Stockholm School of Economics
Department of Accounting and Financial Management
Bachelor Thesis
Fall 2022

How corporate governance factors impact the propensity to voluntarily disclose leases

A quantitative study in the Swedish setting

Albin Persson
25191@student.hhs.se

Teodor Töregård
25193@student.hhs.se

Abstract

Starting in 2014, firms reporting in accordance with the K3 accounting framework were required to recognize financial leases on the balance sheet and to disclose their future operating lease expenses. With the help of this sudden implementation, this study investigates how a set of corporate governance factors may have influenced the decision of voluntarily disclosing this information prior to the regulatory change. This is done by comparing data of disclosed operating- and financial leases from 1,048 Swedish private firms for the years of 2013 and 2014. One out of the four investigated corporate governance factors present a significant positive effect on the amount of voluntary disclosed financial leases. None of the investigated factors show significant impact on the amount of voluntary disclosure of operating leases. Our study uses this event to contribute to the existing literature on voluntary disclosure of financial items.

Acknowledgements

We express our utmost gratitude to our supervisor, Milda Tylaite, for her great insights and for giving us access to her data from previous research. Furthermore, we thank our seminar group for taking their time reading and critiquing our work.

Tutor: Milda Tylaite
Keywords: *leases, voluntary disclosure, BFNAR 2012:1, corporate governance.*

Table of Contents

1. Introduction **1**
1.1 Background 1
1.2 Purpose 3
1.3 Scope 3
1.4 Contribution 4
2. Literature review & hypothesis development **5**
2.1 Voluntary disclosure 5
2.2 BFNAR 2012:1 8
2.3 Distinction between the different leases 9
2.4 Corporate Governance 10
2.4.1 CEO internality 10
2.4.2 Women in leading positions 11
2.4.3 Board size 13
2.5 Hypothesis development 14
3. Methodology **17**
3.1 Sample selection & data collection 17
3.2 Variables 18
3.2.1 Dependent variables: 18
3.2.2 Independent variables: 20
3.3 Model Construction 24
3.4 Models 24
4. Results and Analysis **25**
4.1 Descriptive statistics 25
4.2 Diagnostics 26
4.2.1 Multicollinearity 26
4.2.2 Heteroscedasticity 27
4.3 Regression results 27
5. Discussion **31**
5.1 Analysis of regression results 31
5.2 Validity and reliability 32
6. Conclusion **34**
6.1 Future research 35
References **37**
Appendices **40**

1. Introduction

1.1 Background

Disclosing more financial information than required by the relevant reporting regulations may have large consequences. As reporting frameworks are constantly being further developed to minimize information asymmetry, more financially material information is required to be disclosed through reporting regulations. Still, no reporting regulation is exhaustive, and firms may opt to disclose more information in their annual report than what is required. This paper will investigate what firm specific corporate governance factors may influence such a decision. More specifically, this will be done in the Swedish setting where the regulatory reporting framework for private large firms, K3, abruptly changed the rules regarding the disclosure of leases. This change required firms to recognize financial leases as assets and liabilities, as well as disclose future minimum operating lease payments. This sudden regulatory change will be used to examine the difference of firm specific corporate governance characteristics of those firms who voluntarily disclosed more extensive lease information before the regulatory change and those who did not.

Regulations for accounting have been present for an extensive amount of time and different national regulations have subsequently developed all over the globe in order to maintain control over the behavior of companies and reduce information asymmetry. As a result of having individual regulations within countries, apparent differences have emerged over time. These differences have grown more obvious than ever before as a result of the increase in pace with regards to globalization. As a result of the increase in multinational corporations and the necessity for investors requiring the possibility to easily compare firms from different nations, actions have been taken in order to globally align the way of accounting.

A major leap in trying to align and harmonize the way of accounting was taken in 1973, as a direct consequence of the founding of the International Accounting Standards Committee. Today, that organization is instead referred to as the International Accounting Standards Board (IASB). The very same organization released a set of accounting standards which were to be implemented by countries within the European Union from the year 2005, the International Financial Reporting Standards (IFRS). Initially, this regulation only applied to public

companies and their consolidated statements, however that has changed over time (Financial Accounting Foundation).

Examining the Swedish setting, the companies who operated under IFRS legislation practiced accounting of a much higher standard in comparison to the private companies. This difference in quality consequently culminated in the issuance of the K-frameworks; K1, K2, K3 and K4. The different K-frameworks are all suitable for different types of companies, although the possibility to choose between them sometimes becomes possible (Skatteverket, 2018).
K3 is established from a user perspective and is principle-based. The regulations being of principle-based nature means that there is wiggle room with regards to interpretation for the accounting administrator. Detailed rules and methods are excluded regarding specific events which result in a possibility to make individual assessments, something that differs a lot from K2 which instead provides obvious distinctions between what is wrong and what is right. K3 is furthermore mandatory to follow for all companies, from fiscal years starting on or after the 1st of January 2014, if they meet at least one of the following criteria:

- The company fulfills the criteria to be called "large" according to ÅRL 1:3.
- The company is a parent company in a larger group.
- The company is a public limited company.

The criteria to be considered "large" refers to fulfilling at least two out of the three benchmarks:

- More than 50 employees on average
- Possess a Balance Sheet worth more than 40 MSEK
- Turnover of at least 80 MSEK

As previously touched upon, we intend to use the abrupt change of the directives of the K3 accounting standards in 2014, through BFNAR 2012:1 as an opportunity to investigate the voluntary accounting disclosure within Swedish private companies. Similarly, to how Bassemir (2018) uses the mindset of why certain companies would opt for IFRS completely voluntarily, we aim our attention to the voluntary disclosure of leases and why a firm would want to act in accordance with that. We will explore what firm characteristics may have an underlying impact on why certain firms opt for voluntary disclosure whilst others do not.

Alongside Bassemir (2018), Francis et al. (2009) among many others also investigate determinants of voluntary adoption within European private firms. We aim to continue this investigation, but instead approach Swedish private companies in particular. As previously

mentioned, to further deepen the investigation we opt to explore what firm characteristics may affect the propensity to voluntarily disclose leases. We will specifically examine four determinants that we find of high interest. The determinants, or firm characteristics that we have decided upon are whether the CEO of the firm is an external or an internal, in other words if the CEO is part of the board or not. Furthermore, we will investigate whether having a higher female presence in leading roles opposed to a male dominant presence may have any impact on suggested propensity to voluntarily disclose. Lastly, we aim to provide guidance with regards to how the number of people on the board might affect the propensity to opt for voluntary disclosure within the company. When having distinguished possible underlying reasons for this propensity, we will discuss what implications the results may suggest.

1.2 Purpose

The study intends to investigate a set of determinants of voluntary disclosure of leases. The determinants regard factors of corporate governance. Specifically, we will use the implementation of BFNAR 2012:1 as an opportunity to examine the voluntary disclosure of leases within Swedish private firms. From a wider perspective, our findings could be relevant for understanding the impact of corporate governance factors on voluntary disclosure of financial items in general.

1.3 Scope

We limit the scope of the research paper to private consolidated firms registered in Sweden. We will also only examine two years, 2013 and 2014. The reason for our selected time frame is intuitive; in 2014 BFNAR 2012:1 was implemented and to capture its immediate impact we benefit from examining the specific year as well as the year prior to the introduction, 2013. Furthermore, companies that have been operating under IFRS legislation will not be considered as they are not subject to the regulatory change event. We will instead exclusively focus on firms that instead practice the Swedish accounting framework, K3, and consequently were impacted by BFNAR 2012:1. Only larger private companies fulfilling the criteria previously mentioned must follow the K3-framework. Thus, the study is focused on consolidated companies, as these are more likely to meet these criteria's and will have to comply with the K3-framework and the regulation change of interest. Lastly, due to the nature of the study, we will focus mostly on firms holding large amounts of both financial and operating leases.

1.4 Contribution

We contribute to the current literature in two ways. First, we add to the existing literature by investigating voluntary disclosure of leases within a seldom researched setting; Swedish private companies. Second, we investigate determinants that have not been extensively researched before. Thereby providing for additions to current literature both with regards to expansion of investigated settings, but also by shedding light on perhaps previously undiscovered determinants.

