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The new way of clean clothing

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Master in International Management

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Department of Marketing, Operations and General
Management

ISCTE-IUL – Business School

October, 2022



BUSINESS
SCHOOL

Department of Marketing, Strategy and Operations

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Resumo

O propósito deste estudo é determinar a relação entre conceitos da cadeia de abastecimento, bem como retalho omni-canal, com o mercado das lavandarias. O objetivo é relacionar o mercado do retalho com o mercado das lavandarias, tendo como base o e-commerce, com a expectativa que o cliente tenha os mesmos comportamentos quando compra, numa plataforma e-commerce, no mercado do retalho e no das lavandarias. Isto é suportado por uma revisão de literatura nos campos de omni-canal, entregas *last-mile*, criação de vantagem competitiva e comportamento do cliente, onde as tendências de e-commerce foram identificadas. Foi possível identificar que os clientes preferem soluções digitais e realizar as suas compras online, pelo que ter uma plataforma que combine o uso de uma aplicação móvel com o serviço providenciado por uma lavandaria, seria um fator diferenciador nesse mercado. Investigação quantitativa foi realizada na forma de um questionário online, mostrando que a população inquirida tem interesse nas propostas de valor apresentadas, dado que a maior parte das pessoas que faz a sua lavagem e passagem de roupa em casa estariam inclinadas a recomendar a ideia a um amigo ou a um familiar. O plano de negócios elaborado para a implementação da ideia identifica os principais aspetos estratégicos, de marketing, tecnológicos, organizacionais e financeiros, que permitem a sua avaliação, hipotético financiamento e implementação efetiva. O plano financeiro desenvolvido para analisar a viabilidade do projeto obteve resultados encorajadores, pelo que, considerando a procura prevista, o mesmo começaria a gerar lucros operacionais em menos de 3 anos.

Palavras-chave: Entregas *last-mile*, Comportamento do cliente, *E-commerce*, *Clean*, Plano de negócios

Classificação JEL:

M13: New Firms – Startups

L81: Retail and Wholesale Trade – e-Commerce

Abstract

The purpose of this study is to determine a relation between supply chain concepts, as well as omnichannel retailing, and the laundry market. The aim is to relate the retail market with the laundry market, taking as basis e-commerce, with the expectation that a potential customer has the same behaviours when buying, within an e-commerce platform, in the retail market and in the laundry market. This is supported by a literature review in the fields of omnichannel, last-mile delivery, competitive advantage creation and customer behaviour, where the ongoing trends of e-commerce were identified. It was possible to identify that customers prefer digital solutions and online shopping, thus having a platform that merges the use of a mobile app with the physical service provided by the laundry companies will be a differentiating factor in the laundry market. Quantitative research conducted in the form of an online survey showed that the enquired population has interest in the value propositions presented to them, as most of the people that currently do their laundry at home were likely to recommend the idea to a friend or family member. The business plan elaborated to make the implementation of the idea possible identifies the key strategic, marketing, technological, organizational, and financial aspects, which allow for its evaluation, hypothetical funding, and implementation. The financial plan developed to analyse the viability of the project obtained encouraging results, as, considering demand predictions made, it would start generating profits from operations in less than 3 years.

Key words: Last-mile delivery, Customer behaviour, E-commerce, *Clean*, Business plan

JEL Classification:

M13: New Firms – Startups

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CHAPTER 1

Introduction

The project that is going to be elaborated is a business plan for an innovative idea, and that idea is named by myself as *the new way of clean clothing*, name that is also been attributed to the project itself.

This idea had a basis of, at first, the thought of the laundry market as place that, in Portugal, is very familiar based, i.e., a place where there isn't much digital development or e-commerce activity. On the other hand, it came as we were experiencing the impacts of the COVID-19 pandemic. It affected the whole e-commerce of the world, changing the nature of business and making so that the overall sales in its platforms increase because of the virus (Bhatti et al., 2020). Giving this, "the new way" is related to the digitalization of a process, process that is referred to the pick-up of dirty clothes at the preferred location of the user, and the delivery of them cleaned to that same location, done via a mobile application. To complete, "of clean clothing" is self-explanatory, as it is related to the cleaning service of the clothes that were previously picked up from the user, a service that would still be done by the companies that do it today. To clarify, it is a model very similar to Uber Eats, for example, as it is a three-sided marketplace connecting a driver, a restaurant owner and a customer, having the Uber Eats platform at the centre (Liam Austin, 2022). Only instead of a restaurant owner we'll have a laundry service company owner, and the app that supports the marketplace at the centre.

Furthermore, the value propositions associated with the implementation of this idea will be, firstly, directed to the user of the service, as customer perceived value is the number one driver of competitive advantage in the online shopping environment (Safie et al., 2019). Taking this into account, the main value proposition to the customer will be the ability to purchase a service of cleaning clothes, with a pick-up and delivery service, cheaper than the one that is provided by the laundry companies, as well as being a facilitator in case the customer is doing its laundry in a company that does not have a delivery service. As customers see price as the main source of value, i.e., the utmost utilitarian value is the price whereby customers can enjoy discounts and save transportation expenses by purchasing online, mentioned Safie et al. (2019), this will be the main value proposition of the idea. Following that, there's also a convenience factor in shopping online, as it is the second most important utilitarian value to the customer (Safie et al., 2019). The ability to purchase the cleaning service and be able to take ownership of the scheduling of the pick-up and delivery in an online environment will also be a value

proposition of this idea, as it is very valued by customers (Safie et al., 2019). On the other hand, there's also a value proposition directed to the companies that will be part of the intended marketplace, creating competitive advantages for them. This will happen because marketplaces offer undeniable advantages, such as prompt access to a lot of clients, mentioned Kawa & Wałęsiak (2019), as well as already established processes of payment and logistics. These companies would have the ability to focus their efforts only in their cleaning service, investing all their resources in it. The trade-off will be that they have to exchange part of their sales profits in return for being able to sell their services in a marketplace platform, as it is one of the revenue models by platform' owners (Kawa & Wałęsiak, 2019).

The purpose of this work is to develop a business plan to determine if starting a company with the basis of e-commerce, centred in the delivery part of the chain, in the laundry market is viable, as well as understanding the best corporate strategy to enter the market as a start-up. This will be supported through scientific concepts and research.

Following the presentation of the general idea and value propositions associated with it, I'll conduct a literature review to ensure that there is scientific material to support the assumptions made, as well as the strategy briefly introduced. Then, via an exploratory approach, conduct quantitative research. As Pritha Bhandari (2020) mentions, I'll do the process of collecting numerical data, with the purpose of finding patterns and making predictions about potential customers' behaviour. It'll be done through an online survey consisted of 17 questions with ratings scales that will allow the use of descriptive statistics, to get a summary of the data, and to perform inferential statistics, to then test the customer's value propositions (Bhandari, 2020a). I'll then elaborate a business plan to turn the idea into a company, identifying the key strategic, marketing, technological, organizational and financial aspects, which will allow for its evaluation, potential funding and implementation.

CHAPTER 2

Literature Review

In the sequence of the introduction given before, there's a need to understand, in the global context of the retail and services market in general, if this idea would be successful and if it would make sense to pursue.

As there isn't a lot of literature about the laundry market in the perspective of the delivery service, I'll relate the concepts associated with the delivery part of the supply chain in the e-commerce "world" with the laundry industry. These concepts are last-mile delivery, i.e., the final leg of a distribution network, as the term "last mile" was firstly referred to in the telecommunications industry, Lim et al. (2018), which relates to the home delivery service for customers. They are also omni-channel retailing, being that omni-channel relates to the integration of physical stores and online fulfilment operations in one place, mentioned Lim et al. (2019), which associates with the fact that laundry companies will have a digital marketplace to sell their services as well as an online logistics centre, being this the main strategy for the implementation of the idea. Also, this innovation is motivated by the dramatic growth of e-commerce, as it has strongly increased the development of retail and logistics industries in recent years (Vakulenko et al., 2019b). The aim is to relate the retail market with the laundry market, with the basis of e-commerce, expecting that the customer that buys in that market will have the same behaviour as the one who wants to get their clothes cleaned by a laundry.

On the other hand, the social context that we live in nowadays has compelled us to use the internet and make that a habit in our daily routine, Bhatti et al. (2020), because of the COVID-19 pandemic. Even after the vaccination periods its impacts are felt, the e-commerce business continuous growing and it is very likely that such new shopping behaviours may become the new normal (Nanda et al., 2021). Market adaption is being felt in almost all sectors, as the COVID-19 pandemic has accelerated the existing transition trends, mentioned Nanda et al. (2021), which were already enhancing retailers to adopt multi-channel strategies. Also, the subject of costs reduction, present in the value proposition related to the laundry companies, is also enhanced because of the impacts of the pandemic, as the economic downturn has made retailers from all markets adopt budget saving strategies (Nanda et al., 2021). In here I set a correlation between laundry companies and retailers, and that with communication technologies, retailers benefit from lower operating costs, as well as improved distribution

systems, says Nanda et al. (2021), which will then result in customers enjoying products and services with more competitive prices.

This study also will be a platform for further research to be done in the field of the supply chain and delivery, especially the relation between the last-mile delivery with the laundry market.

2.1. Omni-channel

The market is pulling in the omnichannel direction. Channel is associated with the customer touchpoint, i.e., the means that the company interacts with the customer (Simone & Sabbadin, 2017). As shopping experience became increasingly multichannel, the term omni became popular, as it is referred to use of the two channels, offline (brick-and-mortar) and online (e-commerce) (Simone & Sabbadin, 2017). In this sense, the omnichannel in the laundry industry, with the implementation of the idea, will be the laundry companies operating with their physical services through the digital environment created by the marketplace platform. Previously, the online channel was managed separately and given less importance than the brick-and-mortar one, mentions Simone & Sabbadin (2017), however changes in the customers' behaviour and the rise of new digital channels, particularly mobile apps, resulted in disruptive changes in the retailing context.

Following that, one of the most important aspects is to ensure the development of the distribution centres, in a way that creates competitive advantage towards the retailers or agents in the same market. Developing, click-and-mortar retailers, i.e., retailers that have hybrid operations via the development of both the offline and the online channels, mentions Lim & Winkenbach (2019), have sought to integrate their physical store and online fulfilment operations as a way to counter threats from competitors, especially the ones that only have online channels, called pure-play online retailers (Lim & Winkenbach, 2019).

In that sense, and to evolve in the omnichannel context, they must address the notion that traditional "distribution centre (DC)-to-store" replenishment is fundamentally incompatible with the online "DC-to-end-consumer" delivery approach, as mentions Lim & Winkenbach (2019). This means that, when entering the laundry business, replacing the traditional delivery system of laundries with a more efficient and focused delivery system is of the most importance, illustrated in the difference between DC-TO-STORE and DC-TO-END CUSTOMER.

The strategy that is going to be established for the implementation of the idea must pass through an omnichannel concept, being that the online channel shows significant growth in different markets, through various digital channels such as mobile sales, as per Rivero Gutiérrez & Samino García (2020), and the offline channel is facing dramatic decline. However, even though the offline channel is declining, it is important to maintain some physical presence, so that companies can understand what drives customers to every channel, offering them the best chance at a satisfactory purchasing experience (Rivero Gutiérrez & Samino García, 2020). As laundry companies will remain with their physical spaces even if they join the new marketplace platform, they'll have the physical and digital touchpoint with the customer, as well as from the platform point-of-view, it'll have both touchpoints available to it, providing the best chance at a satisfactory purchasing experience, as mentioned before in Rivero Gutiérrez & Samino García (2020).

On the other hand, there were several collapses prompted by failed omnichannel approaches in the retail sector. One example of this is, as mentioned in Lim & Winkenbach (2019), one big British company lost 164 stores and about 11 000 employees over the same period due to under-investment and failing to adapt its retail operations to the emerging trends. This means that companies that do not adapt to the “new omni-channel way” are closer to failure, which highlights the importance of aligning marketing efforts with the operational distribution activities. This is likely to happen soon in the laundry business as well, following the trend of the retail market.

To finish, studies argue that advanced technologies on digital devices merge touch-and-feel information in the physical world with online content, says Lim & Winkenbach (2019), so there's not to be a complete overhaul of the physical part of these markets. Giving that physical touch still is critical, the intended platform will have it both ways, maintaining the physical touch of the laundry for the cleaning service but operating in the mobile channel.

2.2.Last-mile delivery

Talking about last mile is a critical conversation in this matter, even more critical for retailers and service providers. Early definitions of LML (Last-mile Logistics) were narrowly stated as the “extension of supply chains directly to the end consumer”; that is, a home delivery service for consumers (Lim et al., 2018). Other definitions state that the last-mile is the portion of the downstream supply chain that directly connects retailers with the end-consumer and is often the most expensive segment of a supply chain (Lim & Winkenbach, 2019).

To ensure the proper application of the concept last-mile delivery you don't have to follow the rigid steps to adopt a certain LMSN (Last-Mile Supply Network) in a mechanistic manner, instead, it should be adapted to the firm's own idiosyncrasies, operational priorities, and organizational constraints when determining how to use the said framework (Lim & Winkenbach, 2019). This means that from a logistics point of view, establishing a suitable LMSN in a company is not done by firstly focusing on fulfilling previously wrote steps but, on the other hand, to have in mind the firm's business plans to pick which network fits the company the most. However, there are two general concepts that facilitate a company, from a logistics point of view, to implement a given LMSN – delivery responsiveness and product variety (Lim & Winkenbach, 2019). The author mentions that delivery responsiveness is related to the speed of delivery required, that can be slow or fast, and product variety is related to the range of products that the company has.

To summarize the concept of Last-Mile Supply Network, it is consisted by four variations: Simple LMSN is characterized by slow delivery responsiveness and low product variety, Hyperlocal LMSN offers fast delivery responsiveness and high product variety, One-Stop LMSN maintains slow delivery responsiveness and high product variety, and Protean LMSN provides fast delivery responsiveness and low product variety (Lim & Winkenbach, 2019). After knowing this, we can identify that, for *the new way of clean clothing*, the purpose is to create a supplying network with the basis of Protean LMSN, because it refers to providing a fast delivery responsiveness (faster than the model used as of today) for a low variety of product (clean clothes that were washed and/or ironed).

To explain, the model used as of today by laundries (who in fact do home delivery service) is very basic. They have drivers assigned to the laundry – co-workers – and they have certain routes to cover on a daily basis, making them full-time workers in those companies. They “new way” will be to ensure that the pick-up and delivery system is all done via on-spot drivers assigned in the platform, that obtain incomes via each pick-up or delivery that they do, therefor the laundry wouldn't need to have that cost with the drivers' part.

Why use the concept of Protean LMSN in this project, and more importantly, why apply it to the laundry market? Protean LMSN's have an ability to handle small and frequent orders via carefully curated product portfolios (Lim & Winkenbach, 2019). Their service architecture focuses on delivering moderate to high levels of unique services through the orchestration of cross-channel flows and the proper management of multiple points of interaction, reception, and returns (Lim & Winkenbach, 2019).

