

Finnish startups

Success factors, challenges and causes for failure

Caroline Nyman

Master's Thesis International Business Management 2020

MASTERARBETE		
Arcada		
Utbildning:	International Business Management	
Identifikationsnummer:	7387	
Författare: Caroline Nyman		
Arbetets namn:	Finnish startups: Success factors, challenges and causes for failure	
Handledare (Arcada):	Minna Stenius	
Uppdragsgivare:		

Sammandrag:

Syftet med denna avhandling var att granska finska startups, vilka deras framgångsfaktorer samt största utmaningar är. Målet var att ta reda på om företagen utsätts för likadana problem eller likadana succéer, vilket skulle antyda att framgång och misslyckande följer ett visst mönster. Problemställningarna "vilka är framgångsfaktorerna för ett finskt startupföretag" samt "vilka är utmaningarna för ett finskt startupföretag" stöder målet och syftet med arbetet. Finland hyser ett startupgemenskap som är känd för sina medlemmars vilja att samarbeta och dessutom är Finland känt för sitt höga innovationsindex. 4000 nya startups uppkommer varje år, och 70 % av dessa överlever de följande fem åren. Däremot anses bara 2% av dessa vara skalbara företag. Den teoretiska delen består av teman som är starkt kopplade till startups, bl.a. de största utmaningarna, kritiska framgångsfaktorer, finansiering samt affärsmodeller diskuteras. Metoden i detta arbete var semi-strukturerade kvalitativa intervjuer, eftersom de ger värdefull information angående grundarens startup-resa, hans val och hur dessa har påverkat framgången av hans företag. Sex startup grundare deltog i studien, vilket även bidrar till arbetets begränsningar, ett större urval kunde ha gett tydligare resultat.

Undersökningen visade att grundare av startups är ambitiösa människor som är villiga att lära sig och experimentera, men innehar även affärskunskaper och hur man handskas med människor. Finansiering är den viktigaste framgångsfaktorn för ett startup, men behöver även ett skickligt arbetslag samt en filosofi som fokuserar på kunden. Den största utmaningen för startups är saknad finansiering, men även här är ett misslyckande någonting som beror på många komponenter.

Nyckelord:	Startup, framgångsfaktorer, orsaker till misslyckande, kvalitativ metod	
Sidantal:	68	
Språk:	Engelska	
Datum för godkännande:	27.5.2020	

MASTER'S THESIS		
Arcada		
Degree Programme:	International Business Management	
Identification number:	7387	
Author: Caroline Nyman		
Title:	Finnish startups: Success factors, challenges and causes for failure	
Supervisor (Arcada):	Minna Stenius	
Commissioned by:		
A1 / /		

Abstract:

The purpose of this thesis was to explore success factors and challenges of Finnish startups. The aim was to examine whether there are similar reasons for success and failure amongst startup companies - something that would imply that success or failure follows a certain pattern. The research questions "What are the success factors for a Finnish startup" as well as "What are the challenges for a Finnish startup" naturally pursues the aim of the thesis. Finland is the home to a startup scene that is known for its collaborative community and the country has been recognized for its high level of innovation. 4000 Finnish startups emerge every year, of which 70% survives the forthcoming five years. However, only 2% of these are considered to be scalable startups. The literature review consists of themes that are closely connected to a startups success or failure: key challenges, critical success factors, the startup life cycle, predicting success, unforeseeable uncertainty, business models and funding. The method used for this thesis is a semi-structured deep interview, which is the most proper method since it gives valuable insight into a founder's journey with the startup, exploring the choices that have been made and how it affected the success of the company. Six startup founders participated in the study, which also affects the limitations, as a larger sample could have produced clearer evidence.

The empirical study suggests that founders are driven people that are willing to learn and experiment, but a certain amount of business and people skills are needed as well to survive in this world. Funding is considered the most important reason for success but needs other components such as a skilled team and a customer-centric philosophy to achieve real success. The most substantial challenge for startups is lack of funding, but failure is also the product of several components.

Keywords:	Startup, success factors, failure factors, qualitative method
Number of pages:	68
Language:	English
Date of acceptance:	27.5.2020

TABLE OF CONTENTS

1	INT	RODUCTION	7
	1.1	Aim and research questions	8
	1.2	Demarcation	8
	1.3	Structure of the thesis	8
2	LITE	ERATURE REVIEW	9
	2.1	Concepts	9
	2.2	Key challenges of startups	
	2.3	Predicting success	
	2.4	Critical success factors	
	2.5	Unforeseeable uncertainty	
	2.6	Life cycle of startups	
	2.6.1	1 The 5 phases of the startup lifecycle	
	2.7	Business models for startups	
	2.7.1	1 The Lean Startup	
	2.7.2	2 Minimum Viable Product	
	2.7.3	3 From Product Development to Customer Development	
	2.7.4	4 Business Model Canvas	21
	2.7.8	5 Entering the market as a startup	
	2.8	Funding	24
	2.8.1	1 Venture Capital investors	
	2.8.2	2 Business Angels	
	2.8.3		
	2.8.4		
	2.9	Key aspects summarized	
3	ME	THODOLOGY	
	3.1	Research approach	
	3.2	Data collection	
	3.3	Data analysis	
	3.4	Credibility & Trustworthiness	
4	RES	SULTS	34
	4.1	Dimensions & themes	
	4.2	The success factors	
	4.2.1	1 Funding	
	4.2.2	2 Team	
	4.2.3	3 Product & Customer	

	6.2	Limita	ations and suggestions for future research	. 55
	6.1	Practi	ical implications	. 55
6	CO	NCLU	SION	.54
	5.4	Sumn	nary of discussion	. 53
	5.3.	3	The Finnish startup scene	. 53
	5.3.	2 3	Success skills	. 52
	5.3.	1 I	Background & experience	. 52
	5.3	The fo	ounder	. 52
	5.2.	4 I	Miscellaneous challenges	. 51
	5.2.	3	Team friction	. 51
	5.2.	2 I	Difficult product & market	. 51
	5.2.	1 L	Lack of funding	. 50
	5.2	Challe	enges and reasons for failure	. 50
	5.1.	5 I	Innovation & Experimenting	. 49
	5.1.		Preparation	
	5.1.		Product & Customer	
	5.1.		стеат	
	5.1.		Funding	
	5.1	Succe	ess factors	.47
5	DIS	CUSS	SION	.47
	4.4.	3	The Finnish startup scene	. 46
	4.4.		Success skills	
	4.4.		Background & experience	
	4.4		ounder	
	4.3.		Miscellaneous challenges	
	4.3.	3	Team friction	. 42
	4.3.	2 I	Difficult product & market	. 41
	4.3.	1 I	Lack of funding	. 40
	4.3	The c	hallenges & reasons for failure	. 39
	4.2.	5 I	Innovation & experimenting	. 39
	4.2.	4 I	Preparation	. 38

Figures

Figure 1Top 10 challenges for startups (Giardino 2015)	11
Figure 2 Reasons why startups fail (Cantamessa et al 2018)	12
Figure 3 Success versus failure variables (Lussier 1995)	13
Figure 4 The startup life cycle stages based on the literature review (Santis	steban &
Mauricio, 2017)	15
Figure 5 The 5 phases of the startup life cycle by Brown, M (Tradecraft 2016)	17
Figure 6 The product development model versus the customer development	nt model
(Blank,2006)	20
Figure 7 Business Model Canvas (Osterwalder, A. 2010)	22
Figure 8 The Lean Canvas (Maurya, A. 2012)	23
Figure 9 The startup lifecycle and options for investment (Etula 2017)	24
Figure 10 The themes of the Success-dimension	35
Figure 11 The themes of the challenges & reasons for failure - dimension	40
Figure 12 The themes of the founder - dimension	44

Tables

Table 1 List of participants business fields and each individuals code......32

1 INTRODUCTION

A young, small business venture with a unique idea or service, that will add value for the customer, or more commonly called; a startup, is the phenomenon of the 21st century. The Finnish startup scene is still in its cradle, and therefore facts and statistics are hard to come by (Lukkari, 2018). As reported by Etla (2016), 4000 Finnish startups emerge every year, of which 70% survives the forthcoming five years. It is crucial to underline that entrepreneurship plays a bigger, more important role for the economy than one might think. Startups aid the growth of the economy by lifting productivity and creating jobs. Unfortunately, this development is not dynamic, and the impact is realized years later (Etla, 2018).

According to Etla (2018), of all of the startups that enter the Finnish market each year, only 2% or roughly 100 companies show promising growth from the start. However, a third of these promising startups will experience trouble with funding. Considering these promising startups experiencing challenges, it is important to understand what the growth and success factors of these startups are. Furthermore, it would be essential, to research why only 2% of the startups are perceived as scalable, and what could be done to increase that amount. A greater amount of scalable startups are valuable assets for the Finnish economy.

Finland is the home to a very positive startup culture, that supports young companies testing the market, even though these companies might fail rapidly (Etla 2018). The Finnish public sector support new companies with funding in various ways, which is an enormous help for a company just beginning its journey. For instance, Business Finland has seven different funding programs meant for startups (Business Finland 2019). The private sector's funds have also been growing lately, from 185 million € invested in 2013 to 479 million € invested in 2018 (Fiban, 2019). A new study from Etla (2019) suggests that 83-93% of companies that are funded by business angels are more likely to survive after two years in business than companies without angel funding.

Empowering examples from startups that are big successes, such as Rovio, Smartly.io and Supercell are also powerful enablers that can create a positive mindset for future entrepreneurs. The Finnish startup scene is known for being collaborative and open to sharing knowledge (Koiviola, 2019). Moreover, another meaningful enabler for the Finnish startup culture is Finland's high innovation index, currently ranked as 3rd most innovative in the world (Jamrisko, Miller & Lu 2019).

1.1 Aim and research questions

The aim of this thesis is to research whether there are any common denominators of success and failure factors of startups in Finland? The author aims to explore various themes and theories connected to startups, that supports them in succeeding or poses challenges to them.

More specifically, the research questions are:

- 1) What are the success factors for a Finnish startup?
- 2) What are the challenges for a Finnish startup?

1.2 Demarcation

This thesis focuses on startups that operate in the technology field. These have, generally speaking, the highest growth potential.

1.3 Structure of the thesis

This thesis is divided into six chapters. The introduction leads the reader into the Finnish startup world and why this topic is relevant. The second chapter reviews the academic literature that is closely linked to startups, i.e. Funding, key challenges, success factors, predicting success and so on. The thesis's methodology is presented in the third chapter, shedding light over the chosen research method, data collection and how data analysis was implemented. Trustworthiness and credibility of the research is also discussed. The fourth chapter presents the findings of the data collection according to the themes identified in the data. The results are hereafter discussed and analyzed against to the material in the literature review. The sixth chapter offers the conclusions of the research, and the most important findings. At last, practical implications, limitations and suggestions for future research are submitted.

2 LITERATURE REVIEW

The literature review aims at examining different topics that are closely linked together around the main theme; startups. In order to understand how startups work and what makes them successful or not, one needs to research the building blocks of a new venture. The topics in this part have been partly chosen because of how often they reoccur in academic literature regarding startups.

2.1 Concepts

Startup:

A young company operated by a small group of people at most. A startup has a good growth potential, because they can offer new value to the customer through a product/service that wasn't known before (Fontinelle 2017). However, the well-known entrepreneur from Silicon Valley, Steve Blank, defines a startup as "a temporary organization designed to search for a repeatable and scalable business model" (Raghu 2017).

Entrepreneur:

A person that takes all responsibility in order to bring an innovation or idea to life. An entrepreneur makes all the decisions regarding a new business operation (Sitkins 2010).

Startup lifecycle:

The different phases of a start-up's life. These phases determine the different activities that should carried out at a certain time. There are several opinions regarding which phases are most important, but most models have the same general idea; from idea to investment to growth (Lopez; Nawal, 2018, Salamanzadeh et al, 2015).

Startup ecosystem:

A startup ecosystem refers to the interaction between startups and their supporting elements. This kind of ecosystem is meant to aid the startups to grow and develop (Tripathi et al, 2017).

Business model:

A business model is a plan, made by the business, that strives to answer the questions of who the customer is, what the product is and how it can create value for the customers. There are many kinds of business models, depending on size and industry (Rissanen & Sainio, 2016).

Business Angel:

A person that aids the start-up with financial assets, own knowledge and useful networks. The person receives a part of the profit but is not given a place in management (Jungman et al, 2004, Collins Dictionary 2019).

Pivoting:

To alter your business model according to how the market reacts to the product or service that is being offered (Ripsas et al, 2016).

Proof-of-concept:

An exercise meant to test if an idea can be turned into reality. A proof-of-concept seeks to verify that the idea will work as one has envisioned. The exercise gives the opportunity to see if there is potential for further developing or building (Rouse, M. 2019 TechTarget).

2.2 Key challenges of startups

To be able to avoid failure in the initial phase, Duggan and Blayden (2001) examine the importance of planning and preparing a project thoroughly, while Bourdeau (2010) focuses on five essential tasks such as building credibility, hiring good employees and adding value to customers in order to be successful. Giardino et al (2015) published the ten most critical challenges for startups, based on the survey answers from almost 5000 CEOs. According to the results, most startups face the most challenges in the competition for constant cutting-edge technology and finding their first paying customers. Other major challenges were finding appropriate financial funding as well as finding an entrepreneurial team with the ability to react swiftly. Giardino et al (2015) were able to categorize the challenges into four main dimensions; product, market, financial and team. Most of the challenges detected in the survey, are found in the dimensions product and market. The challenges within these dimensions were at their peak when the problem was being evaluated and when the product that has been developed was in its mature stage.