2. Literature review & hypothesis development

2.1 Voluntary disclosure

Why entities would voluntarily disclose information that they are not required to do by regulation, is a topic that has been widely researched. Multiple papers provide slightly different views on the matter and often approach the question with slightly different motives. Followingly, the findings from previous researchers are thoroughly tested in multiple different settings.

Gassen & Sellhorn (2006) examines determinants with regards to voluntary IFRS adoption in German public firms during the timespan 1998-2004. They primarily find that size, international exposure, dispersion of ownership, and recent IPOs are important determinants with regards to the voluntary adoption. Comparing a sub-sample of these voluntary IFRS adopters with comparable German-GAAP practicing firms, the paper finds that IFRS firms seem to have more persistent, less predictable, and more conditionally conservative earnings. They view these results as an indication that the earnings of IFRS firms are of higher quality. Furthermore, they find support that IFRS adopters experience lower levels of information asymmetry on the German equity market relative to non-IFRS adopters. The paper also touches upon the possibility of international variation under harmonized IFRS reporting and claims that it is likely to be driven by country-level differences in the degree of investor protection, securities regulation, legal system, financing system, corporate governance, auditing, and enforcement. Lastly, they mention a belief that determinants including ownership structure, size, industry, investment opportunity set also could be influential factors.

When distinguishing what factors play an underlying reason in the decision taken by certain firms to actively, and voluntarily, disclose specific financial items, Francis et al. (2009) also adds to the foundation with regards to what variables to examine. Furthermore, they choose to examine private firms instead of public firms which coincides with what we intend to investigate. The paper aligns with Gassen & Sellhorn (2005) with regards to the belief that both firm related factors and the country which the company operates in contribute to the propensity to voluntarily disclose financial items. As a result, the paper divides the different variables into two main sections, namely: Country-specific factors and Firm-specific factors.

The purpose of the country-level variables is to capture important elements of a country's institutions and how they affect the corporate environment in question. While these institutions create protection for investors and lenders, they also enhance the payoffs for borrowers and therefore affect the incentives of all firms. It is important to distinguish to what extent the institutions impact the environment in which the corporations operate.

The country-specific model is complemented by the firm-specific model in order to analyze the bigger picture. The firm-specific factors therefore play a similar role and try to capture the degree of information asymmetry that can influence the demand for better quality accounting. The two models constructed by Francis et al. (2009) provide us with a base to further investigate the phenomenon of voluntary disclosure. The firm-specific model in particular will be approached with caution, as the model we use ourselves will bear notable similarities. The country-specific model is not necessarily vital for our paper, as the sample solely will consist of firms within Sweden, rendering the model rather distant in interest for this particular paper. However, it provides a foundation with regards to possible underlying reasons behind the conclusions which this paper eventually arrives at.

Francis et al. (2009) does in particular point to certain determinants that seem to foster voluntary adoption of accounting standards of higher quality. Namely that firms are more likely to voluntarily adopt more transparent accounting standards if they have stronger contracting incentives. Furthermore, the paper firmly establishes that companies have a greater propensity to adopt IFRS if they are more leveraged and have larger growth opportunities. The fact that IFRS adoption is associated with higher leverage and larger growth indicates that switching firms are characterized by stronger financing needs.

Bassemir (2018) takes further inspiration from Francis et al. (2009) and continues the exploration of why certain firms decide to voluntarily disclose items in accordance with accounting standards that they are not required to obey by law. The paper specifically investigates the voluntary adoption of IFRS and initially tries to distinguish whether private firms voluntarily adopt IFRS or not. Secondly, it investigates the characteristics of firms that replace national GAAP with IFRS. Analyzes are conducted on consolidated financial statements of close to 3,000 firms during the period between 1998 and 2010. Arriving at a sample size of roughly 14,000 firm-years. The results of the study suggest that roughly 10% of the sampled companies made the switch from national GAAP to IFRS. It furthermore suggests

the expected net benefits of voluntary adoption of accounting standards with higher transparency vary substantially across the sampled group of private firms. The reason behind the variation mainly has to do with the company's financing needs, governance system, and organizational and informational complexity. Specifically, some of the findings suggest that private firms choosing to voluntarily adopt IFRS on average have more growth opportunities, are more leveraged, seek to raise external capital and have more international sales and operations.

In accordance with both Bassemir (2018) and Francis et al. (2009), Shehata (2014) points towards various reasons as to why a firm would opt for voluntarily disclosing leases. Simultaneously, there are also apparent reasons to why another company would not want to disclose leases if they are not required to. The paper specifically denotes multiple motivations as to why voluntary disclosure would be preferred for certain companies. Furthermore, the paper also touches upon what circumstance might result in why a firm would not want to practice any kind of voluntary disclosure.

Perhaps the greatest reason why a company would voluntarily disclose information, leases for instance, would be in an attempt to reduce information asymmetry. For example, in accordance with the capital need theory, when a company's managers want to issue new capital through equity or debt, the perception of investors towards information asymmetry between managers and those outside investors is essential to decrease. Voluntary information disclosure may act as an aid in achieving this objective, where a reduction in information asymmetry may occur when voluntary disclosure is increased to outsiders. Another reason to voluntarily disclose information would be to increase the amount of analyst coverage the firm in question has. As a result of more information being accessible in comparison to competitors, the number of analysts following a specific company would increase in relation to the amount of available information there is to access. Another incentive behind why some would prefer to voluntarily disclose information relates to the belief that what is considered mandatory disclosure is not sufficient in the eyes of potential investors. The voluntary disclosure could be considered as an attempt to fill the gaps between what the law requires and what potential investors require (Shehata, 2014). For instance, one would expect potential investors to prefer being aware of large financial leases, even though they were not forced to be explicitly disclosed prior to the issuance of BFNAR 2012:1.

Simultaneously, there are multiple incentives to not voluntarily disclose information in general, and leases in particular. Firstly, managers prefer not to disclose voluntary information that regulators might later use against them and the company. Large corporations with high profits are less likely to voluntarily disclose information as it could have a great impact on the income tax. The higher the reported profits, the more taxes on business profits are being paid by a firm. Secondly, setting a disclosure precedent is one of the factors that reduce voluntary information disclosure, as it means that managers have to maintain the same pattern in the future. The different relevant external actors would consequently expect the company to be committed to the new disclosures and maintain them in the future, despite perhaps no longer benefiting from the voluntary disclosure. This provides an incentive for managers to reduce voluntary disclosures in order to avoid future complications, despite the fact that the voluntary action might be suitable today, it could very well create significant issues at a future stage (Shehata, 2014).

2.2 BFNAR 2012:1

Bokföringsnämnden, The Swedish Accounting Board, is the organization that regulates the K3-framework through national law of "Bokföringslagen" and "Årsredovisningslagen". The Swedish Accounting Board is not technically a legislative body of their own, however, their recommendations are effectively what results in changes to the national law. The Swedish Accounting Board updates the K3 framework through "Bokföringslagens allmänna råd", (BFNAR), which normally results in the same changes to national law. Consequently, the release of new BFNAR guidelines needs to be followed in order to obey the national law of annual reports. (Bokföringsnämnden, 2022a)

On 8th of June 2012 BFNAR 2012:1 was introduced. The effective date of which companies were to follow the guidelines was annual reports covering periods from 1st of January 2014. This new guideline meant large differences in terms of how to disclose leases, both regarding operating- and financial-. This new directive meant that firms under K3 had to recognise financial leases as an asset and as a liability. Furthermore, firms had to disclose the future payments of operating leases. Thus, liabilities concerning future lease payments, both on balance sheet and off balance sheet, now had to be disclosed as opposed to prior to the new issuance. (Bokföringsnämnden, 2022b)

2.3 Distinction between the different leases

In current lease accounting standards, there are two major categories of leases; operating- and financial leases. At first glance, the greatest contrast between the two is that the financial leases are required to be reported in the statement of financial position as an asset and a liability, whilst the operating leases do not have this requirement. However, apart from that apparent difference, the distinction between the two is not always as obvious as practitioners would prefer (Barone et al, 2014).

