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DIGITALIZATION IN TRADITIONAL PHARMACIES

The effect on efficiency, access to information, proximity and personalization

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Master in marketing,

Supervisor:

Invited Assistant Professor Ana Comporta
ISCTE-IUL | Lisbon | Portugal

December, 2021



BUSINESS
SCHOOL

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ABSTRACT

The main objective of this study is to determine what new technologies bring in a traditional pharmacy on the patient purchasing experience. Since new technologies are now part of our lives and have started to take hold in many physical outlets. This study measures the importance of these new technologies in today's pharmacies and its impact on customer satisfaction to understand its role.

Some studies have underlined the benefits of digitization in a point of sale for the manager of the point of sale. And a few highlighted the benefits of point-of-sale digitization for customers. And if some have helped to determine the impact on the purchasing experience of customers, no study has been conducted to determine the level of acceptance of the digitization of a pharmacy, a health store apart from all other physical stores.

The empirical analysis uses the satisfaction scale to measure the satisfaction of 2 groups of respondents. One being immersed in traditional pharmacy and the second in digital pharmacy. The objective of these results is to observe the preference of the French population according to 5 criteria. The statistical analysis of these 120 respondents was made via IBM SPSS Statistics software using a T test for two independent samples, and then an ANOVA to go further in the analysis according to the age of the respondents.

The digitalization of a traditional pharmacy brings 2 benefits to the customer shopping experience. The results show that digitization makes it possible to gain efficiency and gain access to information, but also that age plays a predominant role in the acceptance and satisfaction of digitalization in pharmacies. Indeed, new technologies are not sufficiently developed in France to be fully appreciated in pharmacies. People over 36 are the most reluctant to make this change.

Keywords: digitalized commerce, traditional commerce, pharmacy, customer purchasing experience, efficiency, easy access to information, age

JEL: L2, O3.

RESUMO

O objetivo principal deste estudo é determinar o que as novas tecnologias trazem em uma farmácia tradicional na experiência de compra do paciente. Já que as novas tecnologias agora fazem parte de nossas vidas e começaram a se estabelecer em muitos estabelecimentos físicos. Este estudo mede a importância dessas novas tecnologias na farmácia de hoje e seu impacto na satisfação do cliente para entender seu papel.

Alguns estudos sublinharam os benefícios da digitalização em um ponto de venda para o gerente do ponto de venda. E alguns destacaram os benefícios da digitalização do ponto de venda para os clientes da loja. E se alguns ajudaram a determinar o impacto na experiência de compra dos clientes, nenhum estudo foi realizado para determinar o nível de aceitação da digitalização de uma farmácia, uma loja de produtos naturais, separada de todas as outras lojas físicas.

A análise empírica usa a escala de satisfação para medir a satisfação de 2 grupos de respondentes. Um estando imerso em farmácia tradicional e o segundo em farmácia digital. O objetivo desses resultados é observar a preferência da população francesa de acordo com 5 critérios. A análise estatística desses 120 respondentes foi feita por meio do software IBM SPSS Statistics usando um teste T para duas amostras independentes e, em seguida, uma ANOVA para ir mais longe na análise de acordo com a idade dos respondentes.

A digitalização de uma farmácia tradicional traz 2 benefícios à experiência de compra do cliente. Os resultados mostram que a digitalização permite ganhar eficiência e obter acesso à informação, mas também que a idade desempenha um papel preponderante na aceitação e satisfação da digitalização nas farmácias. Na verdade, as novas tecnologias não estão suficientemente desenvolvidas na França para serem totalmente apreciadas nas farmácias. Pessoas com mais de 36 anos são as mais relutantes em fazer essa mudança.

Palavras-chave: comércio digitalizado, comércio tradicional, farmácia, experiência de compra do cliente, eficiência, fácil acesso à informação, idade

JEL: L2, O3.

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1. INTRODUCTION

This first chapter announces the context and the importance of this research, but also its objectives and the structure of the thesis.

1.1. Contextualization and definition of the research question

This topic of the digitalization of the point of sale and the customer purchasing experience are topical subjects in society. Indeed, more and more research are being done about the digitization of points of sale. However, this research is often based on the benefits that digitization can bring for professionals and not on the benefits that digitization can bring to customers in terms of the purchasing experience. It is therefore important to investigate the role that the digitalization could play on customer purchasing experience in physical store.

Nowadays, the number of companies is growing which means that there is more and more competition between companies, and thus, the offer is increasingly important. Finally, we are also in a world where the export and import of products strongly increase thanks to the globalization. With so many offers, customers tend to be more volatile. Companies must differentiate themselves to obtain a good customer purchasing experience to prosper (Grønholdt et al., 2015).

The research question of this dissertation is here to help understand the role of digitalization in point of sale on the shopping experience of customers.

In addition, this dissertation is based on the example of French pharmacies. Indeed, the research question also seeks to know why pharmacies should adapt their marketing strategies and start focusing on the shopping experience of their customers. Pharmacies are health outlets selling drugs, products and objects intended for body care and where each individual needs to go regularly (Moullin et al., 2013), which makes this research even more interesting because of the large number of visits and the importance of the place for a population.

In addition, very few literature reviews have been written on the effects that the digitalization of point-of-sale pharmacies could have on the customer shopping experience. Because if other points of sale such as large-scale distribution or specialized stores such as cosmetics have been integrating more and more technologies into their points of sale for a few years, there is a valid reason (Picot-Coupey, 2013). So, what is digital impact on the customer shopping experience?

Which role the digital in a point of sale has on the customer purchasing experience in a pharmacy?

1.2. Clarification of its importance and relevance

1.2.1. The digitalization, a topical subject

We are in an era where we seek to improve and facilitate our lives thanks to all kinds of technologies. In our homes with the development of computers, the internet and more recently mobile phones, our behaviors have become digital (Barba, 2013). Due to this change of behaviors, we are in a context characterized by the evolution of the offer and the emergence of new modes of consumption. Companies must question their marketing model to understand new behaviors and the tangible and symbolic needs of consumers (Samir & Soumia, 2020).

In fact, competition between distributors is fierce, whether between the offline networks themselves or because of the new e-commerce players. Screens and mobiles are now part of commerce. But paradoxically, stores are not digitized much. They are often even the last connected places in our daily life journey (Barba, 2013).

To face and remain competitive, the points of sale have understood this well, it is imperative for them to merge this physical universe and this digital universe, what created the expression "phygital". Why? Because this digitization of points of sale suggests an improvement in the consumer experience and profitability of points of sale. Certain outlets have indeed understood this, and more and more stores are adopting phygital, such as large-scale distribution, pure players, ready-to-wear or even cosmetics (Misra & Arivazhagan, 2017).

1.2.2. Pharmacies, a very visited store in France

Pharmacy is a popular place for French people, 4.5 million French people enter in a dispensary every day (Sanofi et al., 2018). In France, a pharmacist is considered as the most easily accessible healthcare professional due to its location (Sanofi et al., 2018). In fact, there are approximately 21,728 pharmacies in France, which means 1 pharmacy for 3,000 inhabitants, which also means that 97% of French people are living within 10 minutes of a pharmacy, and therefore makes it a unique and local network. But the pharmacist is also seen as a trusted person (Sanofi et al., 2018). Accessible and available, the pharmacist embodies a health facilitator. He is the driving force in the continuity of the hospital/home link of a patient, he is

also responsible for the drug distribution circuit, and the relay for public health campaigns (Sanofi et al., 2018).

Customers and patients are now constantly in demand for information and reassurance. Thus, pharmacists also must take on a reassuring role with them (Sanofi et al., 2018). 73% of patients believe that the pharmacist is a healthcare professional before being a merchant, 99% of patients trust pharmacists to take their treatment, 1 in 2 French people seek advice from their pharmacist for benign pathologies (Sanofi et al., 2018). 88% of patients trust their pharmacist to give them appropriate advice in case of health emergency. The pharmacy is therefore seen as a place of trust, proximity for customers and therefore an accessible and listening place. Unfortunately, on average 1 pharmacy closes every two days in France (Gregório & Cavaco, 2020). Thus, healthcare professionals need to find lasting solutions and one of the solutions for this is to rethink the two sides of a pharmacist who are "delivery and advice" to add the notion of "trader" (Tinelli et al., 2009).

In addition to being a very frequented place where confidence reigns, we have also observed for a few years a population with more and more pathologies (Borst, 2019) and living longer and longer, which also proves the importance from the pharmacy at present. Indeed, the French population continues to age. People aged 65 and more represented 20.5% of the population in January 2020, against 20.1% a year earlier and 19.7% two years earlier (*Population par âge – Tableaux de l'économie française* | Insee, 2020).

In addition to a population living longer, we are in a society where technology takes more and more place in our daily life. Unfortunately, the latter increases certain pathologies such as early hearing, mental health, and vision disorders, which leads pharmacists to have more and more patients (Borst, 2019). As a result of this longevity and growth in pathologies, interest in services in the field of prevention is growing (Sanofi et al., 2018). And, in pharmacies, it is now possible, for example, to do vaccines, pharmaceutical interviews, medication reviews, to be monitored and to do rapid screening tests (*Regards croisés sur l'officine de demain*, 2018).

Being a pharmacist is therefore a profession in full transformation and its role continues to evolve to respond to new current health challenges. The pharmacy must therefore turn to innovative solutions to meet the new expectations of patients, thanks to the digitization of its point of sale (Sanofi et al., 2018).

1.2.3. Customer experience is now an integral part of all business strategies

Until a few years ago, transactional marketing was the preferred strategy of all brands. This type of marketing takes a short-term view and focuses on the act of buying itself. Marketers preferred to ignore relationship processes deemed too expensive and too complex to manage in favor of brand loyalty by favoring mass communication (Materne, 2017). However, this type of marketing is no longer possible these days. In a society where customers are more and more demanding, where more and more brands and therefore competitors are emerging and, in a world, where consumers seek to be rewarded for their loyalty, the importance of the customer experience is therefore essential (Materne, 2017).

Therefore, we are now observing the use of so-called relational marketing by most companies, whose vision is longer term and seeks to retain consumers. This notion of “client-company relationship” is now found at the heart of the current problems of all companies (Dampérat, 2006). For businesses, the customer purchasing experience has a decisive role in customer retention and in corporate profitability. It is a source of value providing a basis for differentiation and competitive advantage for companies (Dampérat, 2006).

1.3. Objectives

These societal news have been present for several years and have also interested Materne (2017). Its theoretical research as well as its quantitative study shows that there is a link between the digitalization of a physical point of sale and the improvement of the customer shopping experience. Materne (2017) shows as a main result that the consumer purchasing journey was improved by the presence of digital tools in physical stores, whether it is through attitude towards the brand, purchase intention and satisfaction.

The research will attempt to reuse its research model in a different country and physical store. The research was therefore carried out in French pharmacies with specific objectives: 1) to determine whether digitalization in pharmacies is as important as in others physical stores, 2) and if the dimensions of the customer experience in a digital store have a positive impact on customer satisfaction.

1.4. Structure

The research is composed of 5 chapters. The first, the introduction, setting out the context and importance of the study as well as the objectives of this work. Chapter 2 presents the literary review written through extensive research of study papers as well as articles. This chapter describes the importance that society and consumers have on the way they make their point-of-sale purchases and solutions to improve the shopping experience. Chapter 3 describes the methodology adopted for this research through a conceptual framework where the hypotheses are stated, the objective of the study as well as the quantitative study carried out. Chapter 4 presents the results obtained from the study as well as their interpretations. Finally, Chapter 5 presents the main conclusions drawn from the research, the recommendations and finally the limitations of the study and further research.

