Impacting Information Asymmetry within the Swedish Equity Crowdfunding Market
— An aggregated approach on how equity crowdfunding platforms work to govern, control and reduce information asymmetry

Master's Thesis 30 credits
Department of Business Studies
Uppsala University
Spring Semester of 2018
Date of Submission: 2018-05-29

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Abstract
The equity crowdfunding market has since the financial crisis in 2008 become an important source of alternative financing in Sweden. The equity crowdfunding platforms constitute the market and are responsible for governing the investment relationships. However, the market is not regulated, and in the spring of 2018 the Swedish government proposed regulatory changes for the platforms to impact the problem of information asymmetry. There are different approaches on how to impact the problem, and therefore the thesis sets out to understand how the equity crowdfunding platforms within the Swedish market work to impact information asymmetry.

Empirical data has been collected from five different Swedish equity crowdfunding platforms. Semi-structured interviews were conducted with individuals whose work is connected to governing and impacting information asymmetry. The analysis of the empirical findings identifies five main reasons for the arise of information asymmetry and the platforms work to control and reduce information asymmetry by mitigation strategies, investor communication and effective signaling. The findings indicate that there is a trade-off between controlling information asymmetry and making the financing method accessible within the market. This study contributes to the understanding of how equity crowdfunding platforms work to impact information asymmetry within the Swedish market.

Key words: Alternative financing, Equity crowdfunding, Information asymmetry, Agency theory, Signaling theory, Mitigation strategies, Investor communication, Effective signaling
Acknowledgements

We would like to dedicate a big thank you to all the respondents and companies that devoted their time to contribute to this thesis. We would especially like to thank our supervisor, Emilia Kvarnström, and fellow thesis students for the support and guidance during the development of this thesis.

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Uppsala 28 May 2018
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1. Introduction

Following the financial crisis in 2008 and subsequent unstable economy, banks and institutional actors worldwide have been reluctant to grant companies and entrepreneurs enough capital to support their funding needs (Statens Offentliga Utredningar, 2018). The lack of funding by institutional and traditional financing actors has created difficulties for companies seeking funding to attract external capital and vindicate their future earnings (Belleflamme et al., 2014; Ley and Weaven, 2011). Alternative financing methods have thereby arrived to support entrepreneurial ventures and more established companies to seek external capital and support their development and to preserve projects (Courtney, Dutta & Li, 2016). Furthermore, alternative financing methods have enabled ventures to support political campaigns and further legal battles to gather capital (Gaskell, 2016).

Crowdfunding has become a popular alternative financing method for companies who have failed to receive funding from institutional and traditional financing actors (Mollick, 2014). The crowdfunding market has displayed a rapid and growing volume of capital collected worldwide (Belleflamme et al., 2014). The financing method involves using the crowd of investors to receive ideas and capital to develop corporate actions and thereby vindicating future earnings (Stigenberger, 2016; Lecan & Desmet, 2017; Ingram & Teigland, 2013; Ahlers et al., 2015; Belleflamme et al., 2014; Mollick, 2014). The maturing development of the crowdfunding industry has led to the development of different types of crowdfunding methods and models (Stigenberger, 2016; Ahlers et al., 2015). Non-financial crowdfunding methods have historically been used by social ventures and are grounded in reward- and donation-based motives where the crowd of investors do not receive monetary returns. Financial crowdfunding methods and especially equity crowdfunding is based on financial motives and monetary return. This means that the companies seeking funding raises capital by attracting the crowd of investors and selling a fixed limit of equity or bond-like shares. (Stigenberger, 2016)

Equity crowdfunding platforms constitute the core of the market and work as intermediaries to govern companies seeking funding and the crowd of investors to establish investment relationships (Belleflamme et al., 2014; Belleflammet, 2015). By making use of equity crowdfunding platforms, companies seeking funding can make an open call for selling equity shares and thereby gain financial resources (Tomczak & Brem, 2013). The crowd of investors can make use of the platforms to invest in companies in the exchange of several shares and
thereby intend to make a financial profit (Ahlers et al., 2015). However, within the equity crowdfunding platforms there are informational challenges and information asymmetry (Ahlers et al., 2015; Mollick 2014; Belleflamme et al., 2014). This problem is identified to be present when companies seeking funding possess more knowledge about the underlying quality compared to the crowd of investors (Ahlers et al., 2015; Gerber et al., 2012 & Mollick, 2014). This is further a problem within the equity crowdfunding market and there are different approaches on how the platforms can work to impact, govern, control and reduce information asymmetry (Belleflamme et al., 2015).

1.1 Problem statement and research gap

The problem of information asymmetry is a contemporary practical problem within the Swedish equity crowdfunding market. In 2015 the Swedish governmental agency responsible for financial regulation, Finansinspektionen, released a public report on the Swedish crowdfunding market. The report described that the Swedish crowdfunding platforms govern the Swedish equity crowdfunding market by mediating the investment relationships. Further the report explains that information asymmetry is a prominent problem within the market which can negatively impact the crowd of investors. This means that the crowd of investors can experience difficulties to make well-informed investment decisions and thereby take on a higher level of risk than intended. The report describes that transparency and communicating information about the companies seeking funding is important to impact the problem of information asymmetry. Given that the equity crowdfunding platforms constitute and govern the market the report reflects on whether there is a need to regulate informational requirements for the platforms. This means an increased level of responsibility for the platforms connected to the information they provide between the companies seeking funding and the crowd of investors. (Finansinspektionen, 2015)

Three years later in the spring of 2018 the Swedish government released an investigation on alternative financing methods. The investigation included an examination of the still unregulated Swedish equity crowdfunding market and proposed regulatory changes to impact the problem of information asymmetry. The proposed regulatory changes were perceived to be important to promote the financing method both for companies seeking funding and the crowd of investors. The investigation further described;
“Regarding equity- and lending-based crowdfunding, which is the focus of the Inquiry’s remit, both the asymmetry information risks and liquidity risks are, however, often higher than in other regulated forms of saving or investments targeting consumers and other non-professional investors. (...) There is a need to strengthen investor protection by ensuring that the companies mediating contacts and otherwise assisting in financial mediation to private limited companies via crowdfunding are subject to authorization requirements and supervision, and requirements tailored to this type of activity, such as the duty to provide information”

- Statens Offentliga Utredningar (2018)

Consistent with the Swedish equity crowdfunding market, information asymmetry is a problem within the equity crowdfunding platforms (Ahlers et al., 2015; Mollick 2014; Belleflamme et al., 2015). This means that information asymmetry can translate to inefficient exchanges between the companies seeking funding and the crowd of investors on the platform (Courtney et al., 2017; Belleflamme et al., 2015). The problem is particularly relevant in the equity crowdfunding market as the companies seeking funding often are in the early stages of development and are connected to a higher level of risk and uncertainty (Belleflamme, Lambert & Schwienbacher, 2014). Information asymmetry can limit the credibility of the companies seeking funding (Agrawal et al., 2013). It can further produce challenges for the crowd of investors to evaluate the associated potential and risk of the company seeking funding (Agrawal et al., 2013). Furthermore, this can translate to opportunistic and irrational investor behaviors (Cohen & Dean, 2005). Contemporary research highlights that information asymmetry is a problem within the equity crowdfunding market, however more research is needed to understand the different reasons for the arise of information asymmetry. This is important to grasp and thereby capture how equity crowdfunding platforms work to impact the problem.

As found in contemporary research within the field of venture finance, agency theory describes that information asymmetry arises when one party abuses their informational advantage with the intention to receive funding (Osnabrugge, 2000 & Dehlén et al., 2014). Translating agency theory to equity crowdfunding, the platforms can be interpreted as a third party, the companies seeking funding as agents and the crowd of investors as principals. Platforms can as a third party make use of mitigation strategies such as informational requirements to work to impact, govern and control information asymmetry between the companies seeking funding and the crowd of investors. (Ley and Weaven, 2011) However, contemporary research on mitigation
strategies within equity crowdfunding is underdeveloped. There is a gap in research on how equity crowdfunding platforms work with mitigation strategies to control information asymmetry, especially within the Swedish market.

Moreover, signaling theory explains that information asymmetry arises when the crowd of investors do not take part of information and signals presented by the companies seeking funding (Courtney et al., 2016). Signals between the signaler and the receiver have been shown to reduce information asymmetry in venture finance (Spencer, 1973). Furthermore, different signals between the companies seeking funding and the crowd of investors can help reduce information asymmetry in the equity crowdfunding market (Ahlers et al., 2015; Courtney et al., 2017). Companies need to signal their quality to create credibility and legitimacy by targeting the crowd of investors (Block et al., 2017). Signaling is especially important in the equity crowdfunding market as investors often have limited research and knowledge to evaluate a company seeking funding (Ahlers et al., 2015). Equity crowdfunding platforms are described as intermediates for investor communication (Lecan & Desmet, 2017). The platforms can as a third party govern and reduce information asymmetry between companies seeking and the crowd of investors by impacting the exchanges of signals (Löher, 2017; Belleflamme et al., 2015). More research is needed to explain how the Swedish equity crowdfunding platforms work to impact and reduce information asymmetry by investor communication and signaling.

1.2 Purpose and research question

Contemporary research explains that equity crowdfunding platforms constitute the core of the equity crowdfunding market and are responsible for governing investment relationships (Belleflamme et al., 2014; Belleflamme, 2015). Within the equity crowdfunding platforms there are informational challenges and information asymmetry (Ahlers et al., 2015; Mollick 2014; Belleflamme et al., 2014). Research on agency theory suggests that mitigation strategies can be used to impact, govern and control information asymmetry in crowdfunding (Ley and Weaven, 2011). Furthermore, research on signaling theory suggests that impacting exchanges of signals can be used to govern and reduce information asymmetry in equity crowdfunding (Löher, 2017; Belleflamme et al., 2015; Courtney et al., 2016; Ahlers et al., 2015). Thereby, contemporary research suggests different approaches on how to impact the problem of information asymmetry. However, the approaches have not been researched within the Swedish equity crowdfunding market, and they do not capture a holistic picture on how equity crowdfunding
platforms work to impact information asymmetry. The described gap in literature was recently brought to attention by Moritz et al. (2017) who described that more research is needed to understand how equity crowdfunding platforms impact investor communication to impact information asymmetry.

Given the lack of research, the purpose of the thesis is to explore on an aggregated market level how equity crowdfunding platforms work to impact information asymmetry within the Swedish market. The authors deemed it important to pursue an aggregated market level perspective to capture a holistic picture of how information asymmetry can be impacted. This decision was interpreted to enable the thesis to contribute to the still evolving field of research. This approach was especially interesting given the contemporary practical problems of information asymmetry and proposed regulatory changes within the Swedish equity crowdfunding market. Furthermore, the thesis is limited to the Swedish equity crowdfunding market and its surrounding environment. This is an important distinction given that regulations and market conditions vary depending on the country. Moreover, equity crowdfunding is especially connected to regulations and market conditions because of the exchanges of shares and capital. (Moritz et al., 2015) Below the research question of the thesis is presented:

Q: How do equity crowdfunding platforms work to impact information asymmetry within the Swedish market?
2. Literature review and theoretical framework

In this chapter the alternative financing method crowdfunding, the crowdfunding method equity crowdfunding and equity crowdfunding platforms will be presented to provide the theoretical background of the thesis. The theory of information asymmetry will thereafter be presented to describe the underlying problem within the crowdfunding market. Following, agency theory and signaling theory will be described to present different approaches on how to impact information asymmetry. In the end of this chapter a theoretical framework will be described to illustrate how the different theories and concepts are connected.