Despite the sometimes quite uncertain distinctions between the two main categories of leases, there are a few indicators to examine in order to more easily distinguish what type of lease a company is dealing with. At its core, a lease is to be classified as financial if the risks and rewards have been fully transferred from the lessor to the lessee. This is the simple definition used in BFNAR 2012:1 (Bokföringsnämnden, 2022b). However, as K3 is heavily influenced by IFRS, the K3 definition can more easily be understood by examining the criteria's under IFRS.
The criterias stipulated by IFRS for a lease to be classified as financial are whether:

- The ownership of the right-of-use asset transfers from the lessor to the lessee by the end of the lease period.
- A predetermined option is given to the lessee to purchase the asset at a price lower than its fair market value at a future date, generally speaking, at the end of the leasing term.
- The period of the lease lasts at least 75% of the useful economic life of the asset. Furthermore, the lease is noncancellable during this duration.
- The net present value of the minimum lease payments required under the lease exceeds substantially all (at least 90%) of the fair value of the underlying asset at the inception of the lease.
- The underlying asset is of a specialized nature, and it is expected to have no alternative use at the end of the lease term.

As a result, if none of the abovementioned criteria's are fulfilled, the lease agreement is to be classified as being of operating nature, rather than financing- (Corporate Finance Institute, 2022).

2.4 Corporate Governance

2.4.1 CEO internality

Graham et al. (2020) examines companies from the early 20th century up until the early parts of the 21st century. The paper partly explores the immediate impact of hiring an external CEO and discusses it thoroughly. They present data which supports that in year zero when an external CEO is appointed, the tendency of independent directors leaving their positions increases. As a result of this, dependent directors are in general instead added. This seems to prove consistent with the importance of an advisory role for internal directors when an external CEO is appointed. Further emphasis is put on the fact that as a result of an outsider CEO likely having less experience or expertise with the firm than an insider, hiring an outsider likely increases the benefit of having inside directors on the board. Their ability to provide the external CEO with firm-specific knowledge and appropriately advise her when necessary, could become essential.

In addition, Petrovsky et al. (2015) sees the impact of an external CEO from another perspective. The paper claims that the fit between a potential CEO, external or internal, and an organization, can be understood as the degree of overlap between capabilities of the successor and requirements of the organization in question. Hence, they point towards that the fit denotes the match between the CEOs previous experience and her new organization and the expectation of such. Thereby, not putting much emphasis on the fact whether the CEO is recruited internally or externally. In this view, an outsider from a different organization may serve as a bridge between organizations, thereby smoothing the relationship between them and improving performance. Furthermore, it may also result in the ability to shake up the old organizational culture and introduce new ways of running the organization.

Corsi & Prencipe (2019) further examines the differences between externally- and internally promoted CEOs. However, they explore whether there is a significant difference with regards to the promotion of innovation within a company depending on what type of CEO the firm has. The investigation is based on a sample of more than 13,000 European manufacturing SMEs. Their study supports the significant impact of the CEO on innovative activities and suggests that the effect is negative in the case of having an external CEO. Furthermore, their study also suggests that the effect in the case of internal CEOs is the opposite, meaning it is positive. The

findings remark that external CEOs may lack firm-specific knowledge and therefore display a negative effect on promotion of innovation within the company.
However, no research has been conducted with regards to whether the propensity to voluntarily disclose leased items is affected by the decision of hiring an internal- or external CEO. Despite this, the study by Corsi & Prencipe. (2019) may provide an idea of how the externality- and internality of CEOs may impact the propensity to opt for voluntary disclosure within the company. The propensity and eagerness to promote innovation closely relates to transparency and its connection has been studied by Brown & Martinsson (2018). Their paper suggests that the effect of transparency on innovation is significant and that: "transparency facilitates innovation by reducing the information costs associated with arm's-length financing." Thereby, by combining the findings from both Corsi & Prencipe (2019) and Brown & Martinsson (2018), there is an indication which indeed suggests a positive relation between internal CEOs and transparency, or voluntary lease disclosure.

In addition, Eng & Mak (2003) examine the impact of ownership structure and board composition on corporate disclosure within a Singaporean setting. They do not specifically shed light on the externality- or internality with regards to the CEO but put a lot of emphasis on externality among board members, and it could deepen our understanding of externals within high positions. Prior to conducting their tests, they expect an increased proportion of external directors to be positively associated with voluntary disclosure. The role of the board of directors is to monitor management decisions. Having a higher proportion of outside non-executive directors on the board could be expected to result in better monitoring of the activities by the board and limit managerial opportunism. Outside directors who are less aligned to management may be more inclined to encourage firms to disclose more information to outside investors. Then, they express the expectation that having more outside directors on the board will also result in more voluntary disclosure. However, in contrast to their expectation, they find that the increase in external directors actually reduces voluntary disclosure, which contradicts their hypothesis. They fail to find support for their result and do not manage to explain these findings. However, they imply that it might be a result of their relatively small sample size.

2.4.2 Women in leading positions

Even though few papers have been published with regards to whether having a female CEO or a large proportion of women on the board fosters voluntary disclosure, or vice versa, extensive research has been conducted with regards the perception of transparency between women and

men in general. Examining this prior research may provide a foundation of what to expect when testing our constructed models with regards to how gender affects the propensity to voluntarily disclose leases.

Ibrahim & Angelidis (1994) provides information with regards to gender differences in a corporate environment, inspecting the gender of all board members within the sampled companies. Their analysis consists of roughly 400 corporate directors where a comparison is made between men and women with regards to which group has the stronger orientation toward the discretionary component of corporate responsibility. The study concludes that male board members are more concerned about economic performance in comparison to their female counterparts. Furthermore, they imply that women instead show more interest in the discretionary component of corporate responsibility, in comparison to their male counterparts. Lastly, the paper presents results which support no other significant differences between the genders with regards to what they tested for. Both with respect to the legal dimensions, but also with respect to the ethical dimensions.

Furthermore, Berger et al. (2014) supports what previous literature already suggests. Namely, that women indeed are not as inclined to prioritize economic performance above everything else. They also suggest that women are more risk-averse in comparison to men. Arriving at the conclusion that female board members are much more reluctant to undertake large risks when it comes to financial decision making in comparison to their male counterparts.

Croson et al. (2009) also support previous studies with regards to behavioral differences between men and women. The article reviews the experimental literature on gender differences in three categories: risk preferences, social preferences, and competitive preferences. The paper identifies differences with regards to all of these preferences. Furthermore, they mention that each of these has implications for the economic decisions that men and women make in labor and product markets. With regards to risk-aversion, the majority of studies conducted indicate that women are more risk averse than men and the paper suggests a list of possible underlying mechanisms behind these differences. Specifically denoting emotions, framing and overconfidence as three fundamentals. Regarding social preferences, a number of studies are also presented which further indicate that women's social preferences are different from men's. Though, the results presented with regards to these studies are varied. The paper does however suggest an organizing explanation that relies on the observation that women are more sensitive

to social cues in comparison to men. This leads to higher variability in women's behavior than in men's, which is observed both within experimental studies and between studies. When examining the difference with regards to preference for competitive situations the paper concludes that women on average do not prefer these situations to the same extent as men do. They pose the question whether this behavior is taught or ingrained but suggest that the behavior most likely is a combination of the two.

Lastly, Borghans et al. (2009) examine the differences between genders and their risk aversion and ambiguity aversion, which essentially is defined as our preference for known risks over unknown risks. They investigate how the willingness to pay increases when the degree of ambiguity is reduced. Furthermore, they analyze the extent to which differences in the evaluations of risk and ambiguity are related to cognitive- and personality traits. The analysis confirms findings from previous literature, that women are more risk-averse than men. Furthermore, women initially respond to ambiguity much more favorably than men. In their specific setting this indication relates to a reservation price that does not decline in the experiment they conduct. However, as ambiguity increases, men and women show similar marginal valuations of ambiguity. They mention that psychological traits are strongly associated with risk, but not with ambiguity. Adjusting for psychological traits explains a small portion of the gender difference in risk aversion but none of the difference in ambiguity aversion.

2.4.3 Board size

The number of board members is something that tends to vary from company to company. The construction of board members and the number of those will of course in one way or another impact the firm and its perception, both internally and externally. By researching current literature with regards to board size and its impact on risk-taking, we will obtain an increased understanding of how the size of the board may or may not impact the propensity to voluntarily disclose leases.

