential and inspirational, rather than fulfillment locations. In addition, it mentions how these non-digital platforms can extend their network externalities by constantly changing the retailers they host.

7.2. Implications for business model literature

In studying the emerging transition to omni-channel retailing through BM innovation, several implications were identified for a broader BM literature.

Firstly, the thesis challenges the view of what some authors refer to as a static approach of a BM (Demil and Lecocq, 2010; Wirtz et al., 2016). Although such a view has been predominant in the literature, it is also the reason behind the lack of theory on BMI (Foss and Saebi, 2018). By using elements of process research, this thesis showcases the benefits of understanding the BM innovation process behind the changing core logic of a transforming organization. Therefore, this thesis contributes to empirical findings with respect to discussions on BM dynamics, which have been scarce in the literature and are called for by Foss and Saebi (2018). Furthermore, this thesis helps to understand how different businesses have approached the process of digitalization, rather than simply stating the static aspects of the digitalized design elements of a BM. In addition, the findings of this thesis confirm that BMs are subject to change (Foss and Saebi, 2018; Schneider and Spieth, 2013; Sosna et al., 2010) and that BMI as a novel and nontrivial change of key BM elements, and/or alignment among them, represents organizational transformation (Foss and Saebi, 2017).

At the same time, researchers in the extant literature mainly use the concept of a BM to focus on the value architecture of a specific firm (Casadesus-Masanell and Ricart, 2010; Teece, 2010). However, there have been several
efforts that addressed BMs as concepts with a wider scope. Chesbrough (2003) discussed the openness of BMs, and Zott and Amit’s (2010) idea of a BM as an activity system that suggests its domain spans a firm’s boundaries has also contributed to the discussion. Palo and Tähtinen (2013) have brought a network perspective to BM conceptualization, calling it a “networked” BM. Their main idea was a shift in BM thinking from a focal firm’s value proposition to a joint value proposition of a network of actors (Laya et al., 2018; Palo and Tähtinen, 2013). Similarly, this thesis’s findings point to an alternative viewpoint of BMs – a network-oriented view. Adhering to the previous research that took a network perspective when discussing BMs (e.g. Bankvall et al., 2017), and keeping in mind the nature of the development of services based on ICT, which depend on the involvement of several actors in the network, this thesis proposes an idea of a BM as a multi-level device. In other words, a BM is seen as a device that allows scaling to multiple levels of analysis: on one hand zooming in on a firm’s value architecture, and on the other zooming out in order to analyse a network’s value design. This allows for alternative viewpoints as analytical lenses that can guide the investigation of various value architectures at different levels. This is particularly important, since in this way a BM, when seen as a relational aggregator, can help to explain the interconnectedness of different actors and value architecture at a network level, without diminishing the importance of a BM used at a single-firm level. This is something that Ramirez and Mannervik (2016) considered to be highly important in a contemporary networked and uncertain world.

7.3. Managerial implications

The findings of the thesis indicate several important implications for practice.

Firstly, the thesis refers to several aspects of BMI that can be used to steer the direction of a company towards an omni-channel retailing model. In particular, the thesis highlights: (i) digital technology-mediated interactions between retailers and consumers, (ii) the use of big data to learn about consumer behaviour, and (iii) collaboration with different actors in the ecosystem. The first implies constant and omnipresent retailer-consumer interaction that needs to be managed synergistically across all touchpoints and
the entire medium of interaction. The second implies the significance of data in today’s marketing and operations functions. The third denotes the networked nature of a business and the growing importance of collaborations for the delivery of joint offers. Furthermore, the findings suggest that retailers follow market trends of the transition to omni-channel retailing, but also highlight the need for awareness of one’s core customer base and for an understanding of which changes are adequate for a particular business.

Secondly, retailers that aspire to engage in – or are partway through the transition to – an omni-channel model may find practical examples and inspiration in the appended papers. They feature graphical representations of how each BM element can contribute to pursuing digital technology-enabled opportunities and to (re)designing physical retail spaces. These insights would allow reflective managers to focus on relevant aspects of a BM if and when necessary. In addition, the papers highlight the dynamic perspective of a BM, which allows for a more active way to reflect on one’s business in comparison to taking a static perspective of a BM. Managers may think of a BM as a dynamic device, or as a tool that can provide a way of thinking that goes beyond merely listing the design elements of a business, but it is rather a device with which to map which aspects of a business are changing and to understand the consequences for the overall value architecture in a way that addresses the inter- and intra-organizational changes through constant fine-tuning and innovation.

Finally, the thesis offers an umbrella point of view, i.e. a mindset that incorporates three levels of BM analysis, and may thus provide managers with an interesting lens for future strategizing. In other words, it offers an understanding of a BM as a device that can change the scale of observation and allow managers to focus on a particular unit of analysis. Each of these levels corresponds to a particular viewpoint – a single-firm view, a dyadic-level view or a network-oriented view. These in turn can provide more clarity on certain questions regarding the organizational change and value architecture that can help managers in their work practice.
8. Conclusions

In its aim to explore the emerging transition to omni-channel retailing, this thesis starts by highlighting the relevance of digitalization itself, as well as the particularities related to new mobile technologies as one of its drivers. Next, it goes through existing retail management and business model literatures, since the phenomenon of the transition to omni-channel retailing is seen as a BM innovation process. Finally, after presenting brief summaries of the four appended papers and synthesizing their results in an effort to answer the research question, the thesis discusses how retailers innovate their business model in the face of digital transformation and the pursuit of omni-channel strategies. Thereafter, a number of specific implications of the thesis’s findings for theory and practice are presented.