2.1 Crowdfunding and Equity Crowdfunding

The alternative financing method crowdfunding has emerged from micro-financing together with the wider concept of crowdsourcing. The method involves using a broader crowd to receive ideas and capital to develop corporate actions and thereby vindicate future earnings. (Belleflamme et al., 2014; Mollick, 2014) Crowdfunding has especially become a tool for companies seeking funding that are in the startup phase and have failed to receive funding from institutional and traditional financing actors (Mollick, 2014). Crowdfunding involves an open call to the crowd of investors to create an opportunity for companies to receive financial resources in exchange for future products, services or equity shares (Kleemann, Voß & Rieder, 2008; Belleflamme et al., 2014).

Crowdfunding can be divided into two main types, non-financial and financial crowdfunding. Non-financial crowdfunding consists of donation- and reward-based methods where the crowd of investors give financial aid to the company seeking funding in donation purposes or to receive rewards in the form of products or services (Stigenberger, 2016). Financial crowdfunding consists of debt- and equity crowdfunding in where the crowd of investors give financial aid to the company seeking funding with the goal to make a financial profit. Debt crowdfunding is structured for the investor to submit a loan and expect, with an interest rate, that the investment will result in a profit. Equity crowdfunding means that the crowd of investors invest in the company seeking funding in exchange for several shares and thereby the investors intend to make a financial profit. (Ahlers et al., 2015)

Equity crowdfunding has become the most popular method of crowdfunding. By making use of equity crowdfunding platforms, the companies seeking funding can make an open call for funding. Thereby the company can attract the crowd of investors and sell a fixed limit of equity
or bond-like shares. (Tomczak, 2013) The funding target is typically specified by the company seeking funding together with the online platform. To receive the pledged transactions, the company is dependent on reaching the target. This mechanism protects the crowd of investors and encourages companies seeking funding to set realistic targets (Tomczak, 2013; Belleflamme et al., 2015). The sales of securities and shares however have translated to regulatory issues for the financing method and as a consequence legislative restriction within many markets. This means that equity crowdfunding is substantially affected by home country legislation. (Ahlers et al., 2015; Bradford, 2012)

2.2 Equity crowdfunding platforms
Equity crowdfunding platforms constitute the core of the market and work as intermediaries to govern companies seeking funding and the crowd of investors to establish investment relationships (Belleflamme et al., 2014; Belleflamme, 2015). The platforms work to govern the investment relationships by focusing on key functionalities and services (Hagiu & Rothman, 2016; Lacan & Desmet, 2017). This means that the platforms can provide functionalities such as preselection, financial transactions and legal frameworks (Ahlers et. al., 2015). Moreover, the platforms can provide advice for marketing and investor communication (Lacan and Desmet, 2017).

Equity crowdfunding platforms enable companies seeking funding and the crowd of investors to establish investment relationships. Thereby the platforms act as a two-sided market by connecting two populations (Lacan & Desmet, 2017). Two-sided market theory explains that the platform can work to establish cross-group external effects by establishing mutually beneficial investment relationships (Hagiu & Rothman, 2016). The equity crowdfunding platforms can work to establish this by providing companies seeking funding access to many potentially interested investors. Furthermore, the platforms can grant the crowd of investors access to different investment opportunities allowing for a fit of preference. (Belleflamme et. al., 2015)

Within the equity crowdfunding platform there are informational challenges and information asymmetry (Ahlers et al., 2015; Mollick, 2014; Belleflamme et al., 2014). This is a problem within equity crowdfunding markets and can thereby impact the establishment of investment relationships on the platforms (Belleflammet et al., 2015). This makes it important to impact information asymmetry, and there are different approaches on how the platforms can work to
impact, govern, control and reduce information asymmetry (Ahlers et al., 2015; Mollick, 2014; Ley & Weaven, 2011; Belleflamme et al., 2015).

2.3 Information asymmetry
Information asymmetry is often described as the phenomenon when one party has more or better information than the other (Guldiken et al., 2014). Moreover, in equity crowdfunding it refers to the company seeking funding knowing more about the underlying quality than the crowd of investors (Courtney et al., 2017; Ahlers et al., 2015; Mollick, 2014). Information asymmetry is more common in environments where the level of uncertainty is relatively high, such as in the realm of equity crowdfunding in where underdeveloped products and services are prevalent (Belleflamme et al., 2014). Companies that are in the early stages of development often experience the liability of newness, a high level of uncertainty and risk which can increase information asymmetry (Cumming, 2007).

Information asymmetry is a problem within equity crowdfunding and can translate into inefficient exchanges between the companies seeking funding and the crowd of investors on the platforms (Courtney et al., 2017; Belleflamme et al., 2015). Inefficient informational exchanges can create straits for the crowd of investors to evaluate the companies seeking funding and can lead to opportunistic and irrational behavior in investment situation (Cohen & Dean, 2005). This can create a disadvantage for companies seeking funding and limit the credibility of being able to deliver and produce services or products (Courtney et al., 2017; Ahlers et al., 2015; Mollick, 2014).

Based on contemporary research, information asymmetry is interpreted to arise because of three main reasons. Information asymmetry arises because of the associated high level of uncertainty and risk (Cumming, 2007). Further it arises when companies make use of their informational advantage to receive funding (Osnabrugge, 2000; Dehlhen, 2014). Furthermore, it arises when the crowd of investors do not take part of information and signals presented by the companies seeking funding (Courtney et al., 2016). The different reasons for the arise of information asymmetry is interpreted to be linked to the approaches on how impact the problem. The following two sections present contemporary research on agency theory and signaling theory to increase the theoretical understanding on how to impact, govern, control and reduce information asymmetry.
2.4 Agency theory

Within the field of venture finance, agency theory explains investment relationships which can be characterized as contracts in where an agent, the company seeking funding, performs a service on the behalf of a principal, the venture capitalist (Jensen & Meckling, 1976; Osnabrugge, 2000). Agency theory describes that information asymmetry is present when the company seeking funding has more information about planned activities, true intentions and the quality of goods than the venture capitalist (Osnabrugge, 2000; Dehlén et al., 2014). The information asymmetry can lead to agency problems such as moral hazard and adverse selection (Osnabrugge, 2000). The prior relates to the company seeking funding not following through on the original investment agreement (Fama & Jensen, 1983), while the second agency problem is connected to the agent misrepresenting the abilities as a result out of the informational advantage (Osnabrugge, 2000). Thereby information asymmetry arises when the company seeking funding abuses the informational advantage with the intention to receive funding (Osnabrugge, 2000). The company seeking funding wants to be perceived with a high value; however the venture capitalist wants to know the true company value prior investing (Cohen & Dean, 2005). The underlying assumption for the described investment relationships is that there is a separation of ownership and control between the two parties. Further this can lead to misaligned goals and interests between the agent and principals given the assumption that they are utility maximizers (Jensen & Meckling, 1976).

Mitigation strategies can be used by venture capitalists to control agency problems and information asymmetry (Jensen & Meckling, 1973; Fried et al., 1994; Sohl, 1999; Osnabrugge, 2000). Furthermore, established mitigation strategies include deal flow, initial screening and due diligence (Osnabrugge, 2000). Research on mitigation strategies in equity crowdfunding is limited; however a conceptual model has been developed for the Australian crowdfunding market. The conceptual model consists of pre-investment factors and post-investment factors, both of which are connected to appropriate adoption of crowdfunding. The thesis interprets that the equity crowdfunding platforms can be viewed as a third party, the companies seeking funding as agents and the crowd of investors as principals. Furthermore, the thesis interprets that the five pre-investment strategies in the conceptual model are connected to controlling information asymmetry and include; Crowd Composition, Due Diligence, Deal screening, Deal referrals and Information Sensitivity. (Ley and Weaven, 2011) The thesis interprets that equity crowdfunding platforms can as a third party make use of mitigation strategies to govern and control information asymmetry. Thereby the original conceptual model has
been adapted to fit the relevance of the controlling information asymmetry. The illustrative model is presented below in Figure 1.

![Illustration of equity crowdfunding mitigation strategies](image)

**Figure 1 – Illustration of equity crowdfunding mitigation strategies** (Olsson & Wahlberg, 2018)

### 2.4.1 Crowd Composition

The equity crowdfunding platform can work to control the crowd composition to impact information asymmetry. This means that the platform can work to control that the crowd of investors have a suitable level of understanding and experience of investing in crowdfunding. Further this is important to impact and control informational advantages by the companies seeking funding and adverse selection. (Ley & Weaven, 2011)

### 2.4.2 Due Diligence

The equity crowdfunding platform can work to control the opportunities of the crowd of investors to execute due diligence pre-investment to thereby impact information asymmetry. Investor due diligence is connected to evaluating a company seeking funding to make informed investment decisions. This means that the platform can work to control the disclosing of information to make information accessible for the crowd of investors. Investor due diligence is especially important because companies seeking funding in equity crowdfunding often are in early stages of development which can impact the level of risk and quality of disclosed information. (Ley & Weaven, 2011)

### 2.4.3 Deal Screening

The equity crowdfunding platforms can work to control companies seeking funding by deal screening to impact information asymmetry. This means that platforms can work to evaluate the companies seeking funding pre-investment. Deal screening can impact agency problems
and information asymmetry by mitigating hidden informational problems to make sure that unsuitable companies are rejected access to seek funding. (Ley and Weaven, 2011)

2.4.4 External deal referrals
The equity crowdfunding platform can work to control the level of quality of the companies seeking funding by external deal referrals to impact information asymmetry. This means that the platform can work to control that the companies seeking funding have a high level of quality to mitigate agency problems. This requires that the platform is qualified to conduct external deal referrals. (Ley & Weaven, 2011)

2.4.5 Information sensitivity
The equity crowdfunding platform can work to control the information sensitivity for companies seeking funding to impact information asymmetry. This means that the platform work to control the level of informational requirements for companies seeking funding to increase the level of transparency. This can mitigate the company’s informational advantage and thereby control information asymmetry. (Ley & Weaven, 2011)

2.5 Signaling theory
Signaling theory and effective signaling can support mitigation strategies to impact, govern and reduce information asymmetry (Spence, 1973; Ahlers et al., 2015; Courtney et al., 2017). Signaling theory has been used in literature to understand signals exchanged between different types of investors and companies seeking funding. Further the theory has mainly studied the exchanges of signals from the perspective of angel investors and venture capitalists. (Spence, 1973; Jääskeläinen, Maula & Seppä, 2006; Bruton & Ahlstrom, 2003; Connelly, Certo, Ireland & Reutzel, 2011; Guldiken et al., 2016) Signaling theory argues that different types of signals between the signaler and the receiver can be used to reduce information asymmetry (Spence, 1973). In equity crowdfunding the company seeking funding constitutes the signaler and the investor constitutes the receiver (Ahlers, et al., 2015). Signaling theory is often defined from the perspective that the signaler has the control to manage and direct signals towards the receiver (Spence, 1973). More recent studies have shown that signals do not necessarily need to come from the signaler; but that third parties and external actors can also influence the signaling to the receiver (Daniel & Titman, 2016 & Ahlers et al., 2015). Moreover, equity crowdfunding platforms can constitute third parties and provide necessary infrastructure and
services for investor communication (Belleflamme et al., 2015). Thereby the platforms can impact the exchanges of signals which mean that they can govern and reduce information asymmetry between the companies seeking funding and the crowd of investors (Löher, 2017).