Challenge	Description	#	Dimension
Thriving in	developing technologically innovative products, which re-	1.2	Product
Technology	quire cutting-edge development tools and techniques		
Uncertainty			
Acquiring First	persuading a costumer to purchase the product, e.g. con-	870	Market
Paying Customers	verting traffic into paying accounts		
Acquiring Initial	acquiring the needed financial resources, e.g. from angel	682	Financial
Funding	investors or entrepreneurs' family and friends		
Building	building and motivating a team with entrepreneurial char-	436	Team
Entrepreneurial	acteristics, such as the ability to evaluate and react to		
Teams	unforeseen events		
Delivering	defining an appropriate business strategy to deliver value*	393	Market
Customer Value			
Managing	doing too much work in a relatively short time, e.g. duties	351	Team
Multiple Tasks	from business to technical concerns		
Defining	capturing and evaluating the riskiest assumptions that	307	Product
Minimum	might fail the business concept		
Viable Product			
Targeting	focusing on specific needs of users willing to take risks on	212	Market
a Niche Market	a new product, such as early-adopters and innovators		
Staying Focused	not being particularly sensitive to influences from differ-	165	Team
and Disciplined	ent stakeholders, such as customers, partners, investors		
-	and competitors (both actual and potential)		
Reaching the	balancing losses with enough profits to continue working	161	Financial
Break-even Point	on the project		

Figure 1Top 10 challenges for startups (Giardino 2015)

Cantamessa et al (2018) approached the subject from another angle, by analysing 214 startup failure reports from the websites Autopsy and CB Insights (<u>https://www.getau-topsy.com/ & https://www.cbinsights.com/</u>). A model called SHELL, mainly used for identifying causes of accidents in aviation, was in this case used to visualize that startups rarely fail due to one cause, and that there may be several reasons why a startup goes out of business. The authors identified failure categories, which were clustered and then placed into the SHELL-categories; software, hardware, environment, liveware (organization) and liveware (customers). In the startup environment, software relates to the business plan, hardware is the product being offered to the market and the environment consists of stakeholders and competitors. The analysis showed that the highest number of failing startups belonged to the sectors social media, software and service. 44% of the failed startups went out of business in 1-3 years, 28% managed to stay active for 3-5 years and 14% failed during their first year. After 5 years the number of remaining startups was merely 14%.

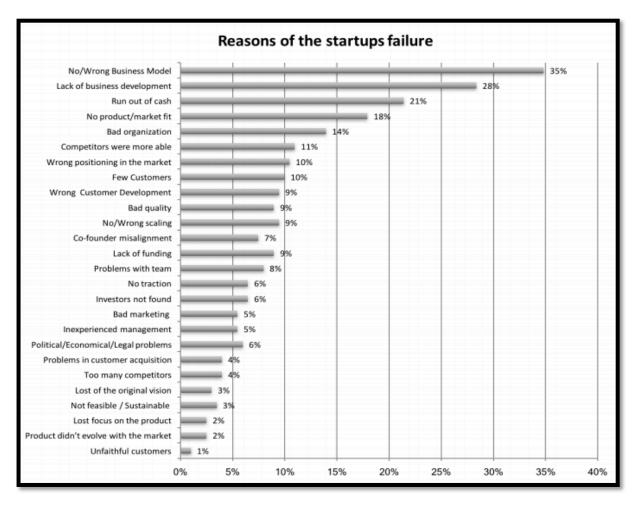


Figure 2 Reasons why startups fail (Cantamessa et al 2018)

There are usually several reasons to why startups fail, and most of these reasons originated from the software/business plan and the livewire/organization. Further analysis showed that the companies had the wrong business model in use and that there was no prod-uct/market fit. The most prominent problems in the organization were having no cash left and that the business lacked development.

2.3 Predicting success

Predicting success and preparing for risk and uncertainty is a vital part of the startup process. Success versus failure prediction model serve as an aid for not only entrepreneurs, but stakeholders such as investors, suppliers and public policy makers. Lussier (1995), developed a model which tests 15 different variables in order to predict whether a business will fail or succeed. Former models have mainly concentrated on financial variables and are usually helpful only after the first year's sales are published. The variables used in Lussier's model are capital, industry experience, professional advisor, staffing, education and parents owning a business, among others. Lussier (1995) states that this model even can be used by an entrepreneur who does not have a business yet but wants to know the probability of success. By estimating one's strengths and weaknesses in each of the variables, it is possible to get an idea of the probability of success.

Variables	Failed Mean or Frequency	Failed s.d.	Success Mean or Frequency	Success s.d.
1. Capital	4.75	1.61	4.60	1.54
 adequate - 7 inadequate) Record keeping and financial control (1 poor - 7 good) 	4.69	1.72	4.77	1.54
 Industry experience (number of years) 	10.00	8.34	8.39	7.99
 Management experience (number of years) 	9.29	7.74	7.63	8.21
5. Planning (1 specific - 7 no plan)	4.09	1.71	3.84	1.52
6. Professional advise (1 used - 7 not used)	3.96**	1.72	3.03**	1.39
7. Education (number of years)	15.32*	2.98	14.53*	2.59
8. Staffing (1 difficult - 7 easy)	5.05***	1.59	4.29***	1.72
9. Product/service timing (1 intro 7 decline)	3.94	1.45	3.95	1.31
10. Economic timing (1 recession - 7 expan.)	4.19	1.85	4.20	1.76
11. Age of owner (number of years)	37.17	8.81	35.89	8.84
12. Partners (number with partners)	62 (frequer	ncy)	70 (frequer	icy)
13. Parents (# who owned a business)	33** (frequer	ncy)	45** (frequer	icy)
14. Minority (# of minority owners)	8 (frequer	ncy)	6 (frequer	icy)
15. Marketing (1 unskilled - 7 skilled)	4.46	1.77	3.94	1.76
a. Age of business (number of years)	5.49	2.80	5.82	2.78
(number of years) b. Size (number of employees)	25.33	37.79	22.23	42.33

Figure 3 Success versus failure variables (Lussier 1995)

Over time, with the help of new information, the model has been altered by adding variables that better suit SME's of the 21st century. Teng, Bhatia & Anwar (2011) used the Lussier-model as a base but had ultimately 26 questions in their survey. They found that especially training, good timing in releasing products and skilled managers were variables that helped ensure success. Halabí & Lussier (2014) on the other hand, used only eight variables in their survey, one of them being "use of internet". The most successful startups had started with a large amount of working capital, used internet more than less successful companies, kept detailed plans of the future, kept good control of financial and accounting information as well as invested in marketing. The education level among the entrepreneurs varied a lot, thus not giving sufficient evidence of its importance.

Cassar (2014) argues that experience from previous entrepreneurial work in a certain industry allows the entrepreneur to have an ability to forecast the future of new ventures. Having entrepreneurial experience helps develop cognitive skills in intellectually evaluating and assessing the opportunities of new ventures. By reflecting on the past, the entrepreneur can obtain information that will improve the future. Past experience aids in lowering the optimism, thereby not clouding the judgement. Mitchell et al., (2004) likewise takes support from the expert information processing theory that suggests that expert entrepreneurs are able to store and use information in a more productive way than less experienced colleagues. This theory proposes that entrepreneurs with more experience seldom fail.

Krishna et al., (2016) introduces a mathematical model to accurately predict a company's success or failure. Data was collected from 7000 successful versus 4000 failed companies during 1999 – 2014. By taking into account the different phases of the companies' life cycles, 9 different models were built. The models predict the outcome using mainly financial factors such as seed funding and further rounds of funding, but also take into account key factors such as time it took to get seed funding, how valuable the company is during each phase and how many months it has been active on the market. The authors also took into account severity factors that were categorized as either positive or negative. Positive factors such as good traction, low burn rate, good management and unwavering belief gave a positive score, while negative factors like non-scalable idea, wrong position on the market, lack of flexibility and incompetent leadership gave a negative score.

2.4 Critical success factors

A study by Santisteban & Mauricio (2017) reviews 74 different studies discussing success factors in information technology startups. Although the last two decades has seen a lot of literature on the subject of success factors of startups, there is still no general agreement regarding what these factors are. Furthermore, there is no agreed upon definition on what

success in a startup means, since every author defines it in a different way. All of these definitions have however, similar features, usually regarding growth of the company or the number of generated jobs.

Santisteban & Mauricio (2017) identifies 21 tested factors that influence success, as well as 13 proposed factors that have not been tested or studied. The 21 tested factors have not been ranked, only categorized. The following factors were discussed in at least 10 different studies, of which many focused on the strengths of the founding team such as previous startup experience, industry experience and technology or business skills. Venture capital was also a popular factor to explore. Topics that were discussed in a minor scale were management experience, size of the entrepreneurial team, age and gender of entrepreneur, R&D experience, motivation and government support. All of the factors were categorized into organizational, individual or external.

In addition, the authors identified 7 different models of the startup life cycle stages, from which one unanimous was created. The objective was to tie the different success factors to the development stages of the life cycle. Conversely, of the 21 factors, only six were connected to the different development stages. Previous experience and government support are tied to the seed stage, whereas the early stage benefits from venture capital. The growth stage is connected with a team that is skilled in business and technology, venture capital and clustering, meaning that companies that are connected to each other, work together in order to achieve benefits. The expansion stage is linked with clustering as well.

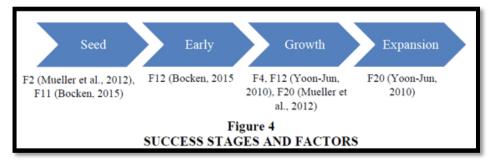


Figure 4 The startup life cycle stages based on the literature review (Santisteban & Mauricio, 2017)

2.5 Unforeseeable uncertainty

Startups that face risk for a long time of their lifecycle, have to, according to Sommer et al (2008) understand that traditional risk planning is not an adequate tool for a new venture that cannot foresee the risk and uncertainty that they are facing, but should instead use methods such as trial and error learning or selectionism in order to better cope with unforeseeable uncertainty. Unforeseeable uncertainty refers to factors that startups cannot recognize or articulate beforehand. The trial and error method involve actively looking for new information and conform the ongoing activities accordingly. It requires active and ongoing problem solving from management (Cassar, 2014). Selectionism, on the other hand, refers to pursuing several approaches simultaneously, in order to obtain new information and market feedback faster (Sommer et al, 2008).

However, in order to choose the right method, Sommer et al (2008) underline that management has to estimate how many decisions have to be taken into account and how many interactions these decisions will spark. This determines the complexity of the project. Another factor that will decide the method is the amount of unforeseeable uncertainty. Selectionism works better with high complexity and trial and error learning get the best results when unforeseeable uncertainty is high. The startups must also take into account that both high complexity and high unforeseeable uncertainty can be difficult to handle and should be advised to proceed with caution. The authors also found that many of the startups where using a mix of these methods, for example applying one method for the main project while using the other for a sub-project (Sommer et al, 2008).

2.6 Life cycle of startups

There are numerous life cycle models for startups, some more elaborate than others. The model by Morgan Brown (Tradecraft, 2016) is detailed and uses many of the principles of the Lean Startup methodology. According to Petch (2016) it is favorable for the startup founder to understand the phases of the lifecycle and where he/she is right now, in order to know if progress is being made and how to move forward.

2.6.1 The 5 phases of the startup lifecycle

The first phase is to recognize how the solution (product/service) actually solves the problem effectively. To move forward with this hypothesis, the intended target market is tested by conducting interviews and running demand tests on crowdfunding sites. This data will provide a solid base from which the minimum viable product (MVP) can be designed. By definition, a minimum viable product is "*a product with enough features to attract earlyadopter customers and validate a product idea early in the product development cycle*" (ProductPlan 2019).

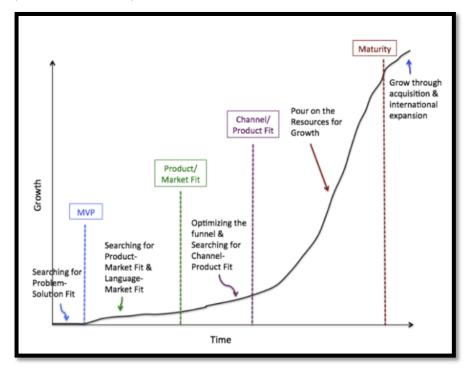


Figure 5 The 5 phases of the startup life cycle by Brown, M (Tradecraft 2016)

The second phase of the lifecycle is building the MVP. Time spent on building the product varies, and by the end of the phase, the MVP will be tested on initial users. The end of phase two requires a good customer flow to be able to collect more data on customer behaviour. However, the team should not do too much channel discovery at this point, just enough to measure retention. The third phase is testing product/market fit, in other words, testing how well the product fits in on the intended market. However, there are processes building up to the product/market fit, that have to be tested. Firstly, making sure that the customer understands the value proposition, accurate descriptions of the

product as well as features and benefits. A user that does not speak the same language as the startup is difficult to win over. Secondly, funnel optimization is tweaking the elements of the product so that the user perceives the product as valuable and easy to use. Lastly, testing which channels work best when pushing the product forward. Experiment with a few channels at a time to receive the best data (Tradecraft, 2016).