In summary, leveraging a BM perspective, this thesis reveals three important aspects regarding retailers’ business in respect of the transition to omni-channel model: (i) digital technology-mediated interactions as a way to offer customers various options to interact seamlessly with the retailer, (ii) using big data to understand customer behaviour and create relevant experiences, and (iii) collaboration with different actors in the ecosystem in order to deliver a seamless customer experience. In doing so, this thesis answers the research question and presents the dynamics and interconnectedness of a BM perspective as a way to explain retailers’ transition to an omni-channel model. That is, it indicates how each of the three aspects are connected to the change in retailers’ businesses logic through the dynamics and innovation of BM dimensions (i.e. value proposition, value creation, value delivery and value appropriation). The establishment of a seamless and experiential customer experience is seen as a new value proposition; the use of digital technology-mediated interfaces and big data represents new ways to achieve value creation and appropriation; and finally collaboration and partnerships are highlighted as pillars of joint value delivery. Thereby, this thesis also sheds light on the emerging network-oriented view of a BM as a way to present a joint value proposition and to map value flows between the network’s various actors.
In addition, this thesis presents an idea of a BM as a multi-level device that allows for a different focus when multiple levels of analysis are required. On one hand, it allows to zoom in on a firm’s value architecture. On the other, it provides the opportunity to zoom out in order to analyse a network’s value design. Such a line of thinking allows different elements of a BM to be appreciated when discussing a retailer’s transition to an omni-channel model.

Finally, the thesis contributes to an ongoing discussion on retail channels and touchpoints, suggesting that we should move away from the notion of channels altogether and consider an alternative line of thinking in which the discussion focus shifts away from different channels, towards touchpoints as retailer-consumer interfaces. The idea is that these touchpoints co-exist in a single medium of interaction between a retailer and a consumer, rather than in different channels, and should therefore be jointly considered in an omni-channel retailing model.

8.1. Limitations and suggestions for further research

This thesis has several limitations, which nevertheless might provide potential for further research. It aimed to provide an understanding of the transition to omni-channel retailing through BMI efforts, but it would be wrong to assume that these endeavours fully address every facet of the phenomenon. The BM perspective can provide only so much, and alternative theoretical lenses might reveal other particularities. For example, a dynamic capabilities perspective has been used by management scholars when studying a firm’s ability to address change in the business environment, and could therefore reveal additional insights into the adaptability of retailers in the digital era. In addition, the concept of a dual BM – for instance where a firm operates two BMs simultaneously, leveraging organizational learning in terms of exploration and exploitation, i.e. organizational ambidexterity – might be an interesting lens to use in the future. Therefore, future research should further explore whether BM literature can help management scholars to gain a better understanding of the operations of ambidextrous organizations.

Bearing in mind that this thesis explores the early phases of emerging processes in the transition to omni-channel retailing, the analysed case
companies provided examples of the pioneering businesses operating in the field at the moment when this research was performed. Therefore, since the thesis did not address the entire process of transitioning from beginning to end, only elements of its early phases, future studies can take a historic perspective and reflect on the phenomenon in its entirety.

By extension, retail digitalization constitutes an interesting industrial level transformation process to be studied. In terms of specific elements of retail digitalization, further research should aim to validate current findings, but should also investigate new (currently unexplored) factors. For example, social commerce as a development of the dominance of social media has not been considered in this thesis, but is a phenomenon that could provide new insights on changing retailer-consumer interfaces.

Moreover, the investigation has focused on retailers and payment providers in Sweden and Italy, mainly looking into three retail segments: fashion, consumer electronics, and bookstores and media. Although the study was explorative in nature, it predominantly represents these markets. Future studies could incorporate other regions, such as other parts of the EU, the US, and in particular China where mobile platforms are becoming a dominant method of interaction with different services and apps, and payment means are already integrated. Additional retail segments could also be explored, especially those with high volumes and low transaction value, such as fast-moving consumer goods.

Furthermore, regarding the studied companies, Paper A – unlike Papers B and C – has addressed the BMs and BMIs of two-sided payment platform providers. An important distinguishing factor between such BMs and those of retailers is that platform businesses have the potential to generate positive feedback loops, which are referred to as network effects between two of the platform’s user groups. These effects are unique to platform BMs, and are the key to unlocking their proposed value. Therefore, some of the findings in Paper A are delimited to platform BMs, while the very nature of BM dynamics and interconnectedness is something that transcends such BMs and holds true across different business logics.
Finally, although the case study approach allowed for deeper discussions and rich data collection in order to explore the phenomenon, two perspectives were presented in this thesis: that of the retailer, and that of the payment provider. Future studies are encouraged to involve consumers and potentially other actors in the value network to provide a holistic, multi-perspective story of co-evolution. Additionally, the application of other research methodologies and testing of the presented findings are encouraged in order to confirm them and further the understanding of the described relationships.
References


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