The e-retail experience is a fundamental concept in the customer journey when purchasing products or acquiring services in a certain retailer. Vakulenko et al. (2019) suggests that logistics is one of the sources e-retailers are turning in order to extend personalized services and offer flexibility to the customer, being that the last mile delivery experience is one of the several core elements of the e-retail experience, as it determines the success of one of the final steps in that journey. In this sense, personalizing the customer experience inside an e-retailing platform, giving it the ability to follow the delivery process (for example) is a differentiating factor, as the customer's perception of the online experience is linked with their experience following a parcel's delivery (Vakulenko et al., 2019).

From the perspective of e-retailers, last-mile delivery is the last step of the supply chain which connects retailers with their customers, mentions Hagen & Scheel-Kopeinig (2021), and because of being the last touchpoint with the customer, it has direct effect in its online shopping experience. Considering these effects, the last-mile delivery experience will also have direct impact in the customer satisfaction with the total e-retail experience (Vakulenko et al., 2019a).

As said before, creating and implementing an effective last-mile delivery experience has direct effect in customer satisfaction, i.e., the platform that will serve as basis for the implementation of the idea will have to implement an effective last-mile delivery experience, due to fulfilling the value propositions that it is committed to. If we take this into consideration, we can infer that, by creating and implementing an effective last-mile delivery experience, we'll increase customer satisfaction. Customers will care about their last-mile delivery experience because it will offer them convenience and flexibility (Lim et al., 2018).

The new way of clean clothing is to be built around the perception that there's an important balance to be achieved through enhanced product-channel-consumer alignment rather than "one-size-fits-all" solutions, which often result in poor delivery economics and bottlenecks when demand exceeds capacity (Lim & Winkenbach, 2019). Meaning that choosing to build a specialized channel that aligns both the vision of product and consumer is much more fruitful for retailers, applying the concept directly to the laundry market.

To finish this point, the solution should ideally focus on product-service differentiation through a personalized store experience and by offering customers a suite of convenient delivery options, mentions Lim & Winkenbach (2019), therefore the pick-up and delivery of the clothes cleaned by the customers' laundry of choice should be flexible, the customers should be able to select their preferred delivery place and the platform will have the ability to adapt to it.

2.3. Create competitive advantage

The implementation of this idea and platform has the aim to create competitive advantage not only for the “new company” itself, but also to the laundry companies that wish to be present in the platform. Firstly, companies will be gain competitive advantage in relation to others because they will be present in a marketplace, i.e., in a platform that offers services of numerous sellers, which can be bought by clients (Kawa & Wałęsiak, 2019). Although there will be other “sellers” in this marketplace, i.e., other laundry companies, they’ll have an advantage against the pure-play offline laundries (laundries that just operate through the offline channel), because marketplaces allow companies to enter and stay in the market with low financial outlays, becoming key selling venues for these companies (Kawa & Wałęsiak, 2019).

On the other hand, building a marketplace platform will also be a competitive advantage against other companies that want to enter the market in the same way that this idea is designed. As marketplaces have a business model based on collecting fees from sales made through them, mentions Kawa & Wałęsiak (2019), this intended marketplace will add other ways of generating revenue, in line with the delivery system previously presented, it will seek additional revenue by taking over their sellers’ (sellers being the companies present in the marketplace platform) fulfilment services, more specifically the delivery service. This type of revenue model is common to be seen in some marketplaces, having similarities to, for example, Amazon, as they operate with numerous sellers (Kawa & Wałęsiak, 2019).

Associated with the implementation of the platform, it is identified that technology plays a crucial role in omnichannel retailing, mentions Cai & Lo (2020), which is the retailing channel associated with the implementation of the platform. The authors also suggests that the impacts of technology in this type of retailing is reshaping competitive advantages of retailers and their supply chain partners, meaning that strategies that rely on price attractiveness and unique service providing are possible to be successful (Cai & Lo, 2020). To clarify, this is directly linked with the implementation of the platform as it has as basis the use of technology, more specifically a mobile application. Here, the creation of competitive advantage towards the “new company” will be done through the use of digital technology.

Moreover, developing a customer-focused framework – in which the priorities are the information and service delivered to consumers – is very important, says Cai & Lo (2020), which relates to the proposition of giving customer constant information (about delivery status, i.e., parcel's tracking) and the attractive price strategy that the platform is intended to implement, therefore creating another source of competitive advantage against its potential market peers.

The ability to generate customisation for the customer, as a “one-fits-all” business logistics model is absent, as per Cai & Lo (2020), is a differentiating factor in the business itself. The authors also mention that running cross-channel operations, such as cross-channel prices and promotion and cross-channel communication has significant importance, which means that creating opportunities to manage multiple channels and, therefore, creating synergies will be a differentiating factor of the new platform in relation to the existing market, as it will be a source of competitive advantage for the laundry companies that join that platform, because they'll be able to manage those multiple channels (online and offline) and create synergies with the platform itself.

As mentioned before, technology itself is key to advance in the retail landscape. The technological advancements (e.g., mobile apps, mobile payment, etc.) create opportunities for omnichannel retailing (Cai & Lo, 2020). The authors also mention that these technologies create strong links between the offline and online shopping, in the same way as they are changing the retail landscape, the retailers and their supply chain collaborators. This means that establishing the introduction of the platform that merges the use of a mobile app with the service provided by the laundry companies will be a differentiating factor in the laundry market.

2.4. Customer Behaviour

The ongoing developments of retail market changed the behaviour of consumers towards the way that the products that they buy and/or the services that they purchase are delivered to them, as the number of consumers that buy online continues to grow, together with the frequency that these purchases are made (Buldeo Rai et al., 2021). The authors also mention that this change in consumer behaviour revitalized the practice of home deliveries, as consumers prefer their homes to receive online orders in favour of alternative delivery locations that are available.

Associating the consumer behaviour to the laundry market, this implies that a laundry service company that can provide a delivery service along with the cleaning service, is more likely to be selected by the customer that one who isn't able to provide that.

As said before, the changes that we are witnessing in consumer behaviour are related with the fact that online markets are growing exponentially, even more with the COVID-19 pandemic effects, as it was time for e-commerce to intervene with vigour and vitality in the market, proving its importance in the field of online shopping (Abd Elrhim & Elsayed, 2020). It is also known that there was an increase in the e-commerce sale, in the worlds' markets, because of the virus' impacts, mentions Bhatti et al. (2020), as people were avoiding to go out, were keeping social distances and were buying from home. One example of this was Walmart, an American "giant" company, which watched its grocery e-commerce sales rise 74% in the COVID outbreak (Bhatti et al., 2020). Given this information, it is also important to have the knowledge that the impacts of the pandemic will continue to be felt, i.e., it is very likely that the new shopping behaviours that have arisen because of the pandemic will become the new normal, after it has passed (Nanda et al., 2021).

Due to the technological trends, as well as the ones who were provoked by the pandemic, the behaviour of the customers is to prefer digital solutions and online shopping, relating to the laundry market, customers will prefer to buy the service and schedule pick-up and delivery online, following these general market trends.

2.5. Inspiration

Although there's a high level of innovation present in the platform's business concept, there was a certain degree of inspiration coming from a similar idea implemented in a foreign country, India. India is quite different to Portugal, country where I'll pursue the initial implementation of this idea, however it has some similar aspects that indicate that the idea would work similarly.

There's a company called Happy Laundry that was created by Mr. Ramadhar Singh's family, which he joined to run in the mid 80's. This company was a "regular" laundry company who, in the vision of Mr. Singh, needed to go digital to expand their customer basis and provide a better service. The "problem" that he found on India's laundry market was that a large section of this industry was of unorganized service providers, and there was no concept of customer satisfaction into it (...) it was a completely demand driven industry with huge supply constraints (Verma & Reyes-Mercado, 2021). To counter this issue and implement digitalization in the business, Happy Laundry invested in developing an Uber-like mobile application through which the consumer scheduled their pickup and delivery times, mentions Verma & Reyes-Mercado (2021), the same that I want to do with *the new way of clean clothing*, however, not to be associated only with one company, but creating a marketplace environment for several laundry companies.

There was also a similar reason for Mr. Singh to develop his business in this fashion, must like what happened in Portugal with the country's centralization in the big cities, India was becoming more and more a country with urbanized life. This meant that with busy life schedule of urban people more and more consumers were looking for outsourced professional laundry services, says Verma & Reyes-Mercado (2021), something that would be unheard of before, as people did all their laundry at home. What we can infer by this conclusion is that as times go by, the lives of the general population are getting busier, especially in the main cities of developed countries, and there's more and more the need to have solutions for this lack of time. This was Mr. Singh did, using a digital solution, which inspired me to develop this idea and apply it, firstly, to my country.

Moreover, there was also another issue that needed addressing – in all, the industry challenge was about a "task of category creation" – changing a consumer behaviour that hasn't changed in decades (Verma & Reyes-Mercado, 2021). This means that Mr. Singh's company needed to change something in the customers mind that hasn't change for years, and that was the way laundry companies worked, as there was no digital solution ever implemented, like he wanted to implement.

Correlating, the case is also the same in Portugal, as the majority of the urban people do their laundry at home or use some kind of local laundry service, however they do not have the chance to use a digital solution or the buying power to use a local laundry service with a home delivery possibility. Like the perspective that I have, Happy Laundry had also a philosophy that the quality of service provided acts as the most successful medium of success, mentions Verma & Reyes-Mercado (2021), i.e., they are a customer-centric company, believing that the best way to be successful is through the quality that the customer perceives of it.

I believe that implementing this idea won't be easy, however it will be a process that requires time and, most certainly, dedication. "As the days passed on, awareness, reliability of the professional services increased, and the company started getting stable." said Mr. Singh about his new development of his company (Verma & Reyes-Mercado, 2021). There was a lot of inspiration and, also, guidelines from what Mr. Singh has done with his business that could be, in some degree, applied to *the new way of clean clothing*. He believed that having B2B contracts was a great source of revenue, B2B model constituted 60% of total revenue and B2C model constituted 40% of total revenue, says Verma & Reyes-Mercado (2021), meaning that intended platform will also be a connection between B2B customers and the laundry companies, providing additional revenues to the laundry service companies that are part of the platform's marketplace. Moreover, the main difference in terms of revenue models would be that the platform will use each service to earn a commission in the delivery fee and service price, while Mr Singh's model earned it by doing all the steps of the service.

To finish, marketing was also thought by Mr. Singh, as he had service providers that were given t-shirts with his company's logo, to give unique professional look and recognition in the market (Verma & Reyes-Mercado, 2021). As he sometimes had to hire other companies to ensure all the services that his customers wanted were fulfilled, those partners had clothes to represent them and give them recognition. The point is to act in favour of the service providers that are part of the platform and create win-win situations, they advertise the "app's brand", and the marketplace platform ensures that they have more service to provide.

2.6. Tools to conduct external, internal, and competitive analysis

In order to develop the business plan for the implementation of the idea, there's a need to conduct analysis respecting the external, internal and competitive environments.

With respect to the external business environment, which is highly dynamic, one of the tools that can be used to evaluate it is the PESTLE Analysis (Perera, 2017). The author also mentions that this model takes into account key aspects in the external environment, enabling conclusions of the industry's attractiveness and the prediction of market key success factors. In terms of the model itself, it is composed Political, Economic, Social, Technological, Legal and Environment factors, which make it highly significant for business appraisal (Perera, 2017). Political factors include political stability/instability, changes in government constitutions, government actions, government support to the industry in question and government policies, like monetary and fiscal policies. Economic factors are one of the most critical to organizational success, mentions (Perera, 2017), as they include tax rates, inflation rates, population growth, literacy rates and perception and purchase behaviours. Social factors, or otherwise described Socio-Cultural factors include cultural aspects, beliefs, ethical values and attitudes towards the business and industry in which the company is inserted, where adapting to these cultural values is important to get the best chance of success (Perera, 2017). Technological factors include technical upgrades, tech infrastructure, technical competency and the productivity of technology, and they are vital as most businesses operate over technological use, mentions the author. Legal factors include regulations, principles, guidelines or requisites, and they are normally specific to the industry in question (Perera, 2017). To finish, Environmental factors are related to the increasing pressures of global warming and sustainability concerns, they include industry average carbon footprint, emissions and waste disposable mechanisms.

Now relating to the internal environment, the selected framework to conducted was the SWOT analysis. SWOT stands for Strengths, Weaknesses, Opportunities and Threats and it connects the external environment to the internal environment of a company (Namugenyi et al., 2019). The author also states that Strengths and Weaknesses are internal factors, where Opportunities and Threats are considered external environmental factors. Explaining, Strengths are internal capabilities and positive factors of the business establishment, which are relevant for the firm to achieve their objectives and serve their customers (Namugenyi et al., 2019). Weaknesses relate to internal factors and constrains which might tone down the performance of the organisation. On the other hand, Opportunities are related to the factors or features that favour or facilitate the business establishment, says Namugenyi et al. (2019), with links to the external environment, being factors that companies can use to exploit their advantages. Finally, Threats are related to factors that can delay achievable goals, referring to negative external reasons for it to happen.

Finally, it is going to be developed an analysis towards the competitive environment. To do that the most suitable framework is the Five Force model by Porter, which enables an organization to get a better understanding of which industry players hold the most power and likely determine the rules of the activities (H. Th. Brujil, 2018).

Porter's Five Forces framework refers to the five forces being Threat of New Entrants, Bargaining Power of Suppliers, Bargaining Power of Buyers, Threat of Substitute Products and Services and the Rivalry Among Existing Competitors (H. Th. Brujil, 2018). The author mentions that the interactions of these five forces shape the competition in the industry are remain a continuous threat to the success of and organization. Developing the forces that compose the framework, Threat of New Entrants should be analysed in a sense of existing barriers to enter a certain industry, as it largely depends on how high they are and how many organizations are in that same industry (H. Th. Brujil, 2018). Bargaining Power of Suppliers depend on the number of suppliers, size of the supplier and availability of substitute suppliers, as they can threaten the industry with increasing prices of products. Bargaining Power of Buyers depends on the competitiveness of the market, as the ones with less players have more bargaining power than market that have more players. Threat of Substitute Products and Services refers to solutions that fulfil the same purpose as the one that the company has/is proposing to have, evaluating the switching costs between them (H. Th. Brujil, 2018). Finally, Rival Among Existing Competitors refers to the way that the competition is in the industry as of the day of the analysis, i.e., if rivalry among competitors is significant, profitability among the industry suffers, and companies must take business actions. It depends on the intensity of the competition in a given industry (H. Th. Brujil, 2018).

CHAPTER 3

Methodology

Introducing the Methodologies that seek to infer if the value propositions presented by the idea are appealing to the universe that its aiming to, being that the universe for this study is Portuguese and foreign citizens that live in Portugal, more specifically in the big cities (Lisbon and Porto). The methodology for this research will be done via an exploratory approach, as it will be an attempt to discover something “new and interesting”, as it is its definition (Swedberg, 2020) However, it is not possible to know in advance if something fruitful will come as consequence of doing it.