Figure 1 – Research Structure

Chapter 1 INTRODUCTION	• Contextualization and definition of the research question • Clarification of its importance and relevance • Objectives • Dissertation structure
Chapter 2 LITTERATURE REVIEW	• The evolution of society • Consumers • In-store customer experience • Digital in physical stores and improving the customer journey
Chapter 3 METHODOLOGY	• Conceptual Framework • Research Hypotheses • Object of Study • Quantitative Study
Chapter 4 DATA ANALYSIS	• Verification of the reliability of the scales • Hypothesis test • Homogeneity of respondents • Discussion
Chapter 5 CONCLUSION	• Conclusions • Managerial implications • Limitations and further research

2. LITERATURE REVIEW

In this research, several concepts and definitions has been identified. But for this literature, only the dimensions of the purchasing experience were selected, providing a specific research axis, and allowing it to make a direct link with the different ways of bringing digitization to a pharmacy point of sale while improving the customer experience in stores, which is the theme of the research.

The first part of the literature review demonstrates why the digitization of the point of sale has become essential today for traders, by first describing the changes that the society has encountered in recent years (Weber, 2014) and by stating the changes in consumer behavior now called "new consumers" (Rachinger et al., 2019).

In a second part, the literature review focuses on the concept of customer experience, the dimensions that make up a good customer purchasing experience at the point of sale: cognitive, sensory, affective, and social dimension and explain the difference between customer satisfaction in traditional pharmacist and digital pharmacy.

The third part explains according to the demands of new consumers what new technologies bring to digital pharmacy: pharmacist efficiency, easy access to information, patient-client proximity, personalization of services. And finally, a conclusion.

2.1. The evolution of society

2.1.1. Appearance of the Internet, e-commerce, and mobile phones

The Internet has been present in French households since 1994 (Picot-Coupey, 2013) and is even more appreciated by consumers following the creation of pure players like Amazon and Ebay. Customer-oriented online stores, making it possible to search, buy in safety, read, and give opinions, and all this while transcending geographical and temporal borders (Druguet & Vallet, 2015).

But the appearance of pure players and e-commerce are only a part of the great technological change that we have experienced. 10 years later, in the early 2000s, the explosion of social networks took place. Dozens of social networks have been created and others continue to be launched even today. These networks bring together and federate communities across the world. Like e-commerce, geographic and temporal boundaries no longer exist (Weber, 2014).

Finally, there was also the emergence of smartphones in the 2010s. Mobile phones have revolutionized consumer behavior. We are connected, always and everywhere. And when it comes to commerce, the display gives us immediate access to thousands of stores, whether physical or just online. With hundreds of millions of products at your fingertips, the screen expands the walls to infinity (Barba, 2013).

The web has become 2.0. Before, Internet users were only spectators. Now they are actors, they can produce content with blogs, express themselves on different subjects, consult freely and react to content posted by others. Thanks to all these new features, the web is becoming even more participatory (Weber, 2014).

Since the COVID-19 pandemic, which happened 2 years ago, the trend of health e-commerce has spread not only in developed countries but also in developing ones. According to a study, this recent growth in sales of health products on the Internet represents a threat for point-of-sale pharmacy but can also represent a danger for consumers of these online purchases (Miller et al., 2021).

2.1.2. The success of e-commerce

These new technologies directly impact the daily lives of consumers in their consumption habits and are appreciated by all. In 2020, there are more than 4.5 billion Internet users worldwide, which clearly shows that the Internet, social networks, and e-commerce have entered everyone's daily life (Picot-Coupey, 2013).

But this is only possible thanks to new technologies that more and more people have. By the end of 2013, 57% of French people used a mobile phone and 68% a tablet to access the Internet in addition to the computer (Druguet & Vallet, 2015). And in 2019, more than 92% of French people under 40 and 77% of 40–60-year-old own and regularly use a mobile phone (Stroz et al., 2019).

Lastly, because of the ease of going on the Internet and the emergence of pure players, 73% of French people buy remotely to the detriment of physical stores (Druguet & Vallet, 2015). Indeed, these effects are visible from 2015 since already 47% of French people say they go to stores less often than 5 years ago (Derrey & Billon, 2015).

This effect is felt even abroad. Indeed, the young generation has grown up with the development of new technologies. Online shopping is accepted by everyone and allows the online sale of health products to begin. But the step for making these purchases is different and more difficult to take. According to a study in Bangladesh, the results show that certain elements, such as trust and preventive medicine, are vital for the acceptance of the use of a platform for purchasing health products (Sabbir et al., 2020). According to a second study, e-pharmacy represents many risks such as fraud, product quality inferior to what found at the point of sale and non-confidentiality of the purchase (Miller et al., 2021). Finally, a third study carried out in India confirms the results of the previous study. According to this study, it is essential that on-call pharmacies are made available to advise e-customers for an e-pharmacy to function well and without risk. Indeed, this would prevent self-medication errors. Without this proposal, e-pharmacy is, according to them, a digital danger (Satheesh et al., 2019). Therefore, it is essential even with the rise of e-pharmacy to continue to focus on the sustainability of an increased role for pharmacists, by providing internet services that highlight the essential role of the pharmacist for managing the health of the population (Gregório & Cavaco, 2020).

2.1.3. The benefits of e-commerce for consumers

The screen gives immediate access to thousands of stores, whether pure-players or brick-and-clicks, with the comfort of not moving around and staying warm (Barba, 2013). But that's not all, with e-commerce consumers have the power. They can buy from anywhere and be delivered anywhere (Daucé & Goudey, 2017). They have the power to buy 24/7 without even thinking about the opening and closing hours of a physical store (Druguet & Vallet, 2015). They also have the power to leave reviews after their purchases and to compare different products and prices with other stores (Rivet et al., 2019).

According to 88% of French people, e-commerce saves money thanks to better prices than in a physical store (Derrey & Billon, 2015). According to 77% of French people, shopping on the Internet saves time on possible trips and allows flexibility on when and where to buy, which is very practical and makes life easier (Derrey & Billon, 2015). According to 76% of French people, this also makes it possible to have a larger product catalog than in stores and to have web exclusives (Derrey & Billon, 2015). E-commerce also makes it possible to read reviews, interact with other buyers and have access to different stores in one click, which is not possible in a physical store (Rivet et al., 2019). Finally, e-commerce also brings transparency to purchases thanks to an easier comparison between products and much more information than on a point of sale (Picot-Coupey, 2013).

Finally, according to a study carried out in 2006 with the objective of developing a scale to measure the advantages and risks that online purchases represent for consumers, as the latter have already been used to e-commerce purchases for a long time, they perceive more all the advantages than the risks for this type of purchase (Forsythe et al., 2006).

Physical stores feel threatened by this digital channel, but are they dead? (Druguet & Vallet, 2015)

2.1.4. The physical store feels threatened but has not said its last word

France currently has over 340,000 points of sale on its territory. And despite the strong growth in e-commerce, traditional commerce is holding its own. In fact, 94% of retail sales are generated in stores (Misra & Arivazhagan, 2017). In addition, retail outlets saw their turnover increase by 13% between 2009 and 2014, when the mass arrival of new technologies corresponds (Misra & Arivazhagan, 2017).

Because even if e-commerce has many advantages, so do physical stores. Indeed, consumers are still very attached to it. Almost 98% of French consumers prefer an in-store experience over an exclusively online experience (Kacen et al., 2013).

According to Derrey & Billon (2015) the physical store is the place to be to see the products at 65%, 46% to touch and smell the products and finally 48% to control its quality but also to try the product. In addition, 85% prefer to buy at a point of sale to have personalized advice from the seller, to have his expertise and to discuss with him (Picot-Coupey, 2013). But also, to be reassured in their choices (Rivet et al., 2019) and to have a pleasant shopping experience at the end of the day, which is not possible in e-commerce (Daucé & Goudey, 2017).

If we remain on this advantage of sellers, we also observe that 66% of French people believe that human contact is essential when they buy and that 66% of French like to talk to sellers (Picot-Coupey, 2013). Other advantages of the physical store over e-commerce are the absence of shipping and delivery costs. Indeed, 44% of French people consider the fees to be excessive and 83% have already given up on an online purchase because of fee rates (Daucé & Goudey, 2017). But also, trust and payment security (Picot-Coupey, 2013), the ease of exchanging and getting reimbursed (Barba, 2013). And finally, for 50% of French people, having the product immediately after buying it is a great advantage for them (Derrey & Billon, 2015).

Even if physical purchase remains privileged, e-commerce has been a primary factor in the destabilization of traditional commerce (Picot-Coupey, 2013), and consumer habits have evolved. Retailers therefore have no choice: they must reinvent themselves to respond to these new uses (Misra & Arivazhagan, 2017). We must give meaning to the point of sale by relying on its main asset: human (Daucé & Goudey, 2017).

E-commerce has some advantages that brick-and-mortar stores do not. But does this e-commerce trend have a real impact on current consumer demands?

2.2. Consumers

As said previously, the desires and habits of consumers have changed following the emergence of e-commerce and mobile technologies.

2.2.1. The disadvantages of the physical for consumers

Now that consumers have gotten into the habit of buying when and where they want, it is increasingly difficult for them to make the effort to go to a store (Barba, 2013). They think of transport costs, gasoline, or parking that they do not have to pay by ordering on the Internet (Barba, 2013), but also of all this time spent in stores because of people (Daucé & Goudey, 2017). Other consumers are unhappy with outlets because of product disruptions. Customers make the trip for nothing when it would have been available on the internet (Daucé & Goudey, 2017). In addition, 84% of French people find that they are not treated in an individualized way or that there is no one available to help and advise them (Derrey & Billon, 2015). Some consumers also suffer from a feeling of superiority over the seller (Barba, 2013). 70% of French people believe that the seller does not know his subject well and that the customer is more up to date on the subject than the seller (Derrey & Billon, 2015). Finally, French people believe that some experiences in point of sale are not worth the trip. Indeed, according to Rivet et al. (2019), 40% of consumers surveyed find that in-store purchases represent a chore and 32% would prefer to do the dishes instead. And a second study shows that 68% of consumers are not satisfied with their in-store shopping experience (Barba, 2013).

2.2.2. "New consumers": their new habits with the Internet

The development of the Internet and associated technologies have changed consumer habits. They are used to juggling from one distribution channel to another. Customers who were once disturbed by increasingly complex offers know how to take advantage of them; they now intend to consume according to their needs, to access offers and services everywhere, all the time (Carteron, 2013).

First, consumers have greater expectations regarding the point-of-sale shopping experience (Daucé & Goudey, 2017). Indeed, they want to have a choice. A requirement that has become imperative in the way they buy. Today it's the customer who decides (Barba, 2013). Consumers also have behaviors dictated by a logic of control. Control of the situation, which relates to keeping control of one's budget as well as of one's time, and self-control, which aims not to deviate from one's objectives (Loupiac & Goudey, 2017). Indeed, some analysts find that

Internet users are spending more and more time looking for the right product at the right price, leaving less and less place for impulse in purchasing motivation (Druguet & Vallet, 2015).

Finally, their behavior has become digital (Barba, 2013). They are multi-equipped consumers, thanks to multi-screens and mobile. Indeed, France has 45.7 million Internet users, 24.5 million mobile users and 12.5 million tablonauts (Weber, 2014). This proliferation of technologies among consumers also makes them multi-connected (Picot-Coupey, 2013).

