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Venture Capital Investment Criteria in the Intellectualized Economy

Master's Thesis in the Master's Program
Entrepreneurship and Business Design

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ABSTRACT

The rise of so-called Unicorn ventures, startups valued to at least one billion US dollars, have raised questions regarding the models used to perform these valuations. Some investors proclaim that what we are seeing a new incarnation of the dot-com bust, while others claim new technology is allowing startups to create massive amounts of value in a shorter amount of time than ever before.

This thesis seeks to understand the development of venture capital investment criteria since the dot-com bust, in order to understand the driving forces behind Unicorn valuations. Through a literature study and several in-depth interviews with venture capitalists in varying geographical regions, firm sizes, investments focus areas, and with varying experience, the study examines similarities and differences between the dot-com era and the situation of today.

The findings suggest that venture capitalists ’investment criteria change depending on the amount of available capital in the venture capital funds. When the amount of available capital increases, venture capitalists seem to take larger risks, increase the valuation of their investment objects and use alternative metrics to argue for these higher valuations.

Furthermore, some findings suggest that the intellectualization of the economy is creating a venture capitalist’s ideal investment opportunity, namely disruptive innovation or completely new markets, at a higher pace than ever before.

Keywords: Venture capital, unicorn, investment criteria, private equity

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1. INTRODUCTION

Venture capital is one of the most interesting topics in business research. This type of financing plays an important role in the growth of new technologies, new companies, and even new industries. Furthermore, it fills a void between traditional financing options such as bank loans and assistance from friends and family. As a consequence, venture capitalists often have a great deal of power in determining, or at least influencing, the direction of new technology development, market creation and as a consequence the development of society as a whole.

Slow growth in many conventional investment opportunities has led many major investors such as hedge funds, private equity firms, and mutual funds to invest increasingly in early-stage ventures, which in turn has affected the venture capital financing landscape significantly. Therefore, to understand the evolution of technological and economic progress, it is of interest to investigate how venture capitalists make the decision to invest in a specific venture.

Venture capitalist Aileen Lee first coined the phrase Unicorn in 2013 (Lee, 2013). At the time she identified 39 Unicorns and since then the number has more than quadrupled. Not that long ago a billion-dollar startup could be considered pure fantasy. Not even Amazon and Google, some of the greatest business successes of our era, came close to reaching those valuations prior to their initial public offerings. Today in 2020 CB Insights lists as many as 449 Unicorns, 11 of which joined the decreasingly exclusive group in the first month of the year (CB Insights, 2020).

This rapid growth in billion-dollar startups has led Unicorns to become the venture capital community's most active topic discussion. The sudden emergence and rapid growth of this new phenomenon have resulted in concerns raised regarding the validity of the valuations. Many experienced venture capitalists argue that the rise of the Unicorn is nothing more than a bubble while others insist that it is just the beginning of a new era of the intellectualized economy.

As a master's thesis intern at a Gothenburg based seed/early-stage venture capital firm Invest Co., the author has been tasked with investigating how venture capitalist investment criteria have developed, to better understand business and venture creation in the intellectualized economy.

1. Problem

Invest Co. is a seed / early-stage venture capital firm based in Gothenburg. The firm specializes in investments in early-stage start-ups within mobile payments, city mobility, and on-demand services; industries in which business models commonly depend on a large user base. The company is currently investing or looking to invest, in several start-ups in the previously mentioned spheres.

The founders and investors at Invest Co. look with skepticism on the increasing regularity of which venture capital firms create so-called unicorns through massive investment rounds, even though the start-ups many times show small to negligible revenues. To Invest Co.'s founders, it is evident that the biggest driver of valuation is a large or rapidly growing user base. However, they question the reasoning used to argue for the future monetization possibilities of these user bases. Furthermore, the founders suspect that many Unicorns lack the assets and business models to remain sustainable after venture capital funding comes to a halt. The name unicorn is fitting, as it is the opinion of Investment Co.'s founders that the genuine are few and far between if they even exist at all in reality.

The underlying suspicion of Invest Inc.'s founders is that many start-ups lack the capabilities or resources required to build sustainable businesses that can remain profitable over time. Furthermore, the founders of Invest Co. draw many parallels to the situation prior to the burst of the dot-com bubble in 2000. During the dot-com bubble, many companies showed what was by many considered to be extreme valuations, with very little revenue.

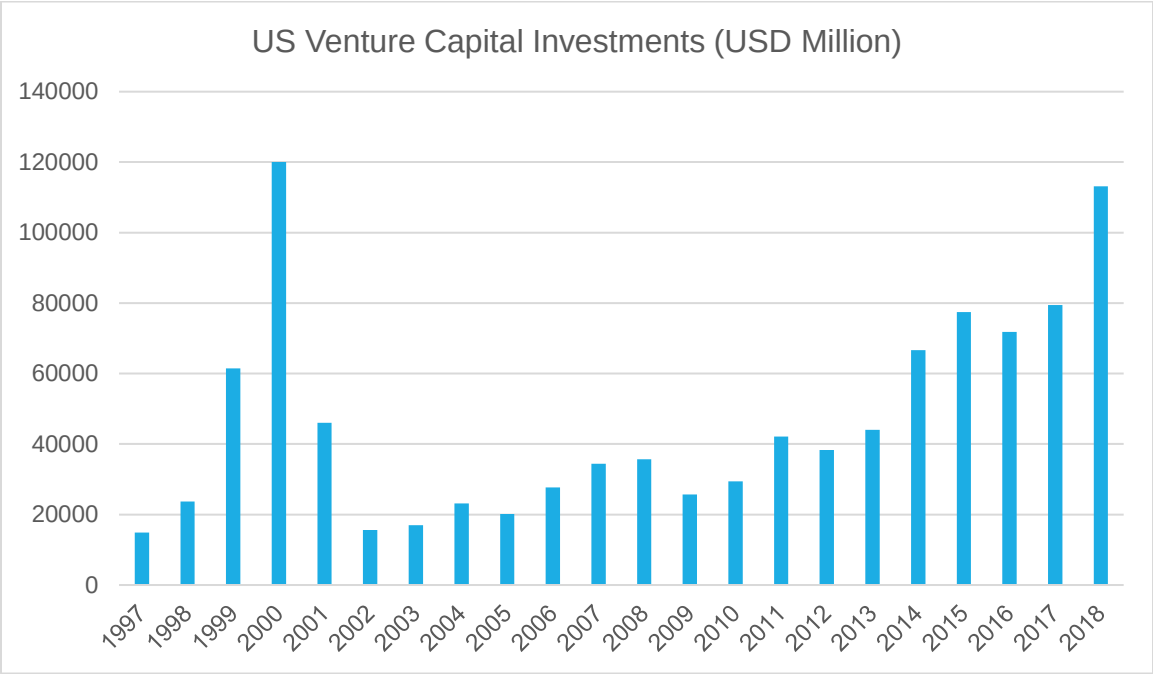

Figure A. Total Venture Capital Investments (Million US$) in the United States between 1997 and 2018. Adapted from McAleer (2016) and OECD (2020) data.

These concerns are supported when looking at the investment climate prior, and during the last financial crisis and comparing it to the current situation. While it is difficult to accurately extrapolate and predict how the future rate of investment will develop over the coming years, the pattern is nonetheless interesting. Worth noting is, however, that venture capital investments in China, India, and other newly industrialized economies are significantly larger in 2015 than they were in 1999 and 2000. Therefore, the differences in total investments globally from the amounts indicated in this graph are likely to be larger in 2018 than in 2000.

It is interesting to try to understand what is driving this increased flow of investments in venture capital. Have venture capitalists become better at spotting winners in the intellectualized economy, or is this a new wave of *irrational exuberance* and fear of missing out?

2. Prior Research

There has been extensive research into venture capitalists 'investment criteria and investment process, with several large studies published throughout the years.

Tyebjee and Bruno (1984) published *A model for venture capital investment activity*, which has become one of the more referenced pieces of literature in the entire field. In their paper, Tyebjee & Bruno (1984) present a model for the general venture capital investment process and its stages. Despite the industry's heterogeneous nature, it is commonly used and is useful in describing the most common practices.

MacMillan et al. (1985) published their study just one year after Tyebjee & Bruno's (1984) piece. The study is aptly named *Criteria Used by Venture Capitalists to Evaluate New Venture Proposals*. It has become one of the most referenced pieces of work on venture capitalists 'investment criteria and identifies many criteria contributing to an investment decision. Furthermore, it goes one step further and ranks their relative importance and overall contribution to the investment decision. MacMillan et al.'s (1985) findings strongly emphasize the importance of the entrepreneur or entrepreneurial team and its characteristics, experience, and personality as the primary factors that impact an investment decision.

This standpoint is however argued against by Zider (1998), whose piece *How Venture Capital Works* provided an updated view on the venture capital industry, its stakeholders and the processes involved in making a venture investment. Zider (1998) argues that venture capitalists primarily are concerned with investing in markets where growth rates are unusually high. Zider (1998) claims that by doing so, a venture capitalist has a higher likelihood of making a profit since even average performers tend to be profitable in rapidly growing markets. According to Zider, the entrepreneur or entrepreneurial team do however become more important to the venture capitalist's investment decision the more market insecurity is present.

Hall and Hofer (1993), as well as Zacharakis and Meyer (1998), agree with the overall investment criteria that have been presented by MacMillan et al. (1985) and Tyebjee and Bruno (1984) but do not agree to their respective importance. The aggregated conclusion of the studies is that venture capital investment criteria fall into four major categories. These factors are primarily related to the market, the entrepreneur/management team, the financial situation, and the product

Much of the influential work on venture capital investment criteria and decision making is as presented above published in the 1980s and 1990s, thus not taking into account what changes may have occurred as a result of the emergence of the digital era, where mobile, internet and on-demand services have become a

major driver of new economic growth. Much of the material dealing with more contemporary examples are likely from economic news sources or other non-academic sources aimed at industry professionals rather than academia.

One of the most influential researchers on the subject of venture capital is Harvard Business School's Josh Lerner. His work deals amongst other things with the development of the venture capital industry, its structure and how capital influx changes its dynamics. Lerner's work has primarily been used to provide an understanding of how capital influx cycles affect the valuation of venture capital investment objects and the behavioral responses displayed by venture capitalists as a result.

3. Purpose of the Study

The purpose of this study is to increase the understanding of venture capitalists 'decision making and investment criteria in the intellectualized economy, especially when compared to the dot-com era. These findings will hopefully contribute to a greater understanding of how venture capitalists, a major factor in determining technological development and innovation, choose their venture investments.

4. Research Questions

In order to fulfill the purpose of this study, the following research questions have been formulated.

4.1. Main Question

Have venture capital investment criteria changed to adapt to technological, societal and economic changes in the intellectualized economy?

4.2. Sub-Questions

- Have the objects invested in by venture capitalists changed in the intellectualized economy?
- Are there indications that the markets are currently experiencing a Unicorn bubble, similar to that of the dot com era?

5. Scope and Limitations

This thesis deals primarily with venture capital investments in the technology sector. While certain elements may encompass the entirety of the industry, the focus on interviewees and the literature studies is primarily that of investments in technology-intensive businesses. Certain studies look at the issue from the perspective of the entrepreneur. While this is in some cases useful, this thesis focuses on how venture capitalists are affected by the developments of the intellectualized economy, and therefore their perspective is emphasized. Furthermore, this thesis deals mostly with deal evaluation and structuring, two steps out of the five generalized by Tyebjee & Bruno (1984). It is possible that future research may find that other steps have a larger impact on the area studied, however, the two aforementioned are deemed suitable for an initial study. Due to limited time and resources, each category of investment criteria will be evaluated at a macro level, which may result in certain specific changes not being discovered.

6. Disposition of the Study

This thesis is structured in eight chapters and appendices.

- The first chapter introduces the subject, provides a background and context and presents the purpose and scope of the study as well as research questions and limitations.
- The second chapter, Methodology, presents the research strategy used do answer the research questions and fulfill the purpose of the study.
- In the third chapter, the literature review, previous research, and relevant literature are presented. The goal is to provide the reader with a base of knowledge that will aid her in understanding the empirical contributions of the thesis.
- The fourth chapter, empirical findings, presents several interviews that provide an up to date overview of venture capital decision making. Furthermore, the interviewees share their views on the current market situation and their beliefs regarding future developments.
- In the fifth chapter, analysis, the literature study is compared with the empirical findings in order to establish patterns of differences and similarities that can help answer the research questions. Furthermore, similarities and differences between the current situation and the situation prior to the dot-com bust will be analyzed.
- In the sixth chapter, conclusions are drawn based on the analysis performed in the previous chapter.
- In the seventh and final chapter, the results are discussed and further areas of research are suggested.