The next step is to define that this approach will translate in a method used for research. In this case the most suitable one (and the one will be used) is quantitative research. As per Bhandari (2020), quantitative research is the process of collecting and analysing numerical data, then used to find patterns and averages, make predictions, and generalize results to wider populations. The last part is major for this research, as I will not be able to enquire all the target population (universe, as stated before), it is important that the research conducted allows the generalization of results to wider populations. Also, quantitative research is widely used in natural and social sciences, more specifically economics (Bhandari, 2020a).

In terms of the methods used, there was a selection of research methods to pick from inside quantitative research, being them Experiment, Survey, Systematic observation, and Secondary research (Bhandari, 2020a). Between them, the one picked as the method to conduct this research was making an online survey. Bhandari (2020a) refers to surveys as a form of descriptive research, as descriptive research aims to describe a population accurately and systematically, which will be the most suitable method to infer conclusions from the value propositions associated with the idea.

The survey will be composed by 17 questions, most of them with answers referring to rating scales, i.e., Likert scale-type questions. Using Likert-scale means that the respondent indicates the degree of agreement and/or disagreement about some attitude, object, person, or event (Taherdoost, 2019). In this case, the Likert-scale type questions will be used for the respondent to indicate the degree of agreement or disagreement with statements and questions made about the idea itself, its usefulness and the value propositions that are stated to be associated with it.

The elaboration of this survey will then allow the use of descriptive statistics, that will give a summary of the data gathered and include measures of averages and variability, as well as support for the creation of graphs and frequency tables, in order to check trends or potential outliers (Bhandari, 2020a). Following that, it'll allow for the use of inferential statistics, i.e., allow to make predictions or generalizations based on the data, as per Bhandari (2020a), and test the hypothesis. Also, it gives the ability to estimate a population parameter, which is a number that describes a whole population, for example, population mean (Bhandari, 2020b).

Finally, the online survey conducted and a total number of responses of 96, meaning that 96 users responded to all the questions present in it, and it was done recurring to the survey program designed by *Microsoft, Microsoft Forms*. You can find the questions asked and the responses to them in the appendix section, annex D: Survey Questions and Answers.

Findings and Data Analysis

The first important aspect was to define the population that I wanted to target. As well as being that live in the Portuguese big cities, both of Portuguese nationality or foreign, it was also important to understand if young people that working full time, study and work part-time, or study full-time, as well as older adults that have their own households, would find value in this idea and if it would improve their lives. Therefore, the first questions asked were with the purpose of knowing their age groups and their gender.

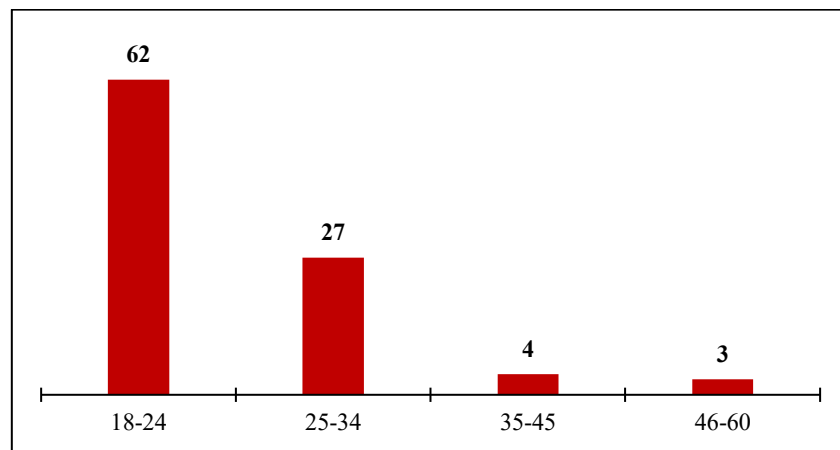


Figure 4.1 – Age groups of the respondents.

As said before, by using this survey I was able to enquire 96 people, which 65% of them belonged to the age group of 18-24, 28% were 25 to 34 years of age and, for the rest, residual percentages. As well as enquiring about the age group of the person answering this questionnaire, I also asked about their gender, being that 61% of the sample population were women and 39% were man.

Following that, I was able to also fulfil one of the conditions that I wanted for this survey, enquiring persons that were non-Portuguese and currently living in Portugal. The greatest purpose of this was to get an accession if someone that was not from the country and was temporarily or permanently living here, saw value and need in this idea. Of the 96 participants that I had in this survey, 91 were of Portuguese nationality – 95%, 4 were European (non-Portuguese) – 4%, and 1 was Brazilian – 1%.

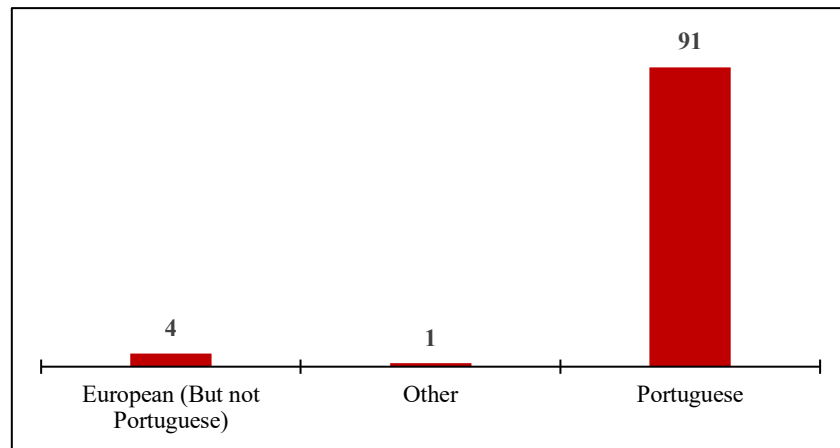


Figure 4.2 – Nationalities of the respondents.

Focusing, firstly, on the foreign persons that answered the questionnaire, I was able to understand that all of them lived outside of their parents' house, while 3 lived alone, 2 lived with a friend or with their partner. I also found that 4 of them did their laundry at home, being that, from this 4, 2 of them had real interest in the app and found the idea very helpful to their lives (answering 4s and 5s in the Likert scale questions – such as “Having an app like this would make your life easier, i.e., would it help with time management in your "day-to-day" life?” and “Would you be likely to recommend this potential app to a friend/family member/colleague? Do you think it would make sense for others to try?”). The one that didn't do his/her laundry at home, used a local laundry service. This person answered also 4s and 5s in the types of questions mentioned before, meaning that for a person that already uses a local laundry service, i.e., doesn't do their laundry at home, the implementation of the idea would be welcome to them. Finally, it is important to give note of a specific question asked in this survey – “Do you value home delivery instead of having to pick up the products that you buy or, more specifically, the clothes that you send to be cleaned?” – and it was answered almost the same from all the enquiries, they all prefer home deliveries. However, only 4 of the 5 opt for them when there are cheap prices and flexible schedules, which is one of the value propositions associated with the implementation of the idea.

Now looking at the broader part of the enquired population, the Portuguese nationality persons, there is a lot of conclusions to be taken from their answers, as they would be the main target in the beginnings of the implementation of the idea. One of the most important things was to know how's the distribution in terms of the place and method that people use to do their laundry.

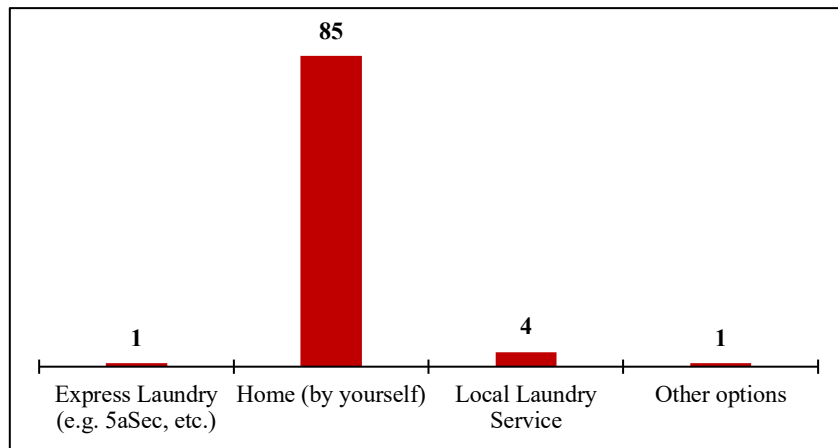


Figure 4.3 – Place were Portuguese respondents do their laundry.

I found something that was expected, as 93% of the Portuguese enquiries do their laundry at home, by themselves. Only 7% pick other places, and the place that this 7% go to the most is the local laundry service companies. We will analyse the level of interest of this big percentage of people that do their laundry at home, however there's a clear need for a change of behaviour and mentality for the idea to be massively implemented, i.e., to be accepted and "bought" by this percentage of people. It's common knowledge in Portugal that people do their laundry at home, and it's confirmed by the answers in this survey. It'll be a challenge to change this mentality, however we will see that there's opportunity to do that.

There were 3 questions in this survey that indicated the level of interest, value and willingness to use the platform that is the base of this idea. They were "Having an app like this would make your life easier, i.e., would it help with time management in your "day-to-day" life?", "What is your level of interest in a service like *the new way of clean clothing* (Picking up dirty clothes and delivering it back to your house, cleaned (...))" and "Would you be likely to recommend this potential app to a friend/family member/colleague?". Keeping in mind the context of this questions, what I wanted to know is what would be the answers in all 3 from people that were Portuguese and that normally do their laundry at home.

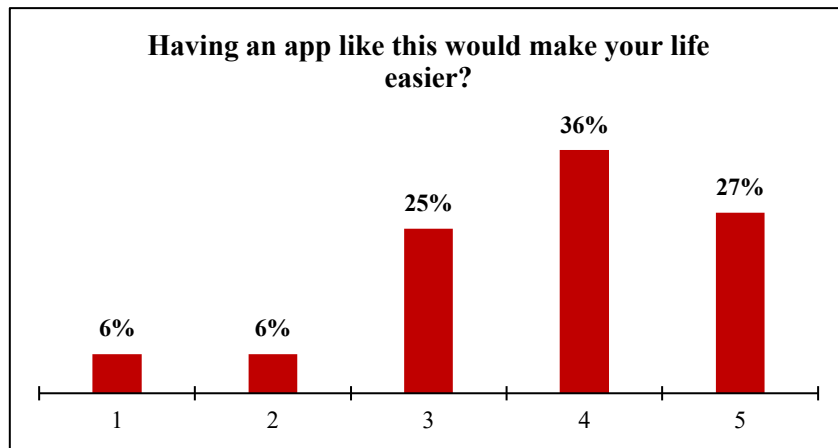


Figure 4.4 – Responses from Portuguese people who do their laundry at home.

From the 85 Portuguese citizens that answered this survey, 64% said that an app like this would make their life easier, i.e., they gave the question an answer of 4 or 5, considered “agree” and “completely agree”. This means that even people that normally do their laundry by themselves can see that there’s value for them with the usage of the intended platform.

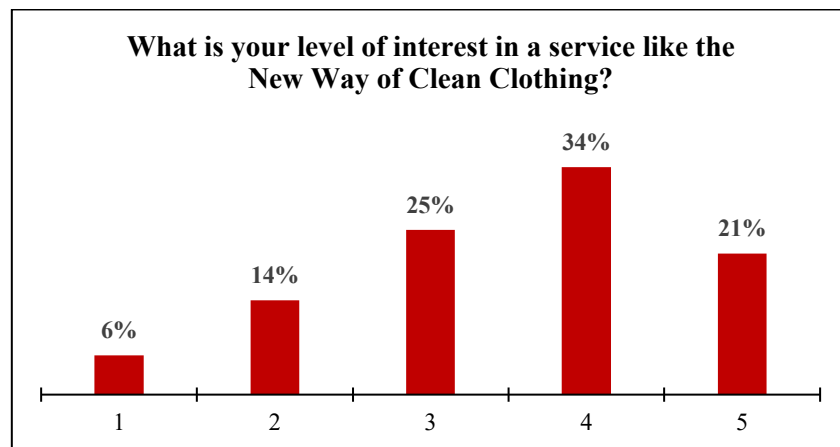


Figure 4.5 – Responses from Portuguese people who do their laundry at home.

On the other hand, level of interest is also something very important to measure, and it combines with the wish of making life easier and removing the chore of doing laundry. The important part here was to understand if a person that usually does their laundry at home would be “interested” (4) or “very interested” (5) in purchasing a service like this. The connection between these two questions is very important because a person can think that something would make their life easier but at the same time not be interested in it, as it serves an additional cost. In this case, 55% of the Portuguese population that does their laundry at home is “interested” or “very interested” in trying this concept.

To wrap up the explanation of why these specific group of people would be interested in the value propositions previously introduced, we'll at the response rates of the third question mentioned earlier.

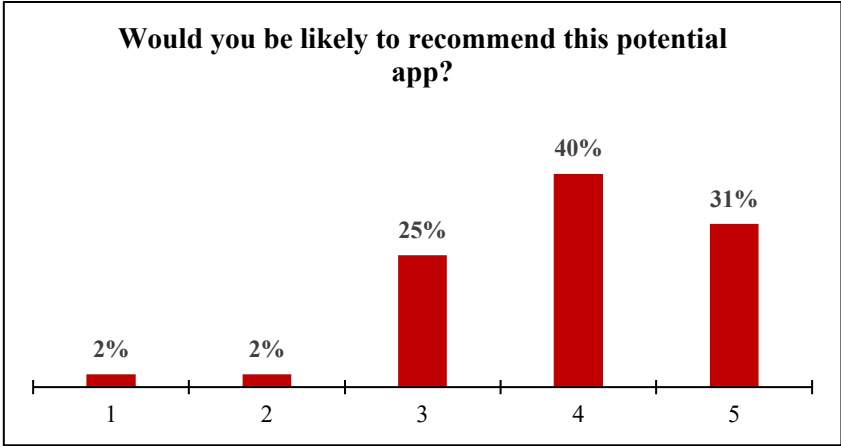


Figure 4.6 – Responses from Portuguese people who do their laundry at home.

Before analysing the responses to this question, it is important to have in mind that being recommended to a friend, family or a colleague by a customer is the best indication of company loyalty, as loyal customers usually make repeated purchases and influence others to make the same purchases as them (Rajasekaran & Dinesh, 2018).

In this case, we are talking about an idea, so recommending the idea is based on what the person was able to gather through the information presented on the survey and the questions that were asked to them. 71% of these enquiries would be “likely” (4) or “very likely” (5) to recommend this potential app to a friend or family member. This means that they consider that this platform would be of value for others to try. This is another indicator which refers to the potential interest of the target populations in the value propositions that are associated with the implementation of this idea, being that 71% of Portuguese people that, currently, do their laundry at home, have seen enough value in the idea to be, at least, likely to recommend it to a friend or family member.