French people spend 5 hours a day on the Internet on average. They become shoppers overexposed to brands and difficult to capture (Derrey & Billon, 2015). Also, French persons spend an average 2.7 hours per day on the Internet via a mobile device (Derrey & Billon, 2015). Consumers have also become over-informed thanks to or because of the information available everywhere and all the time (Weber, 2014). Over-information is even at the origin of a new psychological disorder that some call "infobesity" which is the fact of being constantly connected and aware of everything and that it is a necessity, an emergency for someone (Barba, 2013). Finally, because a person has unlimited access to any content on the internet, they are more demanding in the store. They need quick access to products, that the products are available, an organization just as clear as on the website etc. And because of this, they can easily become unsatisfied (Rivet et al., 2019).

Moreover, consumers can be influenced by the tribe or the community to which they belong (Weber, 2014). Customers have become accustomed to relying on others to form an opinion. Knowing that someone has bought a product is reassuring and reading another's buying experience is compelling. Reviews clearly influence purchasing decisions (Barba, 2013). And this is because consumers are also more sociable. 40% contact their friends or family for in-store advice, 42% admit to having been influenced by at least one social network during their purchases (Derrey & Billon, 2015). People now express themselves fluently and spontaneously on the networks to expose the problems encountered, to comment on their shopping experience, their product satisfaction (Barba, 2013). Stores now face influential and influenced shoppers. Finally, because of the ease of going on the Internet, finding information quickly and being able to do several things at the same time, today's consumers are impatient (Weber, 2014).

This mobility and influx of information through permanent connection to networks has therefore led to a change in the behavior of buyers (Weber, 2014) and are now considered "new customers" by stores (Rachinger et al., 2019). So, what are their new needs in physical stores.

2.2.3. The wishes and new needs of consumers for physical stores

“New customers” (Rachinger et al., 2019) are much more demanding due to the easy and fast use of e-commerce. What they want is to bring the advantages of e-commerce to physical stores while retaining the advantages of physical stores that e-commerce does not have.

- **More product information and availability**

First and foremost, consumers seek access to information. Information on the different products such as composition or origin but also on their availability in store. 75% of consumers would like to be able to check the availability of products in their physical store as soon as they arrive in the store, which would save them the trip or disappointment (Materne, 2017). Physical stores face websites where there is an endless amount of information. In addition, when a customer wants to buy on the internet, it is very easy for him to make his own comparisons between the different brands. Consumers therefore want more transparency from physical stores, by having access to all information on products and their stocks (Materne, 2017).

- **Have your products quickly**

Even if it is true that a physical store allows you to obtain purchases much quickly than on e-commerce, consumers expect more. On e-commerce, it is now possible to be delivered in 24 hours or even in a few hours through certain pure players. However, and as seen previously, a customer likes to see and touch the product before validating his purchase, which only a physical store offers (Picot-Coupey, 2013). A customer going to a physical store will make the trip the opposite of a purchase on the Internet. Physical stores must therefore find solutions to make it possible to buy faster and make customers want to make this trip (Materne, 2017).

Consumers' wish is therefore to save time in the process of purchasing a product (Derrey & Billon, 2015) thanks to a shorter waiting time at the checkout. Customers first want to be able to pay through several means of payment by credit card, loyalty card or PayPal but also want to be able to pay through terminals or sellers which would avoid queuing at the cash desk (Barba, 2013).

- **A personalized experience**

Almost 80% of consumers prefer a brand that offers a personalized experience (Kacen et al., 2013). This personalization can be done through different ways. First, customers want to be unique (Barba, 2013). Consumers are very well informed when they walk into a store, they generally know what they want and expect personalization, self-centered service (Kacen et al.,

2013). As seen previously, customers are sensitive to human contact and like little attention. When entering a store, they want to be welcomed, considered, recognized, and advised (Barba, 2013). Indeed, 45% of French people expect personalized messages based on their in-store consumption habits and 64% of consumers would like their purchases and tastes to be better considered when they request them (Carteron, 2013) which can be done thanks to their purchase histories (Barba, 2013).

In addition to being unique, customers expect a lot from sellers. Which means pleasure in the exchange with the client, personalized advice but above all expertise (Barba, 2013). Consumers feel they know more about products than sellers, so to remedy this, 57% of French people want sellers to be as connected and master smartphones and tablets as well as consumers which would allow sellers to have all the information they need for advice at their fingertips.

Finally, nowadays a personalized experience is acquired thanks to digital. A connected store attracts and motivates customers to make the trip (Weber, 2014). Indeed, customers expect brands to be more and more digital, equipped with devices to test products in close to real conditions and offering an immersive experience. But still, to have autonomous access to information. The client needs to feel that he is in control (Barba, 2013).

Now that we know who these new customers are and their expectations, it's important to understand the customer buying experience and its dimensions.

2.3. In-store customer experience

2.3.1. The customer experience

The customer experience is today an essential marketing concept, especially in the retail world (Druguet & Vallet, 2015). In the 1980s, the notion of experience entered the marketing lexicon following the work of two American researchers, Holbrook & Hirschman (1982). Indeed, according to them the consumption experience as a phenomenon directed toward the pursuit of fantasies, feelings, and fun. 20 years later, the notion of experience has become a key element in the understanding of consumer behavior following Pine & Gilmore (2013) which highlighted the strategic issues of the consumer business for the practice of marketing by businesses of where the emergence of a new so-called “experiential” marketing. This concept is therefore part of the transition made by marketing in recent decades. We have in fact moved from marketing previously focused on the product to marketing placing the customer at the heart of

its strategy and actions. It must be said that in the digital age, consumers are not far from having taken power and their demands on brands and businesses have greatly developed (Druguet & Vallet, 2015).

The customer experience is therefore the result of all the interactions that a customer can have with the brand or the distributor according to his expectations (Carteron, 2013). It refers also to all the perceptions, emotions and feelings experienced by a customer before, during and after the purchase of a product or service (Daucé & Goudey, 2017). The customer experience therefore goes beyond the quality of the service provided and considers all aspects of the offer: customer service, marketing, packaging, product, associated services, ease of use, reliability. Each distributor must define what type of experience they want their customer to experience, in line with their company's strategy: its position on the market, its competitive advantages, its profitability objectives, its brand values, etc. (Carteron, 2013). Indeed, according to the experiential approach, the role of the company is to help the consumer to produce his experience through a favorable experiential context. And according to Caru & Cova (2006), the experiential context is defined as “an assembly of stimuli (products, environment, activities) suitable for bringing about an experience”.

So, the customer experience is above all a result of feelings and experiences, at different times and depending on the context. But pharmacy is not a business like any other. Customers enter a pharmacy to find a relationship of trust, a warm atmosphere, and an expertise in the field of health. These 3 elements are the basis of a successful customer experience in a traditional pharmacy and each lead to client satisfaction (Dornier & Pavie, 2019).

2.3.2. Four dimensions to create a good customer experience

As seen above, a good customer experience is therefore the ability to offer the most fluid customer journey possible at each stage (Druguet & Vallet, 2015), and to create unique, pleasant, and effective customer experiences (Samir & Soumia, 2020). Customer experience can be broken down into 4 dimensions. And being aware of these 4 dimensions and building marketing strategy around them increases the chances for all companies to provide their customers with a good customer experience. Indeed, according to an American study in 2009, these 4 dimensions make up the scale of the brand experience. And the results show that the brand experience affects customer satisfaction and loyalty through associations of brand personality (Brakus et al., 2009).

- Cognitive Dimension

A company must first consider the cognitive dimension of the customer experience. It concerns the acquisition of knowledge. A company must therefore consider all the elements to help the customer decide. More concretely, a company must provide all the information necessary for visitors to make a choice. This can be via price information, product availability or even being able to compare products with each other etc (Samir & Soumia, 2020).

- Sensory Dimension

The second dimension to consider is the sensory dimension. This is directly linked to the stimulation of the five senses: sight, hearing, smell, touch, taste. This stimulation can be done through virtual technology by seeking information on a terminal or by testing a product through virtual reality, for example. But also, through 3D the store's decor and its highlighting, the colors used or even the sound aspect etc. A technique that many stores use today (Samir & Soumia, 2020).

- Affective Dimension

The affective dimension is also a dimension to consider. This dimension is completely personal, it is linked to the positive and negative feelings generated by the visit to the store. The customer will think about his feelings, what he feels in the store like the feeling of confidence or well-being before even thinking about the criteria of the product he wants to buy (Samir & Soumia, 2020).

- Social Dimension

Finally, the fourth dimension of the customer experience is the social dimension. This is directly linked to the interaction during the visit with salespeople, other customers, friends, etc. As a store, it is not possible to control the interactions between the different customers, however the role of the salesperson is very important and contributes as much as the other 3 dimensions in the satisfaction or dissatisfaction of a store experience. Therefore, a seller must know each of his products and can help technologies to answer all consumers' questions (Samir & Soumia, 2020).

These 4 dimensions are additional and complementary as they are linked and the acquisition of one facilitates the acquisition of the others. In fact, the sensory dimension can help in the

acquisition of the cognitive dimension. Having an interactive terminal using the sense of touch will give all the information necessary to the visitor to make a thoughtful choice. However, it is important to understand that each person is different. It is therefore logical to admit that expectations are unique to each person and therefore logically different from the others. In other words, a good customer experience is different from a person to another one (Heitz-Spahn, 2014).

2.3.3. The advantages of a good customer experience

Providing a good customer experience is a real marketing strategy and offers many advantages for a point of sale. In fact, faced with ever-increasing competition from supermarkets and e-commerce (Druguet & Vallet, 2015), the performance of the in-store customer experience is an essential competitive advantage as it makes it possible to stand out from all (Carteron, 2013). This successful customer experience approach also gives the physical store real power to attract customers. The place then has meaning, potential and humanizes the customer relationship. It conveys good communication around the values of the brand and is part of an experiential approach thus marking the minds of consumers (Samir & Soumia, 2020). The advantage for a point of sale is therefore to make its brand known, to make it known and attractive. Because only really satisfied customers speak positively about their experiences. A study carried out by the KP / AM firm on 1,000 people questioned about their most positive experience with a brand shows that the customer experience is cited in more than 50% of cases, ahead of the good deal (16%) and quality (14%) (Carteron, 2013).

Finally, and as seen previously, providing a good customer experience is also a determining factor in the purchase of a product since it increases the probability of purchasing a product and subsequently helps make customers more loyal thanks to a memorable and pleasant shopping experience that makes you want to come back (Druguet & Vallet, 2015). The end goal for a company is therefore to obtain an optimal experience. According to Caru & Cova (2006/3) what generates pleasure in consumers is total immersion in an original experience. A real experience must be unforgettable if not extraordinary!

2.4. Digital in physical stores and improving the customer journey

Consumers are now multi-equipped, multi-connected, want more information, more speed and more of personalization. Indeed, once the players in the distribution have adapted and improved the 4 dimensions of the customer experience in their point of sale, they will need to differentiate themselves go beyond, by giving the customer a differentiating experience (Carteron, 2013). Digitization is therefore the solution to achieve this. Digitization can be vast because of the large number of technologies that currently exist. But according to a study, 9 added values to these technologies have been shown for the brand and / or the consumer: liveliness, mobility, co-creation, tele-transparency, interactivity, connectivity, availability information, communication between departments, personalization. All these added values have a transformative effect directly on the customer experience and can be linked to the point-of-sale pharmacy and its digitalization (Ziaie et al., 2021). Consumers have changed and want to live unforgettable and pleasant experiences thanks to the technologies which are now an integral part of their daily lives and do not want to change their new habits even outside their homes.