Chia-Jane Wang (2012) investigates just that, namely whether the size of the board influences risk-taking. Wang's exploration culminates in significant results which supports her hypothesis. One of her findings is that: "The managerial pay to firm risk sensitivity is negatively related to board size", thereby suggesting that smaller boards give CEOs larger incentives and force them to bear more risk than larger boards. Furthermore, the study finds that companies with smaller

boards take on lower leverage but instead opt for more risky investments. Finally, after controlling for the effects of financial decisions on overall firm risk, the report concludes that companies with smaller boards are associated with higher future risk. This supports her hypothesis that board size indeed has a negative impact on a firm's risk taking. The paper could very well provide guidance for what to expect when performing our tests, as the two subjects of voluntary disclosure and risk-taking could be expected to somewhat correlate.

Berger et al. (2014) examine the connection between board composition and risk-taking and it could provide us with further insights. Furthermore, using the board size as a controlled variable within their study and motivating the decision as follows: "a change in board size may affect the strategic alignment and corporate outcomes (...) For example, it is very likely that adding an additional senior executive (...) impacts the team's decision-making process". Thereby implying that a larger board will result in a different type of behavior, than a smaller board. However, they are cautious with regards to the magnitude of the impact, and also whether a larger board size would increase- or decrease the likelihood of voluntarily disclosing items.

Donnelly & Mulcahy (2008) adds to the discussion and specifically examines board structure as a determinant of voluntary disclosure within Irish publicly listed companies. They report empirical evidence which supports the fact that voluntary disclosure increases with the number of non-executive directors present on the board. However, this finding is not robust to the inclusion of other explanatory variables. Simultaneously, they also display multiple signs indicating that there is no support for whether board size itself has any impact on voluntary disclosure. They take support from other empirical studies and establish an uncertainty with regards to whether the number of board members within a firm has a positive or negative impact on voluntary disclosure. Actually, they cannot display evidence that supports any impact at all, no matter whether it is positive or negative. They thereby conclude by mentioning that the relation between board size and levels of voluntary disclosure to a large extent remains an empirical issue.

2.5 Hypothesis development

The theoretical framework provided above, creates a foundation for the study we intend to conduct. As established, we want to test for the determinants of voluntary disclosure and we will do so by specifically analyzing three questions.

First, we will test for the significance of having an internal- or external CEO. By analyzing the papers published by Corsi & Prencipe (2019) and Brown & Martinsson (2018), a nuanced idea of how the externality of a company CEO affects the perceived likelihood of voluntary disclosure starts to emerge. Corsi & Prencipe (2019) firmly establishes the argument that internal CEOs to a higher extent promote innovation, in comparison to CEOs who instead are externally appointed. Brown & Martinsson (2018) manages to connect this promotion of innovation with voluntary disclosure. Namely, their paper establishes a connection between the promotion of innovation and the transparency of the firm. Their paper argues that transparency feeds the promotion of innovation within a company. Furthermore, Eng & Mak (2003) also find empirical support which suggests that external presence within the governing body of the company actually reduces voluntary disclosure. Thereby, the hypothesis is as follows:

H1: There is a significant and positive relationship between having an internal CEO and voluntary disclosure of leases

In previous literature that instead focuses on gender and more specifically how the gender of the CEO impacts the tendency to voluntarily disclose items, the findings are not contradictory to any extent. Ibrahim & Angelidis (1994) suggest that men in general are more incentivized to opt for a behavior that results in economic gain, in comparison to women. Furthermore, Berger et al. (2014) suggest that women are more risk-averse in comparison to men. Concluding that female board members are much more reluctant to undertake large risks when it comes to financial decision making in comparison to men. Both Croson et al. (2009) and Borghans et al. (2009) also support the idea that women are more risk-averse in comparison to men. With support from prior literature with regards to suggested behavioral differences in connection to risk-aversion and economic incentivization, our hypothesis constructs as follows:

H2: There is a significant and positive relationship between female gender of company leaders and the propensity to voluntarily disclose leases

In connection to H2, two separate sub hypotheses are derived as follows:

H2.1: There is a significant and positive relationship between having a female CEO and the company voluntarily disclosing leases

H2.2: There is a significant and positive relationship between a high proportion of females on the board and voluntary disclosure of leases

Examining the literature with regards to the number of members on the board and how that number affects the tendency to opt for voluntary disclosure within a company, we initially turn our heads towards Wang (2012). The study, as previously mentioned, suggests that smaller boards have a higher propensity to take larger risks. Both Wang (2012) and Berger et al. (2014) point towards some relation between risk-taking and board size. Although it is not empirically established to conclude a direct relation between risk-taking and voluntary disclosure, there seems to be a connection between the two if examining prior literature Hence, the proposed hypothesis is as follows:

H3: There is a significant and negative relationship between board size and voluntary disclosure of leases

3. Methodology

3.1 Sample selection & data collection

In order to conduct tests concerning our hypotheses, we obtained a dataset of Swedish private firms through Serrano, initially removing all firms that did not provide a consolidated annual report. By doing that, we managed to keep firms that generally operated under K3. We also removed all firms that at some point had operated under IFRS standards. From that point, in order to obtain the actual lease data, we manually inspected the annual reports for both 2013 and 2014 for relevant firms and individually retrieved the disclosed amount for future minimum operating lease payments as well as the financial leases on the balance sheet. By inspecting the annual reports when collecting the lease data, we noticed three data points of high relevance and focused on retrieving all of these three specific values if available. Firstly, the leases disclosed in 2013 as depicted in the annual report of 2013. Secondly, the leases disclosed in 2014 as depicted in the annual report of 2014. Lastly, the leases possessed by a company during 2013 as depicted in the annual report of 2014. As most annual reports are constructed differently, not all firms provided the actual lease amount of 2013 within the annual report of 2014. However, for those firms that provided that data, it was compiled. The reason behind collecting all three of these values is that they all provide for increased understanding:

The leases disclosed in the annual report of 2013 provide a basis for understanding what leases were voluntarily disclosed prior to the issuance of the new K3 standards.

The leases disclosed in the annual report of 2014 then show the total amount of leases possessed in 2014. However, this number is used as a proxy to distinguish the value of the leases actually possessed in 2013. Thereby, the difference between the two years' leases is equal to the leases that were not on the books in the annual report of 2013, despite the firm being in possession of them.

However, when the actual value of leases for 2013 is retroactively disclosed in the annual report for 2014, there is no longer a need to make the explicit assumption that what is disclosed in 2014 was present in 2013. As a direct result of the retroactive disclosure, we manage to obtain the actual value of leases possessed in 2013 without having to make any assumptions. Hence,

for the firms that perform this retroactive disclosure, the difference between that number and the leases disclosed in the annual report of 2013 create the difference used in our model.

When retrieving the lease data, the number of lease mentions within the report was used as a proxy for how lease heavy the individual companies were. Thus, data on operating- and financial leases was then gathered based on the variable *lease_count*, i.e number of times the word "lease" was mentioned in the annual report. Data was gathered from both annual reports with *lease_count* starting at the maximum number of mentions of 296, until the number of mentions reached the lower threshold of 18 in any of the year's annual reports. Firms with lower mentions of "lease" tended to not have any leases, as the word only was stated in formal explanations of relevant reporting rules. Considering that the sample mostly consisted of companies only having operating leases, the data gathering was furthermore extended by basing it on the variable *fin_lease*, i.e number of times "financial lease" was mentioned in the annual report. The reason being to try to attain as much tangible data concerning financial leases as possible and avoid retrieving zeros. With regards to that variable, data was gathered from both annual reports with fin_lease starting from the maximum number of mentions of 19, until the number of lease mentions reached the negative threshold of 1 mention in any of the year's annual reports. After manually compiling the data, it left us with a balanced panel dataset consisting of 1,048 firms over two years, and therefore 2,098 total observations. Where all firms either had 18 or more total lease mentions, or 1 or more financial lease mentions in either of the two inspected annual reports, 2013 and 2014.

The dependent variables constructed from the gathered data have gone through a 99% winsorization in order to remedy the presence of extreme outliers. By doing so, the sample and the test results become more robust due to the reduced distortion of the existing outliers.