2. Methodology

The study is intended to be mostly qualitative with the bulk of data collection performed in the form of interviews and comparative case studies. The purpose of the comparative case studies is to aid the process of identifying patterns of similarities of ventures in the dot com era and compare them to the current situation. The analysis is based on the theoretical framework initially laid forth in this planning report and continually improved and developed during the thesis work.

Interviews have primarily been conducted with representatives of venture capital and private equity firms based both in Sweden and the United States. These interviews were performed either face-to-face or via video-link depending on the availability of the interview subject. In some cases, these interviews have taken the form of written communication, due to difficulties scheduling adequately long sessions for video calls. The purpose of these sessions is to attempt to establish patterns of valuation, management, and investment criteria used by the venture capitalists, which can be used as a basis of comparison to the findings of the literature study.

2.1. Research Strategy

This thesis is primarily based on qualitative data gathered through interviews, complemented by a literature review. An inductive research approach is used as this thesis aims to understand factors that may contribute to the occurrence of the Unicorn phenomenon, based on observations made in the literature review and through the empirical data collection process.

2.2. Research Design

This study was designed as a comparative case study, in which several cases are compared using the same theoretical framework. According to Yin (2008), case studies are suitable to gain insights into phenomena that are relatively novel or have previously not been studied, as is the case with investment criteria applicable to ventures in the intellectualized economy. The methodology is suitable for this study, as it does not require that any control is maintained over the studied organizations or events.

The first phase of this study was to perform a literature review to establish a theoretical frame of reference for venture capitalist's investment criteria and decision making. The review revealed that the majority of influential publications on the subject were published during the 1980s and 1990s, thus not taking into account the developments of the last years.

In order to fulfill the purpose of the study, the literature review as complemented by data gathered through interviews with individuals in different positions at several venture capital and private equity firms. These interviews provided an up to date perspective of investment criteria and decision making, in order to establish whether or not, any changes had taken place since the publication of the majority of influential studies. Furthermore, little relevant literature was found that dealt with analyzing businesses in the intellectualized economy. Therefore, a separate literature study was performed in order to establish a way of analyzing ventures working primarily with intellectual assets, property, and capital to create a value proposition.

It is worth noting that the research process was iterative, and several steps may have been revisited on several occasions during the duration of the thesis work.

2.3. Research Process

This study used an inductive process with the goal to explain observations about venture capital investment decision making and its effects on startup valuation.

The study was performed largely as follows:

The research questions were laid out in collaboration with Invest Co. and then revised based on feedback given by the dissertation supervisor Bowman Heiden.

A literature study was performed to provide a foundation for the development of the framework. No specific frameworks that could be used as a foundation were found. Instead, a range of literature on the subject of venture capital investments helped lay the foundation for the framework creation. Literature regarding the intellectualization of the economy was used to provide a context for entrepreneurship in the modern, intellectualized economy in which most successful startups deal with intangible products, or services, rather than physical products. Based on the literature study, interview questions were formulated so that the identified information gap may be bridged. Interviews were performed with venture capitalists from several firms ranging from small local actors to some of the world's largest private equity investors. In the analytical steps, the findings from the interviews were compared with the findings of the literature study in order to establish patterns of differences and similarities that can help answer the research questions. Furthermore, examples of ventures in both eras are presented for comparative and illustrative purposes. Conclusions are drawn based on the findings in the previous step, answering the research questions. A discussion regarding the findings and their implications is conducted, with suggestions for further areas of research presented.

2.4. Literature Review

A literature study was performed in order to gain an overview of the venture capital industry and to provide context of the current economic and societal situation that affects it. A funnel approach to the literature review was taken, where the initial phase was used to gain a broad picture of the industry and subject area studied.

The literature study was then performed at a slightly more thorough level when a number of articles, books, and studies of interest were identified. The last phase of the literature study was an in-depth investigation of the materials selected on the criteria of best matching the research questions.

2.5. Formulation of Research Questions

The research questions were initially formulated in collaboration with the founders of Invest Co., to accurately match the goal of the internship project at hand. These were later revised based on the recommendations of the thesis supervisor Bowman Heiden. The interview questions try to establish whether or not the investment criteria found in the literature review are still valid and commonly used. Furthermore, they are formulated to allow the interviewees to discuss what changes have occurred in investment criteria over time, especially when taking into account technological and societal change. Lastly, the goal is to investigate the interviewees ’views on what changes, if any, will occur in the future.

2.6. Selection of Interviewees

Due to constraints in time and travel opportunities, possible interviewees were limited to individuals either geographically located in the Gothenburg region or willing to communicate via email, telephone or video call. As many professionals working in the venture capital and private equity fields are subject to high workloads and long hours, it is sometimes difficult to access individuals willing to prioritize answering interview questions. Close to 100 individuals at venture capital firms were asked to participate in the study. Only six agreed to be interviewed in-depth. In addition to a high workload, many were not comfortable discussing what they consider to be trade secrets, despite being offered total anonymity. As a result, many of the interviewees that agreed to participate in the study, have been contacted through the network of thesis supervisors and mentors. In order to mitigate any bias that may occur from this selection process, the individuals were selected so that they represent companies of varying size, experience, location, and investment type.

2.7. Selection of Case Studies

The case studies used to test the theoretical framework have been selected to provide insights into similarities between the venture capital industries of the dot com and Unicorn eras. A large number of startups are funded through venture capital each year, and therefore, it is difficult to overview the vast majority of deals being made. The cases highlighted are therefore what could be categorized as outliers. Their performance has either been unusually good or unusually bad, which is what has created enough attention to create a significant amount of information to use in the analysis. The purpose of the illustrative case studies is to test assumptions made in the analysis and to illustrate similarities and differences between the two eras.

2.8. Data Collection

The literature review showed a lack of contemporary sources and therefore qualitative interviews with individuals in varying positions at venture capital, and private equity firms were performed to update the field of study with more contemporary data.

A semi-structured interview approach was used, as it allows the interviewees to steer the direction of the interview to a degree. This helps mitigate any bias or erroneous focus that the interviewer may have inadvertently caused when creating the interview questions. Furthermore, it allows the interviewees to provide data that the interviewer did not initially know or understand was of interest.

An issue that arises in the analysis of privately held companies is the lack of publicly available financial information and documentation such as annual reports. Therefore, it is common to rely on information gathered through financial media and websites dedicated to the distribution of data for privately held companies. Many of these numbers are estimates, and when possible it is ideal to verify them with more than one source.

3. LITERATURE REVIEW

In this chapter a literature review is presented. Its purpose is to provide the reader with context, both from historical, economic and societal perspectives. The chapter is started by presenting a historical context in which the emergence of the intellectualized knowledge economy is explained. Furthermore, the knowledge economy's impact on modern business, entrepreneurship and venture financing is investigated. For instance, this chapter explains some of the differences between the material and intellectual value chains and the impact these differences have on venture creation and analysis. Venture financed Unicorns often have business models that rely on the monetization of data. Therefore, a framework for the categorization of possible business models is presented.

Secondly, an overview of the venture capital industry is presented. In it, its stakeholders, processes, and function are discussed. Influential work on the subject of venture capital investment criteria and decision making is presented and the findings categorized into the main areas of focus.

3.1. The Intellectualization of the Economy

The intellectualization of the economy has been a major driver of economic value creation in the 20th century. It has resulted in a large improvement in economic productivity as well as increasing the rate of technological innovation and advancement. These advances have far-reaching effects both societally and economically, and venture capitalists work on the very edge of development. In order to understand how economic factors affect these investors 'decision making, it is important to understand the context in which they operate. The following sections are intended to give the reader a summary of the process of the intellectualization of the economy, and its impact on innovation and business.

3.1.1. From an agrarian to a knowledge-based economy

Before the industrial revolution spread throughout the now industrialized world the majority of the workforces of these nations were occupied in the primary economic sector performing work such as mining, timber, fishing, and agriculture (Bell, 1973). In this primary sector, productivity was restricted by the amount of physical labor available and a company's value creation did directly correlate with the sales of raw materials such as crops (Petrusson & Heiden, 2008).

With the introduction of technological and managerial advancements such as the steam engine, advanced chemicals and the increasing division of labor starting in the latter part of the 18th-century value addition in the material value chain was shifted towards the industrialists rather than the farmers (Bell, 1973; Petrusson & Heiden, 2008).

According to Bell (1973), the industrial revolution can be attributed in part to the introduction of new technology and scientific progress but also to the codification of tacit knowledge. This codification allowed knowledge, and thereby innovation, to diffuse throughout society at previously unprecedented rates. This is supported by Foray (2006), who states that knowledge is a cumulative good. The increased codification of knowledge, aided by for instance the invention of the printing press in the 15th century, allows for more rapid accumulation and diffusion of knowledge and thus has a positive impact on the rate of scientific and technological advancement seen since (Febvre & Martin, 1997).

The second wave of increased productivity in industrial manufacturing occurred between 1880 and the end of the second world war (Drucker, 1993). In contrast with the industrial revolution, where knowledge was applied to tools, processes, and products, it was instead applied to work. This era of improved management of work and processes has since become known as the *Productivity Revolution*. Drucker (1993) argues that a third major transition of the world economy started after World War II where the knowledge economy began emerging. In this new paradigm, knowledge is applied to knowledge, and it is quickly becoming the most important factor in value creation. Production factors such as raw materials and labor are instead restraints on the utilization of knowledge to create value. Petrusson & Heiden (2008) argues that the global economy is developing towards, and is perhaps in industrialized nations already, an intellectualized economy where intellectual assets, property, and capital are the key focus of the business. Furthermore, the economy is increasingly global and physical boundaries are becoming less relevant.

3.1.2. Business in the intellectualized economy

The value of modern businesses is often primarily based on intellectual property and capital, with not being uncommon to attribute as much such as 80-90% of the total valuation to these factors (Petrusson, 2004). Venture capitalists lack the appropriate tools and skillsets to evaluate the intellectual property, and thus it becomes difficult to predict accurately what startups will turn out to be successful.

In the traditional physical industrial economy, wealth is created through the transaction of physical goods (Petrusson & Heiden, 2008). In this, economic value is created through the production, distribution, and selling of physical products. Valid business models in this type of economy are relatively few and well-known and understood. An actor's competitive advantage is determined by how they compare to their closest competing actors concerning cost and differentiation strategies.

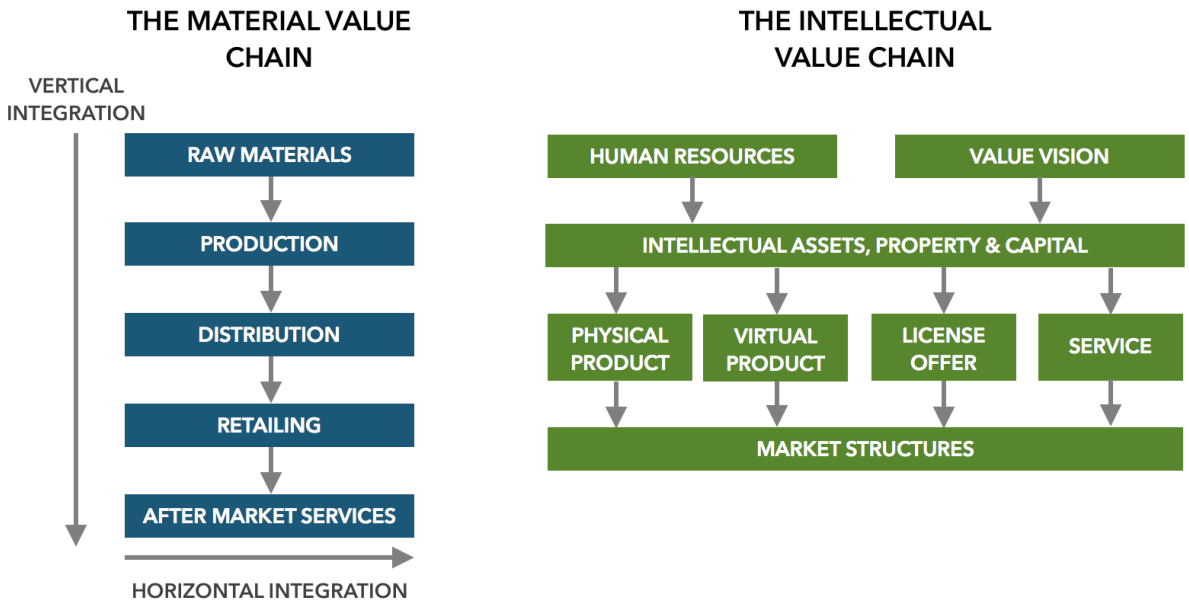

Figure B. The material and intellectual value chains. Adapted from Petrusson & Heiden (2008).