Testing how the product fits the market is best done by examining retention rates. Returning customers is a good sign of a product that is doing well, but other functions that help determine the status of the product is collecting more data from users by doing interviews or counting the net promoter score. The score is calculated by subtracting the percentage of the disappointed customers from the percentage of the content customers that would recommend the product (Net Promoter System, 2018). The fourth phase is scaling up and starting to grow. This is done by concentrating on the right channels. Good retention rates and conversion flow signals the beginning of a new phase. After recognizing the successful channels in the last phase, in this phase one channel at a time will be the main point of growth. This involves hiring the people that are most skilled within that channel and giving them enough assets to make the startup grow. When growth slows down, another channel with good results will be used as the main way to growth. The last phase of the life cycle is maturity. The startup has now reached a point in the life cycle where original growth has slowed down, and new means of growth must be found. Recommended ways of finding new growth is through acquisition, expansion abroad and continually investing in the startup's growth processes as well as looking for new channels of growth.

2.7 Business models for startups

A business model determines who the customer is, what the value proposition is, how the value chain will be created and why the product is needed by the consumer (Crick 2016). Rissanen & Sainio (2016) stress the importance of continuously developing the business model and changing business models in order to be competitive. This recommendation is not only for new ventures, it applies to incumbent businesses as well. Constantly changing or adjusting the business model is called "business model innovation". This term involves changing the building blocks of the model, extending the model, introducing a parallel

business model to the original one and creating a disruptive model (Rissanen & Sainio, 2016).

2.7.1 The Lean Startup

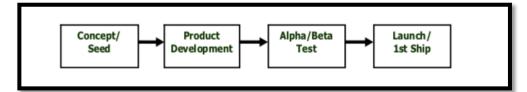
There is a subcategory of the term "business model innovation", called "business model experimentation", that involves changing the business model through experiments. A very popular business model principle, based on business model experimentation is the "lean startup", created by Eric Ries (2011). It involves shortening the cycles of planning and development of products, which enables the founders to quickly discover whether to adjust or keep the same business model (Blank, 2013; Rissanen & Sainio 2016). According to Eisenberg, Ries and Dillard (2012) a lean startup can be defined as "a *firm that follows a hypothesis-driven approach to the evaluation of an entrepreneurial opportunity and the development of a new product for a specific market niche"*. Startups live in an environment of constant uncertainty and should not operate the same way as established companies, who have more knowledge of their market and customers. When startups develop new products, focus should be, according to Dobrila (2012), on constantly experimenting with versions of the product. This constant stream of feedback either validates or contradicts the hypothesis, offers the opportunity to learn and move away from the constant uncertainty.

2.7.2 Minimum Viable Product

As discussed earlier, it is important to validate the vision that the founder has, to see that it offers value to customers. This is done by creating a version of the product, including only the necessary features. This version of the product is called a minimum viable product (MVP) and is used for experiments that test the MVP's features and collecting data on customers (Dobrila 2012). By continuously updating the MVP with feedback from users, constant learning and validating is possible.

2.7.3 From Product Development to Customer Development

The customer development process (CDP) is a business model created by Steve Blank (2014), who recognized the consequences of the popular business model product devel-



opment process (PDP) and therefore created a model better suited for startups. The PDPmodel is designed to focus on getting the product to the customers as rapidly as possible, whereas the CDP-model's focuses on getting to know the customers and creating solutions for their problems (Blank, 2006). As Blank (2006) comments: "*Startups don't fail because they lack a product; they fail because they lack customers and a proven financial model*." The CDP emphasizes learning and discovery as the most important activities of a startup, not execution. This means ignoring sales and marketing activities and focusing on discovering customers problems, learning how much the customer would pay for a solution and continuously learning from mistakes. Blank (2006) states that a company must be able to prove that there is a market and that the solution available by the startup is attractive to the potential customers.

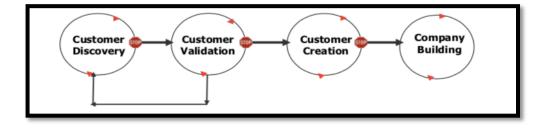


Figure 6 The product development model versus the customer development model (Blank, 2006)

The product development model follows four stages, beginning with concept/seed; a phase that is meant to clarify the founder's vision and form a concept for the startup. This phase seeks to answer questions regarding future customers, market segments, distribution, competitors, and most importantly: how the customers will benefit from the product/service. The second stage, called product development, the engineering and marketing team work simultaneously in order to move forward quickly. The engineering team

focuses on building the product as well as giving estimates for delivery and costs. The marketing team organizes customer focus groups, prepare sales and PR material.

In the third stage, called Alpha/Beta test, the engineering team will first test the product/service in a small scale, with the help of a small group of outside users to see that everything works and stabilize issues that arise. The last stage, known as product launch and first customer ship, will need extensive funding for many simultaneously ongoing processes (Blank, 2006)

The CDP model has four phases, all of them designed to be repeated. In other words, Blank (2006) points out that it will take time to find the right roadmap, underlining the fact that learning and discovery are vital in the process. This model is meant to complement the PDP- model mentioned earlier. The first step is customer discovery, focusing only on learning who the potential customers are, and validating whether it is important to the customer that the problem can be solved. Simply put, does the founder's vision have a market? The next step is customer validation that sets out to make the first successful sales and use these to build a model for future sales. Completing these steps gives useful information and demonstrates that the startup's product/service has found a market with paying customers and that the problem solved is valuable to the customer. Moreover, it means that the product/service has the correct price and that the sales channels and sales processes are the correct ones (Blank, 2006).

In the third step; customer creation, focus lies on capturing the interest of the end-user and increase demand. These activities require heavy spending on marketing, and should, according to Blank (2006) be done after the first wave of customers. This helps the startup control the cash burn rate. The last step, called company building, develops the startup, that formerly only concentrated on learning and discovery, into a formal type of company with specified departments for marketing, business development and sales. The objective is to build further on the success with the first wave of customers (Blank, 2006)

2.7.4 Business Model Canvas

Osterwalder & Pigneur (2010) have identified nine building blocks that should be present in any kind of business model, thus covering all the processes of a business, new or incumbent. These building blocks are customer segments, value propositions, delivery channels, customer relationships, revenue streams, key resource, key activities, key partnerships and cost structure. Together, these building blocks form a business model canvas that visualizes how each building block is necessary in order to earn money and grow.

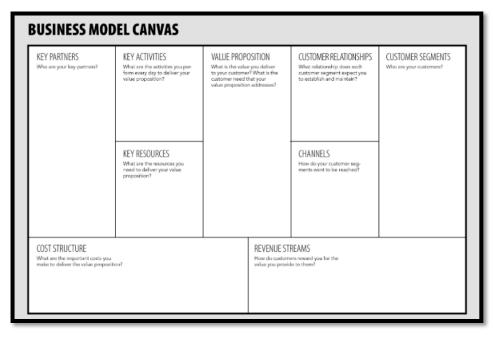


Figure 7 Business Model Canvas (Osterwalder, A. 2010)

Ladd (2018) tested how validating the hypothesis for each building block correlated with venture success. He found that even by validating one of the following; customer segment, value proposition, key activities and key partnerships, the venture had a greater chance of success. It should also be pointed out that validating the remaining building blocks; channels, customer relationships, revenue streams, key resources and cost structure had no impact on venture success. Ladd (2018) therefore suggest that only a part of the business model canvas is a potential help for entrepreneurs. Hussyin (2019) on the other hand underlines the usefulness of the business model canvas, arguing that the model takes into account all the important features of a business and gives a sense of direction to the entrepreneur.

Maurya (2012) argues that the business model canvas is not suited for entrepreneurs with fresh startups, since it uses only examples of successful and matures businesses. Maurya created a version of the model, called lean canvas. It takes into consideration the uncertainty and risk that a startup is facing and has new building blocks such as "problem", that sets out to identify the customers problem that the startup wants to solve. "Solution" is a building block that aims for a well-articulated simple solution to a problem wellunderstood. The other new building blocks in the lean canvas are "key metrics", that focuses on the important performance indicators and "unfair advantage "that outlines the startups competitive advantage.

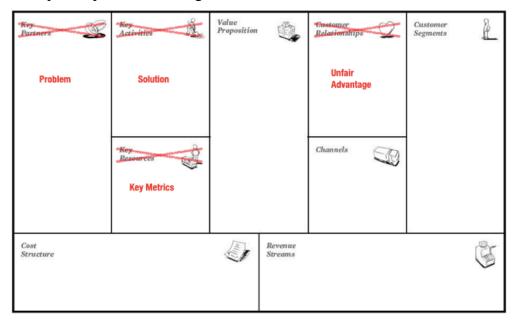


Figure 8 The Lean Canvas (Maurya, A. 2012)

2.7.5 Entering the market as a startup

Entering a new market, the founder not only has to take into account that all startups are different, but there are different types of markets as well. Blank (2006) has identified four different markets. Different types of markets impact every aspect of the market entry, and startups have to take into account the size of the market, how the product should be launched and whether the customer has recognized the problem which the startup has a solution for.

A startup can enter an existing market with a new product. However, success demands outranking existing products with better performance. An existing market offers a familiar environment with known competitors. It is also possible to create a new market with a new product that solves entirely new problems, which offers differentiation from competitors in the same field. Competition is scarce in this market, but future customers need to be defined and convinced to buy the solution. Entering a new market with a new product requires a competent use of funds. Resegmenting an existing market as a low-cost product means that the startup offers the customer a product at a lower price than the competitors. The product might not necessarily be the best performing. Entering this part of the market and staying there is easy as long as the startup is making a profit. When demand slows down, a change of market is advisable. Resegmenting the existing market with a niche-product is quite the opposite to the former market type. This means that the startup offers a similar product as the competitors, but with specific features to a higher cost, and only for a certain part of the market. Resegmenting existing markets are the most common way to enter a market, but are, according to Blank (2006) also the most complex ways to do so.

2.8 Funding

Since most startups are interested in the scalability of their businesses, growth processes that can help new ventures scale up rapidly are also, to a limited degree, discussed in the academic literature regarding startups (Cavallo et al 2019: Nanda et al, 2020). In this case, focus lies on growth that has been provided by different types of investors. Some authors discuss the meaning of knowledge, human resource and pure choice as growth opportunities (Tripathi et al, 2019), but this thesis will only discuss economic resources in relation to funding of startups.

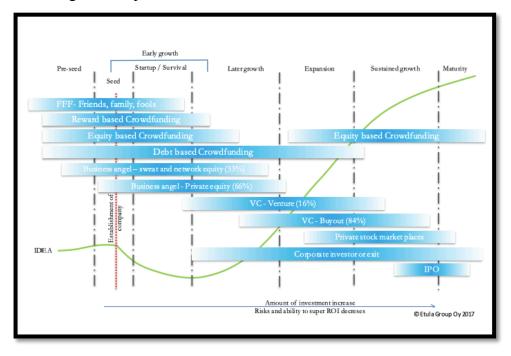


Figure 9 The startup lifecycle and options for investment (Etula 2017)

2.8.1 Venture Capital investors

The Finnish startup scene has seen large investments the last 5 years. According to the Finnish Venture Capital Association (2018), 4 billion euro has been invested in startups and growth companies in this time. Venture capital investors can help launch small dynamic startups by investing capital and providing the companies with industry expertise and their personal network. In return, the investor receives a share in the company. This partnership is designed to raise the profile and the value of the company. Other benefits that a venture capital investor might provide are increase of the company's value, decrease of financial risk and faster growth. Cavallo et al (2019) found that venture capital funding affected both digital startups as well as digital scaleups positively, helping these kinds of ventures create linear growth.

In order to be attractive in the eyes of an investor, a startup needs to, first and foremost, have a product that has found a solution to a problem in a different and better way than its competitors on the market. Another important issue is the team behind the product. Investors value talent, and demand to have the right kind of expertise building the product. Investors will also assess the international demand for the product, as well as the business model and the scalability of the company (Finnish Venture Capital Association, 2018).

2.8.2 Business Angels

Etula (2017) defines a business angel as a kind of private investor, that see themselves as helping hand, or angels to startups in need of funding. The business angel's average investment is 10 000€ minimum. The typical business angel has excellent management skills and might have been an entrepreneur once. A typical angel investor feels the need to contribute to startups by sharing their expertise and investing a piece of their private fortune. According to Etula (2017) the business angel always offers a minority investment worth 10-30%. The funding is used during the four first stages of the startup's life cycle, from pre-seed to the later growth stage. During this time the company is expected to advance from an idea to real growth, getting past the valley of death where many startups perish, and hopefully make an entrance on the international market.

Equity can come in three different forms; private, sweat & network. A business angel is more than likely willing to share more than their private fortune, they are eager to invest sweat and networks in order to boost the growth of the company (Etula, 2017).

2.8.3 Business Incubators & Accelerators

Business incubators and accelerators are programs that provide startups with the right tools for growth, in other words, funding is usually available, but these programs are designed to help the startups grow during the first phases of the startup life cycle, as well as accelerate the growth at a later stage. A business incubator program helps the startup throughout the most difficult time of the startup lifecycle. Through the program, the startup has access to office space, skills training as well as financial and professional networks. The incubation program does not generally offer investments to the startup, but rather, access to partners that do (Sepulveda, 2012; Infodev, 2016). A business accelerator offers shorter programs in order for the startup to launch growth. In these programs, investment in exchange for a share of the company is much more common. Focus lies on helping the startup with organizational, operational or strategic difficulties that is slowing down growth (Finac, 2017; Sepulveda, 2012).