Also, it is an important indicator because a lot of companies take into account a concept that has basis very similar to question, in the form of NPS (Net Promotor Score). Net promotor score is the calculation of customer satisfaction via the “ultimate question” of “How likely are you to recommend our brand/service/product to your colleague, friend or family on a scale of 0 to 10?” (Rajasekaran & Dinesh, 2018). The author also mentions that companies use it because is proved to be a huge breakthrough in customer satisfaction measured globally. In this

sense, having these kinds of inputs, even from a small population, is very encouraging towards understanding if the value propositions intended are also being perceived as valuable by potential customers. This is encouraging because, despite being in a small number, these responses are from people that, as of today, do their laundry by themselves, i.e., do not recur to a laundry company to do that “job” for them.

Following this, I’ll present the business plan of *Clean*, the name that I gave to the app that will be the basis for development of the platform presented across this paper.

CHAPTER 5

Business Plan

5.1. External Analysis

To introduce the business plan, I will start by providing the macro picture of the industry where *Clean* (name of the app that I will use further in this business plan, to represent the idea of *the new way of clean clothing*) is going to be inserted in. To make it easier for the reader, I will treat *Clean* as a company that is going to be established in the market as of now, assuming that the idea had funding and can start to operate under the name of the app.

To gain that macro picture of the industry, I'll conduct an external analysis with the PESTEL method as base, as mentioned in the literature review section of the paper (section 2.6).

Developing this analysis allows me to get an impression of the factors that impact this new business, and identify which fields impact it the most. Also, doing this will help understand what will be presented in the internal analysis, that will be done further in this paper, using the SWOT method as framework.

5.1.1. Political factors

Moving on to the PESTEL analysis itself, I'll start by providing the Political factors that impact the laundry industry and, more directly, *Clean*. Firstly, it's important to give note that the country that the business will be inserted in is Portugal, so it is important to know the reality of the country in the terms of its political environment. Portugal is a country that is now being run by a centre-leftist party, with policies that are generally more applicable to the citizen than to the company, i.e., is focused in more social matters than business ones. At the same time, the country has just started to kick-off its economy, just as the rest of Europe, after the great impacts of the COVID-19 pandemic. This pandemic will be spoken of more during the paper, in several of the PESTEL factors, as it is critical to changes of mentality in the consumers, however critical to government policies and money allocation as well.

As the recovery is taking shape, it is important to have notions of what is present in the State Budget for 2022, as well as what it is predicted for 2023. The State Budget defines clearly where the money from the state will be allocated and the percentage that companies will have

has help, being in literal money form, or through tax cuts. Normally, in Portugal, there aren't a lot of benefits directed to companies, at least not companies that are formed in Portugal. The Portuguese state is not known to give special conditions to those who want to start their business, despite the political party of the government that is in power at the certain time. However, there are a few tax benefits for start-ups and small to medium sized companies – the main tax paid by companies (named IRC in Portugal) is reduced to 17% in the first 25 000 euros of collectable matter (the amount that counts to this fiscal exercise), when it is normally 21%. Companies that report net incomes in the income statement inferior to 7 500 euros are not obligated to pay IRC.

In terms of the context of the 2023 State Budget, there are no specific measures defined specifically to the laundry industry, other of the ones that will impact the general market. Companies that are small to medium sized and have their activities in the interior part of the country have their taxes reduced to 12,5% (IRC) (Areias, 2022). To finish, it's important also to take note that, in the discussions of this following year's State Budget, there were no mentions towards simplification of the fiscal obligations and cost cutdown (Areias, 2022), directly applied to the lives of citizens and, also, very in line with the inflation rate that is currently still increasing. We are on a verge of a very difficult year to start a business, however that are certain needs that will always need to be addressed.

5.1.2. Economic factors

The economic reality is very in line with what was said before in the political factors. Inflation rate is one the concepts that concerns the population and businessmen the most. It's still climbing and the fact that the government has not installed, and as of now, not planning to install any specific policies to attack this phenomenon is also very concerning. It is likely that we see a reduce in demand in the following year, however *Clean* comes to fill a void that does not exist, as I believe that it's demand will be generated in the opposite direction of the general market tendency. The introduction of this app can be compared with the apps that are used for home delivery of food or other things, being that the use of this apps has exponentially been growing, even more because of the impacts of the COVID-19 pandemic. The use of home delivery apps for food has increased a total of 16 percentile points when comparing to the period before the pandemic (Pinto, 2021). In this article is also mentioned that the behaviour of the Portuguese consumers has changed with the pandemic, as they prefer home delivery even

though they are back to working at their offices, and that they prefer to pick from a wider range of offers, than just going to one specific place. This is exactly what *Clean* will offer.

From the data that I was able to gather, Portugal's unemployment rate is within the 5,8% mark, 1.1 percentile points below the same period of last year and 1 percentile point below the average of the Euro zone (GEE, 2022). This are good news to the Portuguese market, as it is clearly a better platform than other countries to start this type of business. In terms of economic growth, there is very interesting data about it, as Portugal has been the country that presented the highest percentage of economic growth in Europe, 6.5% (Euronews, 2022). This growth is very adjacent in the tourism sector, however all major economic sectors have grown when comparing to last year's results. The laundry sector followed the trend, mostly because of the COVID-19 pandemic effects that were still felt in 2021. When looking to 2023, IMF predicts that Portuguese economic will reduce drastically their economic growth rates to 0.7%, half of what the government predicts. Even though this sounds pessimist, the organization is predicting lesser growths to countries like Germany and Italy (Caetano, 2022). Just to finish with the numbers part, I'd like to mention that predictions for inflation rate in 2023 are also set. What will probably end with 8% in 2022, will have the value of 4% in 2023, numbers that, as mentioned before, are scary towards the consumer demand (Caetano, 2022).

5.1.3. Social factors

In Portugal there are a number of social factors that are determinant to this project. As the rest of the developed societies in Europe, there's a big tendency towards e-commerce, as there is a big tendency towards having less time available to do regular chores instead of spending it other ways, and this comes to young people, adults or even elder people. In the same hand, we can say that consumer buying patterns have changed rapidly because of (and this being the main reason but not the only one) the COVID-19 pandemic. Previously people didn't opt to shop as much as they do now in apps, to order food in apps and basically to do everything "phone connected". This is the main point for *Clean*, it'd be introduced in a time that people are "up for it", as they do a lot of other things through their phones.

Although we are talking about a population that is elderying with time, there's a lot of market in the young generation. Students that live outside their parents' homes and young adults still are a great percentage of the people that live in the big cities, the places where I would want to start implementing *Clean*. The awareness of apps is growing exponentially and as seen before in this paper, customers tend to prefer home delivery services, some with concerns with costs

and schedules, but others are even willing to pay more to get their products delivered home. It is a change of behaviour that we need to understand and take advantage of, in a society that evolves so rapidly and that is so impacted by social media and information systems, integrate a business in those means is the biggest opportunity.

To finish this point, it is important to look at the lifestyle of Portuguese working people – a busy lifestyle in a big city with a lot of things to do and a lot of things that are impacting them. As mentioned before, there's a great need for automated solutions of every market, especially in those that don't have any yet. The laundry market is a very “old school” business, and in a city like Lisbon, that people are more and more living a fast paced and time constraint life, there's a need for innovation here, to facilitate the lives of these busy people and take advantage of the market gap that exists here. This is what the food delivery companies did for example, they capitalized in the market gap that existed here, there was not any very accessible service that did home delivery of these goods, and now, potentiated by the impacts of the pandemic, these types of businesses have grown a lot.

5.1.4. Technological factors

Moving on to the technological factors that directly and indirectly impact *Clean* and the laundry/e-commerce market itself, there are important matters here that are very important to have knowledge of and also to the implementation of the project. Firstly, it is important to give emphasis that *Clean* will be an app, an app that will be able to be downloaded for free and used by the consumers in the market that it is introduced. That moves us on to the fact that Portuguese people, for instance, are buying more and more online – 45.5% of mobile app and internet users buy something online every week, being that more than half of these people who do buy online, use their smartphone to do it (Gomes M., 2022). The main people who buy online are also in the age group that this project is focusing on, i.e., the target population. It is known that Portuguese consumers between the ages of 18 and 44 are the ones who buy the most online (mainly through mobile apps) (Gomes M., 2022). It is also relevant to add that the main reason that these consumers come back to the websites or to the apps to buy again – or to use the service again – is because of the lower prices (Gomes M., 2022). Well, all of these facts influence directly the introduction of *Clean* in the e-commerce market, connecting the laundry market to the digital era.

Another point that is important to stretch is the patents and licenses required to get life into this business. To patent an idea in Portugal it is required to file a request to the competent

institution that looks after these enterprise deals, it is called National Institute of Industrial Property (INPI in Portuguese). It is necessary to file this request that consists in high descriptions of a lot of components of the idea, also being subjected to various “exams” to guarantee its authenticity, that is not a copy to any other idea already patented. The patent, when approved, is valid for 20 years maximum, but the person or enterprise that files it has to pay every year’s annuity to maintain its validity (GOV, 2021). It is free in the first 4 years, but after that it has a cost of about 50 to about 750 euros per year, increasing year-on-year. It is also important to add that filling a patent to the National Institute has a cost of 109,07 euros plus a few fees depending on what you need (this is the price for only patenting) (GOV, 2021).

In terms of licenses, other than the regular procedures of legalizing a company with the fiscal authorities of the country, there isn’t any specific normative that obligates companies that operate through apps to have. There will be commercial agreements between the company and the laundry service companies, there is going to be the need to implement the app in the “virtual stores” for the customers to download it (App Store by Apple, Play Store by Google, etc.) but there are no specific licenses needed for that. The app will be developed and certified by the people that do so, but other than that the only impactful thing is really the patents matter.

On the other hand, there’s an important mentioned to be made towards innovation in this sector, as it is very familiar based still. It is likely that, with the introduction of *Clean* in the laundry market, other services like so can arise, as we have a high number of laundries that already have a delivery service of their own. This is likely to be hard to break *Clean*’s value proposition because, to do so, the laundry companies would have to remain paying directly to those employees and, therefore, becoming less competitive (in their cost structure) when comparing to companies in their nearby areas that do remain partnered up with *Clean*.

To finish, is very important to give emphasis to the fact that we live in highly digital society, that by itself enables enthusiasts and businessmen to develop their ideas with a digital context to it. There are highly develop CRM tools to help segmentizing and manage customer relations, there was never so easy to find people to develop apps (for affordable prices, giving that we are talking about a start up) and the use of smartphones and mobile apps has never grown as much as it is growing right now. E-commerce is the main way to do business today, which goes in line with what *Clean* stands for and what it will bring towards the Portuguese consumer basis.

5.1.5. Environment factors

Environment discussions are held all over the world, as we definitely know. Across Europe the subjects of climate change and global impact of businesses are widely discussed and, of course, impact any business in any market. In the big cities, place where *Clean* will be implemented, the global footprint that we leave is very high, there are high numbers in pollution metrics and there is a need to do everything “greener”. Being that the company itself will be digital, the impact in it won’t be direct, however there are factors that influence the company indirectly, mainly in terms of the transportation part of the service (home delivery) and in terms of the laundry market that it will operate in.

When delivering the clothes to the customers’ homes, there will definitely be environmental impacts that need to be minimized, mainly to the preference for electrical vehicles, for vehicles that are of recent date (certification of less emissions of CO2 levels) and efficient trips, to reduce its periodicity to the absolute need times.

Also, developing a company in the 21st century is not possible to do without having a sustainability plan, being that for its employees or for the company’s practices itself. Companies are accountable for the sustainable development objectives that each country have and should be the front runners in implementing sustainable practices in their activities. *Clean* all will do to give the example in the e-commerce industry, reducing waste and especially focusing on the transportation matter. Also, *Clean* will have the responsibility to choose partners, i.e., laundry service companies that follow these sustainable directions as well.

5.1.6. Legal factors

To wrap up the external analysis for the company and the market that it will be inserted in, it is extremely important to talk about the legal factors that impact them. The legal factors are a sum of other factors that we mentioned before in this analysis, because there is regulation in a lot of subjects, especially in the political and environmental factors.

The e-commerce market is not, yet, particularly regulated, as it is beginning to “boom” in the last couple of years. However, there are laws that need to be followed in terms of what taxes need to be paid, the minimum wage that employees in the company need to be paid as well, and also guaranteeing that the partners of the company (laundry service companies) are also doing their part, being respectful towards the law.

In Portugal, the authority that ensures that labour and industry laws are compliant with the law is called ASAE, and it is starting to be strict towards the e-commerce business, as the consumer demand is driving more and more to that sector. Other than that, most of the legal

points are in hand with the political factors express in the first point of the external analysis, as I consider there's not much more to add.

5.2. Internal Analysis

After a descriptive external analysis that provided various insights about the market that *Clean* will be inserted in, as well as for the company itself, it is vital to do a proper internal analysis. This analysis will help identify what points are Strengths, and what points are Weaknesses of this potential company, as well as what are the Threats and Opportunities that the company will face coming from the external environment. For that, as mentioned in section 2.6 of the literature review present in this paper, I'll conduct a SWOT analysis.

Table 5.1 – SWOT analysis.

Strengths (S)	Weaknesses (W)
<ul style="list-style-type: none"> → Digital solution in a market that is familiar based. → Delivery system that is affordable to the end customer. → Marketplace that allows customer to pick from their preferred laundry service company and compare to others. → User interface through the app navigation. → Control over the delivery schedule. → Customer centric business solution. 	<ul style="list-style-type: none"> → Payments will only be available via cashless methods. → Requires a change in customer mentality. → Requires a high degree of initial investment.
Opportunities (O)	Threats (T)
<ul style="list-style-type: none"> → Completely innovative idea, no one has this kind of service in the country. → Country is in economic growth. → Digital expansion is getting to every market - following the trend. → COVID-19 pandemic habits are being maintained, i.e., preference for home delivery. 	<ul style="list-style-type: none"> → Possibility of other digital solutions being developed and introduced in the market. → Customers can still opt for the traditional home delivery service from local laundries. → Short-term profits are difficult to achieve in these types of businesses.

→ E-commerce is at its peak since it was generalized.	
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5.2.1. Strengths

Analysing what was selected to each part of the SWOT analysis, it is usual to start by the strengths of the company. I defined mainly as strengths the concepts that are part of value proposition of *the new way of clean clothing*, being that the strongest point of the company will be to create a customer focused strategy. As mentioned in the literature review, customers value home delivery solutions that are very focused in the last-mile delivery part of the chain, which impacts them the most. In line with that, *Clean* has affordability, another very important concept, as well as the way its user will be able to control the scheduling of the deliveries and the pick-ups, something that will be differentiating the company from its more direct competitors. As well as being the digital solution in the market mainly focused on fulfilling the consumer needs, it will be a marketplace for laundries, where they will be able to get more visibility and work side-by-side with *Clean*, creating win-win situations.