On the contrary, knowledge-based business relies on other mechanisms for wealth creation (Petrusson & Heiden, 2008). In the intellectualized economy, companies can create value through the management of intellectual assets, property, and capital. New technology and value not being bound by physical carriers allow entrepreneurs to create new business models and even entirely new markets that can be dominated by the creator. An example of such a market is Uber's creation of the modern ridesharing market, a market which they now dominate in most geographical areas. The high rate of technological development makes it difficult to anticipate what new markets and business models may emerge in the future.

Technological advancements also work to create rapid growth and disruption in new markets, with companies such as Uber and Airbnb turning the taxi and hotel industries on their heads (Griffith & Primack, 2015). To summarize, it is increasingly difficult to predict future growth and market potential as ventures are beginning to create new markets and disrupt existing ones at a previously unprecedented rate.

3.2. An Introduction to Venture Capital

A venture capital firm usually refers to an organization which purpose it is to invest in, and thus support the growth of, new companies that lack access to institutional lenders (Pratt, 1987). This section outlines the major stakeholders in the venture capital industry and also identifies common investment criteria. The section begins with an overview of the industry and its stakeholders. Furthermore, a generalized venture capital investment cycle is presented. Thereafter, a more in-depth review of venture capital decision making and investment criteria is presented.

The venture capital industry is characterized as being heterogeneous in its nature, with few standard industry practices. Therefore, the below-presented information must be taken as averages or normal situations, rather than a presentation of how all firms operate.

3.2.1. An Overview of the Venture Capital Industry

Venture capital financing plays an important part in the growth of high tech startups as it spans the majority of the startup phase. According to Zider (1998), venture capital fills a gap between traditional sources of funding such as friends and family of the entrepreneurs, government grants and corporations.

Regulations on financial markets create situations where banks will not finance new business unless there are available debt securities in the form of hard assets. Most startups value exists in intellectual assets, and in some properties. As most institutions do not recognize these as a basis for the debt security, startups are left without options to securitize their debt through traditional means. These structures provide a niche for venture capital firms to exploit, as prospective entrepreneurs often lack other options for financing their ventures. Also, venture capital firms perform a crucial role in the knowledge-intensive economy by identifying and funding innovative start-ups with high potential (Monika & Sharma, 2015). In this role, venture capitalists have significant power to affect the future direction of technology development.

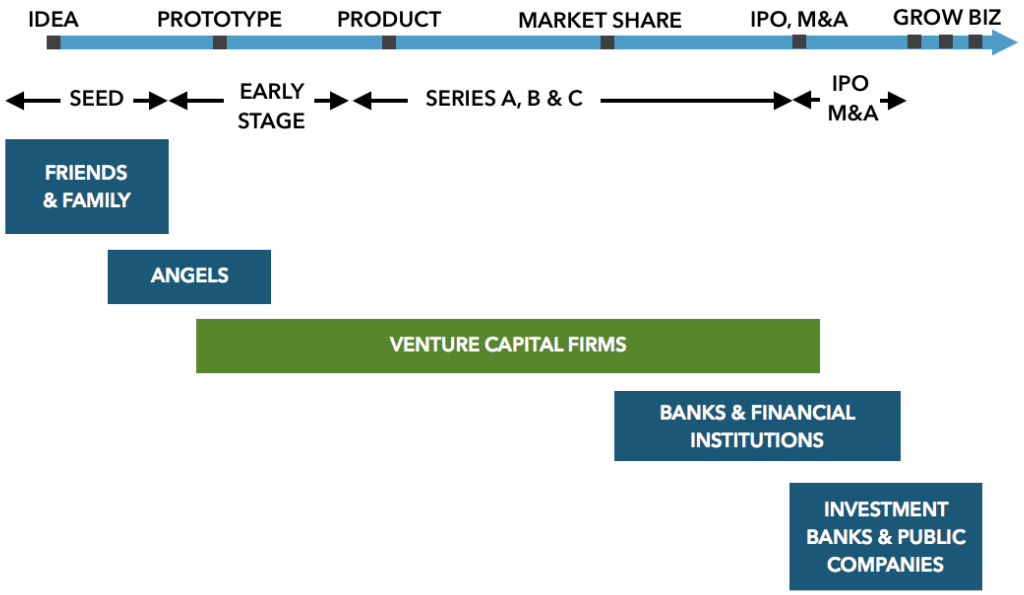

Figure C. Venture Capitalists Take Part in a Significant Portion of a Startup's Growth Cycle. Adapted from Vrontis & Thrassou (2012).

The venture capital industry caters to four major parties (Zider, 1998), these are illustrated in Figure D. First and foremost, there are venture capitalists who are looking to make money for themselves, as well as provide investors with sufficient returns on their invested capital. Secondly, some entrepreneurs seek funding for their startups. Thirdly, investment bankers performing IPOs and or mergers and acquisition work. Lastly, there are investors in venture capital firms who are requiring a high return on investment.

In the case of funding rounds at Unicorn levels, investments by traditional venture capitalist firms are a clear minority. 14% of unicorn level financing rounds in the nine months before December 31st, 2015 were led by traditional venture capital firms (Kramer et al., 2016). Mutual funds, hedge funds, and corporate investors and other non-traditional venture capital investors led 86% of rounds. This level constitutes an increase, as 75% of funding rounds were led by non-VC investors in the firm's previous study, covering the 12-month period before March 2015 (Kramer et al., 2015).

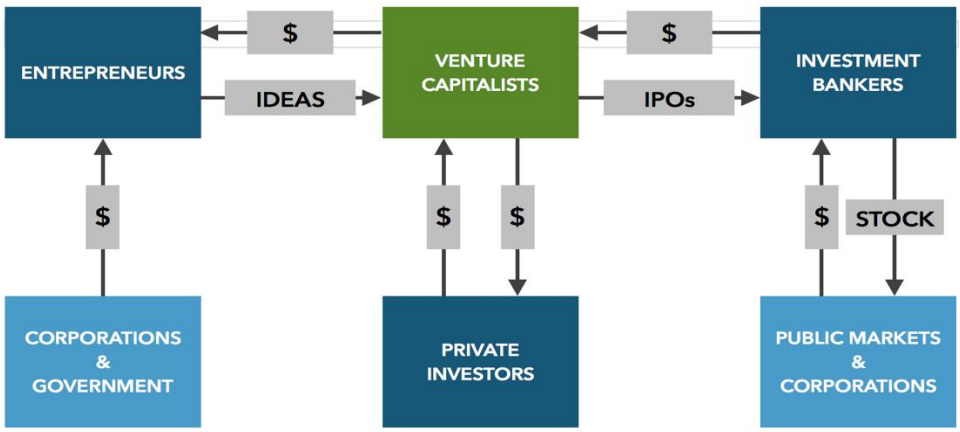

Figure D: Major stakeholders in the venture capital industry. Source: Zider (1998).

3.2.2. Venture Capitalist Investment Process

Tyebjee & Bruno (1984) found that while there is considerable heterogeneity among venture capital firms' investment processes, an overall roadmap of the process can be constructed. The process begins with a deal origination phase, in which a mass of proposals is sent to or gathered by the venture capitalist through various channels.

The numerous proposals are next screened by the venture capitalists to find a much smaller number of potentially interesting cases. The selected cases are then evaluated on several investment criteria which will be investigated further later in this chapter.

Cases that are found to meet the venture capitalist's investment criteria will then be put through the deal structuring phase, in which terms of the investment such as valuation and downside protection are determined. It is these two process steps (highlighted in figure E) this thesis is primarily aimed at investigating. Post investment activities include for instance support with business development, deal-making as well as the preparation and execution of a liquidation event.

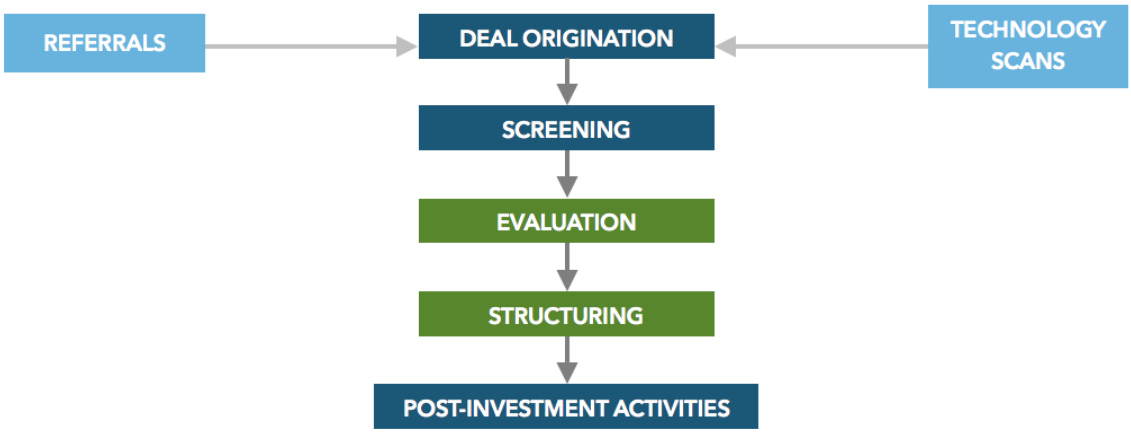

Figure E. The Venture Capital Deal Process. Adapted from Tyebjee & Bruno (1984).

3.2.3. Valuation

Other than being a limiting factor restricted by venture capital fund size, valuation serves an important purpose in venture capital investments, as it aligns the ambitions and views of both investors and entrepreneurs (Miloud et al., 2014). Furthermore, it acts as a signaling tool toward external parties such as later-stage investors, customers, suppliers and potential employees.

According to two studies conducted by Silicon Valley law firm Fenwick & West, attaining unicorn valuation may be a goal of startups raising money in venture capital financing rounds (Kramer et al., 2015; Kramer et al.; 2016). In the study, almost half of companies analyzed had valuations in the $1-1.1B range, an increase from 35% in Fenwick & West's previous study, indicating that startups may specifically negotiate to attain unicorn level valuations.

According to Miloud et al. (2014), traditional corporate finance models for company valuation are difficult to apply to startups, as the methods often rely on accounting data or historical performance. Miloud et al. (2014) even argue that venture capital valuation practices to this day remain a 'guess' and 'alchemy.'

Prior to the burst of the dot-com bubble in 2000, Gompers and Lerner (1999) showed that an increased influx of capital into venture capital funds increased the valuation of investment objects, despite unchanged future earnings potential. The same study showed that the increases could not be explained by a larger number of investors seeking to invest in venture capital funds due to an increase in startup attractiveness. Instead, the main driving forces seem to be lower returns on alternative investments and changes in tax regulations.

In their report *Money Chasing Deals? The Impact of inflows on private equity valuation* Gompers and Lerner (1999) state: “As the capital under management in this asset class has grown from $4 billion in 1978 to $200 billion in 1998, observers have claimed that increasing capital inflows have led to higher security prices, or colloquially, `too much money chasing too few deals'.”

In the first quarter of 2016, US-based venture capital firms raised more capital than they have done since 2000, the year of the dot-com bubble burst (Winkler, 2016). At the same time, the number of Unicorn level startups has increased from 45 to 229 between 2013 and 2016.

3.2.4. Investment Criteria

Investment criteria are difficult to pinpoint, as they vary depending on the startup, the stage and size of the investment, fund capital availability, and other factors. In this segment, investment criteria that have been found and supported by numerous studies are presented. They are in most cases broadly applicable to most types of ventures, in most stages of development.

However, some research argues that venture capitalists seem to possess poor introspection and awareness of their investment criteria and decision-making process, which may skew the results of self-reported questionnaires (Monika & Sharma, 2015; Levie & Gimmon, 2008).

Several studies have concluded that the most important investment criteria for venture capitalists are the skills, experience, and personality of the entrepreneur, rather than the business model, product or market (Tyebjee & Bruno, 1984; McMillan et al., 1985).

An opposing view is put forward by Zider (1998), who argues that venture capital firms do not primarily invest in brilliant ideas or individuals, but rather invest in promising industries. This view is supported by other studies that found the factors identified by Tyebjee & Bruno (1984) and McMillan et al. (1985) to be correct, but their respective importance was not (Hall & Hofer, 1993, Zacharakis & Meyer, 1998).