Signaling theory explains that information asymmetry arises when the crowd of investors do not take part of information and signals presented by the companies seeking funding (Courtney et al., 2016). The equity crowdfunding platforms can govern and reduce information asymmetry by impacting the exchanges of signals (Löher, 2017; Belleflammet et al., 2015). Impacting the exchanges of information is important as companies seeking funding often are in the early stages of development which means that they need to signal their quality to create credibility and legitimacy by targeting the crowd of investors (Block et al., 2017). Furthermore, signaling quality can be a challenge as information often is unambiguous and there is a lack of performance measures which can impact the level of uncertainty of the company seeking funding.

In signaling theory, effective signals are defined to have two underlying characteristics in common and these are signal cost and observability. The signal cost should be structured so that the signal should outweigh the benefits over the cost and dishonorable signals should thereby not be rewarded. The observability is connected to how the investor interprets and understands specific signals. (Ahlers et al., 2015; Connelly et al., 2011) To understand how effective signals are connected funding success and reducing information asymmetry, a framework of independent signals has been established in equity crowdfunding. The framework consists of the following effective signals: Venture Success, Human Capital, Social Capital, Intellectual Capital, Level of Uncertainty, Equity Share and Financial Projections. (Ahlers et al., 2015) The thesis interprets that the equity crowdfunding platforms can as a third party govern and reduce information asymmetry by impacting the exchanges of effective signals. Thereby the original framework has been adapted to fit the relevance of governing and reducing information asymmetry. The illustrative model is presented below in Figure 2.
2.5.1 Human capital
Signaling human capital is interpreted as an effective signal to reduce information asymmetry (Ahlers et al., 2015; Unger, Rauch, Frese & Rosenbusch, 2011; Doms, Lewis & Robb, 2010). Communicating human capital by signaling higher skills- and capabilities can demonstrate that the company has the resources to attract additional resources, to define a strategy and be profitable. (Shane & Venkataraman, 2000 & Ahlers et al., 2015) Signaling human capital by earlier management experience and skill (Zacharakis & Meyer, 2000) together with higher educational degrees (Levie & Gimmon, 2008) are most likely to establish effective signaling. It is also important for the crowd of investors to receive and observe the signal when they evaluate companies seeking funding to reduce information asymmetry (Robb & Robinson, 2014 & Ahlers et al., 2015).

2.5.2 Social capital and business linkages
Signaling social capital and business linkages can increase the company’s opportunity to access additional resources, and thereby is interpreted to be effective signals. Further the signal has been demonstrated to increase the legitimacy and reputation of the company seeking funding and thereby impact information asymmetry. (Ahlers et al., 2015; Baum & Silverman, 2004) Moreover, this signal can demonstrate quality which is particularly important in equity crowdfunding when the companies seeking funding are in the early stages of development. (Ahlers et al., 2015; Brüderl & Preisendörfer, 1998)
2.5.3 Intellectual capital and securing mechanisms
Signaling intellectual capital and other securing mechanisms, such as pending applications for patents, has been shown to increase the opportunity for companies seeking funding to attract investors and capital. The high uncertainty in early development stages makes it crucial to protect and secure their ideas through e.g. patents or brand protection. The signal can demonstrate the quality and strength of the company seeking funding and thereby be interpreted as an effective signal to reduce information asymmetry (Ahlers et al., 2015; Baum & Silverman, 2004). Moreover, signaling patents and other securing mechanisms can enable the crowd of investors to receive information about the product or service that otherwise could be hard to retrieve and observe. (Cohen & Lemley, 2001; Ahlers et al., 2015)

2.5.4 Company uncertainty
Signaling company uncertainty is interpreted to be an effective signal to reduce information asymmetry. The signal can enable the crowd of investors to evaluate the future prospect of the company to thereby support their investment decisions and increase the possibility for profitable investments. Reversely, when the investors do not have the information to identify, and assess the future prospect, the will to invest decreases. This can negatively impact the company seeking funding which makes it important to make this information available. (Ahlers et al., 2015)

2.5.5 Founder and management investments
Signaling founder and management investments in the company seeking funding is interpreted as an effective signal to reduce information asymmetry. The high level of uncertainty and information asymmetry within equity crowdfunding results in ambiguous information for the crowd of investors and can impact investment decision (Leland & Pyle, 1977; Ahlers et al., 2015) Signaling investments made by the founder or management can demonstrate quality and thereby impact the perceived company uncertainty. (Ahlers et al., 2015)

2.5.6 Financial risks and projections
Signaling financial risks and projections are interpreted to be effective signals to reduce information asymmetry. By communicating financial projections and forecasts, the company seeking can demonstrate the connected level of uncertainty. Furthermore, the financial projections and financial information provides a more transparent and precise picture of the connected opportunities and risks. This helps the crowd of investors to evaluate the company seeking funding and thereby form their expectations. (Epstein & Schneider, 2008; Ahlers et al., 2015)
2.6 Theoretical framework
The thesis explores how equity crowdfunding platforms work to impact information asymmetry within the Swedish market. Based on contemporary research within equity crowdfunding there are five identified factors that are interpreted to be linked to the purpose, and thereby constitute the theoretical framework. These five factors include: Equity crowdfunding, Equity crowdfunding platforms, Information asymmetry, Mitigation strategies and Effective signaling. Equity crowdfunding together with equity crowdfunding platforms is identified and interpreted to explain the setting of the equity crowdfunding market. Information asymmetry is identified and interpreted to explain how information asymmetry arises in equity crowdfunding. Mitigation strategies and effective signaling are identified and interpreted to impact, govern, control and reduce the arise of information asymmetry on the equity crowdfunding platforms.

Agency theory contains mitigation strategies that are interpreted to govern and control the arise of information asymmetry. These mitigation strategies include: Crowd composition, Due diligence, Deal screening, External deal referral, and Information deal sensitivity. Signaling theory contains signals that are interpreted to govern and reduce information asymmetry. These signals include: Human capital, Social capital and business linkages, Intellectual capital and securing mechanisms, Company uncertainty, Founder and management investment, and Financial risks and projections. The theoretical framework is presented in the figure below, Figure 3 – Illustration of theoretical framework, which illustrates how the different factors are connected.
Figure 3 – Illustration of theoretical framework (Olsson & Wahlberg, 2018)
3. Method

In this chapter the methodological approach, design and process will be presented to increase the transparency and credibility of the conduction and execution of the thesis. This chapter covers the choice of method, research design, operationalization, data collection and method credibility together with methodological ethics and reflections.

3.1 Research approach

The thesis aims to understand on an aggregated market level how equity crowdfunding platforms work to impact information asymmetry within the Swedish equity crowdfunding market. Given the direction of the research to understand a phenomenon, the research is exploratory in its outset (Strauss & Corbin, 1996). The thesis is influenced by abductive reasoning to provide the opportunity to understand the complex link between theory and practice. This reasoning is alternative to the limitations of deductive and inductive approaches. The approach enables a pragmatist perspective which aims to define, explain and understand the puzzles or surprises. (Bryman & Bell, 2015) The thesis identified a puzzle where information asymmetry is a problem within the Swedish equity crowdfunding market. The chosen approach together with the research design gave the thesis the guide to use a back-and-forth engagement with literature and empirical results to be able to understand and explain on an aggregated market level how Swedish equity crowdfunding platform work to impact information asymmetry within the market.

3.2 Research design

The purpose and the abductive approach has led to that the thesis is conducted by using a qualitative method. Qualitative methods relate to a research strategy that is based on words instead of numbers which often give a deeper understanding of social environments. This method allows the thesis to answer the “how and “why” questions. Furthermore, the research design pursues an epistemological orientation of interpretivism which aims to understand the social environment through the interpretations by the selected participants. (Bryman & Bell, 2015) This method and design has been chosen to enable a deeper understanding of how the equity crowdfunding platforms work to impact information asymmetry within the Swedish equity crowdfunding market. Moreover, the thesis follows an ontological orientation of constructionism which means that a phenomenon is not separated from individuals involved in the construction (Bryman & Bell, 2015). This is relevant to the purpose of the thesis considering that academic research on equity crowdfunding and the role of the platforms impact on information asymmetry still is limited (Edmondson & Mce manus, 2007).
3.3 Data collection
Prior collecting empirical data, the thesis formed a literature review and theoretical framework to illustrate how the different theories and concepts were connected. This was an important step to be able to answer the purpose of the thesis. The process of the literature review included using peer-reviewed academic literature which were retrieved and reviewed mainly from Uppsala University Library. Because of the abductive approach the literature was updated continuously in accordance to the collection of empirical data which enabled the thesis to further explore and understand the studied phenomenon. The literature review included literature on crowdfunding, equity crowdfunding, equity crowdfunding platforms, information asymmetry, agency theory and signaling theory.

3.3.1 Operationalization
The theoretical framework enabled for an understanding of how the different theories and concepts presented in the literature review were linked, and also how they were connected to the purpose and research question. Influenced by the theoretical framework, an operationalization was crafted which gave the base for constructing the interview guide. The operationalization illustrates the connection between theories, concept, sources and questions. It was structured to first capture the setting of the Swedish equity crowdfunding market. This was followed by capturing how information asymmetry is perceived to arise within the market. After that the operationalization was structured to capture how the equity crowdfunding platforms work to impact, govern, control and prevent information asymmetry within the Swedish market. The thesis interpret that the operationalization increased the probability to gather and collect relevant primary data connected to the purpose and research question. See Appendix one for the entire operationalization together with interview guide. The structure of the operationalization is described below in Table 1 - Example of operationalization:

<table>
<thead>
<tr>
<th>Theory</th>
<th>Source</th>
<th>Concepts</th>
<th>Question</th>
</tr>
</thead>
<tbody>
<tr>
<td>Crowdfunding</td>
<td>Belleflamme et al., 2014</td>
<td>Alternative financing</td>
<td>What function does equity crowdfunding fill within the market?</td>
</tr>
</tbody>
</table>

Table 1 - Example of operationalization

3.3.2 Primary data
The collection of primary data in the thesis was conducted and performed through interviews with ten individuals from five different equity crowdfunding platforms operating within the Swedish market. The thesis interpreted that the respondents’ perceptions represented the views of the equity crowdfunding platforms. Further the views of the platforms represented the findings
of the aggregated Swedish equity crowdfunding market. This means that the collected, interpreted and presented empirical findings provided insights to the perceptions of the Swedish equity crowdfunding market.

The exploratory direction of the thesis led to using semi-structured interviews to gather primary data. The chosen method enabled the thesis to understand the individual’s perceptions on how the platforms work to impact information asymmetry within the Swedish equity crowdfunding market. The opportunity to capture the individuals’ perceptions would not have been possible by other methods such as quantitative data collection given its focus on capturing statistical generalizations. Further structured interviews would not have enabled the thesis to ask follow-up questions and capture in-depth insights to the same extent. (Bryman & Bell, 2015).

Three out of the ten interviews were conducted through personal meetings and took place in Stockholm at the platforms’ offices. The reason to having face-to-face interviews was to close the interpersonal distance and also enable a more open environment for the respondent to address the questions asked (Saunders, Lewis & Thornhill 2009). The other interviews were conducted over skype because of events outside the process of the thesis. The interviews conducted each had a time span of approximately 1-1,5 hours and were conducted in Swedish. The interviews were conducted in Swedish because it is the native language for both the authors of the thesis and the interviewed individuals. This enabled deeper interviews where the meaning of the respondent’s interpretations did not get misunderstood or lost.