5.2.2. Weaknesses

On the other hand, it is also major to take notice of the weaknesses that could or will appear in the implementation of the project. Those rely mainly on being a 100% cashless business, as all the payments will work via the app and there will not be any chance for a customer to pay for their laundry services via cash, as most of them do now when they contract a home delivery service from their local laundry providers. Besides the way of payment, it is important to know that there will be needed a high degree of initial investment in the company to start the operations of, has there's the need to fully develop the app from scratch, create a customer support service integrated in the app (most likely via call centre – outsourcing), create a network

of drivers to deliver the clothes and give benefits to the laundry companies for making initial partnerships, as well as operation costs. I will develop further in this paper the cost strategy and analysing the project from a financial point of view, however it is likely that the company won't turn a profit for a few years.

5.2.3. Opportunities

Despite existing weaknesses, there are a lot of opportunities by developing *Clean* into a company. It is a disruptive idea that can be called a complete innovation in the sector, introducing technology to a market that is very "old fashioned", as well as following the trend of digitalism and the e-commerce "boom". The macro environments are now very welcoming, as the Portuguese economy has grown in 2022 and is predicted to continue growing in 2023. Finally, there were benefits (although the difficult periods passed) from the COVID-19 pandemic behaviours, there was a high preference for home deliveries at the time, and that preference is being maintained.

5.2.4. Threats

To conclude the internal analysis, is also relevant to give an explanation on the threats that were mentioned in Table 5.1. With the rapid development of digital solutions in every market, there is a possibility that this company will have direct competitors in the future, mainly own laundry companies that start creating apps for the customer to do the same things but just form their company, or other marketplaces with home delivery service that affect this market. Having that in mind, *Clean* will have the challenge to establish first than the others and create the brand awareness necessary to make consumers pick it instead of other future potential solutions, as well as having the capability to maintain those customers, through its levels of service (and its partners of course) and its customer support. Customer mentality is also a threat here, as they are used to go to local laundries and the "old" methods – the ones who do.

5.3. Competitive Framework

To finish the business analysis and show the competitive framework, I'll use the model of Porter, has previously stated in the literature review part of the paper (section 2.6), due to its effectiveness in understanding the competitive environment in any business or market.

Table 5.2 – Porter’s Five forces framework.

1. Rivalry among existing competitors → Low
<ul style="list-style-type: none"> → There is no direct competitor to <i>Clean</i>. → Potential for laundry companies to develop their own digital delivery system, however there aren’t any yet.
2. The bargaining power of suppliers → Medium-High
<ul style="list-style-type: none"> → <i>Clean</i> uses its own delivery system, as it will be not influence by others in this aspect. → The prices of the laundry service are controlled by the partner. → No price legislation. → High dependency of the service provided by the partners for customer satisfaction.
3. The bargaining power of buyers → High
<ul style="list-style-type: none"> → As there are no competitors, the price charged for delivery fee is decided by the “buying” company - <i>Clean</i>. → Risk of customers finding prices too high, however no alternative yet. → Relating to customers, they won’t have any cost to change to a new competitor in the future.
4. Threat of new entrants → High
<ul style="list-style-type: none"> → In a highly digital society, there's a great chance that there will be direct competitors to <i>Clean</i> in the future. → E-commerce is growing in all markets. → Patents laws are, for the most part, not international.
5. The threat of substitute products or services → Medium
<ul style="list-style-type: none"> → There is currently no service like the one <i>Clean</i> offers, in the Portuguese market. → There is still the possibility to pick-up the clean clothes, not opting for home delivery. → A lot of consumers still will prefer to use laundry machines in their house, as the machines are getting more energy efficient.

5.4. Goals and Implementation Strategy

By developing *Clean*, the main goal is, of course, to turn a profit and make this a profitable business as the other successful cases in the e-commerce market, by tapping an industry that has not been tapped yet. On the other hand, there are specific goals within developing this project, such as changing the laundry market’s consumer mentality, by bringing the needs that they already have in other markets (for example the food market – with home deliveries using apps) into this one. The goal of changing people’s mentality is, of course, very ambitious, however

there are insights that this will be possible, as most of the respondents of the survey that was analysed earlier in this paper said that they see value in the launch of this app, and that it would be a life facilitator for them, even the ones who currently do their laundry at home were willing to pay extra and use an external laundry service with the home delivery part. Obviously, it will be a difficult path to penetrate in the market and convince more people to enter in it to, but the signs are good.

Another important goal is to bring digitalization into the laundry industry, as it is very familiar based and very “old school” as well. It’ll be challenging, as most laundries still work with cash and a lot of them don’t have their accounting books up to standards, which will of course be a requirement to partner up with *Clean*, however there is market opportunity also for this companies if they establish this partnership. *Clean* will provide a unique platform for this companies to gather more clients that they currently do, as they will have a lot of “virtual visibility”. In this way, the goal to bring more a digital solution into this market is, I think, very feasible.

Referring to the implementation strategy, the main purpose is to create the need for those who have busy lives to start using an app like this, leaving doing laundry to a service that will come at a cheap price, with a pick-up and home delivery feature, becoming a facilitator in its lives. Firstly, the strategy is to start the operations in a big city, as this one of the conditions for the definition of target population in the elaboration of the survey (see Chapter 4). The best option to start is the city of Lisbon, as most people live in apartments, some of them don’t have the room or affordability to have their personal laundry machine and, most important of all, it is a city where the people that live in it mostly live busy lives – they work, they work and study or just study – it is a very busy city. Cities like this are where these kinds of businesses work the most, as people are more open to change and, especially, it is where the e-commerce market as boomed. Lisbon, being the capital of Portugal, is the city where there is the most digital development, where the people that are more involved with tech in their lives live also. Being a place where almost every person uses their smartphone to do some task, it will be easier to penetrate and gather customer attention, which will, if the service works well, result in brand awareness.

Secondly, it is important to develop on the topic target population. For the implementation of this idea, the target population are the people between 18 to mid 50’s that have households or are students living abroad. This represents a great piece of the population of the metropolitan area of the city of Lisbon, as it links with the point that was stretch before. In the same hand, these were the greatest percentage of persons enquired in the survey and were the ones that

gave *Clean* the best “points” in terms of the value proposition. They saw value in this idea and said that it would make life easier for them. It confirmed that this is the right path to go when preparing to enter the market.

Thirdly, focusing on the app developing is very critical to the success of the entering. Having something that is user friendly and intuitive makes all the difference in this case, as potential customers don’t have much time and prefer quick solutions. Once we are able to gather them, it is critical that the platform used is very easy to navigate and seems familiar to them. Having a good customer support service is also critical from the start, as marketing is being done from a lot of ways, especially recommendations from one person to another, it is one of the main ways that apps become popular, through the recommendations of others for one to start using it.

Fourthly and finally, the price strategy is something that will be very focused from the beginning, as it is one of the main pillars to the success of the *Clean*. The value proposition defends that this solution must come in an affordable price that makes the customer change from their local laundry service or sees value in stop doing their laundry for himself and start using a service like this. The extra-cost should be very little, as delivery fees will be low. When the project is fully implemented and the company up and running, there is space to think in profitability improvements and change in prices, but to start is very critical that the fees are low, and the laundry partners picked practice the best prices in the area. The main aim is to provide the customer a solution that pays off when comparing to other solutions that he or she might take instead of *Clean*, and I’m confident that we will be able to just that.

5.5. Implementation plans – How *Clean* will come alive

5.5.1. Marketing Plans

In the point stretched earlier, when I mentioned about the implementation strategy and the market segmentation that was done for the introduction of laundry in the market, the marketing plans of *Clean* will go much in hand, following what the people that I view as the main customers will want from a company like *Clean*. Considering that the analysis for segmentation and target population were done and clarified in that point, the next step towards the marketing plans for *Clean* is to define the brand positioning in the market.

Clean will position itself as the disruptive figure in the laundry market, bringing a brand-new digital solution to a market that is the need of one. It also appears in the trend of e-

commerce apps surging in existing markets, offering a “tip of the finger” solution to end customers when deciding out to organize their lives. As today many people get home from work and, due to time or do to will, order their food for dinner (for example) through their home delivery service app on their smartphone, they will also be able to schedule pick-up and delivery times to get their laundry done, and even having the chance to pick from different laundry companies in their residence area, to ensure they are paying the lowest price. These are strong statements to make for a start-up company, however I feel that *Clean*’s potential is huge, and it will be confirmed when introduced in the market. To conclude, it is again important to clarify that the company will be positioned in the Portuguese laundry market, as a way of e-commerce but providing a two-way service, at the same time as being a marketplace for laundry companies, it will also be a network of home delivery services for those clothes that are cleaned, using *Clean*.

After clearly explaining the position of *Clean*’s brand in the market, follows a denser explanation about the Marketing Mix, the core of the marketing plans for the company. The Marketing Mix that I’m going to present in this paper will be composed by 7 steps – Product/Service, Brand Image, Price, Promotion, Location and Distribution, Processes and, finally, People. It is a highly developed part of the framework, because of the core importance that these steps take into implementing a start-up in a competitive market like the e-commerce one, as well as having the challenge to penetrate in a market that is not yet went through a digitalization period.

When referring to the product that *Clean* wants to implement in the Portuguese market, it is basically the option to have a home delivery service included in an app that shows you all the laundries in your location and you can pick from them a select the one that fits you the most (usually the cheapest or the most recommended), being that the delivery process is exclusively provided by the company itself. The product that we will be selling is this option, this convenience of doing all of this through the customers’ smartphones. Elaborating, the service offered by the company will be an effective home delivery schedule, where the customer will be able to schedule their pick-up times (for the driver to pick-up the dirty clothes from the customer’s home), depending on availability but compromising a maximum waiting time of an hour (if the customer wants its clothes pick-up instantly). Moving on, the app will let the customer then select when they want their clothes back, and the timings for this will depend on the service chosen and the volume of orders of the laundry chosen as well – this will all be possible to be consulted by the customer in the app interface. But, again, the minimum lead time for people that want the clothes right back will within 24 hours, so the process of picking-

up, doing the desired laundry service and delivering the clothes back will be done in the space of 24 hours. After selecting pick-up times and delivery times, the customer will, as said before, have the ability to choose the laundry company of their preference to the service, being able to view all prices for all kinds of service in the *Clean* app.

Moving on to a different topic, the second part of the Marketing Mix is brand image. Brand image goes in line with the topic referring to the implementation strategy. *Clean* will be a digital reference in the e-commerce market when dealing with laundry services. Will also be focused on customer satisfaction, creating its business around the needs of the customer, and treating customer problems as the main part of the company. In simple terms, *Clean* is a customer-centric brand that is directed to the digital generation, offering services to make the lives of this generation easier, by implementing an innovative way of choosing where to do your laundry, for an affordable price. The phrase that will go in line with *Clean*'s logo in the advertising that will be done is "Save time, use *Clean*. It makes the difference." This is the message that company wants to pass, to make easier the lives of its customers by offering their services in line with what the other e-commerce players do in other markets.

I've spoken a few times in this part of the paper about price, as being one of the main "flags" of the value proposition of *Clean*. Price is something that will make the difference and give competitive advantage to a company that is now starting in the laundry market, however it will not compete directly with the laundry companies, as it won't have a own cleaning service, however it will replace the delivery part that some laundry companies have. The main topic for price here is the delivery fees charged to the customer who contracts a cleaning service through the app interface, the other prices will be defined by the laundry companies. For this, the logic used was pretty similar to the one Uber Eats uses, for example. It is calculated taking as base the location of the laundry service company in relation to the pick-up point (normally this will be the customer's house). Prices will start at 2,5€ fixed fee (for services within 5km of the laundry service company); for each 5km further the price will increase by 1€, i.e., if a laundry service company is 10km away from the customers home, he will pay the laundry service + 3,5€ delivery fee. It is important to stretch that the delivery fee is only paid once, it counts for the pick-up and delivery service, as there's only one transaction with the customer but 2 touchpoints. Although it will be explained further in the paper, in the revenue model's part, *Clean* will get the revenue from this charge to the client and, additionally, it will gain a commission from the service that the customers chooses in the laundry service company. These delivery fees and commissions is what the company will use to make a profit and distribute to the drivers that do the pick-ups and deliveries, as they most likely won't be the same (the one

that picks-up the clothes and the one who delivers them back). The drivers and their earnings are also points that will be explained further forward.

Moving on, promotion is also critical to any start-up that wants to enter any market, even more if that start-up is bringing to the market something that does not exist yet. In this case, I'll explain how promotion will work in hand with brand communication, in order to create brand awareness from the start. There are multiple channels to achieve brand promotion and, in hand with the way that *Clean* wants to operate, the main promotion channels will be digital, focusing highly on social media marketing and online advertisement. The different types of advertisement that will be described below are online advertisement, social media, sales promotions and direct marketing.

Table 5.3 – Promotional and Advertisement plans.

Online Advertisement
<ul style="list-style-type: none"> → Google ads will be contracted in order to make it easier to find the app's link in the search engine. → Paid search engines will also be contracted to display the app's link when searching for "laundry company"; "laundry service"; "clean" in the search engine. → Will also do insights to the country's main digital magazines and blogs, to promote the company.
Social Media
<ul style="list-style-type: none"> → Use Facebook's and Instagram's premium capabilities in order for the company reach the target population (appear in the "feeds" of people that regularly use the apps and are registred with ages between 18-50). → Invite 2 "big" digital influencers to promote the idea by offering them a fee and free app usage for a period of time. → Create social media pages with great interaction with the customers - several e-commerce apps do so, UberEats for example is very active on Instagram.
Sales Promotions
<ul style="list-style-type: none"> → Create discount coupons for "free delivery fee" and sent them randomly by email to a customer that is registered in the app → Attribute discount coupons for customers with several service usage - loyalty bonuses → Create membership status customers (much like Amazon Prime, pay a monthly fee and have free deliveries) → Create B2B packages in partnership with the laundry companies - reduced prices for high volume and continuous orders
Direct Marketing

→ Create a simple CRM (Customer Relationship Management) network, in line with the sales promotions initiatives, it is important to have constant interaction to the end customer and reward those who use *Clean's* service the most

After promotion, comes the fifth point of the Marketing Mix – Location and Distribution. In hand with was mentioned in the placement part of this paper, as well as the implementation strategy, the plan is to start in the metropolitan area of Lisbon, where there's the opportunity for a company like this to thrive. Distribution here is key, as it is related to the way the delivery systems are going to work – there's the need to have a very well-built distribution system, i.e., delivery system in order to ensure that lead times for pick-ups and deliveries of clothes are complied. To specify, the way that the delivery system is going to work is through local drivers that do other orders to, for example, food ones, and have their vehicles for these purposes. Because we are talking about clothes, it won't be possible to pick-up or deliver them with small motorcycles that have very little room. The size of the vehicle needed will depend on the amount of clothes and types of clothes that need cleaning, i.e., it'll depend on the service contracted with the partner laundry service company. For this to work, there's a need for competitive revenue for drivers, to make sure they are willing to do the service for the company. Driver's networking is a very important concept in the distribution part of *Clean*, and, with time, it'll exponentially grow. The good part in all these topics is that this type of distribution model (delivery model) is tried and tested in other markets, once again the food delivery service companies are a very good example of this, as well as examples in the laundry market that are tried and tested when it comes to home pick-up and delivery of clothes. It works well and as well as providing a good service to the customer, it is a way of keeping the client in the company, by having good experiences and connecting with the brand. *Clean* will appear between these models, as it will bring the agility and digitalization of the other e-commerce markets (apps that do business in those markets), and the convenience of pick-up and delivering clean clothes that the laundry service companies that already have that service provide. It is the combination of the digital experience and the personal contact with the customers that will make this distribution model a win for *Clean*.