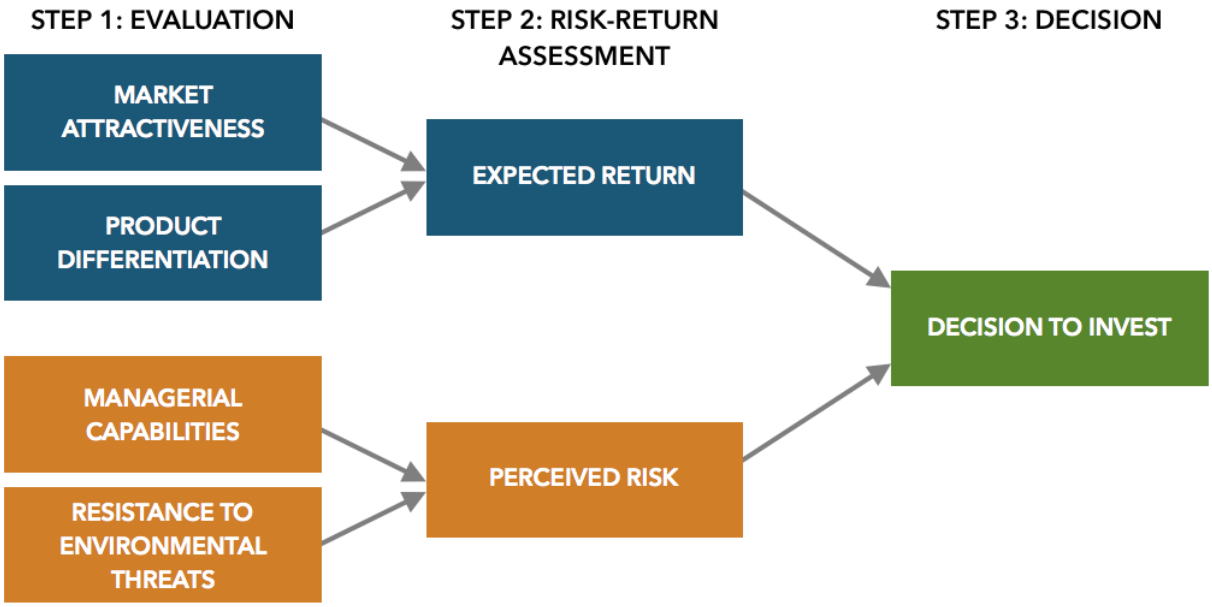

Figure F. The Venture Capitalist Decision Making Process. Adapted from Tyebjee & Bruno (1984).

Several studies in the area of venture capitalist investment criteria and valuation has concluded four major factors of concern during an investment (Tyebjee & Bruno, 1984; MacMillan et al., 1985; Hall & Hofer, 1993). These factors are primarily related to the market, the entrepreneur/team, the financial situation, and the product. Tyebjee & Bruno (1984) introduced a model for Venture Capitalist decision making, in which their versions of the above-listed factors are used to reach an investment decision.

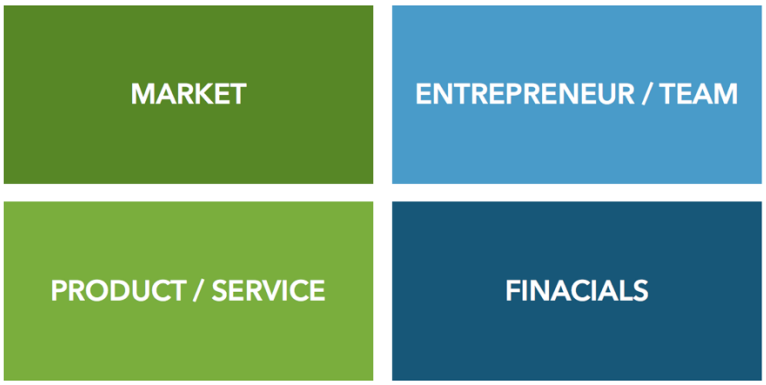

Figure G. The Four Main Categories of Venture Capital Investment Criteria.

Market

MacMillan et al. (1984) identified the most important market factor to be rapid growth. As markets are growing quickly, venture capital investments are in general focused on the middle of the industry's growth S-curve, where growth is at its largest (Zider, 1998). This investment timing allows venture capital firms to tag along on the overall market growth and perform an exit before firm and team characteristics begin to have a major positive, or for that matter adverse, the effect on the startup's performance. In high growth industries, Zider argues, startups with a low and high performance show similar financial results and growth rates.

According to Zider (1998), a successful exit opportunity is often not uncommon in high growth industries, as investment bankers are continually looking for rapidly growing companies to bring to the public markets. Porter (1980) argues that a rapidly growing market or industry will have lower retaliation from incumbents to new entrants as they can maintain acceptable financial performance.

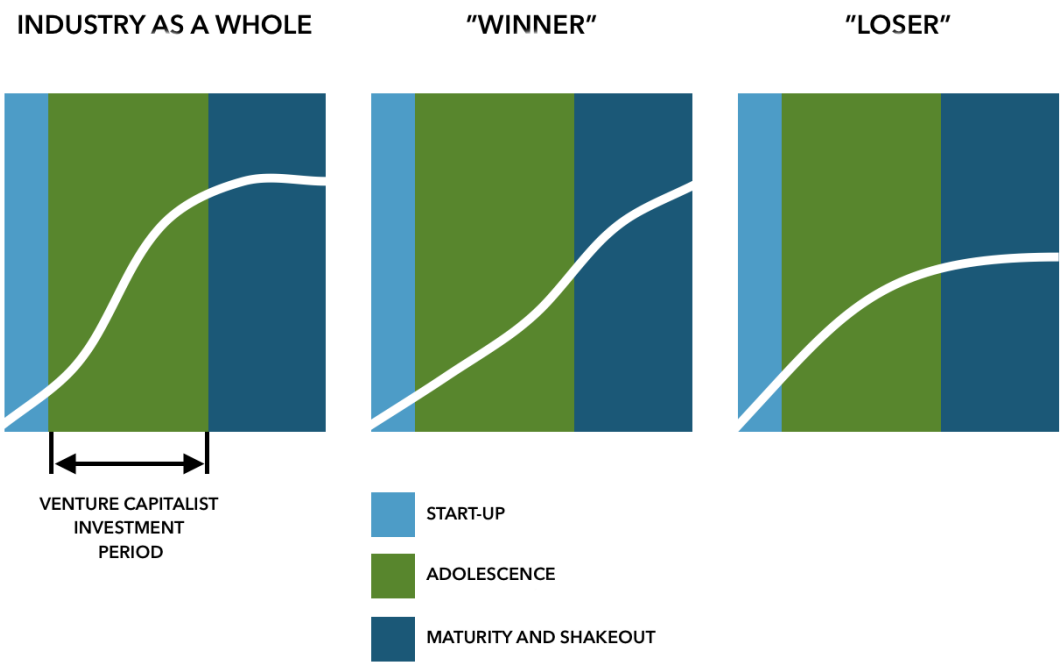

Figure H. The Venture Capital Investment Period. Adapted from Zider (1998).

The Entrepreneur / Management Team

The entrepreneur or management team becomes increasingly important the lower the venture capitalist's belief in the market is. The aforementioned is also true in industries where long or complicated processes are required. Zider (1998), utilizes the example of a genetic engineering company. In this case, it is essential for venture capitalists to identify what entrepreneurs are capable of developing valuable resources to a level

where it is for instance FDA approved. Not until the startup reaches that stage, a successful exit becomes likely.

Several studies have identified the entrepreneur/team's managerial capabilities as one of the most influential factors in an investment decision (Wells, 1974; Tyebjee & Bruno, 1984; MacMillan et al., 1985; MacMillan et al., 1987). In the study performed by MacMillan et al. (1985), venture capitalists listed a capability of sustained effort as the most important characteristic of the entrepreneur and in fact the most important factor affecting the investment decision.

In essence, the investors want someone with the intent and capability to maintain a high degree of effort until the liquidation event. Additionally, relevant experience within the industry, market knowledge or previous startup experience has been identified as contributing to a decision to invest (Tyebjee & Bruno, 1984; MacMillan et al., 1987).

The Product

The evaluation of the product is highly dependent on the industry in which the startup is active. Studies have however identified factors that appear relevant across several investment areas.

Tyebjee & Bruno (1984) found that venture capitalists first and foremost are interested in the profit margin on the product, with the uniqueness of the product being the second most important factor influencing an investment decision. Thirdly, venture capitalists emphasize the importance of a patentable product in order to maintain a competitive advantage against competing market actors. This is supported by MacMillan et al. (1985), who found that a proprietary product that is possible to protect is the most important characteristic.

This factor is followed by the product enjoying demonstrated market acceptance, the product being in a state of development to at least show a functional prototype, and that the product may be described as "high tech."

Financial Situation

According to Zider (1998), the common theme in all venture capital investments is to give investors sufficient downside protection as well as beneficial opportunities for further investments if the startup proves successful. The financial considerations of the startup investment relate to factors such as return on investment, expected payback time, the liquidity of the investment, risk and, of course, the size of the investment for equity.

Venture capitalists on average require a ten-time return on investment within a five or ten-year period (MacMillan et al., 1985). To ensure that this goal is met, MacMillan et al. (1985) identified six types of risks that a venture capitalist needs to manage successfully:

- Risk of losing the entire investment
- Risk of being unable to bail out if necessary
- Risk of failure to implement venture idea
- Competitive risk, and
- Risk of leadership failure

A study by Silicon Valley law firm Fenwick & West concluded 100% of the Unicorn level funding rounds analyzed had investor downside protection in the form of preferred stock liquidation preferences (Kramer et al., 2015). In practice, this means that the investor will get paid before any other owner in the case of company liquidation. The same study found that the average Unicorn funding round was for 9% of total company equity. Thus, the startup's value has to drop more than 91% from the valuation before the investor suffers any loss on the investment.

4. EMPIRICAL FINDINGS

In this section, this thesis's empirical contributions to the study area are presented. Semi-structured interviews have been performed with representatives in varying positions at investment firms performing venture investments. The companies range from smaller local actors, actors significant at a national and regional level, to some of the largest in the world. The interviewees have wished to remain anonymous as certain information could be considered sensitive.

The purpose of these interviews has been to provide contemporary insight into venture capital investment criteria. Previous research is published before the appearance of the first startup Unicorns. Therefore, they do not account for the changes to the industry landscape that have occurred primarily over the last five years.

The findings of the interviews have been divided into categories corresponding to the ones presented in the literature study, namely market, entrepreneur/team, product or service offering, and financial situation.

The interviewees requested that their firm names were not disclosed. In order to keep the replies anonymous, neither the names of the interviewees nor their employers are disclosed.

4.1. Interviewee A - The Large Firm Associate

This interviewee (Interviewee A, 2016) is an investment associate at a large-cap buyout firm, dealing primarily with equity tickets in excess of €125 million. The interviewee performs activities such as deal sourcing, due diligence in collaboration with external advisors and also performs portfolio work. The interviewee has previous experience in investment banking at a large well-recognized financial institution.

4.1.1. The Company

The interviewee is an investment associate at one of the largest and most recognized investment institutions in Europe. The company has divisions focusing on private equity and venture capital. It employs approximately 400 people in offices in approximately 20 of the world's financial hubs. Total under management reach approximately €30 billion. The venture capital division primarily invests in ventures related to the digitalization of financial technology, medical technology, entertainment, and travel. It does do not take part in seed-stage funding rounds.

4.1.2. Market

The interviewee argues that the most important understanding is what factors are the major contributors to growth on the market. Therefore, it is essential to develop a thorough understanding of macro and micro trends in the market. This furthermore aids the understanding of what relationship the company has to its customers.

In addition, it is important to understand the competitive dynamics and the company's market position and whether it is possible to leverage it. Ideally, an investment should be possible to either consolidate with another business or present an unusually strong growth opportunity.

Interviewee A argues that new technology development is making it increasingly difficult to analyze investments. Market size, entry barriers, and downside protection factors are difficult to estimate as many new rapidly growing tech companies are creating markets of their own rather than growing on existing ones. Possible growth, maximum sales and as a consequence the value of the company are factors that are becoming increasingly difficult to estimate.

4.1.3. Entrepreneur / Management Team

Rather than performing an analysis with a focus on a team's current makeup and capabilities, interviewee A considers it more important to put the team into the context of the acquisition plan. The management team should be suitable to perform well over the course of the entire investment period, and it is important to evaluate whether or not they possess the skills, experience and other characteristics necessary to reach a successful exit. The essential factor is to understand whether or not the management team will remain relevant and effective during the entire lifecycle of the investment. If not, the team needs to be replaced or somehow developed.

4.1.4. Product or Service Offering

In contrast to what is presented in the literature study, interviewee A emphasizes the importance of understanding macro and micro trends on the market, and by doing so understanding the product's value proposition towards a customer. Questions to consider are if the product is sensitive to changes in macro trends if it is easily replaceable and so forth. Furthermore, interviewee A explains that the ideal product is critical to the customer in some way.