The chosen research approach- and design together with the interview method enabled the interviewers to have flexibility in relation to the interview questions. Therefore, open questions were asked and were succeeded by follow-up questions which resulted in deeper empirical data. The open questions also allowed the interviewed individuals to make their own interpretations of the phenomena the thesis explored. The questions used in the thesis was constructed by operationalizing the theoretical framework and resulted in an interview guide, see Appendix two. An interview guide is often used in semi-structured interviews to cover specific topics (Bryman & Bell (2015). Furthermore, to uncover new concepts, it is important to change the initial protocol as the research progresses (Gioia, Corley & Hamilton, 2012). Therefore, the thesis made sure to make use of the interview guide and add questions as new concepts were discovered. This enabled the thesis to capture a holistic picture of how the equity crowdfunding market work to impact information asymmetry in the Swedish market.
3.3.3 Secondary data
Before the interviews were conducted, secondary data was collected to give a comprehensive understanding of the Swedish equity crowdfunding market setting. The secondary data enabled triangulation of data, which relates to studying a social phenomenon by making use of more than one method or data source (Bryman & Bell, 2015). The secondary data was conducted by an investigation on alternative financing methods from the Swedish government (Statens Offentliga Utredningar, 2018). Furthermore, the secondary data was conducted by a report on the domestic crowdfunding market from Finansinspektionen (Finansinspektionen, 2015).

This increased the level of thesis validity when carrying out and interpreting the collected primary data. This is especially important because the Swedish equity crowdfunding market consists of different equity crowdfunding platforms. These platforms follow different regulations, target different companies seeking funding and provide different services. This makes it challenging for researchers to grasp and interpret the complexity of the aggregated market. The secondary data is included both in the thesis problem statement and below to describe the equity crowdfunding platforms within the Swedish market.

3.4 Selection of platforms and respondents
The purpose of this thesis was to explore on an aggregated market level how crowdfunding platforms impact information asymmetry within the Swedish market. Comparing to more established markets, the Swedish equity crowdfunding market is less developed. Therefore, the collection of data targeted a specific and narrow market and the sample size captured the majority of the equity crowdfunding platforms within the Swedish equity crowdfunding market. The sample size of 10 respondents and 5 platforms was not too small prohibiting data saturation, and not too large prohibiting extraction of insights. To obtain reliable empirical data, the collection of data was aimed towards extracting insights based on the interpretations and perceptions of individuals involved on the equity crowdfunding platforms. The platforms were first contacted by mail or cold calling depending on platforms website contact information. During the contact the purpose of the thesis and the interview was described and was followed by the selection of relevant respondents working on the platforms. Below the selected platforms are presented in Table 2 - List of selected platforms.
<table>
<thead>
<tr>
<th>Platform</th>
<th>Business model</th>
<th>Regulation</th>
<th>Targeted companies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Platform A</td>
<td>Equity Crowdfunding</td>
<td>Regulated by the securities market act and is licensed to enable transactions</td>
<td>Small to medium-sized growth companies</td>
</tr>
<tr>
<td></td>
<td>Performs due diligence and develops presentation material</td>
<td></td>
<td>Private limited company or public limited company</td>
</tr>
<tr>
<td></td>
<td>Provides advice and practical help to companies</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Platform B</td>
<td>Equity- and debt crowdfunding</td>
<td>Registered financial institution according to the law of exchange and other financial activity</td>
<td>Early stage startups</td>
</tr>
<tr>
<td></td>
<td>Takes a passive role in investment transactions</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Platform C</td>
<td>Debt crowdfunding and until recently equity crowdfunding</td>
<td>Registered financial institution according to the law of exchange and other financial activity</td>
<td>Real estate projects</td>
</tr>
<tr>
<td></td>
<td>Takes an intermediate role</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Platform D</td>
<td>Equity Crowdfunding</td>
<td>Registered financial institution according to the law of exchange and other financial activity</td>
<td>Industry of health and medicine</td>
</tr>
<tr>
<td></td>
<td>Performs due diligence</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Platform E</td>
<td>Equity Crowdfunding</td>
<td>Finnish equity crowdfunding industry is regulated since 2016 and the license is transferred to Sweden</td>
<td>Start-ups</td>
</tr>
<tr>
<td></td>
<td>Have expanded their operations toward the Swedish market</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 2 - List of selected of platforms

3.5 Selection of respondents
By discussing the purpose of the thesis together with the selected equity crowdfunding platforms, relevant respondents were selected. Key individuals who currently work or previously have worked on equity crowdfunding platforms were perceived to be relevant. Furthermore, the respondents were selected based on their work responsibilities in connection to impacting information asymmetry. These individuals had different responsibilities, roles and positions. The variation of respondents was beneficial given the thesis exploratory outset as
different perspectives connected to the purpose were captured. Below the selected respondents are presented in Table 2 - List of selected respondents:

<table>
<thead>
<tr>
<th>Respondents</th>
<th>Title and role</th>
<th>Interview setting</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Platform A</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Respondent 1</td>
<td>Co-Founder</td>
<td>Face to face</td>
</tr>
<tr>
<td>Respondent 2</td>
<td>Investor Relations</td>
<td>Face to face</td>
</tr>
<tr>
<td>Respondent 3</td>
<td>Legal advisor</td>
<td>Face to face</td>
</tr>
<tr>
<td><strong>Platform B</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Respondent 4</td>
<td>Chief marketing officer</td>
<td>Skype</td>
</tr>
<tr>
<td>Respondent 5</td>
<td>Former International Financial Services and current Researcher</td>
<td>Skype</td>
</tr>
<tr>
<td>Respondent 6</td>
<td>Former Head of Business Development</td>
<td>Skype</td>
</tr>
<tr>
<td><strong>Platform C</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Respondent 7</td>
<td>CEO</td>
<td>Skype</td>
</tr>
<tr>
<td><strong>Platform D</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Respondent 8</td>
<td>CEO</td>
<td>Skype</td>
</tr>
<tr>
<td><strong>Platform E</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Respondent 9</td>
<td>Country Manager</td>
<td>Skype</td>
</tr>
<tr>
<td>Respondent 10</td>
<td>Account Manager</td>
<td>Skype</td>
</tr>
</tbody>
</table>

Table 3 - List of selected respondents

3.6 Thematic analysis

The empirical data consisting of primary- and secondary data was analyzed using thematic analysis. The chosen method of analysis was to perform a structured analysis which is connected to an enhanced level of quality rigor (Gioia et al, 2012). Thematic analysis refers to identify, analyze and report patterns found within the empirical material and was therefore a good fit given the purpose of the thesis (Braun & Clarke, 2006).

The thematic analysis in the thesis has been constructed by four phases of analyzing the empirical data. The first phase consisted of transliterating the empirical data to make it more manageable and accessible to analyze. Furthermore, the transcribed data was read several times to capture a holistic picture of the data. The second phase consisted of systematically breaking down the empirical data to analyze and discover patterns and themes. The captured patterns and themes were given labels.
with different colors for each theme. The material was thereafter reviewed and coded by using colors to highlight relevant sentences and quotes connected to the different themes. By providing extracted examples through quotes the thesis decreased the level of biases and increased the level of validation of the empirical results (Bryman & Bell, 2015). The third phase consisted of reviewing and structuring the themes to develop a thematic map. The thematic map created the foundation for the structure of the production of the fourth chapter, 4. Empirical findings. The fourth phase consisted of analyzing the empirical findings by comparing it to the conducted literature review and theoretical framework. This enabled the thesis to capture similarities and differences to understand the link with theory and further understand and answer the purpose of the thesis. This is presented in the fifth chapter, 5. Analysis.

3.7 Thesis ethics
The procedure of the thesis was structured and performed in an ethical course of action. This required that the information was handheld and used according to ethical guidelines. Thereby the participating respondents were informed about where and how the information would be used. Furthermore, the respondents were notified that the involvement of the thesis was optional. (Bryman & Bell, 2015)

Before the interviews took place, an oral agreement about recording the interview was established. Moreover, the participating respondents had the opportunity to discuss and impact their anonymity prior conducting the interviews. One of the respondents chose to be anonymous because of previous situations where important and sensitive information had been leaked. Therefore, after careful consideration, the thesis chose to maintain total anonymity. This would not impact the outcome of the thesis because of the purpose to examine on an aggregated market level how equity crowdfunding platforms work to impact information asymmetry within the Swedish market.

Furthermore, a thesis should also take into consideration how the respondents are affected by the continuous work and the results of the thesis (Vetenskapsrådet, 2002; Symon & Cassell 2012). The respondents were informed during the first contact about the purpose and approach of the thesis together with the process and length of the interview. Moreover, the respondents had the opportunity to choose if they wanted to revise the transcript. The majority of respondents responded that they would like to secure the information used in the thesis and especially quotes. Therefore, the relevant information was forwarded to the respondents to give
them the opportunity to revise, change and clarify. The respondents confirmed the information forwarded to them and thereby no changes were made.

3.8 Transferability
Transferability refers to how the conclusions and contributions of the study can be generalized and replicated into other situations, contexts and social environments (Bryman & Bell, 2015). The thesis is grounded and based on qualitative methods which have been carried out within the equity crowdfunding market, and the social environment is constantly changing. Future changes and differences in laws and regulation can impact the social environment. Thereby the thesis can be considered to have a decreased and relatively low level of transferability. However, this gives intent for further research to increase the level of understanding in other social environments.

3.9 Credibility
There can be more than one and possibly several accounts of social reality which makes interpreting and understanding the social world important to in order to realize credibility (Bryman & Bell, 2015). The thesis is considered to have a high degree of credibility because it has been carried out by transparent and good practice. Furthermore, the thesis has collected secondary data to understand the setting and enable triangulation of data to understand the social world. Furthermore, the quotes used for the empirical findings were submitted to the respondents for confirmation which ensured that the thesis correctly understood the social world.

3.10 Methodological reflection
In the thesis the methodological reflection is based on four criteria of authenticity which include fairness, ontological authenticity, catalytic authenticity and tactical authenticity (Bryman & Bell, 2015). The thesis has captured and presented the different perceptions of the majority of the equity crowdfunding platforms within the Swedish market. Furthermore, the respondents were offered the opportunity to discuss and impact their anonymity in the thesis. The transcripts from the interviews were forwarded to each of the respondent to give them the opportunity to revise, change and clarify. This has been important because a majority of the conducted interviews were performed through Skype which can increase the risk for misunderstandings (Deakin & Wakefield 2014). Together these steps contribute to a fair representation of viewpoints. The thesis has captured insights connected to impacting information asymmetry within the Swedish market, which enabled the respondents to better understand their social environment. Moreover, the captured insights are connected to the contemporary problem of
information asymmetry and proposed regulatory changes within the Swedish equity crowdfunding market. Thereby the contributions can empower both equity crowdfunding platforms and regulatory authorities when pursuing future actions. Thereby the thesis considers that the different criteria of authenticity are fulfilled. (Bryman & Bell, 2015)
4. Empirical findings

In this chapter the empirical findings of the thesis are presented. The chapter begins by describing a heterogeneous Swedish equity crowdfunding market to present the aggregated market setting. After that the different perceptions on how information asymmetry arises within the equity crowdfunding market are presented. This is followed by describing how the equity crowdfunding platforms within the market work to impact information asymmetry. The following presented chapters therefore include how the platforms work to govern and control the crowd of investors and the companies seeking funding. This is followed by how the platforms work to govern and reduce information asymmetry.