Continuing with the Marketing Mix, Processes are a concept very vital for the business to work and to create value for its customers. Firstly, the process of attracting the clients to downloading the app will be done via advertisement and then, via ease of use and user friendliness. Then, there's the process of creating partnerships with local laundry companies,

always looking to add more companies into the marketplace, to make as competitive as possible and to create volume of orders, with the finality of creating revenue for the drivers inside the network and, ultimately, to create economies of scale to *Clean* (more volume of business, less unitary costs, more profit made). That is the ultimate goal. Customer related processes are also important to stretch, as there are a few that are considered critical to the success of the business. CRM used in the promotional plan is an on-going process for customer satisfaction rates, as well as a user-friendly customer support system, introduced in the app and developed, in an initial phase, by an outsourced call centre. To finish, time-to-time enquires and surveys for the consumers that use the service. This will be major to create a NSS (Net Service Score) and NPS (Net Promotor Score) value for the company, used later as comparison with potential competitors that might enter the market – just to clarify, NSS is the perception of the customer about the service that was provided to it and NPS is the rate that the same customer would recommend this same service to others.

The final point that needs to be explained in this Marketing Mix is People. People are the centre of any business, and even in a very digital company wanting to use digital systems and not having any specific workers directly contracted to the company. Despite not having employees on the field, there's the need to have a network of drivers to ensure the delivery service, and for that there's a need to pay those employees. Not via direct salary but commissions for trips made (being pick-ups or deliveries) and depending on the distances that they cover with each trip. As well as having the drivers' network, there's the need for a outsourced call centre for customer support inside the app and, at first, a management team to help directing the business and get new partnerships with other laundry companies. Finally, there's the need for contracting developers to ensure the app development and support, as it will need updates and refreshments from time to time.

5.5.2. Operations Plan

The operational plans for *Clean* pass through 4 different phases, the structure and legal requirements for the company to come alive, the business model that will allow the company to operate, the app that is going to be developed for the company to enter the market and, finally, the revenue model.

Firstly, *Clean* will be structured with a network of drivers to do the home deliveries, a set of laundry partnerships in the city of Lisbon (metropolitan area) to start its business and a mobile app to interact with its potential customers. Secondly, it will be required filling a patent

request in order to stop potential competitors copying the full idea and entering with the same competitive advantage in the laundry market. As well as the patent, all fiscal requirements need to be met according to the fiscal authority in Portugal (*Autoridade Tributária – AT*).

Moving on, *Clean*'s business model was already heavily mentioned through this paper, however, to sum up, it'll be entering in the last-mile delivery of the laundry service industry, providing the pick-up and delivery service to the customer, so he can pick the laundry in its residence area who mostly adequate to it (cheapest, recommended by a friend or family member, etc.), getting its revenue by the fees paid by customer for that delivery, as well as commissions gathered by the service of doing the laundry by the partner company. Being able to create brand awareness overtime is what will make *Clean*'s business model a profitable one, as the volume of orders increase, the volume of fees and commissions will increase to, creating economies of scale as well as providing a cheap price for its services. Summing up, you can say that *Clean*'s business model is the last-mile delivery and capitalizing in doing it well, as well as getting commissions from the laundry service companies that are present in the app.

The app used for the business activity of *Clean* is a great part of its operation, as it will be the place where the customer relates with its services. The touchpoint between company and customer will mostly happen in the digital environment of the customers smartphone, and by knowing that we can tell the importance of dedicating time and resources into it. Not only the development is important, but also app maintenance is something very critical. Ensuring overtime that an app is maintaining its ease of use and ensuring that it doesn't have any bugs is as vital as its initial development. On top of that, having an on-time customer support service inside the app, redirecting to the call centre outsourced for that matter, is critical for the success of the app and, ultimately, customer satisfaction and "good" brand awareness.

5.5.3. Revenue Model

Moving on to another concept, I'm going to develop on one of the aspects that is critical to the success of the company, which is the revenue model – how *Clean* will make money from its business activities. This revenue model takes into consideration a lot of things that were mentioned across this paper, such as delivery fees, commission from laundry services and even partnership bonuses (to be considered after the launch of the company – year 2 onwards, depending on the business' success).

Table 5.4 – Different types of revenue streams.

Stream (unitary)	€ / %
Delivery fee - fixed	2,50 €
Delivery fee - extra	1€ / additional 5km range
Commission from laundry service contracted	20%

As said before, revenue will come directly from each order placed by the customer, as it pays 2,5€ as fixed delivery fee and, if its house is more than 5km away from the laundry service company, pays 1€ extra for each 5km that is away from that point (e.g., customer pays 3,50€ of delivery fee if its address is 6.8km away from the laundry service company that he or she chose in the app). Note that the delivery fee includes the pick-up and delivery process, it is only paid once.

On the other, there's a need for additional revenue as *Clean* will be used as the user interface platform. *Clean* will ask for 20% commission on the net value (before tax) of each order that is placed via its app to the laundry service companies that are present in it. This commission will be automatically paid by the chosen company (chosen by the customer to do the clothe cleaning service) when the service is confirmed. This is something that is done already by e-commerce companies in other markets (like the food delivery one, for example), like Uber Eats or Glovo (present in Portugal). They use a revenue model that is also created in these two points – delivery fees and product/service commission.

To complete the revenue model part of the paper, it is important to make a forecast to the demand and generated revenue amounts, to get a perception for what this business could be valued at (in terms of income revenue) and then to be able to make projections using the financial standardized models (financial analysis of *Clean* – to be done after the implementation plans and issues). Due to the survey conducted in order to develop this project, we can make assumptions of what the penetration rates would be in the first five years of developing and implementing *Clean*. Using that knowledge and focusing on the city of Lisbon only (for this projection) it is possible to infer what that rate would be, using as basis the active population of the metropolitan area of the city (the number that is in hand with the target population of *Clean*). This number is 1 413 200, i.e., this is the number of people that is going to be targeted by the introduction of the app in the laundry market – see annex B – (Lima, n.d.). The percentages used as penetration rates across the five years will be, first, the number of people that do laundry outside their homes, considering that *Clean* will be able to reach 50% of them, and then a growth

in brand awareness and good service knowledge and experience will make this number increase overtime.

Table 5.5 – 5-year forecasts to reach yearly sales volume.

Rates; N°s / Year	2022	2023	2024	2025	2026
Penetration Rate (in the active population)	1,0%	3,0%	5,5%	6,0%	7,5%
N° of clients that purchase a service in the <i>Clean</i> app	14 132	42 396	77 726	84 792	105 990
Average value of the delivery fee (unitary)	3,05 €	3,05 €	3,05 €	3,05 €	3,05 €
Average cost of the service chosen (forecast - unitary)	9,10 €	9,10 €	9,10 €	9,10 €	9,10 €
Average commission gathered (unitary - 20%)	1,82 €	1,82 €	1,82 €	1,82 €	1,82 €
Sales volume	68 823 €	206 469 €	378 526 €	412 937 €	516 171 €

Clarifying the numbers, the average value earned from delivery fees was calculating forecasting that 65% of the potential customers would live within 5kms of the laundry service company that they contract via the *Clean* app – paying 2,50€ – 15% of them would set their pick-up and delivery location within 5 and 10km of the service company of choice – paying 3,50€ (additional 1€ because of 5km extra distance) – and then, the remaining 20% would live within 10 to 15km away from the laundry service company of choice – paying 4,50€. This adds up to, on average, 3,05€ made per service. On the other hand, the average cost of each service (the cleaning service itself) was calculated through a similar logic – 80% of the potential customers would have orders averaging 8€, 10% of them would average spends of about 12€ and, finally, the remaining 10% would average spends of 15€ per service. This was used to calculate the commission received for each order, as *Clean* takes 20% commission from the services acquired in its app. Forecasts for number of potential customers making at least one order per year were made using a growth rate of 2 times (on average) per year – being that year 1 to 2 there's a 3 times growth in the number of potential users, 2,5 times in the following year,

and then slowing down in the remaining two. This adds up to a revenue of 516 171€ in year 5 of the operation.

5.5.4. Technology needed

As it was mentioned heavily in multiple sections of this paper, the main technology needed to get this project alive is the app that its business will be done one. There's a great importance in developing an app that is capable to handle high user usage, as well as a part of the app that is directed to the drivers' network that will work for the company, doing the pick-ups and deliveries of clean clothes for the customers that use it. This app will be developed by an outsource team, specialized in app creation, development and maintenance and the cost of it will be included in the cost structure part of the paper.

Along with the app development, there's a need for GPS connection to the customers and drivers that will use it, as customers can follow where their order is, getting constant updates of it, and the drivers need to be connected to the app using their smartphones GPS capabilities, in order to send those same updates. Connecting the app to the internet will also be necessary for all of this to work.

The rest of the technological requirements are the same as day-to-day apps. The app will be available to Android and iPhone users, being available to be downloaded for free in the two "store" platforms.

In terms of digital payment, the app will support the country's accepted digital payment systems, such as Visa Card/Master Card, MB Way, PayPal, Apple Pay and Google Checkout. Being so available for all the potential customers preferred payment options, just not supporting the use of cash.

5.5.5. Organizational Structure

Now respecting to the organizational structure of the company, what is planned, for the first years, is quite simple. There will be a founder and one top-down manager, receiving a salary of around 1000€ per month, paying 14 months, and both will be responsible for ensuring the good functioning and launch of *Clean*. The founder's main responsibility will be ensuring and growing a great network of drivers, to do the delivery services, as well as take care of the marketing plans and making sure they are fulfilled. The top-down manager main responsibility

will be ensuring partnerships with laundry service companies to enrich the marketplace present in the app.

Furthermore, there will be a service contracted to the app development company that ensures app updates and maintenance for 2 years after its creation, after that there will be a need to pay an annual fee to keep the maintenance service active. Still about the app, there will be an outsourced service contracted to ensure the customer support service present in it (as mentioned before) – there will be a contracted call centre answering customers questions and calls, committing to an on-time response, and working during business hours – for rapid questions (FAQ’s) there will be a chat bot answering them, developed in hand with the app.

To sum up, *Clean* will start with two persons running the operation (the company’s founder and contracted top-down manager), an outsource app development company to ensure app maintenance and updates and an outsourced call centre to take care of customer support. In the following years to *Clean*’s market launch, it is expected that the management team will grow, as the number of customers also grow, and that the customer support becomes internal, contracting employees to do that job.

5.5.6. Cost Structure

To complete the implementations plans for *Clean*, there’s a final aspect that needs to be stretched, which is the cost structure. Various times across this paper there were mentions to what was required to make the company happen – patents, app development, network of drivers, customer support outsourced service, etc. – and now it is time that all that information is compiled and explained, putting numbers in each concept, so that the financial exercises that will be done next, are indeed accurate.

Table 5.6 – Expected costs.

Expense	Type of Cost	Amount (€ / %)
App creation and development	Fixed	27 000€
App Maintenance and Updates (only paid in year 3 onwards)	Fixed	3 000€
Internal Staff Expenses (annual)	Fixed	14 000€
Outsourcing expenses (customer support - annual fees)	Fixed	106 000€

Marketing expenses (following promotional plan)	Fixed	5 000€
Delivery commission for drivers	Variable	50%

Table 5.6 shows us the cost structure defined to the first years of operation of the company, subdivided in fixed and variable costs. In the beginning is expected that there are a lot of fixed costs, as there are a lot of parts of the company that require investment to be “up and running”, however these costs will be less evident in time and when the economies of scale are created by the activity of the company. App creation’ costs were calculated using the support of a power platform from a Portuguese company called *Zaask*, a company that, other of many things, sells the service of app creation and development. They define that more complex apps like ones with the purpose of e-commerce cost around 30€ per hour invested in it. An app like this would take roughly 22,5 weeks (the average week number of a 5-month period) and, considering that the app gets worked on 40 hours a week, it would sum up to the cost of 27 000 euros. Also, there is a cost to maintain the app and ensure its updates, only paid in the 3rd year of activity because the providing company ensures the first two years “for free”. Moving to staff expenses, there is, at first, internal employees’ expenses of 14 000 euros (1000 euros paid 14 months to the top-down manager), however it is expected that, with years passing and activity increasing, there will be the need to strengthen the staff and this cost is expected to increase at that time. As well as internal staff costs, there are going to be outsourced staff costs, with respect to the customer support service needed. Through online budget requests on various websites that provide call centre services, the average amount requested is 25€ an hour per person allocated to that service. For that, *Clean*’s plan is to contract the service with 2 people that work 40 hours a week to provide that service, during full-year periods, which arises to the cost of 106 000 euros. To finish, the variable cost that needs accounting is the fees paid to the drivers that do the pick-ups and deliveries needed, and that will be half of the fee paid by the customer, i.e., 50% of the delivery fee is distributed between the drivers that do the pick-up and delivery service – the driver gets paid per trip, being that he receives half of the amount of that expense up front and, if it is the same person delivering back the clothes, receives the other half when the service is concluded.

5.6. Implementation Issues

After a careful analysis that was conducted through point 3.5 of this paper – Implementation plans – there are, as expected, issues that arise to the successful implementation of *Clean* in the laundry market. Some of these aspects were already mentioned throughout the project, however this section will be the place to summarize them and state reasons why these issues could be addressed or not be relevant enough to make that the company won't have the success that is projected to it.

Firstly, brand and concept acceptance are always common issues when we are referring to an innovative idea, no matter what the market that it will be inserted in. In this case, a lot of Portuguese citizens, and even foreign ones that currently live in Portugal, do their laundry at home, so at first this will require a change of mentality in those citizens to start paying to have their laundry done outside their residence, i.e., to have an extra expense. In the hand, people that currently do their laundry in local laundry service companies would also need to be convinced to move on to a digital solution, with probability that the laundry company they are used to go to would not be (yet) in the app's laundry marketplace. Summing up, the first issue to the implementation of *Clean* in the laundry market would be the change required in the customers' mentality.

Furthermore, offering a service like this requires a very well-functioning distribution chain, to ensure effective last-mile delivery (that's what *Clean* is doing via its digital solution). Specifying, the network of drivers that partner up with the company need to be efficient in their trips, minimizing time wastes and creating efficient routes, in order to get the best lead times for the customers, maximizing their satisfaction with the service. It will be a work in progress, as the concept would have to be "sold" also to them, to make them see fulfilling *Clean*'s services as a proper revenue stream for them as well. In other words, another one of these issues will be to get the best network of drivers as possible, so that *Clean*'s value proposition is delivered by them as well.