3.2 Variables

3.2.1 Dependent variables:

The dependent variables of our constructed models are $FinDiffSales_i$ and $OPDiffSales_i$. The first dependent variable, *FinDiffSales*, refers to the difference between financial leases disclosed in 2014 and financial leases disclosed in 2013, divided by net sales. The second dependent variable, *OPDiffSales*, refers to the difference between operating leases disclosed in 2014 and operating leases disclosed in 2013, divided by net sales in 2013. The dependent variables thus

aim to capture the proportion of undisclosed financial or operating leases to net sales in 2013. A highly positive number of the dependent variables indicates low voluntary disclosure, as the disclosed amount of operating or financial leases is higher in 2014 than the disclosed leases of 2013. A value close to 0 indicates high voluntary disclosure, as the disclosed operating or financial leases in 2013 are similar or higher compared to the amount in 2014. All negative values of the dependent variables were transformed to 0 in the construction stage. In these instances the disclosed leases in 2013 were higher compared to the disclosed leases in 2014. This indicates full disclosure and the difference only refers to a reduction in the actual leases held between the two years, which should not be captured by our dependent variables.

The objective of the dependent variables is to capture the amount of undisclosed operating- or financial leases in 2013. As BFNAR 2012:1 required all firms in the sample to abruptly disclose all their leases in the 2014 annual report, we are able to approximate the amount of operating- and financial leases that the firm had in 2013 but did not disclose. Thus, using the difference between the amount of disclosed leases in 2014 and 2013, we can approximate the amount of undisclosed leases in 2013. In the construction of the dependent variables we thus assume the amount of leases carried in 2014 to be a proxy for the actual amount carried in 2013. As there is only one year apart, we expect no large structural difference in how much leases the firms on average will have. Some firms will naturally pay off, or increase their leases between the two years, however, on average the two effects are expected to generally mitigate each other. Some firms in the sample retroactively disclosed the amount of leases they had in 2013 in the annual report of 2014. In these instances we were able to obtain the amount of leases held according to the BFNAR 2012:1 regulations for both years. Paired t-tests are performed on these firms for operating and financial leases as depicted in Appendix 4 & 5. These two t-tests do not show any significant differences in the mean amount of operating or financial leases held between the two years for the firms reporting according to the BFNAR 2012:1 regulations for both years. This further indicates no significant structural change in the actual amount of leases held during the two years. This strengthens the viability of our dependent variables being good proxies for capturing the amount of undisclosed leases. Still, we need to consider that the majority of the firms within the total sample does not provide lease amounts for 2013 according to BFNAR 2012:1 regulation. Consequently, these t-tests only confirm no significant differences in the amount of actual leases held between the years for a part of the total sample. However, in combination with the theoretical reasoning of no structural differences in such a short period,

we can assume that the dependent variables mostly capture differences in terms of disclosure of leases and not differences in the actual amounts held.

3.2.2 Independent variables:

The independent variables within our models are distinguished to control for certain aspects. For H1 we will use the variable *IntCEO*, which refers to whether the CEO of the firm is internal or external. Essentially, whether the CEO of the private firm also is a member of the company board, or not. When the variable undertakes the value 1, it indicates that the CEO is internal and thereby also a member of the board.

Secondly, we furthermore intend to test for whether the gender of people within leading roles in the company impacts the propensity to voluntarily disclose leases. Both the proportion of women on the board, as well as having a female CEO will be inspected with regards to whether it has an impact on the tendency to voluntarily disclose leases. Therefore, FemCEO will be used for investigating H2.1 and *FemProp* for investigating H2.2. Similarly to the instance regarding the variable *IntCEO*, the variable *FemCEO* is also binary. 0 if the CEO is a male, and 1 if the CEO instead is a female. The variable FemProp may only undertake values between 0 and 1. 1 meaning that all people present on the board are women and 0 meaning that none of the people on the board are female. Consequently, confirming that all instead are men in that case.

Thirdly, we opt to explore whether the number of members on the board affect the tendency to disclose leases on a voluntary basis. As a result of this circumstance, the variable *N_board* will be an independent variable of relevance of testing H3. Furthermore, the variable will only undertake positive discrete values. The reason being a member either fully exists (1) or does not exist (0). Together they accumulate and reach the total sum of board members, a discrete positive value.

In accordance with the findings of Andersen & Dejoy (2011) and with the model used by Francis et al. (2009) in consideration, there are a few variables that should be controlled for, when performing tests involving corporations. Primarily, a variable should be added to control for the firm size. To distinguish the firm size, net sales and total assets are used as proxies. Secondly, also in line with Andersen & Dejoy (2011), a variable should control for the leverage of the firm. This procedure is done by analyzing the companies and their debt to equity ratio

(D/E). Thirdly, a variable that controls for the industry fixed effects is relevant when constructing models with regards to corporations.

Eng & Mak (2003) examine voluntary disclosure and find that larger firms have greater voluntary disclosure. Similarly, firms with lower debt also disclose more information on average in comparison to firms with higher debt. The inverse relationship between debt and disclosure, presented in the paper, is consistent with debt being a mechanism for controlling the free cash flow problem, reducing the need for disclosure and is consistent with other findings. This further supports the importance of controlling for both the firm size and the debt to equity ratio within the companies, to get consistent results on our tests.

Furthermore, in alignment with Bassemir (2018) additional controls will be added with regards to the profitability for the firms. ROA, ROE, total sales, and net profit margin are all added to the models. The variable regarding total sales is of logarithmic character, in order to remedy the otherwise extreme variance that would be present. Lastly, additional controls will be added to mitigate the impact of asset structure within the sampled firms. This procedure is done by adding the total amount of assets and the asset turnover. Similarly, to the use of total sales, the logarithmic version of total assets is also used. The motive being to once again cluster the values in an efficient way and thereby avoid extreme variance.

All independent variables in the regressions are based on values for 2013. Even though the dependent variables are constructed using panel data there is no need to account for time differences regarding the independent variables. The model aims to capture the effect on voluntary lease disclosure in 2013 by using the amount of leases disclosed in 2014 as a control for actual leases held in 2013. Thus, the model solely captures the amount of undisclosed leases in 2013 and consequently the only independent variables of interest are those of 2013.

Apart from the already presented variables which we intend to control for, we will furthermore control for the industry in which the companies operate. The sampled firms are pre-divided into 13 different industries in the data file we obtained via Serrano. In order to control for the industry of which the firms operate in, industry fixed effects are added to our models. This is done through 12 dummy variables in the regressions to adjust the intercept based on the industry in which the firm operates. The distribution of industries for the firms in the sample are

presented in Appendix 1. The most common industry, "commercial services", is not given a dummy variable to avoid the "dummy trap" and corresponding issues with multicollinearity.

Table 1: Variables

Variables	*Definition*	*Use*	*Source*
OPDiffSales	2014 disclosed operating leases - 2013 disclosed operating leases. Scaled by net sales in 2013 *When available: operating leases in 2013 from 2014 AR - operating leases in 2013 from 2013 AR. Scaled by net sales in 2013 *Negative values removed.	Dependent Proxy for voluntary operating lease disclosure	Annual Reports
FinDiffSales	2014 disclosed financial leases - 2013 disclosed financial leases. Scaled by net sales in 2013 *When available: financial leases in 2013 from 2014 AR - financial leases in 2013 from 2013 AR. Scaled by net sales in 2013 *Negative values removed.	Dependent Proxy for voluntary financial lease disclosure	Annual Reports
BoardM	Number of board members	Independent Determinant for H3	Annual Reports - Supervisor
IntCEO	Internal or external CEO. 1 if internal CEO 0 if external CEO	Independent Determinant for H1	Annual Reports - Supervisor
FemCEO	Female or Male CEO 1 if female CEO 0 if Male CEO	Independent Determinant for H2.1	Annual Reports - Supervisor

Table 1 Continued

Variables	*Definition*	*Use*	*Source*
PropFem	Proportion of females in the board	Independent Determinant for H2.2	Annual Reports - Supervisor
DE	Debt to equity ratio	Independent Control variable for leverage	Serrano
lnTotAs	Natural logarithm of total assets	Independent Control variable for firm size	Serrano
lnSales	Natural logarithm of total sales	Independent Control variable for firm size	Serrano
AsTu	Asset turnover	Independent Control variable for capital structure	Serrano
ROA	Return on assets	Independent Control variable for profitability	Serrano
ROE	Return on equity	Independent Control variable for profitability	Serrano
PM	Net profit margin	Independent Control variable for profitability	Serrano
(Industry)	What industries the firms operate in. 12 dummy variables for 13 different industries	Independent Control variable	Serrano

3.3 Model Construction

The two models are constructed to explain the difference between the disclosed book value of leases for 2014 and 2013. Model 1 captures the voluntary disclosure of operating leases, meanwhile Model 2 instead captures the voluntary disclosure of financial lease. The models include multiple controls with regards to firm size, capital structure, profitability, leverage, and lastly multiple dummies are introduced to control for the different industries within which the sampled firms operate.