4.1 The Swedish Equity Crowdfunding Market

Equity crowdfunding within the Swedish market has grown rapidly for the past years and the empirical findings show that the financing method covers a funding gap. This has occurred since the banks have been reluctant to provide financial aid to companies seeking funding in Sweden. Moreover, companies have earlier often turned to professional investors or venture capitalist firms when seeking funding. However, professional investors or venture capitalist firms often invest in companies that have a more rigorous financial situation and are more established which opens the possibility for using equity crowdfunding. Respondent 9 further explains:

“The banks and credit institutes do not generally give loans or funding to companies, entrepreneurial ventures and especially companies that are in need of early funding but have a weak balance sheet, which opens the possibility to use a large number of investors”

Respondent 9

The Swedish crowdfunding market has provided companies seeking funding the opportunity to connect with a large network of investors including non-professional and professional investors to attract investments. Platform A explains that companies that have reached status quo because of the lack of capital and funding can use equity crowdfunding to develop actions to vindicate future earnings. Platform B and Platform E explain that they enable non-listed companies and especially start-ups to connect with the crowd of investors. These investors have earlier been excluded from the formal networks where these types of investment opportunities occur. Respondent 4 elaborates:
"We wanted to open up the market and make it accessible, traditionally some entrepreneurs have not been able to check their product or business idea with the market or get access to funding to become successful or change their concept if it does not respond well to the market. Likewise, previously companies haven’t been accessible for investors, I can imagine many people wanted to invest in Spotify at an early stage” - Respondent 4

Moreover, the equity crowdfunding platforms facilitate the investment relationships in the growing equity crowdfunding market and enable investors to invest on the same conditions as professional investors. Platform A and Platform D further explains that crowdfunding is a broad concept and extends beyond facilitating relationship for companies and the crowd of investors. Platform A is closer to a regular corporate finance firm in where they also provide the infrastructure for transactions and trading of financial securities. However, the respondents explain that the platform is different from regular micro-financing methods by making use of new and modern technology. This enables an easier connection between companies seeking funding and the crowd of investors. Respondent 2 elaborates:

“We make it accessible online, which corporate finance firms also do, the big difference is how you acquire securities and how the process works. You login, you take part of the information, you fill out a letter of interest and you buy the shares directly by using invoice or credit card (...) This is what modernizes our business model compared to regular corporate finance firms. (...) - Respondent 2

The empirical findings show that equity crowdfunding in the Swedish market fill the purpose to decrease the funding gap that other financial institutions cannot fill and make it more accessible for companies to reach the crowd of investors. Furthermore, companies gain access to capital to develop actions and vindicate future earnings, and the crowd of investors get access to investment opportunities not previously within their reach.

4.2 A Heterogeneous Swedish Equity Crowdfunding market

The empirical findings show that the Swedish Equity Crowdfunding market conditions with a lack of regulation translate to a heterogeneous market in where the platforms pursue different strategic directions. This means that the platforms target different companies seeking funding,
they have different perceptions on how they govern their platforms; they follow different regulations and provide different services.

The platforms target their services toward different companies seeking funding. Platform A and Platform E target small- to medium sized companies adhering from a variety of different industries. Platform B focuses on early phase start-up companies. Platform C targets real estate projects on their platform, while Platform D target companies belonging to the industry of health and medicine.

Furthermore, the platforms within the Swedish equity crowdfunding market have different perceptions on how they work to govern their platforms within the market. Moreover, the equity crowdfunding platforms have different perceptions on how to govern information asymmetry within the market. Platform A works to govern and control information asymmetry within the market by informational requirements and their process of evaluating the company seeking funding. This is perceived to be beneficial for the platform, the companies seeking funding and the crowd of investors. Platform D and Platform E also perceive that it is important for the platform to govern and control the market. Platform B explains that they are a disruptor within the market and strives to democratize the market by enabling companies to obtain financing and the crowd of investors to get access to investment opportunities. Platform B perceives that the market knows best and thereby the market governs information asymmetry rather than the platform. This means that the platform pursues less governing and controlling to impact information asymmetry. The platform instead works to provide an efficient and accessible meeting place for companies seeking funding and the crowd of investors, respondent 6 elaborates:

“The company is driven by the idea that market is the best validation (...) the crowd, the people, the more people there are, the better assumptions they make, the market knows better (...) bad companies do not succeed in crowdfunding” - Respondent 6

The Swedish equity crowdfunding market is not fully regulated and the legal barriers of the financing method are vague. Platform A explains that the spreading prohibition law for private limited companies restricts advertising and trading of shares to the public. This means that there are unanswered questions whether the platforms in the market legally are allowed to advertise and conduct trading of shares for private limited companies. Respondent 3 describe the legal problem:
“Capital procurement and mediation of financial financing to private limited liability companies through equity based grassroot financing may constitute an infringement of the companies act. However, the determination does not need to prevent private equity companies from being financed this way”– Respondent 3

The equity crowdfunding platforms follow different regulations which contribute to the heterogeneous market and impact how the platforms govern within the market. Furthermore, it also impacts what services the platforms provide. The empirical findings show that Platform A is regulated by the securities market act which enables the platform to provide services such as carrying out transactions and conduct trading of financial instruments. Platform B, Platform C and Platform D are registered as financial institutions according to the law of exchange and other financial activities. This means that the platforms work as intermediaries for companies seeking funding and the crowd of investors and are passive in conducting transactions through their platforms. Platform D however is registered as a payment service provider according to the payment services act which enables the platform to carry out transactions. Platform E follows Finnish equity crowdfunding regulations and is also licensed under the MIFID II Directive. This means that the platform is required to follow EU rules such as informational requirements that govern the European securities market. Platform E uses their license for their operations in over 28 countries including Sweden.

The empirical findings show that Swedish equity crowdfunding platforms have in common that they work to decrease the funding gap and enable investment relationships. However, the Swedish equity crowdfunding market conditions including lack of regulation translates to a heterogeneous market. This means that within the market the equity crowdfunding platforms pursue different strategic directions. Therefore, the platforms target different companies seeking funding, they have different perceptions on how they work to govern within the market, they follow different regulations and offer different services.

4.3 Perceptions on how information asymmetry arises in the market

The empirical findings show that information asymmetry is a known problem within the Swedish equity crowdfunding market. The market and equity crowdfunding platforms are aware about different reasons for the arise of information asymmetry and how they work to impact and govern the problem. The empirical findings show that there are five main recurring
platform perceptions that explain how information asymmetry arises within the market which is presented below.

4.3.1 The environmental setting of high risk investments
Information asymmetry arises because the equity crowdfunding market is associated with high risk investments. The high level of risk makes it challenging for the crowd of investors to evaluate companies seeking funding. Platform A, Platform B, Platform D and Platform E explain that there is risk when investing in established public companies, however in equity crowdfunding the level of risk-taking is increased as the companies are in earlier stages of development. Platform E further explains that there is a high level of risk in equity crowdfunding because there is a low level of liquidity. This means that it is challenging for the crowd of investors to trade their shares. Platform B explains that increased risk is important to consider because neither companies seeking funding, nor the crowd of investors can have guarantees that the investment will be successful.

4.3.2 Information asymmetry between the platforms and the crowd of investors
Information asymmetry is perceived to arise between Swedish equity crowdfunding platforms in the market and the crowd of investors. Furthermore, the crowd of investors lack knowledge about investing in the equity crowdfunding market and about the functioning of platform processes. Platform A and Platform E explain that information asymmetry arise to a large extent from the lack of knowledge about platform investment processes. Platform A and Platform E also explain that small nonprofessional investors often invest because they know or like the product or service that the company provides. Respondent 9 and respondent 2 elaborate:

“I think that there is a risk that the investment will be wrong because of the high expectations and low knowledge with in the ‘lower class ‘of the investors” - Respondent 9

“The whole education part is difficult and that is something we and the whole market need to work a lot with. - Respondent 2

Platform A further stresses the problem by explaining that there is a need to educate about equity crowdfunding and how the investment situations function. Platform A also explains that the platform communicates both their business model and the role of the investor in investment situations.
4.3.3 Information asymmetry because of informational advantage
The empirical findings show that information asymmetry is also perceived to arise between companies seeking funding and the crowd of investors on the equity crowdfunding platforms. Further information asymmetry arises when companies seeking funding make use of their informational advantage with the intention to receive funding. Platform A stresses the problem by explaining that they govern and control their platform to ensure a high quality of the companies seeking funding to impact the informational advantage. Platform E explains that an underlying reason to govern and control the market is to counteract fraud by the companies seeking funding.

4.3.4 Information asymmetry because of lack of shared information
Information asymmetry is also perceived to arise in the Swedish equity crowdfunding market because of lack of shared information between companies seeking funding and the crowd of investors. The findings show that the equity crowdfunding platforms work continuously to govern and impact this problem. Platform B stresses the problem by describing that they have developed internal informational requirements that companies seeking funding need to communicate. The platform also assists companies seeking funding in developing their communicational material and provide channels for communication. Platform C explains that it is important to present as much information as possible to give the investor the opportunity to make a rational investment decision. The empirical findings also show that the underlying problem is that non-professionals do not take part of the information presented.

4.3.5 Information asymmetry arise because of company valuation
The empirical findings show that information asymmetry is perceived to arise in the Swedish equity crowdfunding market because of the lack of information and understanding of company valuation by the crowd of investors. This is a problem in the market as the companies seeking funding and the crowd of investors have different motivations for company valuation. Platform B, Platform D and Platform E describe that the companies seeking funding want to have high company valuation and will try to adjust their communication to sell their company with a high valuation. Respondent 5 further elaborates:
“One of the crucial aspects in equity crowdfunding are of course the aspect of evaluation and we have about ten different valuation methods how you evaluate a company (...) And then there is a power game and struggle that are centric, which are nothing new. It is just more visible in equity crowdfunding (...) - Respondent 5

The Swedish equity crowdfunding platforms in the market are both aware of how information asymmetry arises and how they work to impact the problem. However, the findings also show that it is almost impossible to fully govern and eliminate information asymmetry. Platform C explains that information presented can never be confirmed by neither investors nor the Swedish Governmental Agency responsible for financial regulations. This implies an inevitable information asymmetry within the Swedish equity crowdfunding market. Platform A mentions that companies seeking funding always will have more information than they will communicate toward the crowd of investors. Respondent 1 explains:

“It is clear that a CEO or founder will have more information and knows things that are only available in their head. So, we can never put that in print but on the other hand the relevant information is often presented, the problem is that small investors often do not take part of it.” - Respondent 1

The Swedish equity crowdfunding platforms perceive that information asymmetry will always be a part of the Swedish equity crowdfunding market. The empirical findings further show that there are five recurring platform perceptions that explain the arise of information asymmetry within the market. Furthermore, information asymmetry is identified to arise between the crowd of investors and the equity crowdfunding platforms, and between the crowd of investors and the companies seeking funding.

4.4 How the platforms work to govern and control the crowd of investors

Information asymmetry is perceived to arise between the Swedish equity crowdfunding platforms within the market and the crowd of investors. The empirical findings show that the crowd of investors in the market are perceived to lack knowledge about investing in the equity crowdfunding market and about the functioning of platform processes. Platform D explains that it is important to impact the opportunities for the crowd of investors to be well informed and be able to properly evaluate cases on the platform. Respondent 1 elaborates;
“Generally, I believe that when investments go wrong in equity crowdfunding, the reason is that the expectations and level of knowledge is too low on the investor-side” - Respondent 1

The Swedish equity crowdfunding platforms work to impact the lack of knowledge by the crowd of investors in the market. Platform B works to inform and educate the crowd of investors about investing in equity crowdfunding. The platform explains that they arrange activities such as crowdfunding events, and the underlying reason is to enable the crowd of investors to make good investment decisions. Platform C explains that they target real estate projects which makes it important to communicate information about the real estate industry to the crowd of investors.

Swedish equity crowdfunding platforms also work to impact the knowledge about the functioning of investment processes on the platforms. The empirical findings show that communicating the functioning of platform processes is a challenging task. Platform A explains that they communicate to the crowd of investors the functioning of the platforms ownership structures and the functioning of liquidation preferences shares. This is challenging to communicate because it is not common public knowledge.