As seen above, the relationship of trust, the warm atmosphere and expertise in the health sector are the basis of a successful customer experience in traditional pharmacy. However, to meet the new demands of enlightened, impatient, and demanding patients, the dispensary pharmacy will have to become more efficient and offer more health services. The solution may be the digitalization of the pharmacy. Digitization will bring efficiency, personalization of services, improve the development of patient-pharmacist proximity and finally allow easy and rapid access to information, which is what "new consumers" are looking for (Decourteix, 2017; Rachinger et al., 2019).

Thus, the digitization of pharmacy is nothing more than improving supply and demand and replaces low value-added tasks with an intelligent machine. And each of these improvements that digitization brings leads to customer satisfaction.

2.4.1. The phygital store

Phygital commerce is a term that appeared in 2013 (Picot-Coupey, 2013) which represents “the combination between the physical world and the digital world within the point of sale to be able to offer to customer a richer and more continuous experience through different channels” (Antéblian et al., 2013). This notably involves combining the reassuring aspect of a physical point of contact, the possibility of “theatricalization” or experiential immersion of a place with the informational, commercial, and interactive wealth of the digital world (Picot-Coupey, 2013). Thus, phygitalisation designates approaches that aim to combine the best of the physical and the digital to deliver fluid sensory and emotional experiences (Antéblian et al., 2013). Another term often used is connected commerce which notably involves the digitization of the point of sale but also mobilizes other approaches such as the use of new connected technologies for in-store salespeople, digital means of payment, creation techniques, traffic at points of sale, etc. (Bressolles & Viot, 2021). Finally, a third term designating the use of technology in a point of sale is the web in store. It represents all the digital content used in stores to improve the customer experience (Rivet et al., 2019). This concerns all types of digital media in stores for customers and employees: TV screen, tablet, terminal, mobile, computer, display case or digital wall (Rachinger et al., 2019).

These 3 means of digitizing a physical point of sale are here in this context very close to each other and allow the adoption within a physical point of sale of digital applications to increase commercial efficiency and improve the customer experience (Bressolles & Viot, 2021).

2.4.2. The customer journey is evolving

The standard purchasing path called "brand funnel" has been transformed by the arrival of social networks and mobility (Druguet & Vallet, 2015). In the marketing concept, the journey is a funnel in 5 steps: 1-awareness (the consumer has a need and learns about the brand), 2-familiarity (he learns about the offers and creates a consumer-brand link) 3- preference (he learns about the brands selected via the speech of this one and is convinced by one in particular) 4-purchase (he buys) 5-loyalty (if he is convinced by the product he remains loyal and redeems, speaks to his entourage) (Weber, 2014).

On the other hand, back and forth between channels is increasing nowadays and that for all types of purchases including in the health sector (Heitz-Spahn, 2014). The new cross-channel buying journey is called the “consumer decision journey”. 1-consideration (the consumer takes

into consideration the brands they have selected based on their messages). 2- evaluation (he acquires knowledge from all sources of information and evaluates) 3- purchase (once in the sales area, he selects in full knowledge and buys) 4- experience (the consumer has an experience around the product who will build their attitude towards the brand and product) 5-loyalty (then will influence those around him). In this model, the consumer is influenced at every moment of the process and will be able to influence others (Druguet & Vallet, 2015).

Even though the pharmacy is a special place unlike other physical stores, patients have the same customer journey and always seek expertise and advice. 2 things those traditional pharmacies have in a limited way unlike digital pharmacies. In fact, first the function of technologies is to provide access to multiple information and to help personalize advice, but above all the help provided by these technologies gives pharmacists time to discuss more with their patients and therefore contributes to better customer satisfaction and loyalty (Decourteix, 2017; Rivet et al., 2019).

This is precisely what demonstrates Dekimpe et al. (2019) in their research. "Despite the growing success of the online channel, brick-and-mortar stores continue to play a central role in the consumers' buying journey. Indeed, digitalization enables brick-and-mortar stores to offer the level of convenience that consumers are accustomed to in the online channel. "

2.4.3. The point-of-sale digitization

Mobile-in-store techniques are all dematerialized, interactive, and technical technologies and tools, making up a new generation of Sales or Purchasing Aids called NAVA. These new technologies, present in pharmacies, are intended to help pharmacists be more efficient and offer more health services (Rivet et al., 2019).

2.4.3.1. Digitization improving pharmacist efficiency

- The digital walls behind the counter. The dematerialization of the offer is the most spectacular brick in the digitization of the point of sale (Nadel, 2018). Already more than 200 pharmacies equipped in 2016. The pharmacist clicks on the desired product, in the back office the robot will look for the product in stock, lower it via a pipe or a rail and the product is directly available to the pharmacist at the front office. For the point of sale this first makes it possible to reduce the exposed stock while presenting an extensive referencing, an enormous time saving for them and therefore allows an optimized customer service thanks to the interactivity that it is possible to achieve having with the client during the robot's work (Druguet & Vallet, 2015).

2.4.3.2. Digitization allowing easy access to information

- The interactive terminal available in self-service on the shelves is first useful for presenting the product catalog, accessing product sheets, information on availability in stock (Feenstra & Glérant-Glikson, 2017) but also allowing the customer to pass through order and pay directly on the screen before picking up purchases at the counter and benefiting from associated advice (Druguet & Vallet, 2015).
- Connected barcodes. Electronic labels make it possible to improve the quality of product information, and to re-establish a link between the consumer and the producer of the product. Indeed, the visitor scans the barcode of the chosen item via his smartphone and obtains real-time product information, stock availability information or demonstration videos on certain products (Ângelo et al., 2017).
- The digital showcase via attractive videos and posters makes it possible to promote certain brands and certain products. The digital showcase therefore makes passers-by want to go through the door (Rachinger et al., 2019) since it allows communication in real time and 24 hours a day (Daucé & Goudey, 2017).
- Mobile application. In Jakarta, consumers have adopted an application developed by pharmacies points of sale allowing the Indonesian population to buy and order products through the application without having to go to the pharmacy (Riantini, 2020). And according to Cobelli & Chiarini (2020) “a multichannel strategy is also important and on the verge of becoming crucial for ensuring customer satisfaction and loyalty”.
- The collection on smartphones aims to reduce waiting times and favor the "one to one" experience with store staff. This practice makes it possible to unclog checkouts and to offer personalized support from product advice to the act of purchase (Nadel, 2018). A loyalty factor and an investment that the pharmacy will hardly be able to do without in the future. Two-thirds of French people have already abandoned a purchase because of a long queue, which is often the case in pharmacies during peak hours (Druguet & Vallet, 2015).

2.4.3.3. Digitization improving the personalization of services

- The Shared Medical Record is a digital health record fully accessible to pharmacists. It is like "the patient's library" (Cases, 2017). This tool allows doctors, pharmacists, and all healthcare professionals to work in a coordinated fashion by having access to patient history, laboratory reports, vaccination status, etc. This file allows pharmacists to get to know their patients and to better personalize advice and prescriptions. The process is already established in Japan (Zhong et al., 2021).
- 3D printer: according to research, the pharmaceutical industry is starting to work with a new technology, the 3D printer. Its objective is to manufacture single-dose drugs, thus allowing total personalization of the prescription (Araújo et al., 2019).
- The "augmented" seller. Thanks to his touchscreen tablet, the seller will first have access to all the information and product availability in the store to help the customer make decisions (Nadel, 2018). The "augmented" seller has also the possibility of accessing the customer's purchase history (Druguet & Vallet, 2015).

2.4.3.4. Digitalization developing patient-pharmacist proximity

- Social media. A study has shown that marketing, customer service and products are the 3 areas where improvement needs to be made with point-of-sale pharmacies. The objective of social networks being to build customer loyalty by adding added value to consumers, social networks for pharmacists can therefore aim to help them identify, thanks to consumers, areas for improvement based on the negative comments received (Zhan et al., 2021).
- With the digitalization of pharmacies, there are now many websites where it is possible to buy drugs without a prescription and at any time of the day. On the other hand, it remains risky to choose drugs yourself. As seen previously, in India, on-call pharmacies are there to watch over these websites and provide direct advice to clients of the sites to help them choose their products and avoid self-medication. (Satheesh et al., 2019).

Following all these examples of the digitalization of traditional pharmacy, it is therefore possible to conclude that its objective is to improve the customer experience by facilitating the patient's visit to the pharmacy. Thanks to technologies, this allows pharmacists to have more time in front of their customers to help and advise them, which is the service that brings the most customer satisfaction (Decourteix, 2017; Rivet et al., 2019).

Finally, it is important to point out that the digitization of a point of sale also has an impact on professionals. According to a study carried out on the digitization of pharmaceutical logistics, it has been shown that digitization can extend their skills, their expertise, and their professional status (Barrett et al., 2012) since it makes it possible to improve 6 stages of logistics: management supply, product traceability, quality management, order management, digital assistance and finally the product experience which helps and relieves healthcare professionals (Araújo et al., 2019). In conclusion, technologies will play a role in the development of the customer experience only if they are integrated and accepted from the outset in the design of the service, while considering the consumer benefits that this will bring (Gregório & Cavaco, 2020).

2.5. Conclusion

Society as well as consumers have changed dramatically in recent times. New technologies are part of our life, and this directly impacts the customer journey and the in-store customer experience. Customer experience in a traditional pharmacy is made up of 3 elements: a relationship of patient-pharmacist trust, a warm atmosphere and a pharmacist who is an expert in his field. But to meet the current demands of new consumers who are expertise and advice, pharmacists must be more efficient and offer more health services than they do today. The solution is the digitalization of the pharmacy. In addition to a classic customer experience in a traditional pharmacy digitalization is there to make the care process as easy as possible. Efficiency, easy access to information, personalizing services, and developing proximity to patients are part of the customer experience of a digital pharmacy. And each of these lead to patient satisfaction (Decourteix, 2017; Rivet et al., 2019).

3. CONCEPTUAL FRAMEWORK AND METHODOLOGY

The research is particularly focused on the digitalization of traditional pharmacies. Thus, the third chapter is first made of the conceptual framework which will support the research hypothesis tested in this research. Then, the selected object of study will be presented and finally the chapter will present the method of data collection, as well as the design of the questionnaire and the analyze techniques.

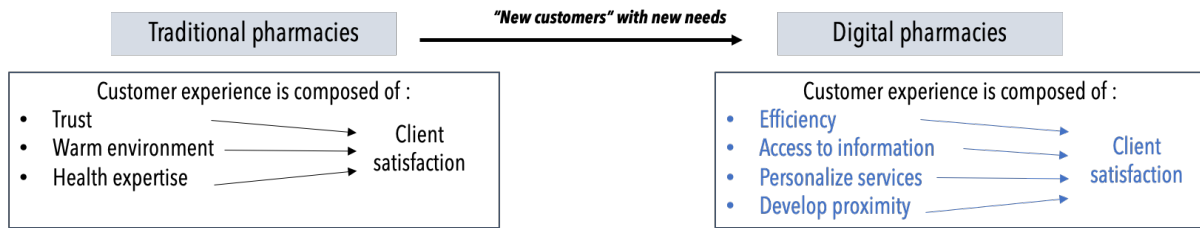
3.1. Conceptual Framework

As mentioned in the literature review, the current research shows the importance of understanding what role digitalization has in a customer's shopping experience, especially in pharmacies. This literature review first showed that society and consumers have changed, which leads physical stores to adapt and improve their services to make customers want to move (Weber, 2014). It has also been shown that the customer shopping experience has become a key issue for companies to remain profitable in the long term and therefore that they can no longer do without customer satisfaction. A pharmacy must therefore integrate digitalization in their physical stores which will help them to be more efficient and help them to offer more health services to their patients (Decourteix, 2017; Rivet et al., 2019).