The dependent variables are, as previously mentioned, scaled, i.e., the difference in disclosure between the two years is divided by sales. The procedure ensures that the large differences in firm size is accounted for. However, to control for certain variables, absolute numbers are necessary and therefore make up part of the model. Despite the presence of absolute numbers, these are of logarithmic character. The reason being to once again control for the extreme differences in the absolute numbers.

3.4 Models

$$FinDiffSales_i = \beta_0 + \beta_1 FemCEO_i + \beta_2 IntCEO_i + \beta_3 BoardM_i + \beta_4 PropFem_i + \beta_5 DE_i \ \beta_6 lnTotAs_i + \beta_7 lnSales_i + \beta_8 AsTu_i + \beta_9 ROA_i + \beta_{10} ROE_i + \beta_{11} PM_i + \beta_{12} Ind1_i + \beta_{13} Ind2_i + \ldots + \beta_{23} Ind12_i + \varepsilon_i \quad (1)$$

$$OpDiffSales_i = \beta_0 + \beta_1 FemCEO_i + \beta_2 IntCEO_i + \beta_3 BoardM_i + \beta_4 PropFem_i + \beta_5 DE_i \ \beta_6 lnTotAs_i + \beta_7 lnSales_i + \beta_8 AsTu_i + \beta_9 ROA_i + \beta_{10} ROE_i + \beta_{11} PM_i + \beta_{12} Ind1_i + \beta_{13} Ind2_i + \ldots + \beta_{23i} Ind12_i + \varepsilon_i \quad (2)$$

4. Results and Analysis

4.1 Descriptive statistics

The descriptive statistics are presented in two separate tables due to the different characteristics of the variables. Table 3 presents the descriptives for all continuous variables, whilst Table 2 instead depicts the descriptive statistics for the binary- and ordinal variables.
When inspecting Table 2, roughly 8.1% of all CEOs in our sampled companies seem to be women. Intuitively, the remaining 91.9% of companies have a male CEO instead. Furthermore, most CEOs appear to be part of the board and are therefore classified as internal. In fact, as much as 81,9% of sampled CEOs are classified as internal as a result of their presence on the board. Regarding the number of board members, the majority of the sampled companies appear to have either 3, 4 or 5 members present on the board, with the mode being 3.

When inspecting table 3 the difference in financing leases is substantially smaller in comparison to the difference with regards to operating leases. The maximum values with regards to the two dependent variables initially present some extreme outliers. To remedy the possibility of the outliers skewing the data, the sample has gone through a 99% winsorization. As a result of that procedure, all values fall below 1. This implies that no firm within the presented sample has experienced a difference in disclosed leases amounting to the total sales of the company, which is intuitive. With regards to the minimum values for the two dependent variables, they are both equal to zero. The reason for this difference is as previously described the result of the procedure of setting all negative values as zero. The presence of 0 as minimum value for the dependent variables thus indicates that there are firms within the sample which disclosed all their leases in 2013.

Table 2: Frequency table for binary- and continuous variables

Frequency	*0*	*1*	*3*	*4*	*5*	*6*	*7*	*8*	*(9 - 16)*	***Mean***
FemCEO	963	85	-	-	-	-	.-	-	-	.081
1ntCEO	190	858	-	-	-	-	-	-	-	.820
BoardM	-	117	214	183	150	86	50	18	39	3.770

Table 3: Descriptive statistics for continuous variables

Variables	*Mean*	*St. dev.*	*1st quart.*	*Median*	*3rd quart.*	*Min*	*Max*
FinDiffSales	.019	.058	.000	.000	.012	.000	.432
OPDiffSales	.068	.200	.000	.006	.050	.000	1.530
PropFem	.181	.255	.000	.000	.333	.000	1
DE	5.667	63.742	.187	.687	1.776	-.000	1,866.600
TotAs*	49,900	236,000	6,060	12,600	32,600	109	4,990,000
Sales*	63,400	32,100	10,100	19,500	44,500	.000	6,750,000
AsTu	.532	1.068	.000	.050	.513	.000	10.689
ROA	.096	.315	.000	.045	.141	-6.605	2.462
ROE	-.200	5.482	-.014	.062	.252	-158.106	15.296
PM	-1.015	27.778	-.003	.016	.050	-888.136	1.203

*Numbers for TotAs & Sales are in 10,000 SEK.

4.2 Diagnostics

4.2.1 Multicollinearity

None of the variables have a higher VIF than 3.730. This is sufficiently low to consider the regressions free from substantial multicollinearity issues. Furthermore, the mean VIF at 1.570 is also low and does not inflict any issues regarding the validity of the regressions.

Table 4: Variance Inflation Factor

	IntCEO	*FemCEO*	*BoardM*	*PropFem*	*DE*	*lnTotAs*	*AsTu*	*ROA*
VIF	1.230	1.160	1.410	1.180	3.730	3.090	1.230	1.180
	ROE	*PM*	*Ind1*	*Ind2*	*Ind3*	*Ind4*	*Ind5*	*Ind6*
VIF	3.790	1.180	1.090	1.060	1.380	1.160	1.180	3.790
	Ind7	*Ind8*	*Ind9*	*Ind10*	*Ind11*	*Ind12*		***Mean***
VIF	1.180	1.090	1.060	1.380	1.160	1.070		**1.570**

4.2.2 Heteroscedasticity

In order to test for heteroscedasticity, Breusch-Pagan tests were conducted on both the model regarding financial leases and the model regarding operating leases. As depicted in Table 5, both tests are significant at all levels, which implies heteroscedastic errors. The reason for the errors being of heteroskedastic nature is intuitive as the values for the residuals naturally differ immensely between the sampled companies, as a direct consequence of the large difference in firm size. However, the issue regarding heteroskedasticity in residual distribution is accounted for by using Huber-White residual errors in the regressions.

Table 5: Breusch-Pagan

H0 = Constant Variance	*Model 1*	*Model 2*
Chi2(1)	484.930	613.060
Prob > Chi2	.000	.000

4.3 Regression results

Table 5 presents the regression of the dependent variable *FinDiffSales* with Huber-White std. errors. The model possesses an R^2 of .117. When inspecting the output it may be noticed that one of our four investigated determinants is significant. The variable *PropFem* has a p-value of .034, meaning that it is significant at a 5% level. Furthermore, the variable presents a negative sign which would suggest that an increase in female presence on the board, would consequently lead to a decrease in the dependent variable. A decrease in difference between leases disclosed

in 2014 and 2013 does in turn suggest a greater voluntary disclosure. The findings are therefore supportive of H2.2. Apart from *PropFem*, none of the remaining three determinants present any significance. Furthermore, the presented magnitude with regards to the three other dependent variables is minimal which would suggest that even if the findings were significant, the impact itself would be very low.

Table 6 presents the regression of the dependent variable *FinDiffSales* with Huber-White std. errors. We see that it has an R^2-value lower than the previous model, namely: .064. Furthermore, no significant results with regards to the investigated possible determinants is presented. Even though there are no significant values with regards to the four independent variables, *IntCEO* is close to being significant at a 10% level. With a slightly lower p-value, this would suggest that the presence of an internal CEO would decrease the voluntary disclosure. However, the findings are not significant and no conclusions can therefore be drawn with regards to our determinants in the particular model.

However, inspecting the two models there are multiple significant variables at various levels amongst our controls. *ROE*, *ROA*, *lnSales* and *lnTotAs* all present significant values. *ROE* and lnSales presenting significant values in both models.