4.1.5 Financial Situation and Valuation

The primary concerns regarding the financials of the investment are, perhaps quite obviously, present on the fund level. The two major concerns are that of total equity value and capital gain. Interviewee A (2016) argues that the other factors dealt with in the literature review are highly interlinked, which makes it difficult to distinguish what factor is most important.

The interviewee, however, mentions that there is an abnormally large amount of capital available on the markets at the moment. This strong supply is driving higher valuations of startups as more investors seek opportunities to deploy their capital. Furthermore, low returns on traditional low-risk investments have led to an increase in investors turning towards industries such as private equity and venture capital, investments that inherently carry higher risks.

The more mature the company is, the higher the requirements are that the business is cash generative. This is however determined on a case to case basis and may be disregarded if the perceived upside at exit is sufficient. To summarize, the financial considerations are simply a matter of finding an attractive balance between perceived risk and possible reward.

4.2. Interviewee B – Senior Investment Manager

The interviewee (Interviewee B, 2016) is a recently retired senior investment manager at the venture capital branch of one of northern Europe's largest financial institutions. The interviewee has over 30 years of experience in the industry, with previous experience in other sectors of corporate finance and banking.

The interviewee was part of the team that set up the bank's venture capital division in 1999 and was part of the team until his departure in 2013. During that time, the firm made almost 100 investments and 70 exits. During that period, the interviewee was appointed as a board member to fifteen companies, some of which later went into the publically traded markets.

4.2.1. The Company

The company is a venture capital division of one of northern Europe's largest financial institutions. It was founded in the late 1990s and has since then performed in excess of 100 venture investments. The investments typically range in size from €2.5 million to approximately €10 million, for a minority stake in the targeted ventures. A majority of investments have been made in the fields of life science and technology, however other industries have been targeted as well.

4.2.2. Market Factors

The interviewee explains that the market is the second most important factor to consider, after the management and entrepreneur. When assessing a market, the primary factor looked at is its growth. Without sufficient growth it is likely too difficult to establish a foothold on a market and compete with incumbents.

When analyzing incumbents, the primary questions that the interviewee asks is whether or not anyone is making good profits on the market. If not, the market itself may be too small or too competitive to even contemplate entering. Thereafter it is important to thoroughly understand competitors in order to successfully predict their reactions. Furthermore, it is important to have a deep understanding of the overarching trends and forces on the market. This helps in understanding customer behaviors and what their motivations are.

4.2.3. Entrepreneur / Management Team

The interviewee considers the management team to be the most important factor by a large margin. The interviewee explains that during his career, almost all failed ventures have been the result of poor management. He continues to argue that failed products or adverse market conditions can be handled by a competent management team. However, a good product or seemingly amazing market opportunities cannot be utilized by incompetent management that lacks the proper market understanding.

In contrast to for instance interviewee E, interviewee B finds it important to distinguish between a technically skilled entrepreneur and someone able to build a valuable company. Interviewee B argues that the CEO of a company should be someone with previous experience of creating a valuable company. In addition, the technologically gifted entrepreneur is more often than not, not suitable for a management position. Therefore, interviewee B usually appoints a new CEO with the ability to build good group dynamics and manage a good relationship with the board of directors.

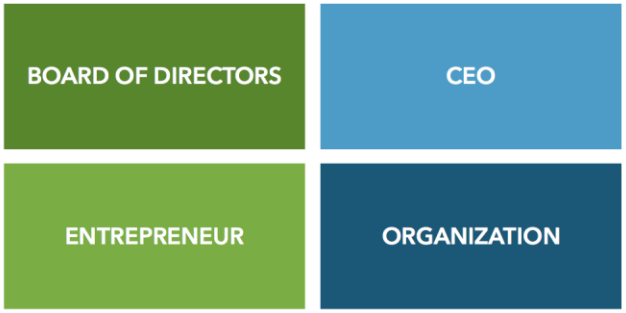

Figure I. The four players that need to be balanced in an investment. Interviewee B (2016).

4.2.4. Product or Service Offering

The first factor that interviewee B investigates is whether or not the product is critical to the target audience. He calls it the "must-have or nice to have test". If the product is indeed critical to the customer, a must-have, it is important to understand what metrics are most important to the user in terms of performance, price, and so forth. Usually, the superior product will be the market winner in these cases. The second type of product is nice to have. In these situations, interviewee B argues that the success of a product is determined by the level and quality of marketing and sales efforts. In all cases, the product must correspond well to the findings of the market analysis. It is also important to remember that if the product is good enough to fulfill the goals, it does not need to be improved even more. It the product is good enough, it is a matter of selling. Other factors looked at include a proof of concept. Interviewee B generally avoids products that do not have a functioning proof of concept. For instance, early investments in pharmaceuticals and biotech proved difficult and much too costly to fully develop.

Lastly, interviewee B looks for products that have sufficient technological advancements that it is difficult to copy. Previous issues with patent protection have led the interviewee to not simply trust an issued patent. Instead, he seeks some sort of other ability to protect the invention as well.

4.2.5. Financial Situation and Valuation

In contrast to other interviewees, interviewee B puts a strong emphasis on the correct valuation. He argues that many modern venture capital investments simply do not have realistic valuations set, and if you count backward it is in many cases evident that the sales volumes required are unreasonable. Interviewee B argues that many early-stage investors agree to high valuation under the assumption that there is a *bigger fool* willing to invest in or buy the company at a later stage. Interviewee B, however, believes that this tactic is inherently dangerous. He states that an investment is already a bet on the management, the product and the

market performing as anticipated. Adding a dimension of finding a *bigger fool* to take over is simply too big a risk in his mind.

Interviewee B's company does not use ratchet or preferred stock in their investments. They used to and found that it created an "us vs. them" mentality between the investors and the entrepreneurs/management. Therefore, they only deal with regular stock that has no additional drawbacks for the entrepreneurs. In addition, the interviewee believes that many companies use ratchets to inflate company value at minimum risk to themselves, according to the *bigger fool* strategy.

The interviewee sees many similarities in today's situation compared to the venture capital investment landscape of 1999 and 2000. In his mind, the large influx of capital has made investors reckless. Valuations are going up and instead of focusing on sound earnings models, investors focus on growth, even for other metrics than revenue. Interviewee B is strongly skeptical of this development and expresses with certainty that the markets are in the midst of a Unicorn bubble.

4.3. Interviewee C – Investment Manager

Interviewee C (2016) is an investment manager at the venture capital branch of one of northern Europe's largest financial institutions. The interviewee has been at his current position for two years, with ten years ' previous experience working with business development and commodities trading at the bank. Prior to joining the bank, interviewee C worked in academia as a researcher and ran businesses as an entrepreneur.

Interviewee C claims that the common factors used to analyze venture capital investments should not change significantly over time. Analyzing venture capital investments is mostly looking at a startup with ordinary business acumen and 'common sense'. Interviewee C argues that if factors change quickly or dramatically, it is likely an indication of a market that is too positive or too negative.

4.3.1. The Company

The company is a separately managed venture capital division of one of northern Europe's largest financial institutions. It was founded in the mid-1990s and has since then performed in excess of 100 venture investments. The investments typically range in size from €2.5 million to approximately €10 million, for a

minority stake in the targeted ventures. A majority of investments have been made in the fields of life science and technology, however other industries have been targeted as well.

4.3.2. Market Factors

Interviewee C argues that it is difficult to generalize market considerations. This is mainly due to the fact that many of the companies that interviewee C's employer invests in are creating new markets of their own. Furthermore, all factors take on new meaning depending on what industry and investment stage is looked at.

In general, interviewee C ideally looks for ventures with the power to completely disrupt a market. A venture that is not able to create a market of its own must have a strong underlying potential for market growth or taking market shares from other actors. The interviewee, however, emphasizes the importance of differentiating between types of growth. According to interviewee C, most tech startups that show a strong user base growth do not experience any real growth in actual revenues. The interviewee states that "most tech startups whose primary growth is in the number of users are not making any money, and they certainly never will make any in the future either" (Interviewee C, 2016).

4.3.3. Entrepreneur / Management Team

The most important factor to consider when evaluating the management team is related to their capabilities and backgrounds. It is important to ensure that the team possesses the right skills, experiences, and relevant backgrounds to achieve the investment goals. Furthermore, it is of great importance to assess whether or not the relationship between investment managers and the management team is functional on a personal level. This is important as a good relationship will result in less friction in the running of the company as well as fewer strong differences of opinion in overall goals and so forth.

4.3.4. Product or service offering

Primarily, interviewee C looks for a relevant, commercially viable proof of concept to ensure that the product or service is, in fact, present a real value proposition. In addition, interviewee C looks at the technological leap that a product makes over its competitors. This is done to better assess how the product provides increased value over previously available products. In addition, a product or service should ideally provide opportunities for strong use in multiple verticals, i.e. it should be able to target more than one step in the value chain in multiple industries. Lastly, the product's or service's scalability is evaluated.

4.3.5. Financial Situation and Valuation

In all venture capital investments, the overarching goal is to achieve an attractive risk-reward balance. An additional factor that is considered is, for instance, the exit strategy. Are there enough potential buyers for a tech-exit, or is it instead necessary to build enough value to successfully perform an IPO for instance? Furthermore, interviewee C notes the importance to look at the strength of the entire investor syndicate to judge whether they are capable of bringing the startup to the planned position in 'all 'possible scenarios. Additional factors to consider are perhaps quite obviously the time horizon for the investment and the invested amount for a certain equity share.

Interviewee C shows a great deal of skepticism regarding Unicorn valuations. He argues that these valuations in most cases are excessive and that the markets are currently experiencing a Unicorn bubble. Interviewee C attributes this development to what he calls some of the golden rules of venture capital. Firstly, there is currently an excessive influx of available funds as investors move from lower risk, lower reward investments in search of higher returns in for instance venture capital and private equity. This creates greater competition among investors who seek to deploy their capital in the few good ventures available, which in turn allows entrepreneurs to successfully seek higher valuations. In order to be able to deploy their capital, venture capitalists are downregulating their risk sensitivity in the search for higher returns. Interviewee C believes that there may also be a psychological anchoring effect, that has come to normalize billion-dollar valuations that just a few years ago would seem extreme.

Interestingly, interviewee C claims that when many of these investments are analyzed after exit, they usually show poor returns. Especially when taking into account the high risks involved. Interviewee C draws many parallels to the dot com era bubble and is confident that the markets are currently in the midst of a bubble and that risk-seeking investors will come to regret their investments relatively soon.

4.4. Interviewee D - The Silicon Valley Unicorn Investor

Interviewee D is an associate at the investment team at one of the world's most prominent venture capital firms. The interviewee has experience as an associate as well as an intern at two other venture capital firms that have done unicorn level funding rounds in well-known ventures.

The interviewee's day to day work involves managing the deal sourcing pipeline, evaluating investment proposals. Furthermore, tasks include supporting portfolio companies and firm initiatives when needed.

Overall, the interviewee finds it difficult to say what are the most important factors to consider in an investment decision. Approximately fifty different characteristics and data points are weighted to create an overall attractiveness rating of the investment. This weighing depends on what type of industry and investment stage is being considered. However, the interviewee says that the most important factors usually involve the entrepreneur or management team, followed by the product-market compatibility or fit, and market characteristics.

The interviewee believes that the factors presented below will, and should, remain relatively unchanged despite technological and societal developments. However, increased pattern recognition among investors may lead to a shift in what patterns are emphasized.

4.4.1. The Company

The company is one of the world's most well-known and high profile venture capital firms. It has offices in Palo Alto, California and on the east coast of the United States. In total, the company employs a staff of approximately 40 people. The company specialized in early and growth-stage investments and has invested in six well-known Unicorns. Two of which have performed successful IPOs at billion-dollar valuations.

4.4.2. Market

The interviewee emphasizes the importance of good timing with regard to market macro trends. The first and primary factor to look for is a compelling answer to the question "why now?". Secondly, it is important to understand the total available market, in order to understand the earnings opportunity. Lastly, it is important to have a proper understanding of the competition.

4.4.3. Entrepreneur / Management Team

The most important characteristic of the entrepreneur or management team is to understand the conviction of their product, idea and business model. It is important to understand that they are committed to completing what is started. Secondly, it is important to see a good founder-product fit, which in essence means that there should be a good story to sell in terms of how the founder created the venture, product, and so forth.

In addition to the above-mentioned factors, an important trait of any team member is displaying a large degree of thoughtfulness in the approach to making business, suggesting that decision making is being done with a long term perspective in mind. Lastly, it is important to evaluate what skillset the team possesses.

For instance, what are the qualifications and experiences regarding sales, leadership and technical knowledge?