Furthermore, Swedish equity crowdfunding platforms work to govern and control the level of investor knowledge and understanding of investing in equity crowdfunding. Platform E explains that prior boarding the platform, the crowd of investors need to fill out and pass a test. The platform calls the test know-your-customer (KYC). The test is designed to control that the crowd of investors demonstrate adequate levels of knowledge and understanding of investing in equity crowdfunding. Platform E explains that regulatory requirements for governing and controlling the crowd of investors have been absent in the Swedish equity crowdfunding market. Platform E also explains that the lack of regulation for governing and controlling the crowd of investors can contribute to information asymmetry. Respondent 9 elaborates;

“The only difference in Sweden is previous lack of requirements, and of course this can result in information asymmetry, what is it actually that I am investing in?” - Respondent 9

The empirical findings show that the crowd of investors within the Swedish equity crowdfunding market are perceived to lack knowledge about investing in the equity crowdfunding market and about the functioning of platform processes. The equity
4.5 How the platforms work to govern and control companies seeking funding

Information asymmetry is perceived to arise between the crowd of investors and the companies seeking funding within the Swedish equity crowdfunding market. Further, the challenge is perceived to arise when companies seeking funding make use of their informational advantage with the intention to receive funding. All equity crowdfunding platforms within the Swedish market work to impact the problem by governing and controlling the companies seeking funding. Platform B works to impact companies seeking funding by controlling qualitative factors. Respondent 6 explain:

"The platform assesses qualitative perspectives, so that the entrepreneur is serious, the business idea is valid (...) it is a big extent of the entrepreneurs that don't end up on the platform" - Respondent 6

Platform B has developed internal informational requirements for companies seeking funding. If the company seeking funding does not provide required information, the company does not get access to the platform. This means that Platform B work to improve the level of information sharing between companies seeking funding and the crowd of investors. Platform B however perceive that the market controls the companies seeking funding rather than the platform, and the platform do not want to restrict companies to seek funding. Platform C explains that they have created an internal template for collecting information about the real estate projects seeking funding. Platform C explains that the template is designed to include project estimates, and the information provided need to show that there is project plausibility.

The Swedish equity crowdfunding platforms can also impact companies seeking funding by a higher level of controlling. Platform A explain that they control the market throughout their deal screening process and makes use of an outsourced legal due diligence. Platform A explains that companies seeking funding do not undergo the same level of controlling as on the stock market. However, the companies seeking funding need to show that they have an annual report, a legitimate past and a developed offering. Respondent 2 explain how they control companies seeking funding:
“It is our responsibility to make sure that the firm is screened and ensure the information. This is done by hiring an external due diligence firm that goes through the numbers and legality of the company and produces a report that we take part of. After this it is our responsibility to spread the information about the investment material” - Respondent 2

Regulation impacts the level of controlling required by the platforms within the Swedish equity crowdfunding market. Platform E explains that their regulatory license impacts their controlling requirements of companies seeking funding. Platform E explain that important steps of the process include gross selection, physical meetings and a review conducted by the platform’s internal investment committee. Platform E explains that they perform a legal due diligence and also sign a contract with specific requirements with the company seeking funding. Platform E also explains that the level of controlling is increased when the company seeking funding has a financial target above 25 million Swedish crowns.

The empirical findings show that all equity crowdfunding platforms within the market work to govern and control companies seeking funding. This is important to impact the level of shared information and the informational advantage by the companies seeking funding. The findings show however that the Swedish equity crowdfunding platforms pursue different levels of governing and controlling. The level of controlling is influenced by regulatory requirements and the strategic direction of the platform. The platforms within the market that pursue a lower level of controlling aim to make the market accessible and perceive that the market knows best. Platforms that pursue a higher level of controlling rather perceive that the platform should govern information asymmetry.

4.6 How the platforms work to govern and control the problem of company valuation

The empirical findings show that information asymmetry is perceived to arise within the Swedish equity crowdfunding market because of the lack of information and understanding of company valuation by the crowd of investors. The equity crowdfunding platforms work to govern and control the problem by informational requirements. However, the empirical findings show that the Swedish equity crowdfunding platforms have different informational requirements on the companies seeking funding within the different platforms. Further there is
no regulation for common informational requirements in the Swedish market. Platform B and Platform E explain that this results in an incoherent market. This means that the crowd of investors have difficulties comparing campaigns from different platforms and making well-informed decisions. Respondent 5 explain that a bottom up regulation can impact the problem of company valuation;

“There is a need for a bottom up regulation, platforms should come together and say what evaluation methods they like to issue and what entrepreneurs should share or not. This will create a more coherent market and would bring more trust to the market”. - Respondent 5

Platform B further explains that a crowdfunding partnership in Scandinavia called Nordic Crowdfunding Alliance have crafted common evaluation methods. This has enabled the crowd of investors to compare campaigns from different countries. Platform B explains that this has positively impacted information asymmetry.

The Swedish equity crowdfunding platforms can impact the problem of company valuation by informational requirements. However, the platforms within the Swedish equity crowdfunding market have different informational requirements which translate to an incoherent market. This means that the crowd of investors have difficulties comparing campaigns from different platforms within the Swedish equity crowdfunding market.

4.7 How the platforms work to govern and reduce information asymmetry
In the Swedish equity crowdfunding market information asymmetry is perceived to arise because of lack of shared information between companies seeking funding and the crowd of investors. Further the platforms perceive that this is a problem because often the crowd of investors do not take part of information presented on the platform. The findings show that the equity crowdfunding platforms work to impact the sharing of information. How specific effective signals and information is communicated is perceived to impact and reduce information asymmetry within the market.

4.7.1 Platform perceptions on communication and transparency
The Swedish equity crowdfunding platforms perceive that communication between companies seeking funding and the crowd of investors need to be transparent and relevant. Platform A and
Platform E further explain that they work to ensure trustworthiness of communicated information. Respondent 2 and respondent 9 explain;

“It should not be no shortcomings or information asymmetry at all, it is our task to ensure that the company is surely screen to create best possible way to ensure the information.” - Respondent 2

“We follow the MIFID 2 regulation, so we communicate thereafter and that’s the information we require from the company. This is the latest reports, financial statements and share register. We put it together in information memo and a pitch text” - Respondent 9

Common channels for communication between companies seeking funding and the crowd of investors include memos or prospectus. Platform A and Platform E also explain that the memo or prospectus is used to create transparency between the companies seeking funding and the crowd of investors. The memo often contains information that is similar to regulated markets but is simplified and shorter in order to make it is easier for small non-professional investors to read and understand. Platform A explains that the platform work with shorter memos of 20-30 pages containing information about the company that is perceived important. Platform A also establishes discussion forums on their website and meetings bringing together investors and the companies seeking funding. The equity crowdfunding platforms share perceptions on how information should be communicated, however an underlying problem is that non-professional investors do not take part of the information presented in the market. This is perceived to contribute to information asymmetry in the market.

4.7.2 Platform perceptions on effective signaling

The empirical findings show that platforms within the Swedish equity crowdfunding market perceive that the trend of disclosing large amounts of information is not the solution for reducing information asymmetry. The platforms rather perceive that specific signals can impact and reduce information asymmetry. This means that specific signals are perceived to be effective for companies seeking funding to communicate to the crowd of investors.

The findings show that it is important for companies seeking funding to communicate and signal human capital. This includes signaling knowledge and expertise of the team, board members and the history of the founders. Signaling social capital and business linkages is perceived to be important,
and this includes communicating external funding from other financial institutes. The platforms call this lead investors, and enables companies seeking funding to show proof of concept which can reduce information asymmetry. Intellectual capital is important to signal and includes signaling patents to show a long term competitive advantage. Signaling uncertainty is perceived as important and thereby it is important to communicate information, so the crowd of investors can analyze the future outcome. Equity crowdfunding platforms can signal founder and management investments by communicating an ownership list to show if the founder or management are investing and thereby demonstrates a level of involvement on the company. Further financial risks, projections and company uncertainty are important to signal.

Platforms in the Swedish equity crowdfunding market further perceive that effective signals need to be designed to establish trust between the companies seeking funding and the crowd of investors. The underlying reason is that companies seeking funding in equity crowdfunding often are new to a market and are associated to having problems with market entry. Platform B explains that companies seeking funding can signal trust to the crowd of investors through third party endorsements.

Furthermore, platforms within the Swedish equity crowdfunding market perceive that signals that are communicated through alternative channels of communication such as social media can impact information asymmetry and also the success of the crowdfunding campaign. Platform B perceive that being active on sources such as Facebook, LinkedIn and Instagram can impact the level of information sharing and the success of the company seeking funding. Respondent 5 explain;

“I don't believe that the investors would like to have more information, but this is something that needs to be clarified (...) what you can see there is a connection when the campaign was connected to LinkedIn, Facebook or Instagram the likelihood for success for the campaign was higher (...)” - Respondent 5

Platform E however explains that the use of social media and the trend to use many different channels of communication can result in a fragmentation and diminish investor trust. It can especially diminish trust for more professional investors on the equity crowdfunding platforms who are relying on traditional channels of communication.

Information asymmetry is perceived to arise in the Swedish equity crowdfunding market because of lack of information and understanding of company valuation by the crowd of investors. Platform B
explains that company valuation can be perceived as a signal that investors look for when making investment decisions. Platform B and Platform D explain that a reasonable valuation is important for companies seeking funding to signal. Respondent 8 explain;

“Sometimes companies can have a very high company valuation (...) We decide on company valuation together with the companies (...) Often the companies have a big idea about their valuation, and then pretty often we adjust and lower the valuation (...) we want to decide on a reasonable valuation that is interesting for our network of investors” - Respondent 8

The empirical findings show that equity crowdfunding platforms within the Swedish market work to impact and reduce the lack of information shared between companies seeking funding and the crowd of investors. The platforms perceive that how information is communicated between companies seeking funding and the crowd of investors can impact and reduce information asymmetry. The investor communication need to be transparent, relevant, trustworthy and simplified. This is perceived as important because the crowd of investors tend to not take part of information presented. The findings also show that the platforms within the Swedish market perceive that specific effective signals can impact and reduce information asymmetry. Further signaling trust through third party endorsements, signaling through social media and signaling a reliable company valuation is particularly important to impact information asymmetry.
5. Analysis

The chapter begins with an analysis of the Swedish equity crowdfunding market and is followed by an analysis on how information asymmetry arises. This is followed by analyzing how the equity crowdfunding platforms work to impact, control and reduce information asymmetry in the market. The empirical findings and contemporary theory will be compared to understand the linkage with theory. This enables to answer the purpose and research question of the thesis.

5.1 The Swedish equity crowdfunding market

The empirical result shows that the Swedish equity crowdfunding market has grown rapidly in recent years and fills the purpose to decrease the funding gap that other financial institutions cannot fill. This is consistent with Mollick (2014) and Belleflamme et al. (2014). The findings further show that the Swedish equity crowdfunding platforms constitute the market and are responsible for governing and facilitating investment relationships. These findings are consistent with Tomczak & Brem (2013) and Belleflamme et al. (2015). This is also consistent with Lacan & Desmet (2017) and Hagiu & Rothman (2016) who explain that platforms can work to establish mutually beneficial investment relationship by the two-sided market theory. The empirical findings further show that the Swedish equity crowdfunding market makes it more accessible for companies to reach the crowd of investors to access capital and develop corporate actions to vindicate future earnings. Meanwhile, the crowd of investors get access to investment opportunities that previously have not been within their reach. This is consistent with Courtney et al. (2016) and Stigenberger (2016).