To finish, convincing local laundry companies to get on the board with the project will be another issue towards implementing this idea. Most of these companies are very "familiar based" and have been operating the same way for years. It will be a challenge to "sell" this idea to them as well as the drivers, but the idea will be to pass on the potential value that using it might demonstrate, and, for the laundry companies specifically, the number of potential customers that they would gain just by being present in the *Clean*'s app environment. Brand recognition would go both ways, because the ones who would be owners of the cleaning service itself provided to the customer would still be them, i.e., the cleanest clothes and best job would always be recognized to the laundry company and not only to *Clean*. The main idea here is to

present to them the win-win scenarios that would be possible with a partnership with the company.

5.7. Financial Analysis

The financial analysis part of this business plan will allow the reader to gather a vision of whether or not the project is viable and, on the other, for a potential investor to see if it would pay off for him to invest its money in *Clean*. It will be composed by the regular financial statements (balance sheet, cash-flow analysis, income statement and profit-and-loss analysis), as well as calculations of the ROI (Return on Investment), Break-even point, NPV (Net Present Value) and IRR (Internal Rate of Return). This investment metrics, when analysed in hand with the financial statements (made with 5-year projections) will bring the vision of what the company will look like across the years and its attractiveness for potential external investment.

5.7.1. Financial Statements

When it comes to the financial statements, the balance sheet will feature in this paper, being able to be consulted in Annex C. However, it won't be in the main part of the part because of the fact that analysing it there isn't many conclusions that can be taken from it – *Clean* is a start-up and only will have, for now, one revenue stream. It would be an analysis not worth making.

On the other hand, I'll give more attention to the Income Statement and the Cash Flow Statement, because they give a better picture of how the *Clean's* business will traduce in financial terms, i.e., how its business will impact the financial part and how it will generate value for potential investors. Talking about potential investors, this is the part of the paper that will present the amount that is wanted for the business to move forward, i.e., the amount of money required to start the implementation plans of the company.

Table 5.7 – Income Statement.

(Values in euros €)	2022	2023	2024	2025	2026
Revenues from services	68 823	206 469	378 526	412 937	516 171
Cost of Goods Sold	(25 722)	(77 162)	(141 463)	(154 323)	(192 903)
Gross Profit	43 101	129 306	237 063	258 614	323 268

Advertising and Promotion	(5 000)	(8 000)	(10 000)	(10 000)	(10 000)
Salaries Benefits & Wages	(14 000)	(24 000)	(24 000)	(36 000)	(70 000)
Third-party supplies and services	(106 000)	(106 000)	(168 000)	(168 000)	(168 000)
EBITDA	(81 899)	(8 694)	35 063	44 614	75 268
Depreciation & Amortization	-	(1 800)	(1 800)	(1 800)	(1 800)
EBIT	(81 899)	(10 494)	33 263	42 814	73 468
Interest Revenue	-	-	-	-	-
Interest Expense	-	-	-	-	-
Earnings before Taxes	(81 899)	(10 494)	33 263	42 814	73 468
Income Taxes	-	-	(5 985)	(7 991)	(14 428)
Net income	(81 899)	(10 494)	27 278	34 823	59 040

Table 5.7 shows the Income Statement forecasted for the next 5 years of the activity of *Clean*. It has the predicted revenues from the revenue model, according to the forecast demand for these years, and also the cost of getting this revenue, which is related to the fees paid to the drivers. Also, I assumed advertisement and promotion costs according to the promotional plan explained in the marketing mix, with them increasing from 5 000 euros in the first years, to 8 000 euros in the second and stabilizing in the average spending of 10 000 euros. Salaries and wages have an increase effect too, related to the contract of new managers to the company, in hand with the increase of the number of customers forecasted to the following years – increase of customers mean new partners into the app, i.e., need of more people to deal with those partnerships and the ongoing increasing of the drivers’ network. It is expected that by 2026 *Clean* has 5 people working and receiving an average payment of 1 000 euros per month. Third-party supplies and service expenses include the customer support outsourced service (call centre), with an increase to 3 people in year 3 onwards, including also the fee paid to the app development company for the app maintenance and regular updates, paid only in year 3 onwards too. Depreciation and amortization costs are related to the intangible asset possession, which is the app (valued at 27 000 euros and with a “lifetime” of 15 years).

To finish, it is expected that *Clean* will start generating a net profit from its operations in two years, i.e., by 2024 the company should start generating profits from the revenue model created.

Table 5.8 – Cashflow Statement.

(Euros €)	2022	2023	2024	2025	2026
Operating Cash Flow					
Net earnings	(81 899)	(10 494)	27 278	34 823	59 040
Depreciation & Amortization	-	1 800	1 800	1 800	1 800
Cash from Operations	(81 899)	(8 694)	29 078	36 623	60 840
Investing Cash Flow					
Investments in Property	(27 000)	-	-	-	-
Cash From Investing	(27 000)	-	-	-	-
Financing Cash Flow					
Issuance (repayment) of debt	125 000		(12 500)	(12 500)	(12 500)
Issuance (repayment) of equity	25 000				
Cash from Financing	150 000	-	(12 500)	(12 500)	(12 500)
Net increase (decrease) in Cash	41 101	(8 694)	16 578	24 123	48 340
Opening Cash Balance	-	41 101	32 407	48 985	73 108
Closing Cash Balance	41 101	32 407	48 985	73 108	121 448

When it comes to the Cash Flow Statement, the effects seen in the Statement analysed before are reflected here. Firstly, it is important to look at the financing cash flow part, where there is a need for 25 000 euros of issuance of equity to start the company, as well as initial investment of 125 000 euros in debt, for the same effect. These 125 000 are related to what the company wants to ask from investors to get the business “up and running”, being the value needed for the operation to work. The debt is expected to start being repaid from year 3 onwards, the same here that *Clean* is expected to start turning profits when it comes to operations – see line net earnings, from the operational cash flow.

The main purpose of doing a forecast of this statement is to ensure that the closing cash balance for every period (year) remains positive, and the company has money to work with, in order to manage operational risk. In this statement we can understand the importance of the initial investment, because from year 3 onwards the closing cash balance is expected to keep growing, reaching a predicted value in 2026 of 121 448. This goes in hand with the continuous increase of net earnings, year-on-year.

5.7.2. Investment metrics calculations

In the second part of the financial analysis, I’ll develop on metrics that will be used to get a more accurate picture of the project viability, explaining, with numbers, if and when it will

turn a profit, as well as return times to potential investors, break-even points in *Clean*'s business and the rate of return that is forecasted, taking into consideration the previous predictions made (in terms of forecasted demand, prices set up for the services and fees and the projected financial statements).

Firstly, it is important to know that, with the cost rate presented in the cost structure in the implementation plans' part of the business plan, the break-even point quantity in terms of *Clean*'s operation is 44 843 units. This means that, for the business to start turning profits, there is a need to sell 44 843 services, considering average delivery fees of 3,05€ and average commission rates (20% per service) of 1,82€. These 44 843 services are predicted to be sold in less than two years, as forecasted demand for 2022 and 2023 combined is 56 528. In other words, it will take *Clean* less than two years of activity to reach the breakeven point in terms of quantity of services sold.

Then, it is also important to calculate the ROI (Return on Investment) to ensure that a potential investor is aware of what investing in this company would mean to its capitals, i.e., the potential return that he or she would get by investing their money in it. For this, there were two calculations made – “simple” ROI, taking into consideration the net incomes from the first five years of the company's forecasted operation and the initial investment required of 125 000 euros; annualized ROI, taking into consideration the final value of net income (year 2026) and, again, the initial investment of 125 000 euros.

Table 5.9 – ROI Calculated.

ROI	%
Annualized	9,4%
Simple	23,0%

Annualized ROI (five-year period) gets us a 9.4%, which means that is predicted that the investor gets a return of that amount per year, considering that the forecasted demand is correct and that the costs remain as the ones presented in the income statement. Simple ROI is 23%, which means that for quick valuation, this project will get an investor willing to spend 125 000 euros in it, a return of 23% of its money. For the industry standards and for the e-commerce ones, this should be considered a good value for money investment.

Moving on, the final 3 metrics that I want to calculate in this financial analysis are the NPV (Net Present Value), IRR (Internal Rate of Return) and the payback period. The 3 go hand-in-hand together and are the most presented in any business plan of any start in any market, and

not only because of their popularity, but because of the value of the numbers. Calculating these metrics gives another dimension of assurance in terms of the attractiveness of the project, from a financial perspective, as they are not as subjective as the Break-even point or the ROI.

Table 5.10 – NPV, IRR and Payback period calculated.

Metrics	
NPV (5 years)	266 157 €
IRR	24,59%
Payback period	3,03 years

In table 5.10 we can see the results for the 3 metrics used to finish of this financial analysis. Start with the NPV, it was calculated assuming a 5-year period and the cash flows generated in each year (cash flows that were taken of the cash flow statement prediction, line “closing cash balance”). I updated those cash flows using a discount rate of 5% (usually the number used in the project investment business) and, as said before, the period of 5 years. This means that the net present value of *Clean* is 266 157 euros, which can be considered high, taking into account that the fee requested to potential investors is 125 000 euros. The IRR was also calculated using the same principles. I selected the predicted cash flows from the next five years of operation, as well as considering the initial investment of 150 000 euros (25 000 home capital to start the company – paid by the founder – and 125 000 euros of investors capital in debt) and doing the formula that equals the NPV to zero, the IRR is 24,59%. This value is also considered quite high to the industry standards, as well as the e-commerce app’s market as well. To finish, there was the need to calculate the Payback period of the project, which essentially means the amount of time that the investor will have to wait until it makes its money back. Once again there were used the forecasted cash flow values present in the cash flow statement, as well as the initial investment of 125 000 euros. Giving those numbers, it would take about 3,03 years to payback this investment – a number that is quite low, considering this is a start-up entering a new market without any previous presence yet.

Conclusions

The elaboration of this study allowed the determination of a relation between supply chain concepts and omnichannel retailing, with the laundry market. It has related the retail market with the laundry market, taking as basis the e-commerce part, expecting that the customer that buys in a certain market will have the same behaviour when buying, through an e-commerce platform, in the laundry market. The literature review conducted allowed for the identification of e-commerce trends related to the concepts of omnichannel, last-mile delivery, competitive advantage creation and customer behaviour. By identifying these trends, such as the behaviour of customers is to prefer digital solutions and online shopping (see section 2.4), I was able to conclude that it is expected that the customer that buys in a certain market will also have the same behaviour when buying the cleaning service and scheduling the pick-up and delivery, preferring to do it online. Also, in terms of competitive advantage creation, it was concluded that a platform that merges the use of a mobile app with the “physical” service provided by the laundry companies will be a differentiating factor in the laundry market, in the same hand as the creation of synergies between the offline and online channels will be a source of competitive advantage for laundry companies themselves, thus they’ll be able to operate in an omnichannel way (see section 2.3). Adding, the value proposition directed to the companies that will be part of the platform was also justified, as marketplaces offer companies prompt access to a larger base of clients, as well as established processes of payment and logistics (Kawa & Wałęsiak, 2019). They’ll have an advantage against the pure-play offline laundries, as operating via the marketplace allows them to compete in the market with less financial expenses.

Then, by conducting quantitative research, in a form of an online survey, I was able to use inferential statistics to generalize the opinion of the target population (see Chapter 4), as the enquired population showed interest in the various value propositions presented to them. In this line, most of the people that always do their laundry at home would be willing to recommend this idea to a friend or family member, giving the fact that being recommended to a friend, family member or a colleague by a customer is the best indication of company loyalty, as loyal customers usually make repeated purchases and influence others to make the same purchases as them (Rajasekaran & Dinesh, 2018).

Thirdly, the elaboration of the business plan for *Clean* allowed for the creation of the macro picture of the external environment, i.e., how the various conditions of the country that is

intended for the business to start affect the implementation of the company. In section 5.1 we were able to understand that the year 2022 is being a year of economic recovery, with the country's economy growing 6,5%, and the following year is expected to be positive to, thus creating an encouraging basis for the implementation of the platform. Also, it was again identified that the COVID-19 pandemic effects are staying, meaning that the preference for home deliveries instead of other options presents an opportunity for the implementation of the idea. Furthermore, Porter's five forces framework allowed us to identify that there are no direct competitors to Clean, however the threat of new entrants is high, as e-commerce is growing in all markets and there's a chance for a foreign company that already does this kind of service to enter the Portuguese market. Finally, with the help of financial metrics and demand predictions, we concluded that, to start this business, there's a need for 125 000 euros of initial investment. This initial investment is expected to have a payback period of 3,03 years as well as the business is expected to turn profits from operations, i.e., to report positive net incomes, by 2024.