2.8.4 Bootstrapping & Crowdfunding

Other types of funding that are closely tied to startups are bootstrapping and crowdfunding. Bootstrapping is a type of funding that according to Perry et al (2001) "uses nontraditional business funding sources". The sources are usually family and friends, or alternatively ex-coworkers. Another way of bootstrapping might be to delay payment of salaries or use one's personal savings. The first type is referred to as a "cash-increasing technique", while the other is a "cost-decreasing technique".

Startups that have been able to get their business of the ground, e.g. by bootstrapping, but are not able to get additional funding from business angels or venture capitalists, have the option to get funded by the individual. Crowdfunding is collecting small amounts of capital from a large number of people. Funds are collected via crowdfunding platforms. There are three types of crowdfunding, depending on the supporters reward: donation, lending and equity (Paschen, 2017). The first type, donation, is categorized into pure donation and reward donation. The first category is a so called "pure" donation from the supporter to the startup, with no strings attached. It is a donation given for the development of a specific product or service. By giving a reward donation, the supporter receives a compensation in the form of meeting the founder or partaking in the products development.

The second type of crowdfunding is lending, which is divided into three categories: forgivable loan, presales and traditional loan. In lending crowdfunding, it is expected that any funding given by the supporters, will be repaid at some point. A forgivable loan refers to a loan that will be given back if/when the founders startup produces revenue. A traditional loan is given using standard lending agreements. Interest of the loan is decided before the sales campaign begins. A presale loan will be returned to the supporter as a finished product (Paschen, 2017).

The third type is equity crowdfunding, which is divided into investor-led and entrepreneur-led. In this type of funding, the donator receives a share in the company as a reward. Investor-led funding refers to stakeholders that are experienced venture capitalists, business angels or specialist of a certain industry. The platform used for these kinds of projects are available through subscription only. In entrepreneur-led funding, on the other hand, invites are open to any kind of investor interested in the project (Paschen, 2017).

This kind of financial inclusivity would not work without the power of social media, that helps spread the word to the whole community, making it possible to raise large amounts of money (Dresner, 2014, Méric, Brabet et al, 2016). By using crowdfunding, startups are able to receive validation regarding product and market. Obtaining funding validates the products problem/solution fit, in other words, it proves that the product is able to provide a solution for a problem. Feedback regarding the product from early adapters helps to improve the product for next launch and testing the market early on gives the founder an inkling of future sales (Paschen, 2017).

2.9 Key aspects summarized

Key challenges of startups

Cantamessa et al (2008) states that a start ups rarely fail as a result of one component gone wrong. There are often several factors that contribute to a failure. Most of the failed startups belong to the software or social media field, of which 44 % goes out of business in 1-3 years. Giardino et al (2015) finds that most challenges derived from the tasks regarding product and market, highlighting problems such as not finding paying customers and the stress of continuously being forced to deliver cutting-edge technology. Cantamessa et al (2008) on the other hand demonstrates that mainly financial reasons such as running out of cash, not being able to develop the business or having the wrong business model were dominant factors for failure.

Success factors & predicting success

As a counterweight to studies that determine the challenges of startups, there are some academic studies that focus on the success factors and how to predict success. Lussier's (1995) model on predicting success has been altered and updated regularly to better suit the small companies of the 21st century. In the different models, especially financial independence and marketing activities are important in order to thrive. Cassar (2014) suggests that an entrepreneurial background is the key to success, arguing that cognitive skills, acquired from previous entrepreneurial endeavours, help assess and evaluate new business opportunities as well as prevents hasty decisions. Santisteban & Mauricio (2017) set out to identify the success factors by reviewing other studies. They find that indeed previous startup experience is widely discussed in many studies, as is industry experience, venture capital, management expertise and technological skills.

Life cycle of startups

Visualizing the startups life cycle gives a better understanding of the different phases of a life cycle, and which processes to spend time on. By grasping these phases, it is easier to know when progress is being made as well as when to move onto the next phase (Petch, 2016). The startup life cycle model used in this study is by Morgan Brown (2016) and focuses on how the product/service evolves over time. Different models work different angles, such as financial or organizational. The first phase is recognizing that there is a

genuine solution to an actual problem. Testing the market is an important part in order to move forward to the next phase; building the minimum viable product. An MVP is a product with enough features to attract early adopters and validate a product idea early in the product development cycle. The following phases are used for testing, how the product fits into the market, which channels are the most valuable for the product, and how to use resources for growth.

Business models

There is a lot of pressure on businesses to constantly evolve their business model in order to keep their competitive edge (Rissanen & Sainio, 2016). The lean startup model by Ries (2011) gives companies the possibility to constantly experiment with their current business model to find the best one. It relies upon shortening the product planning and development cycles, thereby being able to quickly react to changes that need to be made. Eisenberg, Ries & Dillard (2012) argue that startups belong to a different universe with constant uncertainty and should not be operating the same way as established companies. Before the lean startup came along, Steve Blank (2006), the startup guru, developed a business model that focused on getting to know the customer and developing the customer relationship, instead of focusing on pushing out a product too quickly to a customer with needs that are unknown.

The business model canvas by Osterwalder & Pigneur (2010) presented an opportunity for each entrepreneur to build a business model that suits their company the best, by presenting building blocks that cover all the business processes needed. Marya (2012) refined the model by adding building blocks that take into consideration the risk and uncertainty that startups face, as well as building blocks that outlines the startups unique selling point.

Funding

Sufficient economic resources is one of the most challenging tasks for startups, and many companies fail early on if there are no funding opportunities to help them in the early stages of the startup life cycle. There is a lot of funding available in Finland, from different public and private organizations. The amount of capital available from venture capital investors has also been growing the last few years, which is very promising for the Finnish

startup scene. Funding is also available by the help of business angels that not only share their own fortune, but also invest sweat and networks to help the startup grow.

Business incubators and accelerators are programs designed to help startups grow, not always by investment, but with other tools such as office space, networks and skills training.

Bootstrapping and crowdfunding are non-traditional business funding sources, that use primarily funding by individuals. Bootstrapping refers to using own funds, or money from family and friends, whereas crowdfunding is collecting small amounts of capital from a large number of people, usually through a social platform.

3 METHODOLOGY

3.1 Research approach

This thesis will explore the different themes that enable Finnish start-ups to be successful. This study will also look into the challenges that startups face and explore the causes for failure.

More specifically, the research questions are:

- 1) What are the success factors of Finnish startups?
- 2) What are the challenges for Finnish startups?

The data for this kind of exploratory thesis was collected with a qualitative research method that allows the interviewer to ask in-depth questions regarding personal experience, academic background and motivational drivers. The qualitative method of choice for this thesis was semi-structured interviews with founders of Finnish startups from the technology field. This form of data collection is the most appropriate since it gives valuable insight into a founder's journey with the startup, exploring the choices that have been made and how it affected the success of the company. By following the journey, the aim is to identify the factors along the way that enabled the founder to build a successful startup as well as the challenged faced (Bryman & Bell, 2003). A semi-structured interview follows an interview guide but is considered flexible as it is allowed to change the order of the questions and ask follow-up questions if needed. An interview has the possibility to ask in-depth questions that might need many follow up questions. The interviewer has the possibility to observe the object to determine the validity of the answers. The choice of a semi-structured interview is justified since there is not enough space on a survey or the possibility to anticipate the follow up questions that could be needed to collect the proper data. A survey is a correct tool when the aim is to collect concrete and unambiguous facts (Hirsjärvi & Hurme 2001).

3.2 Data collection

Six interviews were conducted during March and April of 2020. The first two interviews were held in the researcher's employer's office; the rest were held virtually with the help of a video conferencing platform. In the beginning of every session I explained the theme of the thesis and informed the interviewee that the intention of the semi-structured interview is to let the participant tell the story of his startup, and gently guide him through the different topics with explorative questions. Each interview lasted between 40 - 60minutes and was recorded with a phone. Half of the interviews were held in English, due to the interviewees mother tongue, and the other half in Finnish as per the request of the interviewees, since these participants felt that their stories would be more detailed if told in their native language. Each interview was transcribed, and the interviews conducted in Finnish were later translated into English. The researcher has carefully translated the interviews to correctly mirror the language spoken in the original interview. There is, however, a slight risk that the nuance of certain phrases, such as slang or emotionally charged parts are lost in translation. The transcribed interviews were thoroughly context analysed in order to find the underlaying themes from the data. Each analysed interview was coded into excel (Please see Appendix 2)

Participants had to meet the criterion that they are the founder, or part of the founding team of the startup. Furthermore, the startup had to have been active for a few years, preferably 3-4 years. Failed startups were also eligible for the study, if the company had been active for the required amount of time. Suitable candidates were tracked down using search engines with the search terms "successful Finnish startups", which led to an abundance of articles where startups were discussed. The researcher also used her personal as

well as professional network to find suitable startups for the study. In the beginning, only founders from startups in the technology field were invited to participate. However, one exception was made for the founder of the failed gaming company whose primary product was a boardgame that was not connected to the technology field, but later on in the lifecy-cle went on developing a game app.

The interview consisted of 8 main themes, each having 1-3 prompts in order to collect as detailed data as possible. The themes were based on the theoretical part of the thesis, choosing the factors that are strongly linked to start-ups, such as the startup life cycle, market entry, unforeseeable uncertainty, business models, funding and success factors. For this particular study, the interviewee's background was an important part of the data collection, so some questions strived to unravels each participants background and motivators for founding a start-up. The complete interview guide is found in Appendix 1. Data was collected from the founders of 6 different Finnish startup companies, all of which base their businesses on different technology solutions and are already a few years into the venture and can showcase a certain measure of success. One exception to this, as mentioned before, is the failed gaming company whose primary product was not initially linked to the technological field.

Nr #	Business field	Founded in	Code
1	Digital investment	2017	DI
2	Clean technology	2011	CT
3	Educational technology	2015	ET
4	Entertainment, Film & Digital media	2014	EFD
5	Digital Real estate	2017	DRE
6	Gaming	2016	G

Table 1 List of participants business fields and each individuals code

3.3 Data analysis

With the help of data analysis, the researcher strives to present to others what has been observed and discovered. There are multiple ways to analyze qualitative data, Saldana (2011) recommends choosing the method that correlates well with your literature review, or in order words; which method will provide the most satisfactory answers to the research questions as well as visualize the findings. Saldana also points out that a researcher

will throughout the whole documentation process start to observe and sense patterns and connections, but by choosing a method will systematically help to organize the data.

Qualitative data is primarily analyzed with a deductive or an inductive method. Deduction is based on conclusions from facts and evidence that has been validated. Induction on the other hand, is forming assumptions by auditing the evidence as well as the knowledge collected. This study will apply an inductive method since the intention is to explore the success factors of Finnish startups. Apart from using an inductive approach, the data will be further analyzed with the help of thematic analysis. According to Nowell et al. (2017), this kind of analysis, that can be utilized in several academic fields, can generate rich and detailed material. In addition, an accurately produced thematic analysis can present findings that are both "*trustworthy and insightful*". Nowell et al (2017) approaches the thematic analysis in 6 phases, beginning with breaking the data into smaller pieces of code, continuing on to looking for categories and finally producing and defining the themas. An example of the thematic analysis made for this study can be found in Appendix 2.

3.4 Credibility & Trustworthiness

A qualitative study needs to take into consideration the factors "credibility" and "trustworthiness", rather than "reliability" and "validity", according to Saldana (2011). The latter is more appropriate when discussing if a quantitative study is accurate. Credibility refers to introducing a narrative that is convincing, as well as an accurate methodology. The credibility of a study can be demonstrated by using the appropriate academic references, openly sharing the analytical methods used as well as using quotes from the interviews to name a few. Trustworthiness on the other hand, is openly discussing the research process, sharing information regarding number of interviews or illustrating analytical and ethical dilemmas. Saldana (2011) underlines that research is never written in stone: "But *remember that we can never conclusively* "prove" *something; we can only, at best, convincingly suggest. Research is an act of persuasion*". This thesis meets every of the criteria of trustworthiness and credibility mentioned above; the theoretic review displays a range of appropriate references, the thematic analysis used on the collected data is openly presented and several quotes from participants have been used in the results section. As for trustworthiness, the information regarding number of participants has been shared, as well as the whole research process.

4 RESULTS

In this chapter, the findings from the thematic analysis are presented. The collected data from the semi-systematic interviews has been thoroughly analyzed with the thematic analysis method, as discussed in the previous chapter. To begin with, the identified dimensions and themes will be introduced, after which each theme will be examined more closely.

4.1 Dimensions & themes

The thematic analysis revealed various ideas arising from the data. They were then thematically bundled together to second order themes and further categorized into three dimensions. The first two dimensions that emerged: the success factors (1) and the challenges & reasons for failure (2) illustrated the positive and the negative factors that support either success or failure. It became clear, however, that the founders background as well as personal thoughts on success needed to have its own dimension: the founder (3). The first dimension contains the themes: funding (1), team & network (2), product & customer (3), preparation (4) and innovation & experimenting (5). The second dimension holds the themes funding (1), product (2), team (3), market (4) as well as miscellaneous negative factors labelled as others (5). The third dimension contains the themes background & experience (1), success skills (2) and the Finnish startup scene (3).