Thanks to the literature review and the one developed by Materne (2017) seeking to prove the role that the digitization of a point of sale plays on customer satisfaction, his research model was selected to support the empirical analysis of this research. The empirical study by Materne (2017) shows as a main result that the consumer purchasing journey was improved by the presence of digital tools in physical stores, whether it is through attitude towards the brand, purchase intention and satisfaction. Consumers, indeed, have more favorable feelings when the traditional commerce in which they are projected is digitalized.

To maintain consistency with the study by Materne (2017) and compare them, the questionnaires for this study also use two independent groups. The first group is confronted with traditional pharmacy and the second group with digital pharmacy. The 2 questionnaires have the same number of questions and the same themes, all determining the level of satisfaction. The 5 questions presented in each of the questionnaires aim to confirm the results obtained in the literature review.

Figure 2 – Conceptual Framework



3.2. Research Hypotheses

This research focuses on the benefits of the digitalization of a pharmacy compared to a traditional pharmacy on the 4 dimensions that make up the customer experience in digital pharmacy: pharmacist efficiency, easy access to information, personalized services, and patient-pharmacist proximity. Those chosen independent variables are improvements that can be brought about by digitization in a pharmacy.

In his study, Materne (2017) conducted this analysis to understand and validate that the digitization of a point of sale has a positive impact on the customer shopping experience. The difference is that this current research focuses on the digitization of pharmacies and not physical stores in general.

To be more efficient and be able to offer more health services to their patients, pharmacists must integrate new technologies into their points of sale to satisfy their customers with higher expectations than before. Therefore, 5 hypotheses have been developed according to the results obtained in the literature review. The first 4 hypotheses are based on these 4 variables and tries to verify that they are indeed due thanks to the digitization of the pharmacy. The 5th hypothesis is there to verify whether, overall, patients would be more satisfied with their visit to a digital pharmacy than in a traditional pharmacy.

H1: Pharmacists are more efficient in a digital pharmacy than in a traditional pharmacy

H2: The digital pharmacy is an easier source of information than the traditional pharmacy

H3: The digital pharmacy gives a more personalized service than the traditional pharmacy

H4: The digital pharmacy makes it possible to develop more patient-pharmacist proximity than the traditional pharmacy

H5: Patients are more satisfied in a digital pharmacy than in a traditional pharmacy

3.3. Object of study

The research carried out is based on the quantitative study by Materne (2017), whose objective is to understand the benefits of digitalization in physical stores on consumers and mainly on their customer experience. Current research therefore aims to select a physical store with a broad target but above all to select a physical store, one that operates in a sector different from classical physical stores. In addition, and to have relevant results, the research must take place in another country than that carried out by Materne (2017) namely Belgium.

Therefore, the physical store selected for this search is the French pharmacy. The name "pharmacy" is quite recent, there have been stores for a long time, before the Middle Ages, where you could buy all kinds of medicine. Moullin et al. (2013) defined a professional pharmacy service as "an action or set of actions undertaken in or organized by a pharmacy, delivered by a pharmacist or other health practitioner, who applies their specialized health knowledge personally or via an intermediary, with a patient/client, population or other health professional, to optimize the process of care, with the aim to improve health outcomes and the value of healthcare." But the relevance of this choice of physical store to digitize can be explained by many factors:

- The pharmacy has always had a monopoly on the sale of drugs requiring prescriptions, which means that 4.5 million French people enter a pharmacy every day (Sanofi et al., 2018).
- Pharmacists have totally forgotten their facet of "trader" which leads to the closure of many pharmacies, particularly because of the many competitors who arrive every day on the Internet, and which attract all customers who do not need prescriptions to buy health products (Rolin, 2017).
- Pharmacists are therefore 85% ready to use a tablet for their patients and use connected objects to facilitate compliance (Rolin, 2017).
- The pharmacy therefore wishes to adapt to the new consumption patterns of the generation of 18–35-year-old who will become the next customers. While knowing that current seniors are more and more connected and understand digital as a practical tool (Rolin, 2017).

Therefore, the pharmacy is a suitable physical store for this research since it is a highly visited store and by a very broad target, but above all because the success of the pharmacy lies in frequent visits of its customers. To retain customers and compete with new Internet competitors,

pharmacists are ready to digitize their pharmacies, which will improve the customer shopping experience. And most importantly, customers of all ages support the digitalization of this point of sale.

3.4. Quantitative Study

3.4.1. Questionnaire formulation and validation

The quantitative study is based on the previous hypotheses thanks to the literary review but also based on the work of Materne S. (2017) who did research and a similar quantitative study on the digitization of points of sale using SPSS software.

The questionnaire was written to be able to measure the impact of digitization on pharmacist efficiency, easy access to information, personalized services, patient-pharmacist proximity, and client satisfaction in general (Rivet et al., 2019).

As Materne (2017) research, the current study is based on 2 different questionnaires, one on the traditional pharmacy and the other, with other respondents, on the digital pharmacy. Which means 2 groups of respondents with 1 experimental condition. Each questionnaire is made up of 5 questions and each question is linked to a hypothesis. The first questions of the 2 questionnaires are on the theme of effectiveness, the second question on easy access to information, the third on the personalization of services, the fourth on patient-pharmacist proximity, and finally the fifth on customer satisfaction. In addition, each question is introduced by a description of the pharmacy on the topic of the question, which helps the respondents to project themselves to answer as well as possible.

The 5 questions of the 2 questionnaires use the customer satisfaction scale with 7 response options developed by Oliver (1980) and translated into French by Vanhamme (2002).

Finally, demographic questions were introduced at the end of the questionnaire to analyze the data according to the gender or the age of the respondents and ensure that there was a homogeneity in the respondents so that it corresponded as much as possible to the diverse and varied clients of the pharmacy.

The questionnaire was first drafted in English and then validated by my tutor validating the various questions of the survey and avoiding possible misunderstandings and difficulties that respondents could encounter.

My subject being the digitization of pharmacies in France, the questionnaire was completely translated into French to facilitate the understanding of the latter for all respondents but also to optimize the number of responses. To analyze the results, the questionnaire was again translated from French to English in accordance with the reverse translation method.

Table 1. Dimensions and Items

Theme	Dimension	Item	Scale type	Question
Traditional and digital pharmacy	Efficiency	An efficient pharmacist	Customer satisfaction scale (Oliver, 1980)	Q1
	Information	Easy access to information		Q2
	Personalization	Personalization of services		Q3
	Proximity	Patient-pharmacist proximity		Q4
	Client satisfaction	Overall satisfaction		Q5
	Sociodemographic	Gender	Multi-dichotomous scale	Q6
		Age		Q7

3.4.2. Questionnaire implementation and sample

As indicated in the object of study section (section 3.3), the questionnaire targets customers of all ages and genders of French pharmacies. For this, the respondents were contacted via the social network, Facebook. The questionnaire was distributed on many Facebook groups. To have a high response rate the objective of the study was explained at the beginning of the study and by providing the link to the online platform where the questionnaire was available, Google Forms (see Annex 1).

For an analysis of this type to be consistent, it was asked to collect between 120 and 130 responses. After a period of collecting responses that lasted 1 week, it was possible to obtain a total of 120 responses, 60 answers for each questionnaire.

3.4.3. Data analysis techniques

The analysis below could be carried out using IBM SPSS Statistics version 27 software. Before starting the analysis, it was necessary to verify the reliability of the scales established for the various scenarios. This study shows that there is internal consistency within the results of the questionnaire. In other words, it allows to know if the respondents reacted to the questionnaire in the same way for all the questions having the same basis. The analysis of the reliability of scales is possible thanks to Cronbach's alpha (Bland & Altman, 1997).

To continue the statistical analysis and validate or not the 5 hypotheses developed in section 3.2. An analysis of the T tests for two independent samples is necessary since we are trying to compare results from the 2 different questionnaires. For these 2 hypotheses were formulated. A null hypothesis claiming that there is no significant difference between the means of the 2 groups and an alternative one-sided hypothesis claiming that there is a significant difference between the means of the 2 groups. The T tests for two independent samples analysis is repeated for the 5 hypotheses and allows the comparison between the 2 groups.

In his factor analysis, Materne S. (2017) observed that there was no relationship between age or gender and the preference between a digital store versus a traditional store. However, the appearance of digitalization in a health store such as a pharmacy may be difficult to accept for some patients. Indeed, health is an important subject for all, fear could set in following the arrival of digitalization (Rolin, 2017). Thus, a second analysis is done to determine if the type of pharmacy influence customer satisfaction differently depending on the age of the person thanks to an analysis of covariance, ANOVA (Fisher, 1925).

Finally, an observation of the socio-demographic responses was made to validate the variety and diversity of respondents on ages and genders.

4. DATA ANALYSIS

4.1. Verification of the reliability of the scales

Before starting the analysis of the questionnaire, it is essential to verify the reliability of the scales established for the different scenarios. For this, Cronbach's alpha on IBM SPSS Statistics is to be used on the results of both questionnaires. According to Bland & Altman (1997) a result greater than or equal to 0.7 is satisfactory and means that there is internal consistency within the results of the questionnaires, which means that the respondents reacted to the questionnaires in the same way for all questions having the same basis.

Table 2. Reliability statistics – traditional pharmacies

Reliability statistics	
Cronbach's alpha	N of items
,850	5

Table 3. Reliability statistics – digital pharmacies

Reliability statistics	
Cronbach's alpha	N of items
,817	5

For these both reliability test, the Cronbach's alpha obtained is greater than the set threshold since it reaches 0,850 for the traditional pharmacies questionnaire and 0,817 for the digital pharmacies questionnaire. This means that the data collected via the questionnaires can be used for statistical analyzes.

4.2. Hypothesis test

5 hypotheses were developed on the basis of the literature review. The objective of this step is to validate or invalidate them using statistical analyzes on the results of the questionnaire. For this, IBM SPSS Statistics software is used to perform T tests for two independent samples. The independent t test determines if there is a statistically significant difference between the means of two unrelated groups (Ingrand, 2018; Student, 1908). 2 hypotheses are stated:

Null hypothesis – H_0 : the hypothesis claims that there is no significant difference between the means of the 2 groups which are traditional pharmacy (μ_A) and digital pharmacy (μ_B).

$$H_0: \mu A = \mu B \text{ or } H_0: \mu A - \mu B = 0$$

Alternative unilateral hypothesis - H_1 : the hypothesis claims that there is a significant difference between the means of the 2 groups which are traditional pharmacy (μA) and digital pharmacy (μB).

$$H_1: \mu A \neq \mu B \text{ or } H_1: \mu A \leq/\geq \mu B$$

4.2.1. Influence of the type of pharmacy on the perception of efficiency

Table 4. Perception of efficiency

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
available pharmacist type of pharmacy-digitale	60	0	60	3,000	7,000	6,033	0,956
available pharmacist type of pharmacy-traditionnelle	60	0	60	2,000	7,000	4,350	1,132
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[1,304; 2,062]							
Difference	1,683						
t (Observed value)	8,798						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	<0,0001						
alpha	0,050						

The digital pharmacy average is higher than the one of traditional pharmacy, thus showing that digitization has a positive effect on the pharmacist's perception of availability.