However, the empirical findings capture that the Swedish equity crowdfunding market conditions translates to a heterogeneous market and is not regulated. Further this means that the equity crowdfunding platforms pursue different strategic directions. The different strategic directions explain how the platforms within the Swedish market have different perceptions on how they work to govern their platforms, they follow different regulation, they provide different services and they targeted different companies. The heterogeneous Swedish equity crowdfunding market is not captured in contemporary literature within equity crowdfunding.

However, Ahlers et al. (2015) and Bradford (2012) describe that within equity crowdfunding the sales of securities and shares comes with regulatory issues and thereby there are legislative restrictions within many equity crowdfunding markets. This means that equity crowdfunding is
substantially affected by the home country legislation. This is consistent with the empirical findings as the lack of regulation within the Swedish equity crowdfunding market contributes to the heterogeneous market. The platforms within the market rather follow different regulations connected to the securities market act or regulations for financial institutions.

5.2 How information asymmetry arises within the Swedish crowdfunding market

The empirical findings show that equity crowdfunding platforms within the Swedish equity crowdfunding market acknowledge the problem of information asymmetry and are aware about the different reasons for the arise of information asymmetry. This is consistent with Ahlers et al. (2015), Mollick (2014) and Belleflamme et al. (2014) who describe that within the equity crowdfunding platforms there are informational challenges and information asymmetry. However, the empirical findings further capture that there are five main reasons for the arise of information asymmetry within the Swedish equity crowdfunding market which are presented below.

5.2.1 The environmental setting of high risk investments

The empirical findings show that one of the main reasons for the arise of information asymmetry associated to high risk investments within the Swedish equity crowdfunding market. This is because the companies seeking funding often are in the earlier stages of development. This means that neither the companies seeking funding, nor the crowd of investors can have guarantees that the investment will be successful. This is consistent with Belleflamme et al. (2014) who describe that companies seeking funding often are in the early stages of development and are connected to a high level of risk and uncertainty. Cumming (2007) also confirms the findings by explaining that these companies often experience the liability of newness and a high level of risk which can increase information asymmetry.

5.2.2 Information asymmetry between the platforms and the crowd of investors

The empirical findings show that another main reason for the arise of information asymmetry is found between the Swedish equity crowdfunding platforms and the crowd of investors in the Swedish market. Further the findings show that the crowd of investors lack knowledge about both investing in the equity crowdfunding market and about the functioning of platform processes. The relationship between the platforms and the crowd of investors is not captured in contemporary research within the field of equity crowdfunding. Rather previous research on
information asymmetry and equity crowdfunding has focused on the relationship between companies seeking funding and the crowd of investors (Courtney et al., 2017; Ahlers et al., 2015; Mollick, 2014).

5.2.3 Informational advantage by the company seeking funding

The empirical findings show that information asymmetry is perceived to arise between companies seeking funding and the crowd of investors on the equity crowdfunding platforms within the Swedish market. The relationship between the companies seeking funding, the crowd of investors and information asymmetry has been the dominant field of study in academia (Courtney et al., 2017; Ahlers et al., 2015; Mollick 2014). Furthermore, the empirical findings show that information asymmetry arises in the Swedish equity crowdfunding market when companies seeking funding make use of their informational advantage with the intention to receive funding. This is consistent with Osnabrugge (2000) and Ley and Weaven (2011) who explain that in venture finance information asymmetry arises because of the abuse of informational advantage by one party. The findings however capture that this is also consistent within the Swedish equity crowdfunding market.

5.2.4 Lack of information sharing

The empirical findings show that one of the main reasons for the arise of information asymmetry is the lack of information sharing within the relationship between companies seeking funding and the crowd of investors. Furthermore, the findings show that the underlying reason for the lack of information shared is that the crowd of investors often do not take part of information presented. These findings are consistent with Courtney et al. (2016) who argue that information asymmetry arises when the crowd of investors do not take part of information and signals presented by the company seeking funding. The findings however capture that the lack of information also is present within the Swedish equity crowdfunding market.

5.2.5 Lack of information and understanding of company valuation

The empirical findings show that one of the main reasons for the arise of information asymmetry is the lack of information and understanding of company valuation by the crowd of investors. This is a problem because the companies seeking funding and the crowd of investors within the Swedish equity crowdfunding market have different motivations for company valuation in the Swedish equity crowdfunding market. This means that companies seeking
funding have the intention to sell and communicate a high valuation. Though, the crowd of investors want to buy shares at a low valuation to increase the opportunity for a successful investment. Contemporary literature in the field do not capture that information asymmetry arise because of the problem of company valuation. However, the problem has many similarities with contemporary research on agency theory. Jensen & Meckling (1976) explain that there is a separation of ownership and control in investment relations which can lead to misaligned goals and interests between the two parties. This characterization of investment relationships can explain the problem of company valuation within the Swedish equity crowdfunding platforms.

5.3 How the equity platforms work to impact information asymmetry
The empirical findings show that the equity crowdfunding platforms perceive that information asymmetry is a problem within the Swedish market. The findings further show that the equity crowdfunding platforms work to impact the different reasons for the arise of information asymmetry. This is consistent with Belleflamme et al. (2015) who explain that the platforms can work to impact the problem of information asymmetry. Furthermore, the empirical findings capture a holistic picture of how platforms within the Swedish equity crowdfunding market work to impact information asymmetry. The market conditions translate to different strategic directions pursued by the Swedish equity crowdfunding platforms. The different strategic directions are connected to two main approaches on how to govern information asymmetry within the Swedish market. The first main approach relates to that the role of the platform is to govern and control information asymmetry within the market. The second main approach relates to that the market knows best, and thereby the free market should govern information asymmetry. This means that the market rather than the platform is perceived to be responsible for controlling information asymmetry. These two main approaches on how platforms within the Swedish equity crowdfunding market work to impact information asymmetry is not captured within the field of equity crowdfunding.

5.3.1 Working to govern and control information asymmetry
The empirical findings show that the equity crowdfunding platforms within the Swedish market work to impact the problem of information asymmetry. This has led to that the equity crowdfunding platforms work to control both the companies seeking funding and the crowd of investors. This is consistent with Ley and Weaven (2011) who argue that mitigation strategies
can be used to control information asymmetry in crowdfunding. Mitigation Strategies as *crowd composition, due diligence, deal screening, external deal referrals and information sensitivity* have been highlighted to control information asymmetry in crowdfunding (ibid). However, the empirical findings extend contemporary research by capturing how the Swedish equity crowdfunding market makes use of mitigation strategies to control information asymmetry.

Furthermore, the empirical findings show that the crowd of investors within the Swedish equity crowdfunding market are perceived to lack knowledge about investing by using equity crowdfunding and the functioning of platform investment processes. The findings show that the Swedish equity crowdfunding platforms can work to impact the problem by controlling the level of knowledge and understanding about investing in the field. The platforms can do this by making the crowd of investors perform a test called know-your-customer. This is consistent with Ley and Weaven (2011) who explain that crowdfunding platforms can control that the crowd of investors have a suitable level of understanding and experience of investing in crowdfunding. The empirical findings also show that not all Swedish equity crowdfunding platforms work to control the crowd of investors. That is because of the argument that the Swedish equity crowdfunding market should be open and accessible to the public and thereby not controlled.

The empirical findings further show that information asymmetry arises between companies seeking funding and the crowd of investors within the Swedish market. Further information asymmetry arises when the company seeking funding has an informational advantage and makes use of the informational advantage to receive funding. The Swedish equity crowdfunding platforms work to govern and control the information asymmetry problem by increasing the level of information sharing and evaluating companies seeking funding. This is consistent with Jensen & Meckling. (1973), Fried et al. (1994), Sohl (1999) and Osnabrugge (2000)) who describe that mitigation strategies can be used to control information asymmetry within venture finance. Ley & Weaven (2011) further explain that *deal screening, external deal referrals and information sensitivity* are strategies that can mitigate information asymmetry within crowdfunding. The empirical findings confirm that these mitigation strategies are used within the Swedish equity crowdfunding market. The equity crowdfunding platforms can make use of informational requirements, physical meetings, internal business reviews and legal due diligence as important parts of their controlling process. The level of controlling is dependent on the platforms strategic direction. This means that the level of controlling pursued within the Swedish equity crowdfunding market is influenced by factors such as their perceptions on how
to govern the platforms, what regulations they follow, what services they provide and what type of targeted companies. Though, the empirical findings show an argument to make equity crowdfunding more accessible as a financing method for companies seeking funding by a lower level of platform and market control. This means that there is a trade-off between controlling information asymmetry and making equity crowdfunding accessible within the market.

Moreover, the empirical findings show that information asymmetry arises because of lack of information and understanding of company valuation by the crowd of investors. The equity crowdfunding platforms can work to govern and control the problem by making use of informational requirements on the companies seeking funding. This is consistent with described mitigation strategies by Ley and Weaven (2011). However, the findings show that currently the platforms within the Swedish market have different informational requirements which can translate to difficulties for the crowd of investors to compare and understand campaigns from different platforms and making well-informed decisions. This is not covered in contemporary research and can be perceived to increase information asymmetry within the Swedish equity crowdfunding market.

5.3.2 Working to govern and reduce information asymmetry

The empirical findings capture that one of the main reasons for the arise of information asymmetry is the lack of information sharing between companies seeking funding and the crowd of investors. The findings show that the equity crowdfunding platforms work to govern and reduce the lack of shared information and thereby information asymmetry. This is consistent with Löher (2017) and Belleflamme (2015) who explain that the equity crowdfunding platforms impact and reduce information asymmetry by governing the exchanges of information. The findings capture that how the Swedish equity crowdfunding platforms work with investor communication can impact information asymmetry. The platforms within the equity crowdfunding market provide channels for communication such as discussion prospectus, memos, forums, investor meetings and social media. The platforms perceive that communication between companies seeking funding and the crowd of investors need to be transparent, relevant, trustworthy and simplified. This is perceived to be even more important when the crowd of investors tend to not take part of information presented. This is connected to Ahlers et al. (2015) and Connelly et al. (2011) who argue that observability is important in signaling theory and relates to how information is interpreted and understood. Furthermore, this is consistent with Spence (1973), Ahlers et al. (2015) and Connelly et al. (2011) who explain
that the company seeking funding constitutes the signaler and the investor constitutes the receiver in equity crowdfunding. Thereby the investor communication should be structured so the crowd of investors can interpret and understand the information within equity crowdfunding.

The empirical findings show that the Swedish equity crowdfunding platforms work to impact specific signals exchanged between the companies seeking funding and the crowd of investors within the market. The findings capture that the exchanges of specific signals can impact and reduce information asymmetry on the equity crowdfunding platforms. This is consistent with Courtney et al. (2017) who argue that different signals between the companies seeking funding and the crowd of investors can help to reduce information asymmetry.

Moreover, the empirical findings show the specific signals such as Human capital, Social capital and Business linkages, Intellectual capital and Securing mechanisms, Company uncertainty, Founder and management investment, and Financial risks and projections, are important signals to communicate within the Swedish equity crowdfunding market. This is undeviating and consistent with Ahlers et al. (2015) who mention that these signals are crucial for impacting information asymmetry in equity crowdfunding. However, the empirical findings capture that signaling trust can impact information asymmetry and that third-party endorsements can be used to signal trust. This is consistent with Daniel & Titman (2016) who explain that signals cannot only be sent from companies seeking funding, but also from third parties and external actors. This can also be explained by Cumming (2007) who describes that companies that are in the earlier stages experience uncertainty and the liability of being new to a market. However, the linkage between signaling trust and impacting information asymmetry has not been captured within the field of equity crowdfunding.