4.2 The success factors

This dimension examines the positive factors that enables a startups success. Each founder was given the task to reflect upon the startups journey, reminiscing aspects that affected the business in a positive matter. The themes of this dimension are funding (1), team & network (2), product & customer (3), preparation (4) and innovation & experimenting (5). Figure 10 demonstrates how the data was organized thematically.

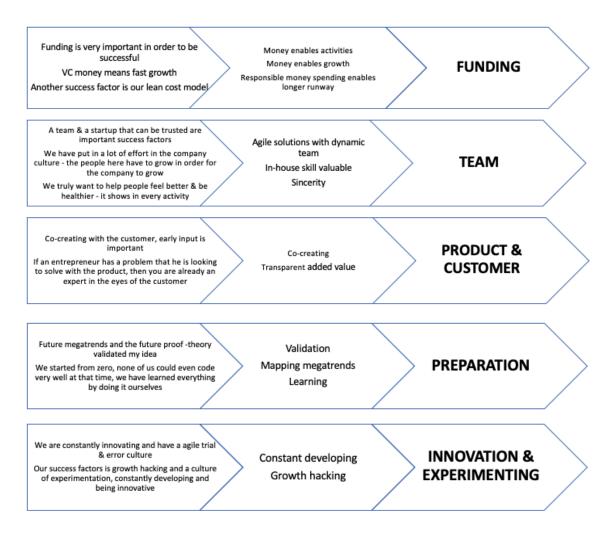


Figure 10 The themes of the Success-dimension

4.2.1 Funding

Every one of the interviewed startup founders highlighted the importance that funding has for the startup. Adequate funding does not only mean possibility for growth, it validates the business idea for potential clients and potential investors.

"Cash is king in this line of business - and money makes the journey possible" (CT)

Two of the startups have managed to stay independently funded, of which one is no longer active. The founder of the inactive started mentioned that:

"We when started the company, we didn't think about investment, we wanted to use our own money and stay independent for as long as possible" (G)

The other startup was afraid of owing the bank money, and used low-cost solutions for most activities, ensuring a slower growth but with a longer runway.

"I feel that a lot of companies try to invent the wheel all over again, when there actually are smart solutions available for a lot of activities" (DI)

"Another success factor is our lean cost model; other companies would have burned a lot of money by now" (DI)

The other startups have been granted money from several sources, both private and public. All of the founders commented in one matter or another that applying for funding is time consuming and takes a lot of paperwork, and in certain cases; a piece of the company in return.

"It is easy to get public funding, but it demands a lot of work" (EFD)

One founder has had the luck of having a private funder that believed in the business idea from the start and funded the company for two consecutive years.

"Success was possible thanks to a funder who believed in me from the start" (ET)

4.2.2 Team

Several startup founders commented that the team itself or the work performed by the team has led the company to success. One founder said that a prerequisite for a successful growth company is giving the employees room to develop their skills.

" Our teamwork led to success" (CT)

"I think that our team's dynamic is the reason we have achieved a certain amount of success" (DI)

"We have put in a lot of effort in the company culture - the people here have to grow in order for the company to grow" (CT)

One founding member recognized that there was a constant need for skilled programmer and used more than intended of the budget, in order to be spared from the hassle of different subcontractors. "We realized that we need to have the skills in-house and have employed our own programmer" (EFD)

The same team also took in an external advisor with a large network to help them navigate through different funding opportunities. The interviewee from this team explained that startup companies that are looking to be successful, need to be open to working with external partners, a person that has their own point of view and can offer constructive feedback.

4.2.3 Product & Customer

For many of the founders, putting the customer in the spotlight was highly prioritized. A few companies had built a part of their business idea on co-creating the product with the customer, in order to get valuable early input. However, the process wasn't always smooth.

"Before launching the product, we started co-creating the product together with teachers" (G)

"The product was co-created with customers, but it took resilience and strength to create a product that was to everybody's liking" (CT)

A few founders have created the products or services to meet a need or problem of their own, anticipating that if they experience a problem, others will too. One founder commented that by solving a problem like this, and offering it to the public, makes you an expert according to the customer.

"The idea came from my own frustrations with the market" (DRE)

"I wanted to provide people with better customer experience" (DRE)

"If an entrepreneur has a problem that he is looking to solve with the product, then you are already an expert in the eyes of the customer" (CT)

Other founders, that had not co-created the product with the customer, recognized that the valuable aspect of identifying the customer's needs before launching the product, since this was a favourable way of validating the business idea. Another founder commented that by knowing the customers' demands, finding the product/market fit is much more accessible. "By identifying the customer's needs, you will also find the product/market fit" (EFD)

When asked which was more important, launching the product quickly onto the market or getting acquainted with the customer, most founders admitted that these were equally important activities, whereas others replied that:

"Getting to know the customer before launching a product is vital" (ET) "The product needs to be launched asap" (G)

4.2.4 Preparation

When asked about what kind of preparations were made before going live, each founder seem to have their own take on how to prepare for the future. Half of the founders mentioned that they thoroughly mapped future megatrends or tested the future-proof-theory in order to receive some form of evidence that they were on the right track.

"Future megatrends and the future proof -theory validated my idea" (CT)

"In the beginning we mapped the megatrends of the world and put all our effort in to offering those to the customers" (EFD)

"Future plans are affected by current megatrends & other external factors" (ET)

One founder concluded that market research seems to be a waste of time, that the team should put the effort in creating and testing minimum viable products (MVP), and listen to how the customers respond.

"I was a firm believer that market research doesn't really get you far, it's more important to get the product as ready as possible, release it and see how the marker responds." (G)

"When you start up your own company, you forget about existing models and follow your intuition" (DI)

Many of the founders also mentioned that they had to learn a lot of skills in order to get the business up and running. One commented that the best way to learn something is just by doing it yourself, be it coding, applying for funding or choosing the correct business model. "We started from zero, none of us could even code very well at that time, we have learned everything by doing it ourselves" (DI)

"We had to learn about funding from the beginning, we had no prior expertise" (G)

4.2.5 Innovation & experimenting

The interview guide did not contain questions regarding innovation & experimenting practices in the startup process, but evidence of these practices surfaced through questions about business plans and success factors. One founder in particular described their culture like this:

"We are constantly innovating and have an agile trial & error culture" (EFD)

"Our success factors are growth hacking and a culture of experimentation, constantly developing and being innovative" (EFD)

Others commented the need for experimenting in the startup world, a few have followed the guidelines of the lean startup by Eric Ries, others experimented in other ways.

"The lean model was so popular in school that it was easy to incorporate such a model into our business" (DI)

"We have the same kind of loop as Ries describes in his book: build - measure - learn, however ours is create - measure – learn" (EFD)

4.3 The challenges & reasons for failure

This dimension examines the negative factors that affect startups and could potentially lead to failure. Many of these themes are the same as in the positive dimension, which suggests that there are always two sides to every story. The themes of this dimension are lack of funding (1), difficult product & market (2), team friction (3) and miscellaneous challenges (4). Figure 11 demonstrates how the data was organized thematically.



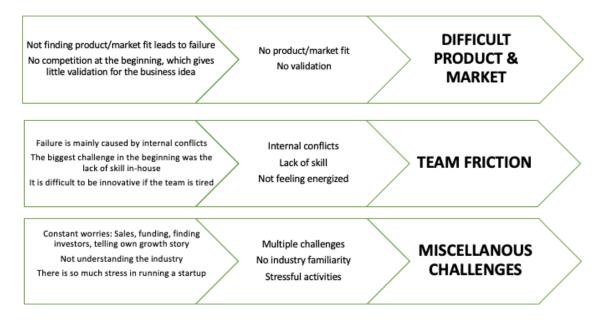


Figure 11 The themes of the challenges & reasons for failure - dimension

4.3.1 Lack of funding

A lot of founders have witnessed the damage that funding, or in this case a lack of, can do to a company. Some commented that applying for funding is time consuming and contains extremely difficult procedures; preparing financial plans for the future, calculating the budget and showing proof that the product or service has an unsaturated market and that there are customers willing to pay for it.

"Raising money means losing focus and time" (G)

"I feel that the Business Finland funding model is not working, you get a little capital to work with - but never enough, and you have to apply for loans at the same time that you are working on projects, it takes too much time. Only when you submit the final report on a project will you receive money" (EFD)

"The most challenging phase was trying to get funding; it was extremely difficult" (DI)

Other significant problems related to funding is that startup activities in Finland, such as marketing and hiring people, are expensive. Having to work with a budget that is constantly too small effectively shortens the runway of the startup, causing a lot of problems for the founders.

"Having to hire new people made a dent in the budget and caused us not to be able to launch a commercial product" (EFD)

"A small budget slows down the growth & development of the companies" (EFD)

"The biggest reasons for failure are probably all connected to funding. Everything in Finland is expensive, especially hiring people" (DI)

"Word of mouth needs money" (DRE)

"Our market entry was chaotic, it's hard to do something systematic without proper funding" (DI)

One founder felt that many venture capital firms were only willing to fund startups that fit into a certain category, and that especially gaming companies were sought after.

"VC's are looking for scalable, multimarket companies" (DI)

When asked about the main reasons why startups fail, almost all the founders replied that lack of funding was the most significant cause why startups could not carry on. Even the two founders who had managed to keep business running while staying self-funded admitted that funding probably caused most of the startups to fail. The game developer, for instance, had run out of money after three years and could not keep the activities running without adequate funding.

"Failure comes from total lack of funding" (DRE)

"Not having adequate funding or the ability to conform to the situation are also reasons for failure" (CT)

"If we hadn't pushed for a growth company, we would have been able to keep this company on the side, keeping it slow and organic" (G)

4.3.2 Difficult product & market

Fundamental difficulties for the startup founders were also caused by the products and the intended markets. In the second phase of startup life cycle, the essential task is to find how the product or service fits into the market. At least half of the founders commented that if the product does not find its fit quickly enough, it might lead to failure:

"Not finding the product/market fit in time leads to failure - motivation, faith & money runs out" (ET)

"Not finding product/market fit leads to failure" (G)

Another central challenge was not being familiar with the industry itself, which led to not understanding the sales channels or how to position the product, as one founder said. A founder found it difficult to validate the business idea, because they had released a new product into a brand-new market, and there was no competition to analyze. A founder commented that testing assumptions is always problematic, but in order to get the business idea validated, decisions need to be made sooner rather than later. The founder with the failed company realized that one can make endless assumptions about the market and the customer, but by going to market you gain a lot of new information.

"Another thing that we didn't do early enough was working on the positioning of the product, and finding the correct channels, tweaking them correctly and we did this way too late." (G)

"We had no competition in the beginning, which gives little validation for the business idea" (ET)

"It's difficult to test your assumptions - but decisions have to be made quickly in order to validate quickly" (DI)

"Of course, you can make assumption about the customer, but you only know for sure once the product is on the market and in this short period, we learned a lot about positioning, costs, and customers" (G)

Various unexpected costs managed to catch a few founders off-guard, that even simple marketing activities like word-of-mouth marketing is expensive.

"Word of mouth needs money" (DRE)

"We did completely underestimate many things like customer acquisition costs" (G)

4.3.3 Team friction

While most founders discussed the importance of having adequate funding in order to stay in business, one founder commented that internal conflicts within a team is a considerable cause for failure. The founder of one company, said on the other hand, that there had been a lot of challenges with the existing team, but the cause was the lack of skill inhouse, not internal conflicts. The same founder recognized both the need for an adviser that could guide them to find the proper funding, as well as a chief technology officer to be in charge of technological ventures.

"Failure is mainly caused by internal conflicts" (CT)

"It's always difficult working with different personalities" (G)

"The biggest challenge in the beginning was the lack of skill in-house" (EFD)

"The team has been lacking a CTO - someone who has enough knowledge of technology to guide us forward" (EFD)

One founder mentioned the importance of having a team that is energized and said that things were very different 10 years ago in the startup businesses, that employee's health and wellbeing were not central topics back then.

"It is difficult to be innovative if the team is tired" (CT)

For one founder, there was the problem of having external factors pushing the team in a different direction than the one they wanted to take. They had enrolled into an accelerator program, that kept pushing them into the growth game, a route that the founding team felt reluctant to take.

"the things is, when you are a part of the accelerator, it felt like we also had to be a growth company. This perhaps side-tracked and rushed us a bit" (G)

4.3.4 Miscellaneous challenges

Most of the founders felt, that a startups failure is never caused by one single circumstance, that there are in fact, several factors in play together, causing the startup to go out of business. There are so many activities to keep track of, and constant pressure to validate the business idea – to oneself, to investors and to customers.

"Sales, funding, finding investors & telling the own growth story are constant worries" (ET)

"I did not grasp how long the process of getting everything to work is" (CT)

"There are usually multiple reasons for failure: bad timing, bad product, wrong market or bad distribution" (EFD)

"There is so much stress in running a startup" (DRE)

4.4 The founder

When conducting the interviews and analyzing the text, it is clear that the founders of the startup have a central role in finding the answers to the research questions. Background and experience (1), success skills (2) and the Finnish startup scene (3) are themes that need to be looked at from another point of view, since these themes reside in a dimension of personal experiences and reflections, not to mention how unique the Finnish startup environment seems to be. Figure 12 demonstrates how the data was organized thematically.