To ensure that this difference is also observed in the population, a t test for independent samples is performed. The test value is 8.79, which is greater than the critical value of 1.98, and therefore this test is said to be significant, as shown by its p value <.05. It is 95% sure that in the population the difference in averages observed in favor of digital pharmacy will be observed. Hypothesis 1: pharmacists are more efficient in a digital pharmacy than in a traditional pharmacy is therefore validated.

4.2.2. Influence of the type of pharmacy on the perception of access to information

Table 5. Perception of access to information

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
pharmacy, a source of information type of pharmacy-digitale	60	0	60	3,000	7,000	5,950	1,156
pharmacy, a source of information type of pharmacy-traditionnelle	60	0	60	2,000	7,000	4,817	1,157
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[0,715; 1,551]							
Difference	1,133						
t (Observed value)	5,367						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	<0,0001						
alpha	0,050						

Here too, the digital pharmacy average is higher than the one of traditional pharmacy, thus showing that digitization has a positive effect on the perception of access to information.

To ensure that this difference is also observed in the population, a t test for independent samples is performed. The test value is 5.36, which is greater than the critical value of 1.98, and therefore this test is said to be significant, as shown by its p value <0.05. It is 95% sure that in the population the difference in averages observed in favor of digital pharmacy will be observed. Hypothesis 2: the digital pharmacy is an easier source of information than the traditional pharmacy is therefore validated.

4.2.3. Influence of the type of pharmacy on the perception of personalization of services

Table 6. Perception of personalization of services

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
personalized service type of pharmacy-digitale	60	0	60	2,000	7,000	5,717	1,290
personalized service type of pharmacy-traditionnelle	60	0	60	3,000	7,000	5,717	1,250
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-0,459; 0,459]							
Difference	-8,88178E-16						
t (Observed value)	0,000						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	1,000						
alpha	0,050						

The digital pharmacy average is identical to the one of the traditional pharmacy, showing that digitalization has no effect on the perception of service personalization.

Hypothesis 3: the digital pharmacy gives a more personalized service than the traditional pharmacy is therefore rejected since the test value is 0, thus less than 1.98 and $p > 0.05$.

4.2.4. Influence of the type of pharmacy on the perception of patient-pharmacist proximity

Table 7. Perception of patient-pharmacist proximity

Summary statistics (Data / type of pharmacy):							
Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
patient-pharmacist proximity type of pharmacy-digitale	60	0	60	1,000	7,000	4,717	1,508
patient-pharmacist proximity type of pharmacy-traditionnelle	60	0	60	3,000	7,000	5,633	1,149
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-1,401; -0,432]							
Difference	-0,917						
t (Observed value)	-3,745						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	0,000						
alpha	0,050						

The digital pharmacy average is lower than the one of the traditional pharmacy, showing that digitization has a negative effect on the perception of patient-pharmacist proximity.

To ensure that this difference is also observed in the population, a t test for independent samples is performed. The test value is -3.74, which is less than the critical value of 1.98, as is the p-value > 0.05 Hypothesis 4: the digital pharmacy makes it possible to develop more patient-pharmacist proximity than the traditional pharmacy is therefore rejected.

4.2.5. Influence of the type of pharmacy on the perception of client satisfaction

Table 8. Perception of client satisfaction

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
customer satisfaction type of pharmacy-digitale	60	0	60	3,000	7,000	5,583	0,962
customer satisfaction type of pharmacy-traditionnelle	60	0	60	4,000	7,000	5,350	0,936
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-0,110; 0,576]							
Difference	0,233						
t (Observed value)	1,347						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	0,181						
alpha	0,050						

The digital pharmacy average is higher than the one of the traditional pharmacy, showing that digitalization has a positive effect on the perception of customer satisfaction.

But in the end, there is no significant difference in satisfaction since the test value is 1.34, which is lower than the critical value of 1.98, just like the p value > 0.05. Hypothesis 5: patients are more satisfied in a digital pharmacy than in a traditional pharmacy is therefore rejected.

4.3. Age of respondents

Table 9. Analysis of variance (customer satisfaction) - part 1

Analysis of variance (customer satisfaction):

Source	DF	Sum of squares	Mean squares	F	Pr > F
Model	9	32,973	3,664	5,381	<0,0001
Error	110	74,894	0,681		
Corrected Total	119	107,867			

Computed against model
Y=Mean(Y)

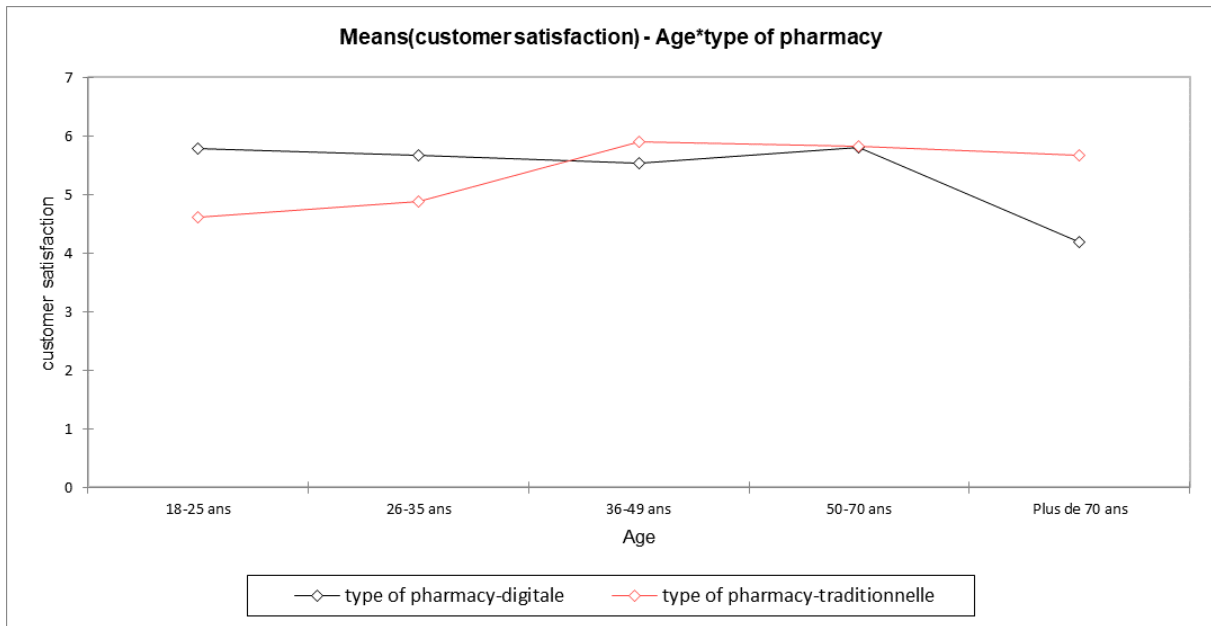
Following the analysis of covariance, 2-factors ANOVA (2 independent variables: type of pharmacy and age), the type of pharmacy has a different influence on customer satisfaction depending on age. The value of P being less than 0.05, the test is significant.

Table 10. Analysis of variance (customer satisfaction) - part 2

Model parameters (customer satisfaction):						
Source	Value	Standard error	t	Pr > t	Lower bound (95%)	Upper bound (95%)
Intercept	5,667	0,476	11,895	<0,0001	4,723	6,611
Age-18-25 ans	-1,056	0,515	-2,051	0,043	-2,075	-0,036
Age-26-35 ans	-0,792	0,559	-1,417	0,159	-1,899	0,315
Age-36-49 ans	0,228	0,513	0,445	0,657	-0,788	1,244
Age-50-70 ans	0,167	0,533	0,313	0,755	-0,889	1,222
Age-Plus de 70 ans	0,000	0,000				
type of pharmacy-digitale	-1,467	0,603	-2,434	0,017	-2,661	-0,272
type of pharmacy-traditionnelle	0,000	0,000				
Age-18-25 ans*type of pharmacy-digitale	2,645	0,661	4,002	0,000	1,335	3,955
Age-18-25 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-26-35 ans*type of pharmacy-digitale	2,258	0,703	3,214	0,002	0,866	3,651
Age-26-35 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-36-49 ans*type of pharmacy-digitale	1,117	0,679	1,646	0,103	-0,228	2,463
Age-36-49 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-50-70 ans*type of pharmacy-digitale	1,433	0,699	2,052	0,043	0,049	2,818
Age-50-70 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-Plus de 70 ans*type of pharmacy-digitale	0,000	0,000				
Age-Plus de 70 ans*type of pharmacy-traditionnelle	0,000	0,000				

Regarding the rest of the analysis, we observe that 3 P values have a coefficient less than 0.05 as well as a positive coefficient value (value column) which means that the significant coefficients are all positive and therefore mean that in the population digital pharmacy has a positive influence on satisfaction in the 3 age groups concerned (18-25 years old, 26-35 years old, 50-70 years old).

Figure 3. Age per type of pharmacy



Finally, a graph showing the results of the analysis of covariance. Respondents over 36 have a preference for traditional pharmacy. Indeed, the average for traditional pharmacy is 5.85 and 5.38 for digital pharmacy. Conversely, respondents under 36 have a preference for digital pharmacy. With an average of 5.73 and 4.69 for traditional pharmacy.

4.4. Homogeneity of repondents

Table 11. Age of respondents

Age of respondents	Percentage
18-25	31%
26-35	19%
36-49	25%
50-70	18%
More than 70	7%

The majority of respondents are between 26 and 70 years old with 63%, then the 18-25 years with 31%, and finally the repondents of more than 70 with 7%. The age of the respondents is rather consistent with the current customers of the pharmacy, since 73% are 35-65 year olds (Rolin P., 2017).

Table 12. Gender of respondents

Gender of respondents	Percentage
Women	65%
Men	35%

The vast majority of respondents are women with 65%, then men with 35%. These figures roughly represent the current customer base of the pharmacy, since there are as many male and female customers in the pharmacy (Rolin P., 2017).

4.5. Discussion

According to statistical tests, digitalization brings efficiency to pharmacists and easier access to information for customers. The 3 other hypotheses are not significant, which means that there is no difference between traditional pharmacy and digital pharmacy.

Table 13. Results from the Statistical Analysis

Hypothesis	Description	Result
H1	Pharmacists are more efficient in a digital pharmacy than in a traditional pharmacy	Accepted
H2	The digital pharmacy is an easier source of information than the traditional pharmacy	Accepted
H3	The digital pharmacy gives a more personalized service than the traditional pharmacy	Rejected
H4	The digital pharmacy makes it possible to develop more patient-pharmacist proximity than the traditional pharmacy	Rejected
H5	Patients are more satisfied in a digital pharmacy than in a traditional pharmacy	Rejected

In this study, the digitalization of the pharmacy gives a perception of the effectiveness of the pharmacist more important than if this one is in a traditional pharmacy. These results obtained are similar to the research carried out by Nadel (2018) who explains that the digitization of a pharmacy begins with the digitization of back office management. This aid to the pharmacist is also supported by Barrett et al. (2012) who demonstrate in their study that digitization can extend their skills, expertise and professional status by saving time and learning to use new technologies. Finally, the results obtained also match those of Araújo et al. (2019) who explain that digitization makes it possible to improve 6 stages of logistics including order management and the product experience that helps and relieves healthcare professionals. All of this research

shows that automating inventory saves pharmacists time and therefore allows them to take more time to discuss with these patients and advise them.