4.4.4. Product or Service Offering

The primary factor looked at is that there is a clear use case that can be understood and proven. Secondly, there needs to be a unique trait or characteristic of the product that can either be kept secret or somehow protected. Thereafter an analysis involves looking into net promoter scores, which deals with the rate of which a customer is likely to recommend a product or service to others. Other than this gauge of customer loyalty and ability to diffuse the product throughout the population, it is also important to estimate the retention rates of new customers.

Once these factors have been estimated, the analysis includes looking at what the interviewee calls platform potential. This factor deals with whether or not it is possible, and if so how much effort is required, to upsell a customer or account. Lastly, there are integration, workflow and stack "fit" considerations to other products that are taken into account to judge whether or not the product will be a viable option in the environment in which the customer operates.

4.4.5. Financial Situation and Valuation

In order to make a decision to invest, interviewee D and his team look primarily at what upside potential can be found in the investment opportunity. When it has been established, it is important that there is a clear and plausible path to exit.

When the above has been established, it is important to assure that there is an opportunity to reach target ownership at a total cost that fund budgets will allow. These ideal ownership percentages of total equity are as follows:

- Seed stage: 10-15%
- Series A: 20-30%
- Series B-C (Growth stage): 25-50%.

However, the interviewee explains that the firm has become less bound by specific investment stages and check size over time, and are more willing to work outside the ideal boundaries for the right opportunities. Furthermore, interviewee D explains that his firm prefers clean capitalization tables in the ventures they invest in. This meaning as few owners and investors as possible to reach the investment target.

4.5. Interviewee E - The Fortune 500 Corporate Venture Capitalist

The interviewee is an investment manager at a Fortune 500 company's corporate venture capital division. After graduating from university, the interviewee joined a biotech startup as chief operating officer. In this capacity, he was responsible for several funding rounds, dealing with approximately 60 million SEK in venture capital investments. In 2010 the interviewee joined his current employer as a business analyst, working with investment evaluation as well as assisting portfolio companies with business development and fundraising. After one year, the interviewee became an investment manager and head of the Americas and was in 2012 tasked with establishing an office in Silicon Valley.

4.5.1. The Company

The company is the corporate venture capital division of a Fortune 500 company in the commercial vehicles industry. It has offices in Sweden and Silicon Valley. The company previously invested primarily in clean technology or clean transportation ventures. However, the company found that these markets were primarily driven by politically controlled incentive schemes which were difficult to predict or affect. The investment focus has since then shifted towards ventures that use software or other technology to improve or revolutionize transportation.

The company has two goals with investments. First of all, it is important for an investment to create value in some way for the parent company. For instance, a technology that can be used to improve the product offering or software that can allow service and aftermarket support to improve and new business models created.

4.5.2. Market

Due to the nature of the company, all investments are focused on the transportation industry or industries that affect transportation. This narrow focus allows for a greater understanding of the market in which the company invests, but the interviewee explains that it is hard to analyze many markets today, as technology-driven startups are disrupting many existing structures, or in some cases creating entirely new markets. This also includes transportation and its surrounding markets.

It is important to understand technology trends in the markets. By looking at emerging technologies, the investors try to assess what business models and value creation opportunities will emerge that can impact

the parent company. The interviewee does believe that his firm has an advantage by focusing on a single market, but still finds it very difficult to fully understand it.

The interviewee explains that many investors have had a strong focus on growth at the expense of other metrics, but that this sentiment is changing back to be more profit-focused. The interviewee sees that while there has been a trend of prioritizing grabbing market shares and growing as quickly as possible without much consideration taken for earnings, this trend is beginning to die out.

4.5.3. Entrepreneur / Management Team

Interviewee E is likely the interviewed investor that most emphasizes the importance of the entrepreneur or team behind a venture. Referencing the short product life cycles that software-based companies face, the number one factor interviewee E looks for is the capabilities to continue the development of the product. It is essential to have a team that is exceptional at reacting to customer feedback in an efficient way, and then push the evolution of the product in an appropriate direction. In this way, the initial product does not need to be perfect, as the team has the capability to quickly adapt the product to customer feedback.

In the interviewee's experience, companies perform best with minimal intervention from investors. Therefore, when looking at the entrepreneur(s), it is important to assess whether or not this is a person or team that are capable of completely disrupting and industry, or create a new one, and build a company worth billions. Even though the team can always be complemented and supported with additional skills and experiences, the above described must be there from the start.

Furthermore, interviewee E believes a company will perform best when managed by individuals that have been part of the time since the very early stages. Early-stage involvement gives a deeper understanding of company DNA and the mission, which is harder to achieve when joining later on in the process.

Lastly, interviewee E looks for what he refers to as star quality. This means that the entrepreneur can inspire with a captivating story, which is the foundation of the company's DNA. This characteristic is important when building a strong corporate culture that supports continuous innovation.

4.5.4. Product or service offering

First and foremost, the product must have a clear benefit or synergy effect that has a positive impact on the corporate venture capital firm's parent company. When that is established, the interviewee looks for a good

product-market fit. This is usually a good indication of the capabilities of the team as well, showing that they can understand customer behaviors and needs.

In almost all cases, the interviewee invests in companies which value proposition is software-driven. As a consequence of software's short product life cycles, the interviewee emphasizes the importance of being able to quickly develop and adapt the product to new market trends. The product must be able to keep pace with market evolution.

4.5.5. Financial Situation and Valuation

The interviewee finds it difficult to rank what financial considerations carry the most weight in an investment decision. In early-stage investments, qualitative factors are most important. From this standpoint, it is important to find an attractive balance between perceived upside benefits and downside risks. These factors are however considered on a case to case basis and are therefore difficult to describe generally. Early-stage investments are inherently risk-filled, and therefore interviewee E explains that the investment must make sense from a portfolio standpoint. Looking at successful venture capital companies, the interviewee explains, you see that the majority of profits come from one or two unusually successful ventures. As most ventures are likely to fail to reach the investment goals, looking into minutia has little actual impact on the performance of the investments.

The interviewee argues that specific valuations are not of high importance. However, it is critical not to set the initial valuation a level that is too high. If that happens, it can become problematic to perform subsequent funding rounds without lowering the initial valuation in so-called 'down rounds'. The interviewee observes that there is a large influx of capital into venture capital funds during recent years, which as a result drives up valuations. He, however, does not believe that we are experiencing an overall bubble, but rather a smaller overheating of a market. Furthermore, he has observed that venture capitalists in the Silicon Valley area are recently beginning to put higher demands on earnings and profits than what was common in recent years, where the growth of different kinds were the primary metrics considered.

4.6. Interviewee F - The Swedish Growth Investors

Interviewee F (interviewee F, 2016) is an investment manager at a Swedish private equity firm. The interviewee has 8 years ’experience at his current firm and has previously worked at an additional investment company, as well as a French multinational industrial company’s German offices.

4.6.1. The Company

The company is a Swedish private equity firm that primarily invests in small to medium-sized privately held companies. They have two branches: growth investments and consolidation investments. In the former, they usually invest for 20-50% of equity and in the latter for 50-92% of equity. The company has made 20 investments in the ten years it has existed. Its exit horizon is on average seven years. The company currently has eight holdings in its portfolio in industries ranging from

4.6.2. Market

Interviewee F explains that the primary factor evaluated is growth and future growth opportunities. In addition to good growth prospects, it is essential that the company does not rely on the business of one or two major customers to survive. Furthermore, the interviewee emphasizes the importance of some kind of relatively high entry barrier for competitors.

4.6.3. Entrepreneur / Management Team

As is common among the interviewees, interviewee F states that the entrepreneur or management team of the investment object is by far the most important factor in an investment decision.

In addition to strong business skills and market knowledge, the most important factor to consider is the personal level connection between the management team and the investors. Interviewee F states that “You must get a great gut feeling for the guys you are supposed to work with”. He continues to explain that it is common to support the management team with additional skills and experiences, primarily by appointing board members, but the right characteristics must be present from the start.

4.6.4. Product or service offering

Interviewee F states that the factor his firm commonly analyzes first is the level of profit margins for the product or service offering. Higher margins are one of the major balances in the risk-reward analysis performed, and high margins can offset many other negative impact factors.

Secondly, interviewee F looks for factors that stop other actors from copying the product or service offer. It may be capital requirements, technological advancements, intellectual property rights or other entry barriers.

4.6.5. Financial Situation and Valuation

Interviewee F states that the valuation is very much negotiation between the two parties to the investment. The interviewee states that there is an unusual amount of capital available to private equity firms at the moment, which is driving up valuations as all firms are struggling to deploy their capital.

5. ANALYSIS

In this section the empirical data gathered through interviews with venture capitalists is analyzed and compared to the findings of the literature study with the purpose of exploring the differences in venture capital decision making and the investment climate between the dot-com era and the current situation.

5.1. Market

Even though factors such as competition, market entry barriers, and market access are important factors, the literature study revealed that it is likely that the largest factor that decided market attractiveness for venture capitalists was a large degree of growth potential (Tyebjee & Bruno, 1984; Zider, 1998).

The benefits of high growth were illustrated in Figure H where Zider (1998) explains that high growth allows both long term winners and losers to grow and gain market shares. This concept is supported by Porter (1980), who argued that high growth makes it easier to enter a market as incumbent aggression is less than in a situation where market growth is non-existent.

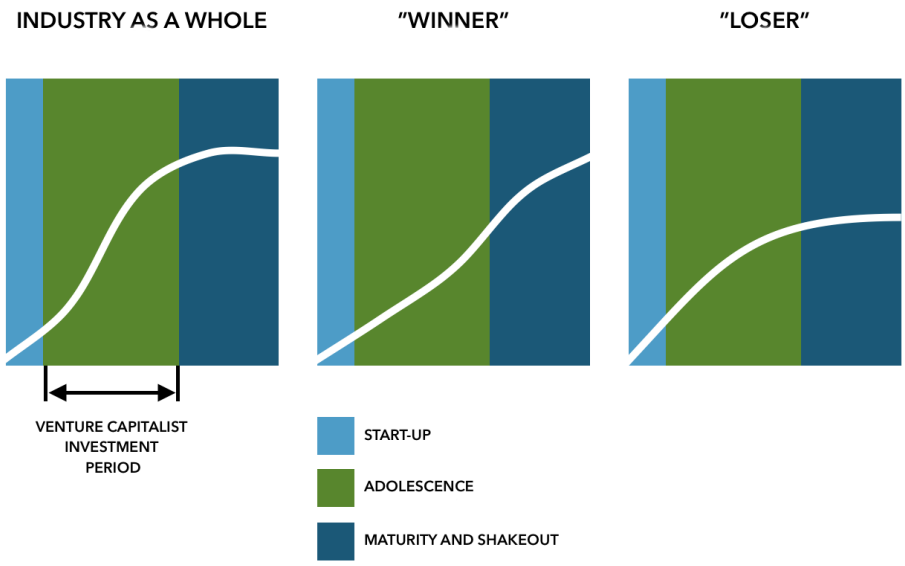

Figure H. The Venture Capital Investment Period. Adapted from Zider (1998).

The empirical study showed that high growth is still a primary decider of market attractiveness, and one of the top factors impacting an investment decision among the interviewees (Interviewee A, 2016; Interviewee B, 2016; Interviewee C, 2016; Interviewee D, 2016; Interviewee E, 2016; Interviewee F, 2016).

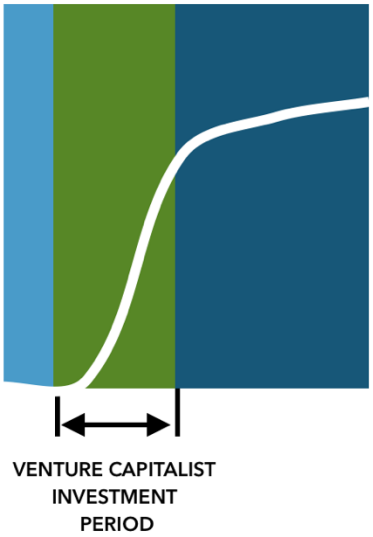

Figure J. The Venture Capital Investment Period May Have Decreased.

Several interviewees commented that investment timing is becoming increasingly important (Interviewee A, 2016; Interviewee B, 2016; Interviewee D, 2016; Interviewee E, 2016). Interviewee B (2016) and Interviewee E (2016) argue that rapid technology development and shorter product lifecycles make the window of opportunity smaller, and therefore understanding technology and market trends is becoming increasingly important for successful investments. This viewpoint is supported by Interviewee A (2016) and Interviewee D (2016) who argue that understanding macro trends is becoming increasingly important. One reason is the increasing rate of disruptive software-driven innovations that fundamentally change industries and the conditions that can be analyzed. Interviewee E (2016) argues that technology trends are perhaps even more important to understand than general market conditions, as the rapid rate of innovation is creating disruptive technology at a much higher rate than previously seen.