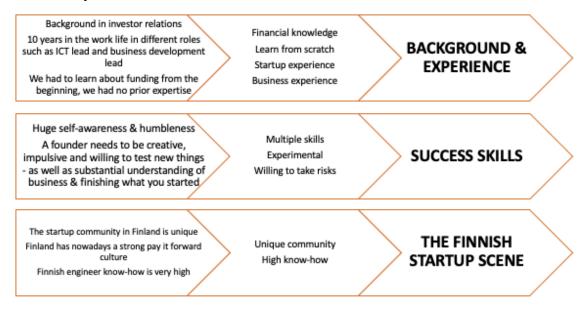


Figure 12 The themes of the founder - dimension

4.4.1 Background & experience

All the founders in this study have a rich and detailed background, and all quite similar to one another. Most of them are highly educated, with usually at least two degrees completed. They have been in the work life for quite some while and have had different job descriptions on different career levels along the way.

"When I came to Finland, I did my master's degree in game design and my bachelors' degree in business economics. I have a PhD in game design" (G)

"I have been 10 years in the work life in different roles such as ICT lead and business development lead" (DI)

"I have experience from the academic world where I worked for four years, both as a teacher as well as participating in different research projects" (CT)

Some of these founders have gained experience from working in startups before they started their own, particularly one has a past volunteering for the Slush-event for multiple years. A few founders revealed that they have learned everything that they need to know by doing those activities themselves. One founder commented that the most valuable lesson he learned from the startup that he had worked in previously was, how to be financially responsible.

"I was a part of the organizing team at Slush, and that basically my call to fame. I was part of the group that grew Slush from 500 visitors to 17 500 visitors" (DRE)

"We started from zero, none of us could even code very well at that time, we have learned everything by doing it ourselves" (DI)

"I don't have any prior experience from startups, but I have always been very entrepreneurial" (G)

"Experience from another startup gave a good reference for how to spend money wisely" (ET)

4.4.2 Success skills

The founders were asked to comment on skills that they think are important for a startup founder to master in order to succeed. Several founders painted a picture of a person that is capable of withstanding a lot of pressure, being a little reckless and willing to experiment, even if that means failing. One founder in particular underlined that being in touch with one's own personal limitations and strengths, as well as being humble were important skills.

"A founder needs to be resilient & persistent" (G)

"As a startup founder you have to be a little reckless & willing to fail" (EFD)

"Success comes from a good mix of being accurate and "shit happens" - attitude" (DI)

"A founder needs huge self-awareness & humbleness" (G)

Some mentioned that having adequate business skills is important, as well as the ability to sell the business idea to investors and possible customers. One said that being capable

of managing different kinds of personalities, be it team members, investors or other important stakeholders.

"A founder needs to be creative, impulsive and willing to test new things - as well as substantial understanding of business & finishing what you started" (ET)

"You need to have the ability to sell" (DRE)

"It's important to have business skills" (DI)

"The ability to be versatile, social and to handle different types of people" (DI)

4.4.3 The Finnish startup scene

During the interviews, many founders talked about the Finnish startup community, the Finnish brand, and which skills are in high demand. One founder expressed his gratitude for the valuable Finnish brand, which gives him a clear advantage in foreign markets.

"Our product has the "Finland stamp" which makes it attractive in the TechEd-field" (ET)

"You can trust Finns and Finnish society is very stable" (CT)

"The Finnish brand has a good reputation" (DI)

One founder mentioned that he has never found it so easy to connect with other Finnish startup founders, to exchange ideas and experiences. This was echoed by another founder who has seen the Finnish startup scene evolve under many years, saying that people in the community collaborate, and help is always available, you just have to ask for it.

"The startup community in Finland is unique" (G)

"One of the things that we have, compared to Sweden's startup scene, is that our scene is more collaborative and people from different companies support each other more" (DRE)

"Finland has nowadays a strong pay it forward culture" (CT)

Some founders commented the high level of know-how that is available in Finland. Finns are, according to them, highly trained, especially in engineering. One founder pointed out that there are two things that combine successful Finnish startups – well executed distribution and visible added value.

"There are highly trained people in Finland" (CT)

"Finnish engineer know-how is very high" (ET)

"Finnish successful startups usually have excellent distribution channels" (EFD)

"Finnish successful startups transparently show the added value they are offering - and the customer enjoys that" (EFD)

5 DISCUSSION

This chapter will discuss the findings of the research and examine these against the literature review. The aim of the study was to investigate the success factors and reasons for failure of Finnish startups and look for similarities or patterns that could suggest that there is a certain way to ensure that a startup can grow to be successful. Interviews with startup founders revealed a colorful world of startup stories where both positive and negative drivers could be identified. The positive drivers were collected into the dimension success factors and contains the themes funding (1), team (2), product & customer (3), preparation (4) as well as innovation & experimentation (5). The negative drivers belong to the dimension challenges and reasons for failure. The themes are lack of funding (1), difficult product & market (2), team friction (3) and miscellaneous challenges (4). A third dimension was regarded necessary, in order to collect categories that involved the founders background and personal experiences (1), as well as reflections on success (2) and what the Finnish startup scene (3) looks like. This dimension is named the founder.

5.1 Success factors

5.1.1 Funding

In the literature review, when reviewing critical success factors, funding does not surface in the same manner as in the interviews. Santisteban & Mauricio (2017) mention in their literature review that venture capital is an identified factor for success but is perhaps because of the study's literature nature not discussed further. The results of the interviews showed that all the founders, even the ones that had not received external funding, grasped the importance of money. It was stated that a startup constantly needs resources in order to continue with daily activities, and that funding is most likely what makes success possible. According to the Finnish venture capital association (2018), venture capital is used for faster growth, decrease of financial risk and increase of capital value. In models that were designed to predict success (Lussier, 1995: Halabí & Lussier, 2014), capital is a central factor. Testing the models on startups suggested that the most successful ventures had enough working capital, as well as good control of finances and accounting.

5.1.2 Team

Bourdeau (2010) states that one of the five essential tasks to execute in order to be a successful company, is hiring good employees. Santisteban & Mauricio (2017) present evidence in their literature review, suggesting that the founding team members previous experience, industry familiarity as well as technology and business skills all affect the startups success. When the interviewees were asked about where success derives from, the second most popular answer was the team. While some did not specify which factor within the team was the winning concept, others spoke very positively of the effect of hiring people with the right skills or teaming up with external advisors.

5.1.3 Product & Customer

The entrepreneurs that participated in the study highlighted the importance of activities such as co-creating with customer and offering customers transparently added value in products, suggesting that these themes should be given more attention when discussing critical success factors. All the while, the literature review offers only indecisive suggestions of these themes as success factors. Bourdeau (2010) proposed that adding value to the customers is one essential way of staying on the road to success, while Teng, Bhatia & Anwar (2011) discussed the meaning of timing when releasing products to the market. The startup product is discussed more from the failure point of view, which will be commented upon in another chapter.

However, this aligns well with Blank (2006) who, recognized early on why startups go out of business. He claimed that by focusing on customer centric activities such as getting to know the customer and creating solution for their problems, would eventually lead to business success.

5.1.4 Preparation

There was scarce academic information regarding the importance of planning for the future; Duggan & Blayden (2001) highlighted that planning and preparing a project is crucial, Sommer et al (2008) talked about being prepared for unforeseeable uncertainty, or in other words aspects that one cannot see coming. Several of the startup founders that participated in the study, commented on the topic of preparing for the future. Half of the founders explained that by mapping future megatrends and testing the future proof concept, they had some kind of roadmap as to what kind of products to offer to customers and in which direction grow. Another claimed that future plans need to be made for every occasion with a potential investor. Sommer et al (2008) presented two kinds of takes on how to be prepared for the future; selectionism and trial & error. None of the founders had found it necessary to go to such lengths in order to deal with issues in the future.

The preparation theme is not strictly preparation as in making up plans, the category learning plays a small role as well. Two founders mentioned that most of the startup activities were unknown to them, and that simultaneously as the startups were being built, they educated themselves to be prepared for the future. This category in not covered in the literature review

5.1.5 Innovation & Experimenting

The business model chapter of the literature review offers a brief explanation of business model experimenting, and that the lean startup theory by Ries (2011) belongs to this category. Eisenberg, Ries & Dillard (2012) conclude that startups operate in a different environment than traditional companies and need their own set of rules for how to survive. Dobrila (2012) explains that lean startups should primarily focus on constantly experimenting with new versions of the product, when developing new goods. The need for experimenting is a vital part of the startup process, according to some of the founders. One founder is particularly fond of Ries's model and has adjusted it to better serve his purposes. Innovating and experimenting is a part of this team's culture and considered one of the reasons for success. This team takes on new projects constantly, burying projects that do not take flight and continuing with those that survive. It needs to be mentioned, however, that a culture like this is only possible thanks to the revenue from the

parent company, that innovation practices are expensive. Another founder has found that the lean startup model has helped his little company to stay financially lean and make agile decisions within the team, so focus is not entirely on being innovative or experimental.

5.2 Challenges and reasons for failure

5.2.1 Lack of funding

Funding, or the lack of it, seems to be the most commented topic whether discussing success or failure. Several academic sources present studies that point to the fact that the startup will not make it for long without funding. Interestingly enough, lack of funding is not in first place in either of the following studies. Giardino et al (2015) presents evidence that securing appropriate funding is viewed as the third most critical challenge after thriving in technological uncertainty and acquiring first paying customers. This evidence is supported by Cantamessa et al (2018) that published a study that analyzed startup failure reports. The biggest reasons for failure was not finding the product/market fit, running out of cash was in third place. Of the six interviewed startup founders, only one had failed after running out of money in the third year. Several of the founders witnessed of the challenges that lack of funding causes, such as constantly doing projects will small budgets or slowing down the growth, and all of the founders regarded lack of funding as one of the considerable reasons for failure. Some startup founders had very strong opinions regarding funding process; saying that funding is terribly difficult to receive, and the paperwork steals valuable time from actual undergoing projects. He mentioned that Business Finland's funding policy is a little backwards, instead of receiving the whole sum upfront, like in the American model, you receive a little amount at first which leads to having to apply for loans while simultaneously working on client projects just to get by. Only in the end, when the final report has been submitted, will you receive rest of the money.

5.2.2 Difficult product & market

Giardino et al (2015) suggest that the main challenges that startups have to combat are found in the following dimensions: product, market, team, financial. The study also shows evidence that of these dimensions, most challenges are connected to product and market. Problematic issues in these dimensions is for instance constantly being forced to produce cutting edge technology or acquiring the first paying customers. According to Cantamessa et al (2018), not finding the product/market fit is the fourth most common reason why startups fail. The interviewees of the study concur with the statement that a lot of obstacles are connected to the product and the market, and especially issues with the product/market fit are risky. The founders also had problems with validation after product launch, since a few of the founder's products entered a new market, and there was no competition that could validate the business idea.

5.2.3 Team friction

In the literature review, Giardino et al (2015) presents the 10 most critical challenges for startups. The startup team claims three of the 10 challenges, showing that CEO's think that it is complicated building entrepreneurial teams that can manage staying focused and disciplined, while they manage multiple tasks. Some participants of the study had minor concerns regarding the startup team, such as managing different personalities or being able to hire the right kind of skill to have in-house. One founder in particular expressed the opinion that a startups failure is caused by internal conflicts.

5.2.4 Miscellaneous challenges

This topic collects the startups challenges, that had no category of their own. Cantamessa et al (2018) highlighted that there are usually several reasons why startups fail, it is seldomly caused by a single factor. One founder acknowledged this by saying that there are usually multiple reasons for failure: bad timing, bad product, wrong market or bad distribution. Another founder mentioned that constant worries were sales, funding and finding investors.

5.3 The founder

5.3.1 Background & experience

Cassar (2014) addresses the positive aspects of having previous experience from entrepreneurial work. In his opinion, it gives the ability to forecast the future of a company, as well as evaluate and assess opportunities from a different perspective than less experienced colleagues. The interviewees were all highly academically trained individuals, and most had at least two sets of degrees. Only a few had real entrepreneurial experience, but all the founders said that they had more or less entrepreneurial personalities. Mitchell et al (2004) comments that people with entrepreneurial experience store and use information in a more productive way, ultimately leading to more success in business. Some of the founders agreed with this statement, saying that having previous entrepreneurial gives you an advantage, especially with financial challenges and how to be a lean business. Other founders said that having that experience from before does not matter, that it might be helpful, but it is more important to have the skills and the knowledge that affects the product.

5.3.2 Success skills

To clarify, the founders that participated in the study were asked to give their point of view on which skills a startup founder needs to possess in order to succeed. The literature review does not explicitly mention skills like these, there is an acknowledgement of incompetent leadership affecting the future of the company negatively and unwavering belief being a positive factor (Krishna et al, 2016) as well as technology skills being a critical success factor (Santisteban & Mauricio, 2017). The founders themselves talked about skills such as self-awareness, humbleness, persistence and resilience, but also the importance of being willing to take risks and to be able to fail, that failing was necessary in order to succeed in the future. This question in the interview guide was meant to illustrate the perfect startup founder, but these practical examples are only mirrored in the literature review in a minor way, leaving room for suggestions at this point.