Our study therefore complements this research by showing that customers are indeed satisfied with the arrival of digitalization aimed at improving pharmacist efficiency.

The second validated hypothesis demonstrated that the digitization of the pharmacy gives better access to information than in a traditional pharmacy. These results obtained are similar to the research carried out by Beck & Crié (2015). According to them, the new sales and purchasing aids can be classified according to 2 axes, one of which is "facilitating the choice". This axis can be achieved via media with certain characteristics such as dematerialization or the degree of interactivity that certain technologies such as interactive kiosks make up. Feenstra & Glérant-Glikson (2017) also did research with similar results as ours. They focused on interactive decision-support technologies allowing the customer to produce a service in complete autonomy and demonstrated that these technologies had an "assistance" dimension to help the customer in his research and an "education" dimension to explain product features and how to use them to customers. These two studies clearly show that point-of-sale digitization provides better access to information than in a physical store.

But our study complements their research since it is conducted in the pharmacy, which is a particular point of sale. Our research shows that it is much easier to access information when the pharmacy is equipped with technology than when it is not.

In this study, the hypothesis of personalization of services through digitization was rejected, which is in disagreement with certain studies present in the literature review. Indeed, Decourteix (2017) affirms that new technologies in pharmacy improve the personalization of services, in particular thanks to shared files, as Zhong et al. (2021) who explain that in Japan "the regulated digital pharmacy could be an innovative solution based on systems of electronic health records and computerized entry of doctor's orders". On the other hand, their study is based in Japan and not in France as is the case for us, which may explain part of the mismatch in the results. This difference in results is confirmed thanks to the research of Gregório & Cavaco (2020) which explains that at present the technologies are not mature enough to enter the pharmacy. In addition, according to them "it is important to continue to focus on the sustainability of an increased role for pharmacists, providing services that highlight their social role" which is the opposite of improvement the personalization of services thanks to the digitization of our hypothesis. In conclusion, technologies will play a role in the development

of the customer experience only if they are integrated and accepted by all which is not currently the case according to the results of our own study.

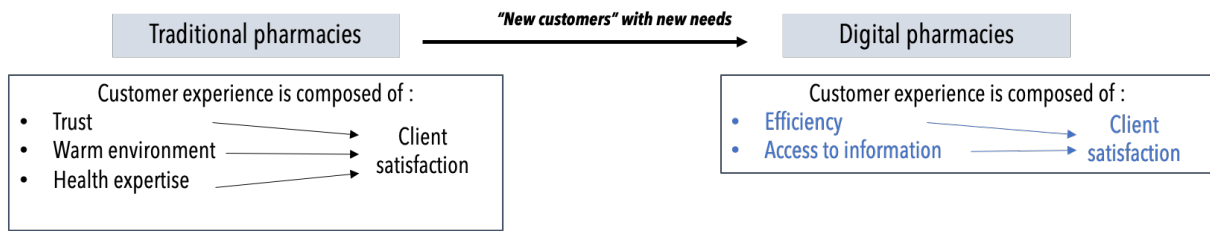
The fourth hypothesis is also rejected. The digitalization of the pharmacy does not make it possible to develop more patient-pharmacist proximity than in a traditional pharmacy. Once again, the results disagree with Decourteix (2017) who affirms that new technologies in pharmacy develop patient-pharmacist proximity, in particular thanks to the possibility of contacting the pharmacist remotely, just like the study by Satheesh et al. (2019). Satheesh et al. (2019) explains in his study that the Indian population is in favor of buying drugs on the internet if there are pharmacists available to help them. On the other hand, this same study explains that it is very dangerous to buy on the Internet and to self-medicate. This explains why our hypothesis was rejected given that the example of the questionnaire was that of Satheesh et al. (2019).

Finally, our latest analysis showed that customer satisfaction in digital and traditional pharmacy depends on the age of the patients. Indeed, even if the last hypothesis which relates to better customer satisfaction in digital pharmacy than in traditional pharmacy has been rejected and is in disagreement with the research of Decourteix (2017), it has nevertheless been confirmed that people over 36-year-olds are more satisfied in a traditional pharmacy than people under 36, who seem to be more satisfied in digital pharmacies. This result is in disagreement with those of Materne (2017) who after conducting a study similar to ours with 2 groups of individuals: 1 being aware of the traditional store and the second of the digital store, these results showed no preference depending on the age or gender of these respondents. On the other hand, its analysis was carried out now 3 years ago. The spread of the digitization of points of sale was not the same as it is today and its study does not focus on pharmacy, which, as a reminder, is a health store, and health is a very serious subject, especially for elderly people who are reluctant to integrate technology into a pharmacy. Indeed, when a customer goes to a clothing store, it is mostly a pleasure purchase where you don't know what you want when entering the store. On the other hand, when a customer enters a pharmacy, even if he has no idea of the brand he wants, a customer knows very well why he needs to go to a pharmacy, his purchase is a utilitarian purchase, for his well-being (Kaur, 2013; Wahba & Bridwell, 1954). These same results were found by Vidal (2003). Indeed, he explains that people who have not lived with new technologies since the beginning of their life are less used to and must familiarize themselves with new technologies. They have the "transition generation", but after a period of

adaptation these people are no longer resistant to the idea of having new technologies everywhere.

Following the validity of 2 of the 5 hypotheses, the final model of the customer experience in digital pharmacy is made up of 2 dimensions: pharmacist efficiency and easy access to information. Both giving patients satisfaction.

Figure 4 – Final Model



5. CONCLUSION

The purpose of this last chapter is to conclude the study carried out. As a reminder, the study consisted of emphasizing the benefits of digitizing stores and in particular pharmacy on the customer shopping experience.

This chapter is made up of three parts. A general conclusion of the empirical study carried out, the main managerial contributions and finally the limits of the study as well as suggestions for future research.

5.1. General conclusions

This dissertation aimed to determine what role the digitalisation of point-of-sale has on the customer purchasing experience in pharmacies, by asking whether digitalization in pharmacies is as important as in other physical stores, and if the dimensions of the customer experience in a digital store have a positive impact on customer satisfaction.

It was first necessary to explain the evolution of society, the change in consumer behavior but also to define the customer experience and finally list the new technologies and their benefits for traditional pharmacy.

By means of intergroup analysis using SPSS software, analysis of customer satisfaction of a group having been subjected to the case of traditional pharmacy and of the second group subjected to the case of digital pharmacy according to the four dimensions of the customer experience in digital pharmacy found in the literature review made it possible to start on this study. Thus, it has been shown that digital point-of-sale provides pharmacists with efficiency in their work and helps facilitate access to information for customers. 2 roles bringing customer satisfaction following a purchasing experience in a digital pharmacy that is much smoother and more pleasant than in a traditional pharmacy.

It was then appropriate to focus on the age dimension of the patients. This approach was adopted in this last step, that of researching, some expressions of satisfaction with regard to digital pharmacy and of confronting the different points of view. The sample suggested disparities in the customer satisfaction of different pharmacies, across ages, and give grounds for analysis.

The idea that digitalization in pharmacies improves the shopping experience and customer satisfaction needs to be moderated. As Gregório & Cavaco (2020) rightly says, new technologies are not yet sufficiently developed to be appreciated in pharmacies.

Digitization in pharmacies has not had the expected satisfaction in France yet. Only the efficiency of the pharmacist and the ease of access to information were emphasized by the respondents. Unfortunately, digitization does not bring patient-pharmacist proximity and the personalization of services yet, things that are highly sought after by French people. This is the beginning of the digital for the pharmacy in France.

5.2. Managerial implications

As stated previously, a good customer buying experience is an essential asset for a business. It is now placed at the heart of any business strategy. Indeed, it allows to have satisfied customers and therefore customers who return to the store and is thus defined as a competitive advantage (Dampérat, 2006). The digitization of a point of sale and thus its modernization is also a point of difference and therefore a competitive advantage that tends to be developed by French stores.

As a result, this research highlights the importance for a pharmacy to provide a good customer shopping experience through digitalization, which is now an integral part of everyday life for the French.

Thanks to the use of the scale of Oliver (1980), research brings new elements by taking pharmacies customers as an example. The questionnaire emphasizes that it is important for a pharmacy to add certain types of technologies to its store, such as those helping the pharmacist's efficiency or those giving easy access to information for patients, which would make their customer shopping experience much more satisfying.

5.3. Limitations and Further Research

Despite all this research and investigation, the study has some limitations and therefore suggestions for future research can be identified.

First of all, the pharmacy is not a physical store like the others. The pharmacy is a health store where people come out of necessity and not for pleasure. Purchases in pharmacies are indeed important purchases and for which we take the time to reflect because this is directly linked to our health.

Digitization in pharmacies is certainly a distant subject for most French people. As demonstrated in the survey, the French are still struggling to understand the benefits of in-store digitization. As long as digitalization is not commonplace in more traditional physical stores such as supermarkets or clothing stores, the population will find it difficult to project and imagine such a thing in a pharmacy. Future research may take place on the same theme but in several years when digitalization has become more frequent in other types of physical stores.

The size of the sample for the survey may also be a limitation to consider. Indeed, even if the size of the sample was large enough for this study, it does not allow to generalize the results because of its size and the fact that it is not sufficiently representative of the current clientele of the pharmacy.

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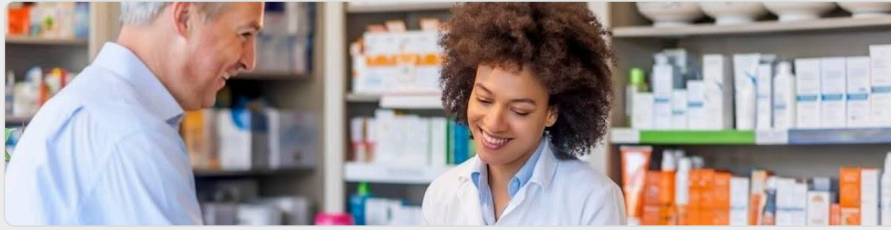
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APPENDICES

APPENDIX 1 – online questionnaire: traditional pharmacy



La pharmacie

Dans le cadre de mon mémoire de fin d'études en marketing, je réalise une étude portant sur les apports de la digitalisation dans les pharmacies traditionnelles sur l'expérience d'achat client.

L'objectif de ce questionnaire est de déterminer quel est le niveau de satisfaction client dans une pharmacie traditionnelle (sans digitalisation).

L'enquête dure au maximum 5 minutes et est entièrement anonyme.
Je vous remercie d'avance !