Table 6: Model 1 regression

FinDiff Sales	*Coefficient*	*Robust std. err.*	*t*	*P > | t |*	*Lower 95% conf. int.*	*Upper 95% conf. int.*
BoardM	.000	.001	.420	.673	-.002	.002
IntCEO	.001	.005	.170	.865	-.010	.012
FemCEO	-.001	.008	-.070	.948	-.016	.015
PropFem	-.014	.007	-2.120	.034**	-.028	-.001
D/E	-.000	.000	-.250	.802	-.000	.000
lnTotAs	.002	.003	.700	.485	-.003	.007
lnSales	-.007	.004	-1.960	.050*	-.014	.000
AsTu	.003	.004	.660	.511	-.005	.010
ROA	.015	.008	1.790	.074*	-.001	.031
ROE	-.003	.001	-3.820	.000***	-.004	-.001
PM	-.000	.000	-.340	.732	-.001	.001
Constants	.111	.035	3.210	.001***	.043	.179

$R^2 = .117$ Prop F > 0 = .000

See Appendix 2 for extended regression results with coefficients of industry dummies included

Table 7: Model 2 regression

OPDiff Sales	*Coefficient*	*Robust std. err.*	*t*	*P > | t |*	*Lower 95% conf. int.*	*Upper 95% conf. int.*
BoardM	-.002	.003	-.700	.482	-.008	.004
IntCEO	.019	.012	1.600	.111	-.004	.042
FemCEO	-.006	.022	-.290	.775	-.051	.038
PropFem	-.010	.023	-.430	.667	-.056	.036
D/E	.000	.000	.150	.881	-.000	.000
lnTotAs	.019	.009	2.190	.029**	.002	.035
lnSales	-.031	.011	-2.930	.004***	-.052	-.010
AsTu	.012	.009	1.390	.164	-.005	.029
ROA	-.006	.027	-.240	.812	-.059	.046
ROE	-.003	.002	-1.950	.051*	-.006	.000
PM	.000	.001	0.190	.853	-.002	.003
Constants	.300	.103	2.920	.004***	.099	.501

R^2 = .064 Prob F > 0 = .000

See Appendix 3 for extended regression results with coefficients of industry dummies included.

5. Discussion

5.1 Analysis of regression results

As previously established, one of our two models display significant coefficients with regards to one out of our four investigated variables. As a direct consequence, we fail to accept both H1 and H3. However, significant output with regards to part of H2 is presented. Despite managing to present some significant findings, they are contradictory.

Our first hypothesis questioned whether having an internal CEO would foster voluntary disclosure of leases. Both the regression regarding financial leases, and the regression regarding operating leases present no significant impact. The coefficient for having an internal CEO does in both regressions have a p-value above the required .05 to make it significant at the desired level. Furthermore, the hypothesized finding was to discover a decrease in the dependent variable. Thereby, a negative sign was expected in connection to the coefficients, something that was not present. Below we will be discussing potential explanations for our nonsignificant findings with regards to H1.

There was little to no literature suggesting whether an internal CEO would impact the propensity to voluntarily disclose information either positively or negatively. However, by combining findings from both Corsi & Prencipe (2019) and Brown & Martinsson (2018) we thought we could see a connection between the two variables that apparently was not supported by our regression.

The second hypothesis of which we conducted tests relates to whether there are any gender differences connected to the propensity to voluntarily disclose leases. The hypothesis is divided into two sub hypotheses in order to first investigate whether a female CEO would foster increased voluntary disclosure. Furthermore, a higher proportion of females on the board was also hypothesized to foster similar behavior. The first hypothesis of the two, displays p-values that are not significant at any level. However, the second sub hypothesis displays significant values in the model regarding financing leases. The relevant variable has a P-value of .034 and is therefore significant at a 5% level. The sign being negative furthermore suggests that a higher proportion of females at the board would result in a decreased difference between disclosed financing lease, i. e. more voluntary disclosure. Despite the significant findings with regards to

the financing model, the operating model suggests no significant impact. The very different implications provided by the two models will be discussed below.

The difference in construction between Model 1 and Model 2 is nonexistent. The models are constructed as a direct replication of each other, the only difference being the type of leases they investigate. Given that the findings are so different between the models, suggest that there are some significant differences between the numbers of the dependent variables. The reasons behind the contradictory results might be a result of a too small sample with regards to financial leases. Despite obtaining values for financial leases for more than 1,000 Swedish private firms, a lot of the reported numbers were 0. The majority of reported values being clustered around the minimum value could skew the reported data and consequently create very different outputs in comparison to *OPDiffSales* where a much smaller proportion of reported values were equal to 0.

Our last hypothesis tests for whether the board size of firms impact the propensity to voluntarily disclose leases. Similarly, to the case of H1, both the regression regarding financial leases and the regression regarding operating leases display coefficients of very low magnitudes. Furthermore, and more importantly, they fail to be significant at a 5% level.

By inspecting previous literature, there appears to have been no reported connection between the number of board members and the propensity to voluntarily disclose information of any kind. It being a seldom researched area may derive from the fact that there indeed is no connection to be reported. Despite this, Wang (2012) poses the idea of a connection between smaller boards and increased risk-taking. However, the paper uses a small sample and investigates public firms in a Singaporean setting. Therefore, it might be unreasonable for us to expect the findings to be transferable to our investigation. Partly because, private firms and public firms pose varying characteristics and the expectation and anticipation for the findings being similar might therefore not have been supported enough to make.

5.2 Validity and reliability

The main potential sources of validity issues concern the construction and the data gathering for the dependent variables. Our dependent variable is novel and has not been tested in earlier studies. As already described in section 3.2, there is a possibility that our dependent variables

do not solely capture the amount of undisclosed leases, but also partially the change in actual leases possessed. The issue with trying to gather data on something that is undisclosed lies in the very definition of the word. Consequently, it can only be done through an approximation. Although our dependent variables may come close to capturing the amount of undisclosed leases they are still an approximation and not necessarily an exact representation of the actual numbers.

Furthermore, the data gathering of the dependent variables required manual gathering from the annual reports. This may invoke reliability issues regarding the human factor. Even though the data gathering process was very meticulous there is always risk of human error in such a large sample with annual reports of different structures. As already mentioned in section 3.1, the data gathering was prioritized from highest amount to lowest in terms of the times words related to leasing were mentioned within the annual reports. This was necessary in order to obtain a sufficient sample size of companies owning leases in any of the two years. However, this could potentially be a source of sample bias as it cannot be considered as an entirely random sample of firms.

6. Conclusion

From the very beginning, the purpose of this study has been to dissect what determinants play part in increasing the propensity to voluntarily disclose information in general and leases in particular. In order to investigate this, we turned our attention towards Swedish private firms as the issuance of new rules with regards to disclosure provided an opportunity to more easily examine the particular behavior. Specifically, we focused on three different determinants: CEO externality or -internality, gender within leading positions and number of board members.

Previous literature concerning external- and internal recruitment of people within leading positions suggests that internals foster voluntary disclosure to a greater extent than externals (Eng & Mak, 2003). We fail to find a significant connection between having an internal CEO and voluntary disclosure, nor do we find signs of the opposite. Thus, our study seems to suggest that there is no significant connection between whether a CEO is part of the board or not, and how the firm chooses to voluntarily disclose information. Prior literature with regards to differences between men and women suggests that increased female presence within leading positions implies more risk-aversion (Borghans et al., 2009; Croson et al., 2009; Berget et al., 2014). Furthermore, it suggests that women are not as inclined to care about economic performance as men (Ibrahim & Angelidis, 1994; Berger et al., 2014). With regards to the gender of the CEO we fail to present a significant impact on voluntary disclosure. However, with regards to the proportion of women on the board we do display a significant relationship in one of our models which suggests that by an increased presence of female board members, the firm voluntarily discloses more financing leases than it otherwise would. When inspecting prior literature with regards to how the number of board members impact voluntary disclosure the findings are not clear. They suggest that there seems to be a connection between the board size and risk-taking and that a smaller board would imply greater risks (Wang 2012). Simultaneously, there is nothing that explicitly suggests whether the board size would increase or decrease the amount of voluntary disclosure. Examining determinants in connection to voluntary disclosure has been done in many settings, during multiple different time periods and on firms of varying character. However, we opted to extend this research both by targeting seldom researched determinants, but also by analyzing the Swedish setting and its private companies. We only manage to find one of the researched determinants as significant at a 5% level: Female proportion on the board. We display a positive relationship in one of our models which suggests that an increase in female proportion on the board results in increased voluntary

disclosure of financial leases. However, our second model suggests that there is no relation between the two variables. The findings could perhaps be related to the generally higher risk-aversion amongst females, but it is nothing we can conclude on with certainty as the results are contradictory.