5.3.3 The Finnish startup scene

This part is meant to paint a picture of the "unique" Finnish startup scene that one founder mentions in his interview. Finland has been distinguished in later years as a highly innovative country, in 2018 Finland claimed 1st place, but had only slipped down to 3rd place in 2019 (Business Finland 2018 & 2019). One founder with a lot of past experience mentioned that what makes Finland's startup scene different from e.g. Sweden's is the will to collaborate and help each other. This is echoed by Lancaster (2017), as well as Koiviola (2019) that discuss what makes Finland so special as a startup country and what its advantages are. Another founder highlighted the same by saying that Finland has nowadays a strong "pay it forward "culture.

5.4 Summary of discussion

The findings of this study mirrors to some extent the results from previous studies. The literature that the literature review is based on, is primarily fixated upon startups key challenges (Giardino et al 2015: Cantamessa et al 2018: Lussier 1995: Teng, Bhatia et Anwar 2011: Halabí et Lussier 2014). There are clear connections between empirical evidence and the literature review on the challenges of startups, such as lack of funding, team conflicts or difficulties finding the product/market fit. The most problematic negative factors for startups seem to involve the dimensions finance, product & team.

The literature review discusses success factors rather briefly (Santisteban et Mauricio 2017: Sommer et al 2008: Cassar 2014: Krishna et al 2016) but the collected empirical evidence mirrored some critical success factors quite clearly, e.g. the importance of an experienced team with skilled team members and receiving venture capital. Positive categories that were not completely echoed in the literature review but had a lot of support in the empirical evidence was the importance of the customer and the need to be innovative.

6 CONCLUSION

This study has shown that there are two sides to every story, or in this case, every theme. The purpose of this thesis was to explore which success factors and challenges have been researched earlier and how these would align with startup founders' own stories and experiences. The aim was to examine whether there are similar reasons for success and failure amongst startup founders – something that would imply that success or failure follows a certain pattern. The evidence would suggest that every startup follows a path that is individual. There is no "one size fits all" guide to success, but there are elements that quite clearly stimulates growth and success. The same applies for failure, there is no pattern that fits every startup that goes out of business.

The Finnish startup scene possesses certain positive elements that can be helpful in the creation on new Finnish startups. A vivid picture was painted thanks to the empirical evidence and was echoed by several other sources. The Finnish scene is known for being collaborative and sharing knowledge between companies, and nowadays there is a strong "pay it forward" culture amongst startup people. Finns are generally speaking, highly educated individuals, and showcase a strong engineer and digital knowledge.

This study found that particularly funding, team and customer were important elements for the positive success factors and funding, team and product for the negative failure factors. Having funding allowed for all kinds of activities – it gave the startups the necessary means to grow, develop products and innovate. On the other hand, lack of sufficient funding was a serious constraint. Applying for funding was time-consuming and difficult and was seen by many as the greatest reason for failure. A startup team with members that have past experience, business and technology skills, as well as good leadership within the team have a good foundation for success. For others, an undynamic team with different personalities, too many tasks to handle and lack of motivation could lead to bigger issues and could in the end lead to failure. The customer element was an important factor according to the empirical evidence, although this was not echoed in the literature review as heavily. Many of the founders implied that being customer-centric has a positive element, product issues was represented both in the literature and in the

empirical evidence: not finding the product/market fit on time, could lead to lack of funding and loss of motivation and ultimately lead to failure. It is important to add to this discussion what many previous studies have already stated: success or failure is in the end caused by many different components; rarely by one.

6.1 Practical implications

This study highlights the fact that success or failure is rarely caused by one single component, but by several different ones that are either charged positively or negatively so to speak. Funding is one of the most important reasons why startups succeed, since it enables so many different activities such as marketing, innovation and product development. If a startup wishes to be in the growth game, they need to access other enabling elements such as a skilled team, past experience and a customer centric product idea. The same applies to failure, lack of funding may extensively shorten the runway, but without enabling components such as team conflicts or no product/market fit, there could still be a chance to survive.

6.2 Limitations and suggestions for future research

The purpose of this research was to investigate startups within a certain age range, preferably 3-6 years old and active. Due to difficulties finding willing participants, one interviewee was the odd one out with a primary physical product, his secondary was a technological product. Furthermore, this company was no longer active. It must also be stated that this company had, in its active years made revenue, so it was decided to let this company participate. Other limitations to the study is its small sample size; six startup founders participated in the study, leaving a lot of information yet to be discovered. This is however, generally deemed sufficient for a qualitative study; the purpose is not to generalize.

Success or failure is not achieved over night. For this particular statement, a research that involves a longer period of time and several more participants is suggested. A longer qualitative study gives room for exploring all the components that come together for a success or failure. Another suggestion is to use the same kind of frame used in this study

and increase the number of participants to a 100 startup founders. Research with larger sample sizes of qualitative interviews could generate interesting results with more accurate data regarding success and failure factors.

REFERENCES

Baidoun, S.D. & Lussier, R.N. & Burbar, M. & Awashra, S. 2018, Prediction model of business success or failure for Palestinian small enterprises in the West Bank, *Journal of Entrepreneurship in Emerging Economies*, Vol. 10 Issue: 1, pp.60-80

Blank,S. 2013, *Why the Lean start up changes everything* [www] Available at: ("Four_Steps steve blank .pdf," n.d.) Accessed: 10.5.2019

Bourdeau, A. 2010, The 5 essentials of successful startups. *Profit: The Magazine for Canadian entrepreneurs*, Vol. 29, Iss. 4, (Oct 2010): 35-38.

Bryman, A. & Bell, E., 2003, Företagsekonomiska forskningsmetoder, Liber Ekonomi

Business Finland. 2019, *Startup – Rahoituspalvelut alle 5-vuotiaille yrityksille* [www] Available at: <u>https://www.businessfinland.fi/suomalaisille-asiakkaille/palvelut/rahoi-tus/startup/lyhyesti/</u> Accessed: 12.3.2019

Business Finland. 2019, *Finland among the best of the world* [www] Available at: <u>https://www.businessfinland.fi/en/do-business-with-finland/invest-in-finland/why-in-vest-in-finland/finland-rankings/</u> Accessed: 10.5.2020

Business Finland. 2018, *Finnish startup scene* [www] Available at: <u>https://www.busi-nessfinland.fi/en/do-business-with-finland/invest-in-finland/why-invest-in-finland/vi-brant-startup-scene/</u> Accessed: 10.5.2020

Cantamessa, M., Gatteschi, V., Perboli, G. & Rosano, M. 2018, Startups' roads to failure. *Sustainability*, Vol 10:2346

Cassar, G., 2014. Industry and startup experience on entrepreneur forecast performance in new firms. J. Bus. Ventur. 29, 137–151. <u>https://doi.org/10.1016/j.jbusvent.2012.10.002</u>

Cavallo, A., Ghezzi, A., Dell'Era, C. & Pellizzoni, E. 2019, Fostering digital entrepreneurship from startup to scaleup: The role of venture capital funds and angel groups. *Technological Forecasting and Social Change,* Vol 145, pp. 24-35 Crick, J.M. 2016, Angel investors' predictive and control funding criteria: The importance of evolving business models. *Journal of Research in Marketing and Entrepreneurship*, Vol. 20 Issue: 1, pp.34-56

Culture trip. 2017, *Inside Finland's white-hot startup scene* [www] Available at: <u>https://theculturetrip.com/europe/finland/articles/inside-finlands-white-hot-startup-scene/</u> Accessed: 10.5.2020

Dresner, S.,2014, *Crowdfunding: A guide to raising capital on the Internet*, John Wiley & Son, Inc., Hoboken

Dobrila, R.M. 2012, "Minimum Viable Product and the Importance of Experimentation in Technology Startups", *Technology Innovation Management Review*, vol. 2, no. 3, pp. 23-26.

Duggan, M. & Blayden, R. 2001, Venture maintainability: a path to project success Why are some projects less successful than others and what can we do to improve? *Journal of Quality in Maintenance Engineering*, Vol. 7 Issue: 4, pp.241-251

Etla, 2019. Business angel investment, public innovation funding and firm growth. [www] Available at: <u>https://www.etla.fi/wp-content/uploads/ETLA-Raportit-Reports-</u> <u>97.pdf</u> Accessed: 5.1.2020

Etula, S. 2017, Nordic guide to finding an angel investment. Available at: https://www.fiban.org/guide.html Accessed: 15.11.2019

Finac, 2017. Accelerators [www] Available at: <u>https://finac.fi/accelerators/</u> Accessed: 7.12.2019

Fiban, 2019. A record-breaking number of investments – 479M€ into Finnish startups. [www] Available at: <u>https://www.fiban.org/news/a-record-breaking-number-of-invest-ments-479meur-into-finnish-startups</u> Accessed: 5.1.2020 Fontinelle, A. 2017. What exactly is a startup? [www] Available at: <u>https://www.in-vestopedia.com/ask/answers/12/what-is-a-startup.asp</u> Accessed: 10.3.2019

Giardino C., Bajwa S.S., Wang X., Abrahamsson P. (2015) Key Challenges in Early-Stage Software Startups. In: Lassenius C., Dingsøyr T., Paasivaara M. (eds) Agile Processes in Software Engineering and Extreme Programming. XP 2015. Lecture Notes in Business Information Processing, vol 212. Springer, Cham

Good news from Finland. 2019, *Five from Finland: Finland's startup scene* [www] Available at: <u>https://www.goodnewsfinland.com/feature/five-for-friday-finland-s-</u> <u>startup-scene/</u> Accessed: 10.5.2020

Griffith, E. 2014, Why startups fail, according to their founders. [www] Available at: http://fortune.com/2014/09/25/why-startups-fail-according-to-their-founders/ Accessed: 11.3.2019

Halabí, C.E. & Lussier R.N. 2014, A model for predicting small firm performance Increasing the probability of entrepreneurial success in Chile. *Journal of Small Business and Enterprise Development*, Vol. 21 Issue: 1, pp.4-25

Hirsjärvi, S. & Hurme, H., 2001, *Tutkimushaastattelu – Teemahaastattelun teoria ja käytäntö*, Yliopistopaino, Helsingfors

Hurri, P et al. 2018, Startupit kansantaloudessa. [www] Available at: https://www.etla.fi/julkaisut/startupit-kansantaloudessa/ Accessed: 11.3.2019

Hussyin,S. 2019, How to choose the most profitable business model for your startup. [www] Available at: <u>https://getgist.com/how-to-choose-the-most-profitable-business-</u> model-for-your-startup/ Accessed: 5.1.2020

InfoDev, 2016. Business Incubation Management Training Program. [www] Available at: <u>http://www.infodev.org/sites/default/files/m1_traineemanual_20101029.pdf</u> Accessed: 7.12.2019

Jamrisko, M.& Miller, L.J. & Lu, W. 2019, These are the world's most innovative countries. [www] Available at: <u>https://www.bloomberg.com/technology</u> Accessed: 12.3.2019

Lopez, M. 2018, The startup life cycle, according to a couple of successful VC's. [www] Available at: <u>https://medium.com/@mattvlopez/startup-life-cycle-according-to-a-couple-of-successful-vcs-34759a6970</u> Accessed: 27.4.2019

Lukkari, J. 2018, Etla: Suomessa syntyy vuodessa sata startup-yritystä – vain yksi yritys on onnistunut kasvamaan todella isoksi. [www] Available at: <u>https://www.tekniikkata-lous.fi/talous_uutiset/yritykset/etla-suomessa-syntyy-vuodessa-sata-startup-yritysta-yain-yksi-yritys-on-onnistunut-kasvamaan-todella-isoksi-6725954</u> Accessed: 11.3.2019

Mansfield, M. 2018, Startup statistics – the numbers you need to know. [www] Available at: <u>https://smallbiztrends.com/2016/11/startup-statistics-small-business.html</u> Accessed: 11.3.2019

Mansoori, Y. 2016, Enacting the lean startup methodology: The role of vicarious and experiential learning processes, *International Journal of Entrepreneurial Behaviour and Research,* Vol. 23 Issue: 5, pp.812-838

Maurya, A. 2012, Why lean canvas vs business model canvas? [www] Available at: <u>https://blog.leanstack.com/why-lean-canvas-vs-business-model-canvas-af62c0f250f0</u> Accessed: 5.1.2020

Méric, J., Maque, I. & Brabet, J. 2016, *Crowdfunding – positive, normative and critical theory,* Emerald Group Publishing Limited, Bingley

Nanda, R., Samila, S. & Sorenson, O. 2020, The persistent effect of initial success: Evidence from venture capital, *Journal of Financial Economics*

Nawal, A. 2018, The startup lifecycle. [www] Available at: https://www.feedough.com/the-startup-life-cycle/ Accessed: 27.4.2019 Net Promoter System, 2018. Measuring your net promoter score [www] Available at: <u>http://www.netpromotersystem.com/about/measuring-your-net-promoter-score.aspx</u> Accessed: 8.9.2019

Nowell, L.S., Norris, J.M., White, D.E. & Moules, N.J. 2017, Thematic analysis: Striving to meet the trustworthiness criteria, *International Journal of Qualitative Methods*, Vol 16: 1-13

Osterwalder, A. & Pigneur, Y. 2010, Business Model Generation – a Handbook for Visionaries, Game Changers, and Challengers, John Wiley & Sons, Inc., Hoboken

Paschen, J., 2017. Choose wisely: Crowdfunding through the stages of the startup life cycle. Bus. Horiz. 60, 179–188. https://doi.org/10.1016/j.bushor.2016.11.003

Perry, J.T., Chandler, G.T, Yao, X., Wolff, J.A., 2011, Bootstrapping techniques and new venture emergence, *New England Journal of Entrepreneurship*, Vol. 14 issue 1, pp. 35-45

Petch, N. 2016, The five stages of your business life cycle – which stage are you in? [www] Available from: <u>https://www.entrepreneur.com/article/271290</u> Accessed: 27.4.2019

Pääomasijoittajat, 2018. How to raise venture capital and private equity funding – a guide for entrepreneurs [www] Available at: <u>https://paaomasijoittajat.fi/wp-content/up-loads/2018/03/How-to-raise-venture-capital-and-private-equity-funding.pdf</u> Accessed: 11.11.2019

Raghu, M.R. 2017, The differences between SMEs and startups. [www] Available at: https://www.thenational.ae/business/the-differences-between-smes-and-start-ups-1.12126 Accessed: 11.3.2019

Rissanen, T. & Sainio, L-M. 2016, Business model experimentation in incumbent and startup companies.