Question 1 : un pharmacien disponible

Lors de votre passage en caisse le pharmacien va chercher un par un les produits de votre ordonnance, vous pose des questions et vous conseille, puis revient au comptoir pour le paiement. Lors des heures de fortes affluences, le temps d'attente des patients peut augmenter. Quel est votre sentiment lors de cette situation ? *

1 2 3 4 5 6 7

Pas du tout satisfait ☐ ☐ ☐ ☐ ☐ ☐ ☐ Très satisfait

Question 2 : la pharmacie, une source d'informations

Le pharmacien est là pour vous apporter des informations sur les produits lorsque vous en faites la demande. Cependant le pharmacien peut alors avoir besoin de consulter son ordinateur afin de compléter ses renseignements, ce qui peut complexifier l'information partagée. Quel est votre sentiment lors de cette situation ? *

1 2 3 4 5 6 7

Pas du tout satisfait ☐ ☐ ☐ ☐ ☐ ☐ ☐ Très satisfait

Question 3 : un service personnalisé

Vous êtes dans la pharmacie et cherchez un médicament suite à votre visite chez le médecin. Le pharmacien, souhaite vous aider dans votre demande (posologie, moment de prise des médicaments, conseil pour bien les tolérer, conseil sur des produits additionnels pour compléter la médication...). Quel est votre sentiment lors de cette situation ? *

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Question 4 : proximité patient-pharmacien

La pharmacie est un point de vente de proximité géographique grâce à leur grand nombre. Les pharmaciens connaissent donc avec le temps leurs patients et une relation de confiance et de proximité est instaurée. La pharmacie est généralement ouverte dans la journée et partiellement le week-end. Quel est votre sentiment lors de cette situation ? *

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Question 5 : satisfaction client

Suite à ces différentes mises en situations développées quel est votre niveau de satisfaction envers la pharmacie ? *

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Questions démographiques

Etes-vous ? *

- ☐ Une femme
- ☐ Un homme

Quel âge avez-vous ? *

- ☐ Moins de 18 ans
- ☐ 18-25 ans
- ☐ 26-35 ans
- ☐ 36-49 ans
- ☐ 50-70 ans
- ☐ Plus de 70 ans

APPENDIX 2 – online questionnaire: digital pharmacy



La digitalisation dans les pharmacies

Dans le cadre de mon mémoire de fin d'études en marketing, je réalise une étude portant sur les apports de la digitalisation dans les pharmacies traditionnelles sur l'expérience d'achat client.

L'objectif de ce questionnaire est de déterminer si la digitalisation en pharmacie apporte réellement de la satisfaction client.

L'enquête dure au maximum 5 minutes et est entièrement anonyme.
Je vous remercie d'avance !

Question 1 : un pharmacien disponible

La pharmacie est équipée au niveau des caisses d'un tapis roulant pour réceptionner les produits souhaités par le patient. Une machine a été installée dans la salle des stocks pour éviter au pharmacien d'y aller et de gagner un temps précieux. La machine reçoit la commande via l'ordinateur du pharmacien, sélectionne les produits correspondant à la commande et les dépose sur un tapis roulant juste derrière le comptoir du pharmacien. Le pharmacien a ainsi plus de temps à consacrer à son patient et peut réduire l'attente en caisse. Quel est votre sentiment lors de cette situation ? *

1 2 3 4 5 6 7
Pas du tout satisfait ☐ ☐ ☐ ☐ ☐ ☐ ☐ Très satisfait

Question 2 : la pharmacie, une source d'informations facile

De nombreuses technologies permettent de digitaliser la pharmacie. L'une d'entre elle est la borne interactive ainsi que les QR codes à flasher disponibles en rayon afin d'accéder à de multiples informations sur les produits, de pouvoir les comparer entre eux et aussi de voir leurs disponibilités dans la pharmacie. Quel est votre sentiment lors de cette situation ? *

1 2 3 4 5 6 7
Pas du tout satisfait ☐ ☐ ☐ ☐ ☐ ☐ ☐ Très satisfait

Question 3 : un service personnalisé

Les pharmaciens peuvent être munis d'un nouveau logiciel permettant d'avoir accès à tout l'historique médicalisé du patient. Ce logiciel est commun à tous les médecins et pharmacies digitalisées afin de donner accès à ses ordonnances, son état de santé, son historique d'achat en pharmacie dans le seul but d'avoir assez d'informations pour conseiller correctement le patient sur la prise ou le confort du traitement. Quel est votre sentiment lors de cette situation ? *

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Question 4 : proximité patient-pharmacien

Avec la digitalisation des pharmacies, il existe maintenant de nombreux sites internet où il est possible d'acheter des médicaments sans ordonnance et à n'importe quel moment de la journée. En revanche, cela reste risqué de choisir soi-même des médicaments. Les pharmacies de garde sont donc là pour veiller sur ces sites internet et permettre de donner des conseils en direct aux clients des sites internet pour bien choisir leurs produits. Quel est votre sentiment lors de cette situation ?

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Question 5 : satisfaction client

Suite à ces différentes mises en situations développées quel est votre niveau de satisfaction envers une pharmacie digitalisée ? *

	1	2	3	4	5	6	7	
Pas du tout satisfait	☐	☐	☐	☐	☐	☐	☐	Très satisfait

Questions démographiques

Etes-vous : *

- ☐ Une femme
- ☐ Un homme

Quel âge avez-vous ? *

- ☐ Moins de 18 ans
- ☐ 18-25 ans
- ☐ 26-35 ans
- ☐ 36-49 ans
- ☐ 50-70 ans
- ☐ Plus de 70 ans

APPENDIX 3 – reliability tests

Table 2. Reliability statistics – traditional pharmacies

Reliability statistics

Cronbach's alpha	N of items
,850	5

Table 3. Reliability statistics – digital pharmacies

Reliability statistics

Cronbach's alpha	N of items
,817	5

APPENDIX 4 – T tests for two independent samples

Table 4. Perception of efficiency

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
available pharmacist type of pharmacy-digitale	60	0	60	3,000	7,000	6,033	0,956
available pharmacist type of pharmacy-traditionnelle	60	0	60	2,000	7,000	4,350	1,132
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[1,304; 2,062]							
Difference	1,683						
t (Observed value)	8,798						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	<0,0001						
alpha	0,050						

Table 5. Perception of access to information

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
pharmacy, a source of information type of pharmacy-digitale	60	0	60	3,000	7,000	5,950	1,156
pharmacy, a source of information type of pharmacy-traditionnelle	60	0	60	2,000	7,000	4,817	1,157
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[0,715; 1,551]							
Difference	1,133						
t (Observed value)	5,367						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	<0,0001						
alpha	0,050						

Table 6. Perception of personalization of services

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
personalized service type of pharmacy-digitale	60	0	60	2,000	7,000	5,717	1,290
personalized service type of pharmacy-traditionnelle	60	0	60	3,000	7,000	5,717	1,250
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-0,459; 0,459]							
Difference	-8.88178E-16						
t (Observed value)	0,000						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	1,000						
alpha	0,050						

Table 7. Perception of patient-pharmacist proximity

Summary statistics (Data / type of pharmacy):							
Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
patient-pharmacist proximity type of pharmacy-digitale	60	0	60	1,000	7,000	4,717	1,508
patient-pharmacist proximity type of pharmacy-traditionnelle	60	0	60	3,000	7,000	5,633	1,149
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-1,401; -0,432]							
Difference	-0,917						
t (Observed value)	-3,745						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	0,000						
alpha	0,050						

Table 8. Perception of client satisfaction

Variable	Observations	Obs. with missing	Obs. without	Minimum	Maximum	Mean	Std. deviation
customer satisfaction type of pharmacy-digitale	60	0	60	3,000	7,000	5,583	0,962
customer satisfaction type of pharmacy-traditionnelle	60	0	60	4,000	7,000	5,350	0,936
t-test for two independent samples / Two-tailed test:							
95% confidence interval on the difference between the means:							
[-0,110; 0,576]							
Difference	0,233						
t (Observed value)	1,347						
t (Critical value)	1,980						
DF	118						
p-value (Two-tailed)	0,181						
alpha	0,050						

APPENDIX 5 – ANOVA

Table 9. Analysis of variance (customer satisfaction) - part 1

Analysis of variance (customer satisfaction):

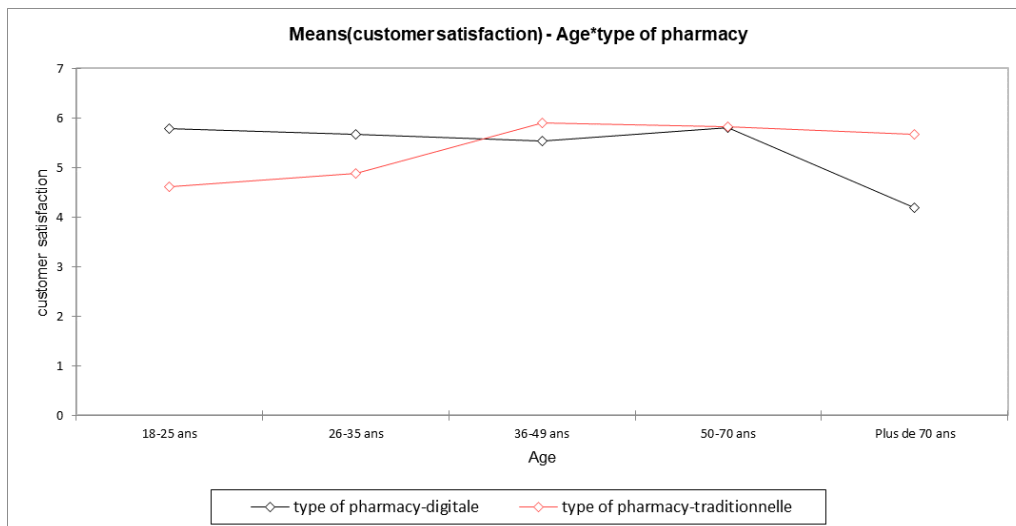
Source	DF	Sum of squares	Mean squares	F	Pr > F
Model	9	32,973	3,664	5,381	<0,0001
Error	110	74,894	0,681		
Corrected Total	119	107,867			

Computed against model
Y=Mean(Y)

Table 10. Analysis of variance (customer satisfaction) - part 2

Model parameters (customer satisfaction):						
Source	Value	Standard error	t	Pr > t	Lower bound (95%)	Upper bound (95%)
Intercept	5,667	0,476	11,895	<0,0001	4,723	6,611
Age-18-25 ans	-1,056	0,515	-2,051	0,043	-2,075	-0,036
Age-26-35 ans	-0,792	0,559	-1,417	0,159	-1,899	0,315
Age-36-49 ans	0,228	0,513	0,445	0,657	-0,788	1,244
Age-50-70 ans	0,167	0,533	0,313	0,755	-0,889	1,222
Age-Plus de 70 ans	0,000	0,000				
type of pharmacy-digitale	-1,467	0,603	-2,434	0,017	-2,661	-0,272
type of pharmacy-traditionnelle	0,000	0,000				
Age-18-25 ans*type of pharmacy-digitale	2,645	0,661	4,002	0,000	1,335	3,955
Age-18-25 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-26-35 ans*type of pharmacy-digitale	2,258	0,703	3,214	0,002	0,866	3,651
Age-26-35 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-36-49 ans*type of pharmacy-digitale	1,117	0,679	1,646	0,103	-0,228	2,463
Age-36-49 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-50-70 ans*type of pharmacy-digitale	1,433	0,699	2,052	0,043	0,049	2,818
Age-50-70 ans*type of pharmacy-traditionnelle	0,000	0,000				
Age-Plus de 70 ans*type of pharmacy-digitale	0,000	0,000				
Age-Plus de 70 ans*type of pharmacy-traditionnelle	0,000	0,000				

Figure 3. Age per type of pharmacy



APPENDIX 6 – Characterization of respondents

Table 11. Age of respondents

Age of respondents	Percentage
18-25	31%
26-35	19%
36-49	25%
50-70	18%
More than 70	7%

Table 12. Gender of respondents

Gender of respondents	Percentage
Women	65%
Men	35%