Furthermore, the rapid emergence and strong growth of software-driven companies such as Facebook, Airbnb and Uber has set new benchmarks for investors in terms of realistic growth goals (Interviewee C, 2016; Interviewee F, 2016). These factors combined may perhaps contribute to increased requirements for growth in order to achieve profit goals with, at least perceived, shorter product life cycles and higher market insecurity. Interviewee C (2016) explains that many investors have turned to new metrics, such as user base growth, when not achieving revenue or profit increases. He, however, argues that it is exceedingly difficult to translate user base growth to profit growth, which will have consequences for startups whose valuation is mostly based on their user bases. Interviewee B (2016) and Interviewee C (2016) both draw strong

parallels to the dot-com crash. They argue that similar trends were present then, with profit goals being down prioritized in favor of large growth.

5.2. Entrepreneur / Management Team

The literature study showed that most studies concluded that the characteristics of the entrepreneur or management team were the factors with the most significant impact on an investment decision (Wells, 1974; Tyebjee & Bruno, 1984; MacMillan et al, 1985; MacMillan et al, 1987). Zider (1998) states that the importance of the entrepreneur or team increases as venture capitalist confidence in market conditions decreases.

The empirical findings seem to support these findings, as three of the interviewees (Interviewee B, Interviewee E and Interviewee F) rank the characteristics of the entrepreneur/team as most important. Interviewee A, C and D all emphasize the importance of the right entrepreneur/team in their decision-making process.

The characteristics that are sought after vary from firm to firm. Furthermore, there are differing attitudes towards the requirements on the initial team. Interviewees A, B and F are most positive to replacing the initial team with experienced individuals. Interviewee B furthermore strongly recommends that a technology-minded entrepreneur is not made CEO or made a member of the board. An opposing view is presented by Interviewee E, who argues that the right leadership capabilities must be in place to begin with. Interviewee E explains that specific skills can always be supplemented, but it is critical that the entrepreneur/team has what he calls a star quality, and that they seem like a team that can create a billion-dollar business. Interviewee D, another investor with experience from the Silicon Valley investment scene, reasons in a similar fashion as Interviewee E. He emphasizes the importance of understanding a good founder-product fit, which suggests that the founder has a great deal of understanding and passion for the product, business model and vision for the company.

The interviewee whose response most stands out is Interviewee E. What he emphasizes most is that the team must possess great adaptability when it comes to customer demands. Interviewee E explains that the short product life cycles in software necessitate that the teams are able to keep product evolution at the same pace as market trends change.

Worth noting is that the investors with experience from the Silicon Valley venture capital scene are the ones most emphasizing qualitative values among the entrepreneur/team rather than specific skills or experiences.

5.3. Product or Service Offering

While it is true that product or service offering characteristics are dependent on the industry context, the literature study found that there are indications that there are somewhat universal characteristics. The most important product characteristic seems to be high profit margins (Tyebjee & Bruno, 1984). Profit margins are followed in importance by the product representing a unique value proposition. The last characteristic is that the product is either difficult to copy or in some way protectable through intellectual property rights (MacMillan et al, 1985). Additional characteristics that emerged during the literature study were a proof of concept, that the product enjoys demonstrated market acceptance. Furthermore, investors like to see demonstrated ways to access the target market, i.e. efficient distribution channels.

The empirical data collection showed that even though investors argue for the importance of margins, the most recurring theme is that of understanding market trends. Interviewee A (2016) explained that the product must present a unique, lasting value proposition that corresponds to macro trends in the relevant market. It is however likely that this criterion is not a newly emerged one, but rather a result of more in-depth investigation than previous studies. Interviewee E (2016) however argues that shorter product life cycles, global competition and the increased frequency of disruptive innovation increase the need to understand market trends, and to have a product that can be quickly adapted to new situations. However, Interviewee E continues to explain that a product with great initial product-market fit is an indication of a team that have a proper understanding of the market and customers.

Interviewees C, D, E, and F, all argue for the value of a product that is possible to use in multiple verticals. In addition, interviewees C and D categorize the scalability of a product as an essential factor to evaluate. Furthermore, Interviewee D also suggests that the possibility to upsell a customer is important as well. Interviewee D explains that his firm performs analyses of net promoter scores in order to assess product impact and possible diffusion.

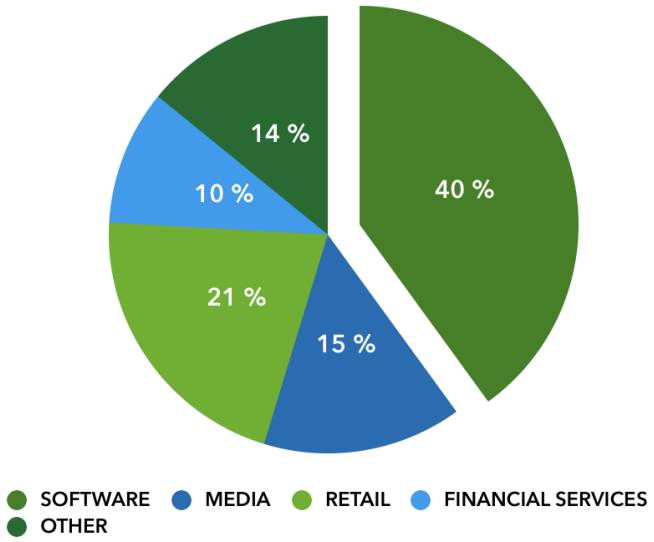

Figure K. The Distribution of Unicorn Ventures by Industry. Data gathered from Fortune Unicorn List (2016).

When looking at the distribution of Unicorn ventures by industry (See Figure K) it becomes evident that a significant portion, 40%, of Unicorns are categorized as software firms according to the Fortune Unicorn List (Fortune, 2016). When further analyzing businesses in the media, retail and financial services it becomes evident that these businesses are almost exclusively actors with software-driven value propositions or web-based distribution channels. Worth noting is that the software, social media and financial services are industries characterized by above-average profit margins, as shown in Figure L below.

INDUSTRY	AVERAGE GROSS PROFIT MARGIN
FINANCIAL SERVICES	40 %
ONLINE RETAIL	32 %
SOFTWARE & PROGRAMMING	70 %
INTERNET SERVICES & SOCIAL MEDIA	76 %
COMPUTER PROCESSING & CLOUD SERVICES	56 %
AVERAGE OVER 13 SURVEYED INDUSTRIES	43 %

Figure L. Average Net Profit Margins by Industry. Data Gathered from CIS Industry (2016).

In addition to high profit margins, software-based value propositions can have several advantages over physical goods. Overall, the marginal cost is usually very low. Furthermore, distribution is often easily performed via existing sales channels such as operating system app platforms such as *Google Play* and the *Apple App Store*.

Software is furthermore relatively to test in a target demographic compared to physical products, which allows investors to test a product and understand the use case, as described by Interviewees C and D.

In addition, software products are easier to update and control when sold to the customer. This is strongly connected to the points made by Interviewee E about the necessity of being able to update the product when conditions on the market change. Furthermore, software solutions allow further communication and perhaps upselling, for instance via the so-called freemium business model, which corresponds to the requirements explained by Interviewee D.

5.4. Financial Situation and Valuation

The literature study showed that the valuation of venture-backed startups is a difficult issue to explain clearly. Miloud et al. (2014) even argue that venture capital valuation practices to this day remain a 'guess' and 'alchemy'. Gompers and Lerner (1999) showed that average investment object valuation increases with larger inflows of capital into venture capital funds in a scenario they described with *"too much money chasing too few deals*". In essence, larger fund sizes do not translate into a larger number of funded ventures, but rather higher valuations for the ventures funded.

Miloud et al. (2014) state that valuation serves an important purpose as a signaling tool. It aligns the ambitions of investors and entrepreneurs but also impacts relationships with suppliers, employees, customers and competitors. Two investigations showed that half of the Unicorn startups have a valuation of $1-1.1 billion, which indicates that the billion-dollar valuation has been specifically negotiated by at least one of the parties involved (Kramer et al., 2015; Kramer et al., 2016).

Like all investors, venture capitalist's decision making essentially involves weigh risk and reward against each other in order to reach an investment decision. Kramer et al. (2015) showed that all analyzed Silicon Valley funding rounds at unicorn level valuations in the analyzed period had downside protection ratchets in place which required total company value to drop by 91% in order for early-stage investors to not break

even on their investments. Zider (1998) mentions these downside protection ratchets as a common way for investors to mitigate risk.

Interviewees A, B, C, E, and F all state that the venture capital funds are currently seeing a very large amount of capital inflow, which they see as a consequence of relatively low returns on alternative investments. Interviewee D does not mention in particular that there is an unusual amount of capital available but does however note that his firm is becoming less and less restricted by the absolute amount invested.

Interviewees A, B and C claim that the large amount of available funds is driving up valuations as investors are deploying larger funds in an unchanged amount of investment objects. These statements are in accordance with the findings of Gompers and Lerner (1999). Interviewee B furthermore claims that he is recognizing similar patterns as were present in 1999 and 2000, prior to the burst of the so-called dot-com bubble.

The findings of Gompers and Lerner (1999) and the statements of interviewee Interviewee B continues to explain that during the dot-com bubble, certain venture capitalists used unconventional metrics to rationalize high valuations when venture revenues or profits could not. Interviewees A, B, C and E all state that there has been an increase in motivating high valuations with other than revenue or profit-based metrics such as user base growth. If Interviewee B is correct, it may be the case that there is a correlation between increased capital influx into venture capital funds and the use of alternative motivations for high venture valuations among venture capitalists. Perhaps venture capitalists use alternative valuation methods in order to facilitate the deployment of their entire funds during a given time period. Interviewees B and C, in particular, argue that the above-mentioned metrics are in most cases not translatable into actual revenue.

Interviewee D mentions that his firm is becoming less restrained by limitations on the invested capital amounts and are willing to step outside of their conventional investment ranges for the right potential upside. This is confirmed by Interviewee F who states that there is a fear of missing out on for instance the next Facebook is prevalent among tech investors, making some actors step outside their usual investment boundaries for an opportunity to invest in early stages. Interviewee E states that looking at upsides is more interesting than downsides. Since a large majority of venture backed startups fail, it is more productive to look at what benefits they could possibly produce than looking into every way the venture can fail. He continues to add that most successful venture capital firms, profits are mostly from one or two hugely successful companies, and it is those kinds of successes venture capitalists are constantly trying to achieve.

Interviewee E states that the valuation of a company is not of great importance in early stages, as long as it is not so high that it becomes extraordinarily difficult to raise subsequent funding rounds. Interviewee B holds an opinion in stark contrast to the aforementioned. He argues that agreeing to a high initial valuation without a revenue that could support a classical valuation at the high level, is betting that there is a greater fool that will be willing to purchase the company later on. Interviewee B argues a venture capital investment is already a bet on the market, product/service, and the entrepreneur/team. To further bet on the existence of *the greater fool* is in the interviewee's mind foolish.

5.5. Driving Forces Behind High Valuations

When analyzing the findings of the literature study and the empirical data collection, certain patterns seem to emerge. There seem to be several factors that contribute to the higher valuations experienced by many tech ventures. Large capital inflows, an increased rate of innovation, the use of alternative metrics, and fear of missing out seem to be some of the more significant. This list is in all certainty not exhaustive, but it seems that these forces at least contribute on a noticeable level.

5.5.1. Large Capital Inflows

As shown in Figure A, it is clear that 2015 is the year since the dot-com crash that has seen the highest amount of funds deployed through venture capital investments. This is supported by the views of Interviewees A, B, C, E, and F, who all state that there is an unusually large amount of money raised by venture capital funds. Based on the observations made by Gompers & Lerner (1999) it is, therefore, reasonable to assume that the increase of available capital has had an effect on startup valuation.

As venture capital fund sizes increase, venture capitalists struggle to deploy their capital. Instead of lowering their standards for what objects to invest in, thus increasing the number of investments, they instead show a tendency to increase valuations in the investments made. Prominent venture capitalist Bill Gurley states that every venture capitalist '*must play the game'*; If a single investor refuses to accept higher valuations, the entrepreneur will seek other investors willing to go outside their normal boundaries, and the investor will struggle to deploy her capital in attractive venture opportunities (Griffith, 2015).

Gurley furthermore adds that there is a great fear of missing out on investing in what could come to be the next Facebook, Google or Amazon. Gurley is quoted saying "There is no fear in Silicon Valley right now." Interviewee B questions the motivations of many venture capitalists, stating that "it is easy to gamble with

other people's money", suggesting that investors are taking unnecessary risks due to the limited downsides for themselves.