Ripsas S., Schaper B., Tröger S. 2015, A Startup Cockpit for the Proof-of-Concept. In: Faltin G. (eds) Handbuch Entrepreneurship. Springer Gabler, Wiesbaden

Rompho, N. 2017, Operational performance measures for startups, *Measuring Business Excellence*, Vol. 22 no. 1 2018, pp. 31-41

Rouse, M. 2019, Definition: Proof of Concept (POC). [www] Available at: <u>https://searchcio.techtarget.com/definition/proof-of-concept-POC</u> Accessed: 3.8.2019

Salamzadeh, A. & Kesim, H.K. 2015, Startup companies – life cycles and challenges. [www] Available at: <u>https://www.researchgate.net/publica-</u> tion/280007861 Startup Companies Life Cycle and Challenges Accessed: 27.4.2019

Saldana, J. 2011, *Fundamentals of Qualitative Research*, Oxford University Press, Inc. New York

Santisteban, J. & Mauricio, D. 2017, Systematic Literature Review of Critical Success Factors of Information Technology Startups. *Academy of Entrepreneurship Journal*, Vol 23 issue 2

Sepulveda, F, 2012. The Difference between a Business Accelerator and a Business Incubator? [www] Available at: <u>http://technologyhamptonroads.com/wp-content/up-</u> <u>loads/The-Difference-Between-a-Business-Accelerator-and-a-Business-Incubator.pdf</u> Accessed: 7.12.2019

Sitkins, R. 2010, Are you an employee or an entrepreneur? *Rough Notes*, Vol 153, is-sue:1, pp.34-36

Sommer, S.C., Loch, C.H. & Dong, J. 2009, Managing complexity and unforeseeable uncertainty in Startup companies: An empirical study, *Organization Science*, Vol. 20 No. 1 January-February 2009, pp 118-133

Taticchi, P., Balachandran, K.R., Botarelli, M. and Cagnazzo, L. (2008), Performance measurement management for small and medium enterprises: an integrated approach, *Journal of Applied Management Accounting Research*, Vol. 6 No. 2, pp. 57-72.

Tradecraft. 2016, *5 phases of the startup lifecycle: Morgan Brown on what it takes to grow a startup* [www] Available at: <u>https://medium.com/tradecraft-traction/5-phases-of-the-startup-lifecycle-morgan-brown-on-what-it-takes-to-grow-a-startup-50b4350f9d96</u> Accessed: 10.8.2019 Teng, H.S.S. & Bhatia, G.S. & Anwar, S. 2011, A success versus failure prediction model for small businesses in Singapore, *American Journal of Business*, Vol. 26 Issue: 1, pp.50-64

Tripathi, N. & Seppänen, P. & Boominathan, G. & Oivo, M. & Liukkunen, K. 2017, Insights into startup ecosystems through exploration of multi-vocal literature, *Information and Software Technology*, Vol. 105, pp. 56-77

APPENDICES

APPENDIX 1 – INTERVIEW QUESTIONS

- 1) Background
 - a. Tell me about your background, what did you do before you founded company x?
 - b. What inspired you to start your own company?
 - c. Did you have any prior experience from startups? Tell me about that!
- 2) Life cycle & phases
 - a. If you look back at your company's beginning and its path to the present time, which were some of the most the critical phases?
 - b. When in the life cycle did they occur?
 - c. PROMPT how did you resolve them?
 - d. Have you monitored your path during the startup life cycle? Tell me what your phases looked like?
 - e. Which were the biggest mistakes that you made during the first phases?

Which of the following categories did it concern: Financial, Product, Market, Team? (Not a question, just for author to keep in mind later)

- 3) Predicting Success
 - a. Tell me about the preparations made before going live? Was market analysis made? Or any kinds of analysis?
 - i. What kind of predictions did you make for your future?
- 4) Entering the market
 - a. Tell me about your market entry process
 - b. Into what kind of market did you enter? (New product exiting market/ new product – new market etc)

- c. Are you familiar with the concept minimum viable product? Did you have such a product?
- d. Tell me about how the minimum viable product was tested?
- 5) Unforeseeable Uncertainty
 - a. Did your company have to deal with issues that you could not predict beforehand? Tell me about these problems.

6) Business model

- a. did you use a certain business model when starting out?
 - i. What led you to use this kind of model? / Why did you not have a business model?
- b. Did this model focus more on getting to know the customer or getting the product to market?
- 7) Funding/ Growth
 - a. How did you perceive funding for startups before starting out? Was this an important factor for you?
 - b. With what kind of funding has the startup been built? (Bootstrapping, crowdfunding, Business angels, venture capital, public sector funding)
 - c. Tell me how the company was able to grow? (incubator/accelerator/venture funding)
- 8) Success
 - a. Which do you think are the success factors of your company?
 - b. Which factors do you think contribute to a startup's failure?
 - c. What do successful startup in Finland have in common?
 - d. Are entrepreneurial skills important for a startup founder? Why/ Why not?
 - e. Which skills do you think are important for a startup founder to master?

APPENDIX 2

THEMATIC ANALYSIS

A. humbleness The is u ance ance ance ance ance ance ance	THE FINNISH STARTUP SCENE he statup community in Finland s unique here are highly trained people in inland ou can trust Finns and Finnish ociety is very stable inland has nowadays a strong pay if forward culture hur product has the "Finland tamp" which makes it attractive in he TachEd-field
is u ance The Fini Soc be creative, ing to tast new ubstancial usiness & finishing r you have to be a ing to fail the	s unique here are highly trained people in inland ou can trust Finns and Finnish ociety is very stable inland has nowadays a strong pay t forward culture tur product has the "Finland tamp" which makes it attractive in he TechEd-field
be creative, ing to tast new ubstancial usiness & finishing r you have to be a ing to fail	inland ou can trust Finns and Finnish ociety is very stable inland has nowadays a strong pay t forward culture tur product has the "Finland tamp" which makes it attractive in he TachEd-field
be creative, Fini ing to test new ubstancial usiness & finishing r you have to be a ing to fail the	ociety is very stable inland has nowadays a strong pay t forward culture tur product has the "Finland tamp" which makes it attractive in he TachEd-field
ng to test new it fe ubstancial usiness & finishing r you have to be a ing to fail the	t forward culture tur product has the "Finland tamp" which makes it attractive in he TachEd-field
ing to fail star the	tamp" which makes it attractive in he TechEd-field
sell Fin	innish engineer know-how is very
hig	
	innish successful startups usually ave excellent distribution channels
apple than the	innish successful startups ansparantly show the added value hey are offering - and the customer njoys that
	he finnish startup scene is ollaborative
a good mix of Fin	innish people are smart, with our art firmly on the ground
"shit happens" - feet	he Finnish brand has a good
	c a good mix of F "shit happens" - fi

FUNDING Using own money & staying	TEAM & NETWORK	PRODUCT & CUSTOMER The product needs to be	PREPARATION Future megatrends and the tuture proof-	NNOWATION & DIPERIMENTING You have to experiment your way	-
independent.		launched asap	theory validated my idea	onward	G
Cash is king in this line of business - and money makes the journey possible	Our team has made it possible to succeed	Co-creating with the customer, early input is important	Plana for the luture are made every time you meet an investor	The revenue from the parent company has always allowed for product development and innovating practices.	ст
Growth has been possible thanks to equity funding & differentioans	We have put in a lot of effort in the company culture - the people here have to grow in order for the company to grow	Protype waa builtquickly	In the beginning we mapped the megatrends on the world and put all our effort in to offering those to the customers.	We are constantly innovaling and have a agile trialilerror culture	ET
	We truly avantic help people teel better & be healthier - it shows in every activity	If an entreperenur has a problem that he is looking to a dive with the product, then you are already an expertin the eyes of the customer	When you startup your own company, you forget about existing models and follow your intuition	We take on new projects often and see which take flight and frome that don't seem to be going anywhere we just bury	670
Crowdlunding, business angel funding as well as private small investments	Success was possible thanks to a good team	The productivas co-created with customers, but ittook resilience and atrenghtto create a product that was to everybody's liking	We started from zero, none of us could even code very well at that time, we have learned every thing by doing it ourselves	We have the same kind of loop as Ries desbribes in his book-build- measure-learn, however ours is create - measure - learn	DRE
Alunder that believed in the idea	Ateam & a startup that can be trusted are important success factors	Nowadays we use a broad panel of experts from different fields to comment our products		Our success factors is growth hacking and a culture of experimentation, constantly developing and being innovative	DI
Eatra lunding 2 consecutive years	Strong knowledge on production, restof the team strong post- production knowledge	My productacilves real problems		Its easy to be agile when the company is small	
Startup was built alowly to ensure a long runway	We realized that we need to have the skills in-house and have employed our own programmer	Offering a service package that is easy to offer and easy for clients to buy		The lean model was so popular in school that it was easy to incorporate such a model into our business	
Success was possible thanks to a funder who believed in me from the start	with a great network trying to help us get more funding	thanks to a good product idea		Heel thata lotof companies try to invent the wheel all over again, when there actually is smart solutions available for a lotof activities.	
Funding validates the business idea on many levels, potential clients, potential investors, for oneaset	In order to be auccessful find the right partners, people that can bring their own point of view.	Getting to know the customer before launching a product is vital			
Funding is a really important part of the startup world	I think thatour teams dynamic is the reason we have achieved a certain amountof success	However, getting the product to market is a very important part			
Bis easy to getpublic funding, but it demands a lot of work	We are also very curious and atrive to fix any problem that comes up, there is "nothing" that	We have done a good job identitying our customers and their needs			
Funding is very important in order to be successful, you have to fink about where the money comes from and what things cost		By identifying the customer's needs, you will also find the product/market fit			
VC money means fastgrowth		I Wanted to provide people with better customer experience			
Another success factor is our lean costmodel, other companies would have burned a lotof money by now		Mad perfectionaim for customer experience			
		We have designed this production our own needs We entered into an existing			
		market with a tresh angle			

LACK OF FUNDING	DIFFICULT PRODUCT & MARKET	TEAM CONFLICTS	FUNNISH PROBLEMS	OTHER OHALLENGES	
Raising money too early leads to	Not finding product/market fit leads	It's always difficult working with different personalities	Creating a successful brand is difficult for	Constant worries: Sales,funding,finding investors,	
failure	to failure		Finnish companies	telling own growth story	G
Raising money means loosing focus & time	Underestimating costs	Failure is mainly caused by internal conflicts	Finns suck at marketing	No industry familiarity	cr
Bigger investor should have been brought in earlier to secure longer runway	Not finding the product/market fit in time leads to failure - motivation, faith & money runs out	It is difficult to be innovative if the team is tired	Firms suck at building brands that resonate with people	Whong strategy	ET
Not having adequate funding or the ability to conform to the situation are also reasons for failure	Product design was tricky	The biggest challenge in the beginning was the lack of skill in-house		Winong timing	ELD.
Having to hire new people made a dent in the budget and caused us not no be able to launch a commercial product	It's difficult to test your assumptions- but desicions have to be made quickly in order to validate quickly	Employing subcontarctors in not an easy puzzle		Not understanding the industry	DI
As far as unforesseable problems- we have been to optimitic with our funding - we have been constantly doing project with a budget that is too small	No competition gives no validation	The team has been lacking a CTO - someone who has enough knowledge of technology to guide us forward			DRE
A small budget slows down the growth & development of the companies	Not latening to the market	Failure comes from lack of concentration		Did not grasp how long the process of getting everything to work	
I feel that the BiannessFeland funding model is not working, you get a little capitatio work with - but never enough, and you have to apply for loarn at the same time that you are working on project, it takes too much time. Only when you work the final report on a project will you recieve money	No compatition at the beginning, which gives little validation for the business likes			Sales, funding, finding investors & toiling the own growth story constant worries	
Crowdfunding also takes a lot of time & effort	Even simple marketing activities need funding			There are usually multiple reasons for failure: bad timing, bad product, wrong market or bad distribution	
Failure comes from total lack of funding				Allfe cycle model is not reality	
The most challenging phase was trying to get funding, it was extremely difficult				Matakes not putting in safety measures	
VC's are looking for scalable, multimarket companies				There is so much stress in running a startup	
The biggest reasons for failure are probably all connected to funding. Everything in Finland is expensive, especially hiring people					
Our market entry was chaotic, it's hard to do something systematic without proper funding					