Furthermore, the empirical findings show that company valuation can be perceived as a signal and can reduce information asymmetry. The equity crowdfunding platforms within the Swedish market perceive that companies seeking funding often pursue a high valuation while the crowd of investors pursue a low valuation. Signaling a reasonable company valuation is not captured in contemporary research on equity crowdfunding and signaling. However, it is consistent with Ahlers et al. (2015) who explain that signals need to be designed to outweigh the benefits over the costs.
6. Conclusions

In this chapter the conclusions are presented to answer how equity crowdfunding platforms work to impact information asymmetry within the Swedish market.

The thesis has captured a holistic perspective on how the equity crowdfunding platforms within the Swedish market work to impact, govern, control and reduce information asymmetry. The Swedish equity crowdfunding market has become an important source of alternative financing, however the lack of regulation has translated into an incoherent and heterogeneous market environment. This has led to different strategic directions within the market which means that the equity crowdfunding platforms have different approaches on how they work to impact, control and reduce information asymmetry. The answer to the purpose and research question is presented below.

6.1 Impact and govern information asymmetry

The thesis concludes that there are five main reasons for the arise of information asymmetry within the Swedish equity crowdfunding market. An underlying reason for information asymmetry within the market is the associated high risk investments in the market. The information asymmetry in the Swedish equity crowdfunding market has led to two approaches on how the equity crowdfunding platforms work to impact and govern information asymmetry in the market. The first main approach relates to impacting information asymmetry by governing and controlling the equity crowdfunding market. The second main perception relates to impacting information asymmetry by allowing the free market to govern information asymmetry. The two different approaches indicate a trade-off between controlling information asymmetry and making the financing method accessible within the market.

6.1.1 Control information asymmetry

The thesis concludes that the equity crowdfunding platforms work to control the companies seeking funding and the crowd of investors to thereby impact the problem of information asymmetry. Furthermore, the platforms work especially to control four out of the five reasons for the arise of information asymmetry in the Swedish equity crowdfunding market. The first of the four main reasons for the arise of information asymmetry is when the crowd of investors lack knowledge about investing by using equity crowdfunding and the functioning of platform investment processes. The Swedish equity crowdfunding platforms can work to control the level of knowledge and understanding about investing in the field. The second of the four main
reasons for the arise of information asymmetry is when the companies seeking funding make use of their informational advantage to receive funding. The Swedish equity crowdfunding platforms work to control the companies seeking funding by increasing the level of information sharing and evaluating the companies. The third of the four main reasons for the arise of information asymmetry is when the crowd of investors lack information and understanding of company valuation. The Swedish equity crowdfunding platforms work to control the problem of company valuation by informational requirements. From a holistic market perspective, the Swedish equity crowdfunding platforms pursue different levels of controlling with different informational requirements.

6.1.2 Reduce information asymmetry

The thesis concludes that the equity crowdfunding platforms work to reduce information asymmetry between the companies seeking funding and the crowd of investors. The final of the four main reasons for the arise of information asymmetry is when the there is a lack of shared information. The equity crowdfunding platforms within the Swedish market work to reduce this problem by transparent, relevant, trustworthy and simplified investor communication. This means that the platforms structure and develop the investor communication so that the crowd of investors can interpret and understand the information. The equity crowdfunding platforms further work to reduce this problem by working with specific signals which include: Human capital, Social capital and Business linkages, Intellectual capital and Securing mechanisms, Company uncertainty, Founder and management investment, and Financial risks and projections. The thesis further concludes that signaling trust by third party endorsements and signaling a reliable valuation can reduce information asymmetry within the Swedish equity crowdfunding market.
7. Concluding remarks

The final chapter of the thesis concludes how the insights from the thesis contributes to the equity crowdfunding market in a larger context. Further the chapter presents propositions for further research and limitations of the thesis.

7.1 Discussion

During the spring of 2018 the Swedish government released an investigation on alternative financing methods including equity crowdfunding within the Swedish market. The investigation brought to attention problems within the equity crowdfunding market with e.g. information asymmetry, communication and transparency. The Swedish government suggested and proposed different regulatory changes that should be implemented to handle the challenges and problems within the field of equity crowdfunding. The regulatory changes were perceived to be important in order to promote alternative financing methods for companies seeking funding and the crowd of investors. The thesis captures and contributes important insights connected to the contemporary challenges and regulatory changes within the Swedish equity crowdfunding market. The thesis finds that the lack of regulation has created an incoherent market that increases information asymmetry for the crowd of investors. The thesis captures that regulating informational requirements can positively impact the problem of information asymmetry within the Swedish equity crowdfunding market. However, an increased level of informational requirements can also decrease the access of equity crowdfunding as a financing method in the Swedish market. The thesis further captures that information asymmetry arises between the Swedish equity crowdfunding platforms and the crowd of investors. This means that future regulation targeting equity crowdfunding platforms can impact the problems of information asymmetry.

7.2 Theoretical Contributions and limitations of the thesis

The exploratory research approach has enabled the thesis to contribute to theory by capturing a holistic picture of why and how Swedish equity crowdfunding platforms work to impact, govern, control and reduce information asymmetry within the Swedish market. The contributions are presented below:

- The thesis contributes to the research within information asymmetry by capturing five main reasons for the arise of information asymmetry. The thesis extents literature by showing that information asymmetry arises between the equity crowdfunding platforms
and the crowd of investors. The thesis also contributes to theory by capturing that information asymmetry arises because of lack of information and understanding of company valuation by the crowd of investors.

- The thesis contributes to agency theory by confirming that mitigation strategies are used to control information asymmetry in the Swedish equity crowdfunding market. Furthermore, the thesis contributes to theory by capturing that the equity crowdfunding platforms pursue different levels of controlling to impact information asymmetry. Further, the thesis contributes to agency theory by capturing that the problem of company valuation can be controlled by informational requirements within the Swedish equity crowdfunding market.

- The thesis contributes to signaling theory by confirming that effective signals can be used to reduce information asymmetry in the Swedish equity crowdfunding market. Furthermore, the thesis contributes to signaling theory by capturing that investor communication in the market need to be transparent, relevant, trustworthy and simplified. The thesis contributes to signaling theory by capturing that signaling trust and a reliable company valuation can reduce information asymmetry.

Nevertheless, the thesis has limitations that need to be pointed out. The thesis chose the purpose and research approach to capture the aggregated market level of equity crowdfunding. This has limited the thesis from capturing and exploring more narrow areas of research within the equity crowdfunding platforms, such as in-depth knowledge of mitigation strategies. Furthermore, the qualitative design enabled the thesis to capture the perceptions of the respondents representing the equity crowdfunding platforms within the Swedish market. However, this means that the empirical results are reflections of the respondents’ perceptions and mirrors how they perceive how the equity crowdfunding platforms work. Therefore, the credibility of the thesis is limited to the interpretations of the respondents. This is why the thesis made sure to increase credibility by secondary data and carrying out the research with transparency and good practice. It is important to highlight that a quantitative design could have added reliability of the findings, especially to further understand the correlation between specific signals and reducing information asymmetry.
7.3 Suggestions for Future Research

The exploratory direction of the research has enabled the thesis to capture interesting suggestions for further research. The thesis captures that the majority of research on the theory of information asymmetry focuses on the relationship between the companies seeking funding and the crowd of investors. However, the thesis finds that information asymmetry arises between equity crowdfunding platforms and the crowd of investors in the Swedish market. The thesis proposes that further research is needed to address this theoretical gap. The thesis further captures that signaling trust and signaling a reliable valuation can reduce information asymmetry. The thesis proposes further quantitative research on how these signals correlate to reducing information asymmetry within the market.
8. References


## Appendix one

### Operationalization

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<thead>
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<th>Concepts</th>
<th>Question</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Alternative financing</strong></td>
<td>Belleflamme et al., 2014; Mollick, 2014; Stigenberger, 2016; Ahlers et al., 2015; Ingram &amp; Teigland, 2013</td>
<td>Equity Crowdfunding</td>
<td>What function does Equity Crowdfunding fill within the market?</td>
</tr>
<tr>
<td><strong>Information asymmetry</strong></td>
<td>Ahlers et al., 2015; Mollick, 2014; Belleflamme et al., 2014; Courtney et al., 2017; Cohen &amp; Dean, 2005</td>
<td>Information asymmetry arises</td>
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<tr>
<td><strong>Platforms</strong></td>
<td>Belleflamme et al., 2015; Lacan &amp; Desmet, 2017</td>
<td>Equity crowdfunding</td>
<td>Which function does the platform have for companies seeking funding and the crowd of investors?</td>
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<td>platforms</td>
<td>How does your platform work to impact and govern information asymmetry?</td>
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<td><strong>Agency theory</strong></td>
<td>Ley &amp; Weaven, 2011</td>
<td>Mitigation Strategies</td>
<td>How do you work to control the companies seeking funding and the crowd of investors to impact information asymmetry?</td>
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<td>Ley &amp; Weaven, 2011</td>
<td>Crowd Composition</td>
<td>How do you work to control the level of understanding and experience of investing in crowdfunding?</td>
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<td>Source</td>
<td>Topic</td>
<td>How do you work to control the opportunities for the crowd of investors to execute due diligence pre-investment?</td>
<td>How do you work to evaluate the companies seeking funding pre-investment?</td>
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<td>Ley &amp; Weaven, 2011</td>
<td>Due diligence</td>
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<td>Deal Screening</td>
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<td>External Deal Referrals</td>
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<td>Belleflamme, 2015; Löher, 2017</td>
<td>Exchanges of signals</td>
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<td>Effective signals</td>
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<td>How do you work to communicate and signal intellectual capital and securing mechanisms?</td>
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<td>Ahlers et al., 2015</td>
<td>Company uncertainty</td>
<td>How do you work to communicate and signal company uncertainty?</td>
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<td>How do you work to communicate, and signal funder and management investments?</td>
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<tr>
<td>Ahlers et al., 2015</td>
<td>Financial risks and projections</td>
<td>How do you work to communicate and signal financial risks and projections?</td>
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### Appendix two

**Interview guide**

**Introduction:**
- Is it okay that we record the interview?
- Do you have any questions before we begin?

**Background question:**
- What is your position at the firm?
- Can you shortly describe what your work entails at the company?

**Questions:**
- Which function does equity crowdfunding fill within the market?
- How do you perceive that information asymmetry arise within equity crowdfunding?
- Which function does the platform have for companies seeking funding and the crowd of investors?
• How do your platform work to impact and govern information asymmetry?
• How do you work to control the companies seeking funding and the crowd of investors to impact information asymmetry?
• How do you work to control the level of understanding and experience of investing in crowdfunding?
• How do you work to control the opportunities for the crowd of investors to execute due diligence pre-investment?
• How do you work to evaluate the companies seeking funding pre-investment?
• How do you work to control the level of quality for the companies seeking funding?
• How do you work to control the company seeking funding by informational requirements?
• How do you work to govern and impact the exchanges of signals on the platform?
• Which specific signals do you think are important to communicate?
• How do you work to communicate and signal human capital?
• How do you work to communicate and signal social capital and business linkages?
• How do you work to communicate and signal intellectual capital and securing mechanisms?
• How do you work to communicate and signal company uncertainty?
• How do you work to communicate, and signal funder and management investments?
• How do you work to communicate and signal financial risks and projections?

Ending Questions:
• To summarize, what is important to highlight related to impacting and governing information asymmetry within equity crowdfunding?
• What do you believe are future challenges connected to information asymmetry and the equity crowdfunding market?
• Do you want us to send the transcriptions or citations for editing and clarification?