Bibliographical References

- Abd Elrhim, M., & Elsayed, A. (2020). *The Effect of COVID-19 Spread on the e-commerce market: The case of the 5 largest e-commerce companies in the world*. <https://ssrn.com/abstract=3621166>
- Areias, R. (2022, October). *Benefícios Fiscais*. Orçamento Do Estado 2023. <https://www.pwc.pt/pt/pwcinforfisco/orcamentoestado/beneficios-fiscais.html>
- Bhandari, P. (2020a, June 12). *What Is Quantitative Research? | Definition, Uses & Methods*. <https://www.scribbr.com/methodology/quantitative-research/>
- Bhandari, P. (2020b, November 27). *Parameter vs Statistic | Definitions, Differences & Examples*. <https://www.scribbr.com/statistics/parameter-vs-statistic/>
- Bhatti, A., Akram, H., Basit, H. M., Khan, A. U., Mahwish, S., Naqvi, R., & Bilal, M. (2020). E-commerce trends during COVID-19 Pandemic. *International Journal of Future Generation Communication and Networking*, 13(2), 1449–1452.
- Buldeo Rai, H., Verlinde, S., & Macharis, C. (2021). Unlocking the failed delivery problem? Opportunities and challenges for smart locks from a consumer perspective. *Research in Transportation Economics*, 87. <https://doi.org/10.1016/j.retrec.2019.100753>
- Caetano, E. (2022, October 11). *FMI. Economia portuguesa cresce 0,7% em 2023, metade do que prevê o Governo, numa Europa que trava a fundo*. Fundo Monetário Internacional. <https://observador.pt/2022/10/11/fmi-economia-portuguesa-cresce-07-em-2023-metade-do-que-preve-o-governo-numa-europa-que-trava-a-fundo/>
- Cai, Y. J., & Lo, C. K. Y. (2020). Omni-channel management in the new retailing era: A systematic review and future research agenda. *International Journal of Production Economics*, 229. <https://doi.org/10.1016/j.ijpe.2020.107729>
- Euronews. (2022, July 14). *Portugal com crescimento de 6,5% em 2022, o maior na Europa*. Notícias Europeias. <https://pt.euronews.com/my-europe/2022/07/14/portugal-com-crescimento-de-65-em-2022-o-maior-na-europa>
- GEE. (2022, June 1). *Taxa de Desemprego - EuroStat*. Flache GEE: Indicadores. <https://www.gee.gov.pt/pt/indicadores-diarios/ultimos-indicadores/32081-taxa-de-desemprego-eurostat-10>
- Gomes M., S. (2022, June 15). *As principais tendências do e-commerce em Portugal*. <https://invoicexpress.com/blog/tendencias-do-ecommerce-portugal>
- GOV, J. (2021, June 11). *Como apresentar um pedido de patente*. <https://justica.gov.pt/Registos/Propriedade-Industrial/Patente/Como-apresentar-um-pedido-de-patente>
- H. Th. Brujil, G. (2018). *The Relevance Of Porter's Five Forces Inn Today's Innovative And Changing Business Environment*.
- Hagen, T., & Scheel-Kopeinig, S. (2021). Would customers be willing to use an alternative (chargeable) delivery concept for the last mile? *Research in Transportation Business and Management*, 39. <https://doi.org/10.1016/j.rtbm.2021.100626>
- Kawa, A., & Wałęsiak, M. (2019). Marketplace as a key actor in e-commerce value networks. *Logforum*, 15(4), 521–529. <https://doi.org/10.17270/J.LOG.2019.351>
- Liam Austin. (2022, June 5). *The Uber Eats Business Model (2022 Update)*. Business Models. <https://fourweekmba.com/uber-eats-business-model/>
- Lim, S. F. W. T., Jin, X., & Srari, J. S. (2018). Consumer-driven e-commerce: A literature review, design framework, and research agenda on last-mile logistics models. In *International Journal of Physical Distribution and Logistics Management* (Vol. 48, Issue

- 3, pp. 308–332). Emerald Group Holdings Ltd. <https://doi.org/10.1108/IJPDLM-02-2017-0081>
- Lim, S. F. W. T., & Winkenbach, M. (2019). Configuring the last-mile in business-to-consumer e-retailing. *California Management Review*, *61*(2), 132–154. <https://doi.org/10.1177/0008125618805094>
- Lima, F. (n.d.). *ÁREA METROPOLITANA DE LISBOA EM NÚMEROS-2018 ÁREA METROPOLITANA DE LISBOA IN FIGURES-2018 EDITOR*. www.ine.pt.
- Namugenyi, C., Nimmagadda, S. L., & Reiners, T. (2019). Design of a SWOT analysis model and its evaluation in diverse digital business ecosystem contexts. *Procedia Computer Science*, *159*, 1145–1154. <https://doi.org/10.1016/j.procs.2019.09.283>
- Nanda, A., Xu, Y., & Zhang, F. (2021). How would the COVID-19 pandemic reshape retail real estate and high streets through acceleration of E-commerce and digitalization? *Journal of Urban Management*, *10*(2), 110–124. <https://doi.org/10.1016/j.jum.2021.04.001>
- Perera, R. (2017). *The PESTLE Analysis* (2.0). Nerdynaut. https://books.google.pt/books?hl=en&lr=&id=ZWpLDwAAQBAJ&oi=fnd&pg=PA2&dq=external+analysis+pestle&ots=Dud3nP2CHA&sig=iuUs_KYvRRnym-MHPa8BOK_W36E&redir_esc=y#v=onepage&q=external%20analysis%20pestle&f=false
- Pinto, I. (2021, November 29). *Portugal lidera no crescimento das entregas de comida em casa*. <https://www.dinheirovivo.pt/economia/portugal-lidera-no-crescimento-das-entregas-de-comida-em-casa-14359734.html>
- Rajasekaran, M. N., & Dinesh, M. N. (2018). HOW NET PROMOTER SCORE RELATES TO ORGANIZATIONAL GROWTH. In *International Journal of Creative Research Thoughts* (Vol. 6, Issue 2). www.ijert.orgwww.ijert.org
- Rivero Gutiérrez, L., & Samino García, R. (2020). Omnichannel Strategy and Consumer Behavior in Distribution Channels: Trends in the Ophthalmology Sector. *Frontiers in Psychology*, *11*. <https://doi.org/10.3389/fpsyg.2020.01142>
- Safie, N., Satar, M., Dastane, O., Yusnorizam, M., & Arif, M. ' . (2019). Customer Value Proposition for E-Commerce: A Case Study Approach School of Accounting & Business Management, FTMS Global Malaysia Block 3420, Persiaran Semarak Api, Cyber 4, 63000 Cyberjaya, Malaysia 2. In *IJACSA International Journal of Advanced Computer Science and Applications* (Vol. 10, Issue 2). www.ijacsa.thesai.org
- Simone, A., & Sabbadin, E. (2017). The New Paradigm of the Omnichannel Retailing: Key Drivers, New Challenges and Potential Outcomes Resulting from the Adoption of an Omnichannel Approach. *International Journal of Business and Management*, *13*(1), 85. <https://doi.org/10.5539/ijbm.v13n1p85>
- Swedberg, R. (2020). Exploratory Research. In C. Elman, J. Gerring, & J. Mahoney (Eds.), *The Production of Knowledge - Enhancing Progress in Social Science* (pp. 17–39). Cambridge University Press. https://books.google.pt/books?hl=en&lr=&id=vITMDwAAQBAJ&oi=fnd&pg=PA17&dq=exploratory+approach+in+research&ots=ITsGf4SaZm&sig=gItJNnEif_PLJsk1c35wTZggllk&redir_esc=y#v=onepage&q=exploratory%20approach%20in%20research&f=false
- Taherdoost, H. (2019). What Is the Best Response Scale for Survey and Questionnaire Design; Review of Different Lengths of Rating Scale / Attitude Scale / Likert Scale. In *International Journal of Academic Research in Management (IJARM)* (Vol. 8, Issue 1).
- Vakulenko, Y., Shams, P., Hellström, D., & Hjort, K. (2019a). Online retail experience and customer satisfaction: the mediating role of last mile delivery. *International Review of*

Retail, Distribution and Consumer Research, 29(3), 306–320.

<https://doi.org/10.1080/09593969.2019.1598466>

Vakulenko, Y., Shams, P., Hellström, D., & Hjort, K. (2019b). Service innovation in e-commerce last mile delivery: Mapping the e-customer journey. *Journal of Business Research*, 101, 461–468. <https://doi.org/10.1016/j.jbusres.2019.01.016>

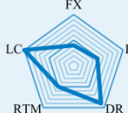
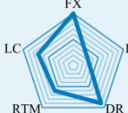
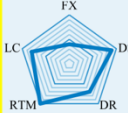
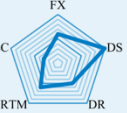
Verma, R., & Reyes-Mercado, P. (2021). Happy Laundry Services: What Next? In Rajagopal & R. Behl (Eds.), *Entrepreneurship and Regional Development* (pp. 367–379). Palgrave Macmillan, Charm. https://doi.org/10.1007/978-3-030-45521-7_19

Annexes

Annex A: Configuring the last mile – Protean LMSN

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TABLE I. Characteristics of the SHOP Model.

Configuration Dimension	Variable	Simple LMSN	One-Stop LMSN	Protean LMSN	Hyperlocal LMSN
Network Structure	Centralization	High	High	Low	Low
	Vertical Integration	High	Low	Moderate - High	Low - Moderate
	Horizontal Integration	Low	High	Low - Moderate	High
	Geographic Dispersion	Moderate	High	Low - High	Low
Network Flow	Flow Integration	High	Low - Moderate	High	Low - Moderate
	Flow Coordination	Low	High	Low	High
Relationship Governance	Interdependence	Low	Moderate	High	Low-Moderate
	Governance Mechanism	Hierarchical	Market and Intermediate	Hierarchical and Intermediate	Market
Service Architecture	Service Uniqueness	High	Low	Moderate - High	Moderate
	Service Modularity	Low	High	Low - Moderate	High
Core Logistics Capability		Low Total Cost Distribution	Flexibility (and customizability) Delivery Reliability	Responsiveness to Target Market(s)	Delivery Speed
Logistics Capability Maturity Profile					
Delivery Responsiveness		Slow			Fast

Note: LMSN = last-mile supply network; FX = flexibility; DS = delivery speed; DR = delivery reliability; RTM = responsiveness to target market(s); LC = low total cost distribution.

Annex B: Population in Lisbon

2018	A. M. Lisboa	Portugal	2018
milhares			thousands
População ativa	1 413,2	5 232,6	Active population
População empregada	1 308,2	4 866,7	Employed population
População desempregada	105,0	365,9	Unemployed population
%			%
Taxa de atividade - Total	49,8	51,0	Activity rate - Total
Taxa de atividade - Feminina	47,6	47,5	Activity rate - Female
Taxa de atividade - 15-24 anos	32,7	34,2	Activity rate - 15-24 years
Taxa de emprego - 15-64 anos	71,3	69,7	Employment rate - 15-64 years
Taxa de emprego - 45 e + anos	44,3	45,3	Employment rate - 45 and + years
Proporção de desempregadas/os de longa duração	49,6	51,1	Proportion of long-term unemployed population
	A. M. Lisboa	Portugal	

Fonte: INE, I.P., Inquérito ao Emprego.
Source: Statistics Portugal, Labour Force Survey.

Annex C: Balance Sheet

Balance Sheet					
(Euros €)	2022	2023	2024	2025	2026
Assets					
Current Assets:					
Cash	41 101	32 407	48 985	73 108	121 448
Accounts Receivable	-	-	-	-	-
Total Current Assets	41 101	32 407	48 985	73 108	121 448
Property & Equipment					
Property & Equipment	27 000	25 200	23 400	21 600	19 800
Goodwill	-	-	-	-	-
Total Assets	68 101	57 607	72 385	94 708	141 248
Liabilities					
Current Liabilities:					
Accounts Payable	-	-	-	-	-
Accrued Expenses	-	-	-	-	-
Unearned revenue	-	-	-	-	-
Total Current Liabilities	-	-	-	-	-
Long-term Debt					
Long-term Debt	125 000	125 000	112 500	100 000	87 500
Total Liabilities	125 000	125 000	112 500	100 000	87 500
Shareholder's Equity					
Equity Capital	25 000	25 000	25 000	25 000	25 000
Retained Earnings	(81 899)	(92 393)	(65 115)	(30 292)	(28 748)
Total Shareholder's Equity	(56 899)	(67 393)	(40 115)	(5 292)	53 748
Total L+E	68 101	57 607	72 385	94 708	141 248

Annex D: Survey Questions and Answers

Question #	Question	Number of selections
1.	Please state your age group:	96
	<18	0
	18-24	62
	25-34	27
	35-45	4
	46-60	3
	>60	0
2.	Please state your gender:	96
	Woman	59

	Man	37
	Prefer not to say	0
3.	Please state your nationality:	96
	Portuguese	91
	European	4
	Other	1
4.	If you selected "Other" in the question answered before, please state which one:	1
	Brazilian	1
5.	Household situation:	96
	Living with your parents	61
	Living with your partner/with friends	23
	Living alone	12
6.	Work-life situation:	96
	Employed full-time	61
	Studying full-time	17
	Employed part-time and studying	10
	Employed part-time and not studying	2
	Not employed or studying at present time	6
7.	At present date, where do you get your clothes washed/cleaned?	96
	Home (by yourself)	89
	Local Laundry Service	5
	Express laundry (e.g., 5aSec, etc.)	1
	Other options	1
8.	If you selected "Other options" in the previous question, please state where:	1
	Home, by cleaning lady	1
9.	At present date, where do you get your clothes ironed?	96
	Home (by yourself)	85
	Local Laundry Service	6
	Express laundry (e.g., 5aSec, etc.)	1
	Other options	4
10.	If you selected "Other options" in the previous question, please state where:	4
	Home, by cleaning lady	4
11.	What is your level of interest in a service like the New Way of Clean Clothing (Picking up dirty clothes and delivering it back to	96

	<p>your house, cleaned, washed and/or ironed, at your convenience for a cheap price, through the interface of an app)?</p> <p>Please answer 1-5, being that 1 is "Not Interested" and 5 is "Very Interested".</p>	
	<p>1 - Not Interested</p> <p>2 - Low level of interest</p> <p>3 - Neither interested nor uninterested</p> <p>4 - Interested</p> <p>5 - Very interested</p>	<p>6</p> <p>13</p> <p>22</p> <p>33</p> <p>22</p>
12.	<p>Are you likely to use a service like The New Way of Clean Clothing?</p> <p>Please answer 1-5, being that 1 is "Very Unlikely" and 5 is "Very Likely".</p>	96
	<p>1 - Very unlikely</p> <p>2 - Unlikely</p> <p>3 - Neither likely nor unlikely</p> <p>4 - Likely</p> <p>5 - Very likely</p>	<p>9</p> <p>19</p> <p>24</p> <p>29</p> <p>15</p>
13.	<p>Having an app like this would make your life easier, i.e., would it help with time management in your "day-to-day" life?</p> <p>Please answer 1-5, being that 1 is "Completely disagree" and 5 is "Completely agree".</p>	96
	<p>1 - Completely disagree</p> <p>2 - Disagree</p> <p>3 - Neither agree nor disagree</p> <p>4 - Agree</p> <p>5 - Completely agree</p>	<p>5</p> <p>5</p> <p>24</p> <p>35</p> <p>27</p>
14.	<p>Do you think that having an app interface makes a difference in a business like this? Where there's practically no digital development and the whole business is very "family based".</p> <p>Please answer 1-5, being that 1 is "No difference/Not relevant" and 5 is "A lot of difference/Very relevant".</p>	96

	1 - Not relevant 2 - Slightly irrelevant 3 - Neither relevant nor irrelevant 4 - Relevant 5 - Very relevant	1 1 21 44 29
15.	Do you value home delivery instead of having to pick up the products that you buy or, more specifically, the clothes that you send to be cleaned?	96
	Yes, I prefer home delivery but only for a cheap price Yes, I prefer home delivery but I'm not willing to pay more Yes, I prefer home delivery and I'm willing to pay extra No, I prefer to pick up the products myself	67 17 6 6
16.	Do you consider that there's a certain degree of social need for services like this to be digitally developed? For example, food delivery followed this path (with UberEats and others), as well as the "Taxi" business (with Uber or Bolt). Do you think this business (laundries) should follow the trend? Please answer 1-5, being that 1 is "Totally disagree" and 5 is "Totally agree".	96
	1 - Completely disagree 2 - Disagree 3 - Neither agree nor disagree 4 - Agree 5 - Completely agree	1 4 22 45 24
17.	Do you think that having an app that gathers all the laundry service companies of your area of residence in one place would: At first, improve the competition and result in cheaper prices for the end customer; At second, improve the quality of each company that is featured in the app? Please answer 1-5, being that 1 is "Totally disagree" and 5 is "Totally agree".	96
	1 - Completely disagree 2 - Disagree	2 6

3 - Neither agree nor disagree	22
4 - Agree	43
5 - Completely agree	23