5.5.2. Disruptive Innovation & Shorter Product Lifecycles

Knowledge is a cumulative good (Foray, 2006). As new technologies and infrastructures for the diffusion, processing, and storage of knowledge are deployed, the rate of innovation can, therefore, increase exponentially. Interviewees B, C and E claim that large established corporations are struggling with keeping pace with the rapid technological development showed by startups. They further claim that incumbents in existing industries are being disrupted by startups at a quicker rate than ever before.

The technology field is seeing an increase in corporate venture capital divisions being established. Between 2010 and 2015 the share of capital investments in ventures being made by corporate venture capitalists rose from approximately 9% to 17% of total venture capital investments. Large technology corporations are looking to invest in startups with disruptive potential so that they are not outcompeted in their segments by external actors. This shift of innovation from large incumbents to disruptive startups is likely affecting the investment landscape when established firms spend more and more in investing in, or acquiring startups.

Furthermore, it is becoming increasingly difficult for venture capitalists to evaluate startups, as the intellectualized economy allows for far more new business models than the industrial economy (Petrusson, 2004; Interviewee A, 2016; Interviewee C, 2016; Interviewee E, 2016).

5.5.3. The Use of Alternative Metrics

Interviewees A, B, C, E, and F all state that it has become common among venture capitalists to use alternative metrics to motivate high valuations of companies that lack substantial revenues. These metrics are in many cases related to user base growth, the number of downloads of a software product, and so forth.

Much like Bill Gurley, Interviewee F (2016) claims that he is seeing tendencies of larger private equity firms putting more money into early-stage ventures, in the hope of being an early investor in what will become the next Facebook. He argues that private equity firms are spending money to build a large user base, which they will figure out how to capitalize on eventually.
Interviewees B and C are highly skeptical of motivating startup valuations with these metrics, claiming that very few companies manage to translate a large user base into actual revenues and profits.

It is perhaps the case that the relatively new use of these metrics is not yet sufficiently tested, resulting in some ventures that score well on, for instance, user base growth rate metrics not being able to translate those metrics into actual revenue. There are exceptions showing that immediate capitalization on a user base is not necessary for long term success, the most obvious examples being Facebook and Google. On the opposite, there are Unicorn ventures such as Snapchat that have large user bases, with small to non-existent revenues to show for it. It is difficult to determine whether or not the use of these metrics will prove to be a valid tool in the future, but there are clear success stories that can be used to argue for the relevance of user base valuations.

Interviewees B and C argue that the use of alternative metrics was common during the dot-com era, and is commonly used by investors to inflate valuations when they are not justifiable using traditional valuation techniques.

5.6. A Comparison of Two Eras

In this section, two companies will be profiled in order to display some similarities and differences between the dot-com and Unicorn eras. There are differences between the eras that are obvious. The dot-com bust saw companies on the publicly traded markets losing a majority of their public market capitalization value. The Unicorn era, on the other hand, is primarily a matter of high valuations for privately held companies. This affects the availability of data, but due to a large degree of media attention and coverage of Unicorns, good estimates of for instance revenues are often available.

However, there are also many similarities such as new technologies being used, growth being prioritized over profitability and in some cases ventures having unproven business models. The rationale from the perspective of the entrepreneur and investors seem similar, at least from a macro perspective.

5.6.1. Webvan

Webvan is likely one of the most well-recognized examples of a company that failed during the dot-com bust. After it was founded in 1995, it became one of the most hyped businesses in the United States. Its business model was to after an online order to deliver groceries and other similar goods to the customer's home. The customers were able to choose a 30-minute time span in which they wanted their delivery.

The company quickly acquired a large amount of funding, securing close to US$400 million from well-known investors such as Sequoia and Goldman Sachs, ending its series B round at a valuation of US$4.3 billion (Crunchbase, 2016). It was at this valuation the company raised US$375 million in its initial public offering in 1999. At the time, Webvan had seen cumulative revenues of US$370,000 and net losses that exceeded $US50 million.

Webvan attempted to use its first-mover advantage to secure a large foothold on the market, even with significant losses and little to no revenue (Maney, 2001). Venture capitalists and entrepreneurs were inspired by the success of companies such as Amazon and Yahoo, who were considered first movers in their respective industries. The logic from Webvan's perspective was to quickly expand to as many local markets as possible, reaching a large customer base and then attempt to create profitability on a broad scale.

In an attempt to increase its foothold on the market, Webvan acquired its main rival Homegrocer for US$1.2 billion in June of 2000 (Sandoval, 2002).

The company, however, struggled to generate significant turnover and in 2000 the company had revenues of $178.5 million, but that was not enough to cover its $525.4 million costs (Maney, 2001). After continuing to struggle with increasing earnings, Webvan's quick burn rate led to its money running out. In 2001 the company filed for bankruptcy, losing virtually all funds invested through venture funding rounds and the initial public offering.

5.6.2. Snapchat

Snapchat is one of the most well-known companies in the Unicorn era. Launched by a Stanford graduate student in September 2011, this messaging app allows users to send temporary images and videos to others in the network.

After an initial seed funding round of US$485,000 in 2012, the company has received approximately US$1550 million in venture capital funding, spread out through nine investment rounds (Crunchbase, 2016). A significant investment took place in May 2016 and the amount of US$200 million had the company's value at US$20 billion (Lunden & Roof, 2016).

After three years of working to maximize user base growth, the company in 2014 actively pursued its first revenue-generating operations, which resulted in annualized earnings of US$3 million with total losses exceeding US$120 million (Riley, 2016). The December 2014 funding rounds put the company's valuation at US$10 billion (Crunchbase, 2016). In 2015 the company stepped up its efforts of monetizing roughly 200 million users, launching new advertisements, reportedly reaching a revenue of US$100 million for the entire year.

Some analysts argue that Snapchat will have difficulties to monetize its audience to the same extent as for instance Facebook or LinkedIn (Edwards, 2013). According to this reasoning, Snapchat does not have the ability to target certain demographics, interests and so forth to the degree that other social media ventures are, something analysts have argued to be a major contributor to their successes.

Only time will tell if Snapchat's will be able to monetize its large audience, but recent years 'performance does not indicate that they have been able to capitalize on their user base to a degree that could defend the company's valuation through traditional means.

6. CONCLUSIONS

The empirical data in this report is gathered from several interviews, where the interviewees were selected to provide a broad overview of the venture capital industry. The varying perspectives were not only geographic, but also in terms of investment size and type. It is clear that the investors most active in the San Francisco area tend to show less skepticism regarding Unicorn valuations. This is perhaps not very surprising, as approximately half of the world's unicorns are based there.

The study does not find big changes in venture capital investment criteria when compared primarily to the studies of Tyebjee and Bruno (1984), MacMillan et al. (1985), and Zider (1998). Instead, the same factors seem important to venture capitalists prior to the dot-com bust as today. Many interviewees claim that venture capital investment decisions are made mostly using "common sense", which likely should not change much over time.

A pattern that emerges is that the interviewees with the longest experience, that were active during the dot-com bust, claim that they are seeing investors making the same mistakes with Unicorns. It appears that venture capital investment criteria are perhaps cyclical rather than evolving, with higher risks being tolerated in times of growing fund sizes. As investors struggle to deploy their capital, some may argue for higher valuations based on non-conventional metrics as a method of reaching their investment targets. The influx of investments to venture capital funds reached its highest point since 2000 in 2015, which corresponds to the rapid increase in the number of unicorn startups.

Several interviewees stated that they are looking for startups with potentially disruptive innovations or business models. Societal and technological developments have in the last 15 years created an increase in the number of startups that have large, disruptive effects, which may have an effect on venture capital investment behaviors. Furthermore, more ventures are using technology to create entirely new markets, which are difficult for venture capitalists to evaluate, thus making evaluation and valuation more difficult.

Furthermore, venture capitalists and entrepreneurs alike seem to be inspired by a wave of successes of companies that deployed a "first mover"-strategy, in which the companies down-prioritized revenue growth in favor of gaining a large market share, user base or strong brand recognition. According to several interviewees and reports in finance media many investors experience a *fear of missing out* on investing in the next of these successes, increasing the likelihood of large investments being made in the earlier stages. As the majority of interviewees are not active in the Silicon Valley venture capital community, where a large portion of unicorns are active, it is possible that they lack insight into the realities of the situation.

However, it may also be the case that the external viewpoint of these interviewees leads to a greater understanding of the overall situation, while Silicon Valley-based investors are in the midst of a situation they are unable to overview.

In conclusion, the findings of this thesis may be summarized with the following points:

- Investors seem to not believe that criteria will change much in the future, as they are supposedly mostly based on 'common sense'.
- Venture capital investment criteria seem to be cyclical rather than evolving, changing based on capital inflow to the funds. Higher fund sizes require larger exits in order to maintain acceptable returns which affects venture capitalist risk tolerance, which becomes higher when the competition to deploy capital is greater.
- An increased rate of disruptive innovation, a result of technological and societal progress, creates more startups that are great fits with venture capitalists' investment criteria.
- Investors have a fear of missing out on early investments in what may be future success stories on a similar scale to for instance Facebook and Amazon. Furthermore, the possibility of Unicorn level exits may have created a psychological anchoring point in the minds of investors.

7. DISCUSSION

The venture capital industry is complex in many ways. In essence, venture capitalists try to predict the future developments of markets, technologies, and individuals. This is obviously a difficult endeavor, and despite all the best efforts of well-informed and highly intelligent entrepreneurs and investors alike, most ventures eventually fail.

It is difficult to use a macro perspective to judge the entire phenomenon of Unicorns, and make claims of the legitimacy of individual ventures. It is however a possibility to see patterns of change, and similarities, on a macro perspective, to better understand how the phenomenon has evolved and what factors have been driving the progress. Previous studies have found that venture capitalists have poor introspection regarding their investment criteria, not accurately stating the relative importance of difference factors. However, interviews with people in the venture capital industry still hold value, as they can provide first-hand insights of industry developments.

Furthermore, it is difficult to accurately portray and analyze each category of investment criteria in full, as each could easily be the subject of many books. It is therefore quite possible that this report has failed to include changes to investment criteria, that are present on the micro scale perspective. The macro

perspective is however valid for the purpose of the report, as it allows an overview of the industry in the context of a developing economy, with a steady stream of new technological innovations. The relative novelty of the Unicorn phenomenon is a restricting factor as well, as the faiths of most ventures is still very much uncertain. It is therefore important to abstain from drawing too grand conclusions based on similarities or differences when compared to the dot-com era.

It is clear that the evolution of the global economy is creating new opportunities for value creation, and the question is whether the age of unicorns are the first signs of a new where startups dominate innovation like never before, or simply a bubble waiting to burst.

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8.2. List of Interviews

- Interviewee A (2016-05-04). Associate at the Stockholm office of one of Europe's largest private equity firms. Interviewed by Adam Nohlborg.

- Interviewee B (2016-05-12). Recently retired senior investment manager at the venture capital branch of one of Northern Europe's largest financial institutions. Interviewed by Adam Nohlborg.

- Interviewee C (2016-05-05). Investment manager at the venture capital branch of one of Northern Europe's largest financial institutions. Interviewed by Adam Nohlborg.

- Interviewee D (2016-05-06). Associate at the Palo Alto office of one of the world's most well-known venture capital firms. Previous intern at another well-known major venture capital investor. Interviewed by Adam Nohlborg.

- Interviewee E (2016-05-11). Senior Investment Manager & Head of Americas at a Fortune 500 company's corporate venture capital division. Interviewed by Adam Nohlborg.

- Interviewee F (2016-05-16). Investment Manager at a Swedish private equity firm's Gothenburg office. Interviewed by Adam Nohlborg.

9. APPENDIX

9.1. Interview Questions

- Please describe your position at company X and background in the venture capital industry.
- What would you say are the most important factors that contribute to your decision whether or not to invest in a venture?
- What would you say are the most important factors to consider in an investment process regarding the team or entrepreneur running the venture?
- What would you say are the most important factors to consider in an investment process when regarding the market in which the venture operates?
- What would you say are the most important factors to consider in an investment process regarding the venture's product or service offering?
- What would you say are the most important factors to consider in an investment process regarding the financial situation and requirements of the venture investment proposal?
- Have you experienced that the metrics and factors analyzed have changed at all during your career?
- If you take into consideration the rapid growth of new tech-driven business ventures and the high valuation many of them have experienced in recent years. Do you believe the above discussed metrics and factors will change over the next five years?
- How do you analyze the importance and value of intellectual assets in your investment processes?
- What are your personal opinions and thoughts on the subject of the valuation of Unicorn startups?