Although we manage to present the connection mentioned above, our study has some limitations that must be taken into account. First, we could have inspected more possible determinants of voluntary disclosure. We now explore the impact of three seldom researched determinants and manage to find one significant result. Which most probably suggests that there are various other determinants that have not been extensively researched but still pose great significance. Second, previous literature suggests that there are differences not only within countries, but also between countries (Francis et al., 2009; Gassen & Sellhorn, 2006). Our study does not account for any country-specific variables which could pose some issues with regards to its validity in other settings. Lastly, the model that displays significant results does not cover voluntary disclosure of all leases within Swedish private firms, but exclusively depicts a significant relationship with regards to financing leases. Thus, conclusions are required to be drawn with caution as our study does not provide any conclusive findings. Despite this absence, the study does provide inspiration for future research.

6.1 Future research

There are many potential scopes of future research that could extend to our paper. Firstly, the BFNAR 2012:1 is only one of many regulatory changes to the many reporting frameworks around the world. Thus, there is the possibility to investigate other settings both in terms of different countries and in terms of different financial items. Furthermore, the research could also be extended by investigating other determinants of voluntary disclosure. There is the possibility to examine more variables concerning corporate governance and firm leadership, but also to focus on variables that relate to financial performance or differences between industries.

As already reviewed in section 2.1, with Bassemir (2018), Francis et al. (2009) and Shehata (2014), extensive research has been conducted on the consequences and incentives of voluntarily disclosing financial items. However, this subject could be researched further by investigating the consequences for firms deciding to disclose non-mandatory financial

information. In terms of the setting of this paper, the impact on cost of debt as a result of the voluntary disclosure of leases could be an interesting research topic. This could contribute to the current line of research regarding the financial impact due to the implementation of current regulatory changes such as IFRS 16. Thus, by using settings similar to the one in this paper, one may compare firms which voluntarily did disclose information that later became mandatory through a regulatory change. By comparing the financial impacts on the firms which did voluntarily disclose compared to the firms which did not, useful results can be drawn and applied to newer regulatory changes which do not yet have sufficient data to make a useful analysis.

References

Andersen, M. & Dejoy, J. (2011). Corporate Social and Financial Performance: The Role of Size, Industry, Risk, R&D and Advertising Expenses as Control Variables. *Business and Society Review*, 116, 237-256. doi: 10.1111/j.1467-8594.2011.00384.x

Barone, E. Birt, J. & Moya, S. (2014). Lease Accounting: A Review of Recent Literature, *Accounting in Europe*, 11:1, 35-54. doi: 10.1080/17449480.2014.903630

Bassemir, M. (2018). Why do private firms adopt IFRS?, *Accounting and Business Research*, 48:3, 237-263. doi: 10.1080/00014788.2017.1357459

Berger, A. Kick, T. & Schaeck, K. (2014). Executive board composition and bank risk taking, *Journal of Corporate Finance*, 28, 48-65. doi: 10.1016/j.jcorpfin.2013.11.006

Bokföringsnämnden, (2022a) Retrieved from https://www.bfn.se/om-bokforingsnamnden/var-normgivning/

Bokföringsnämnden, (2022b) Retrieved from https://www.bfn.se/wp-content/uploads/2020/06/bfnar12-1-grund.pdf

Borghans, L. Heckman, J. Golsteyn, B. & Meijers, H. (2009). Gender Differences in Risk Aversion and Ambiguity Aversion. *Journal of the European Economic Association*, 7:2-3, 649–658. doi: 10.1162/JEEA.2009.7.2-3.649

Brown, J. & Martinsson, G. (2018). Does Transparency Stifle or Facilitate Innovation?. *Management Science*, 65:4, 1600-1623. doi: 10.1287/mnsc.2017.3002

Corsi, C. & Prencipe, A. (2019). Does CEO promote innovation in SMEs? A comparison between internal and external CEO. *International Journal of Innovation Management,* 23:5. doi: 10.1142/S1363919619500427

Croson, R. & Gneezy, U. (2009). Gender Differences in Preferences, *Journal of Economic Literature*, 47:2, 448-74. doi: 10.1257/jel.47.2.448

Donnelly, R. & Mulcahy, M. (2008) Board Structure, Ownership, and Voluntary Disclosure in Ireland. *Corporate Governance: An International Review*, 16, 416-429. doi: 10.1111/j.1467-8683.2008.00692.x

Eng, L. & Mak, Y. (2003) Corporate governance and voluntary disclosure. *Journal of Accounting and Public Policy, 22:4, 325-345.* doi: 10.1016/S0278-4254(03)00037-1

Financial Accounting Foundation, ACCOUNTING STANDARDS, Retrieved from https://www.accountingfoundation.org/page/PageContent?pageId=/overview-accounting-and-standards/accountingstandards.html

Francis, J. Khurana, I. Martin, X. & Pereira, R. (2008). The Role of Firm-Specific Incentives and Country Factors in Explaining Voluntary IAS Adoptions: Evidence from Private Firms, *European Accounting Review*, 17:2, 331-360. doi: 10.1080/09638180701819899

Gassen, J. & Sellhorn, T. (2006). Applying IFRS in Germany: Determinants and Consequences. doi: 10.2139/ssrn.906802

Graham, R. Kim, H. & Leary, M. CEO-board dynamics, *Journal of Financial Economics,* 137:3, 612-636. doi: 10.1016/j.jfineco.2020.04.007

Ibrahim, N. & Angelidis, J. (1994). Effect Of Board Members Gender On Corporate Social Responsiveness Orientation. *Journal of Applied Business Research (JABR)*, *10*:1, 35–40. doi: 10.19030/jabr.v10i1.5961

Petrovsky, N. James, O. & Boyne, G. (2015). New Leaders' Managerial Background and the Performance of Public Organizations: The Theory of Publicness Fit. *Journal of Public Administration Research and Theory: J-PART*, *25*:1, 217–236. http://www.jstor.org/stable/24484947

Schmidt, J. (2022). Lease Accounting. *Corporate Finance Institute,* https://corporatefinanceinstitute.com/resources/accounting/lease-accounting/

Shehata, N. (2014). Theories and Determinants of Voluntary Disclosure, *Accounting and Finance Research*, 3:1. doi: 10.5430/afr.v3n1p18

Skatteverket, Vad kännetecknar de olika K-regelverken?, Retrieved from https://www4.skatteverket.se/rattsligvagledning/edition/2018.7/3212.html

Wang, CJ. (2012). Board size and firm risk-taking. *Review of Quantitative Finance and Accounting,* 38, 519–542. doi: 10.1007/s11156-011-0241-4

Appendices

Appendix 1: Industry of Sampled Firms

Industry code	*Dummy var.*	*Industry*	*N*	*%*
10	Ind1	Energy & Environment	21	2.000
15	Ind2	Materials	19	1.810
20	Ind3	Industrial Goods	174	16.570
22	Ind4	Construction Industry	61	5.810
25	Ind5	Shopping Goods	141	13.430
30	Ind6	Convenience Goods	48	4.570
35	Ind7	Health & Education	28	2.670
40	Ind8	Finance & Real Estate	173	16.480
45	Ind9	IT & Electronics	33	3.140
50	Ind10	Telecom & Media	17	1.160
98	Ind11	Other	46	4.380
99	Ind12	Code Missing	13	1.240
60	-	Corporate Services	276	26.290

Appendix 2: Full regression results Model 1 with industry dummy coefficients included

FinDiff Sales	*Coefficient*	*Robust std. err.*	*t*	*P > | t |*	*Low.95% conf. int.*	*Upp 95% conf. int.*
BoardM	.000	.001	.420	.673	-.002	.002
IntCEO	.001	.005	.170	.865	-.010	.012
FemCEO	-.001	.008	-.070	.948	-.016	.015
PropFem	-.014	.007	-2.120	.034**	-.028	-.001
D/E	-.000	.000	-.250	.802	-.000	.000
lnTotAs	.002	.003	.700	.485	-.003	.007
lnSales	-.007	.004	-1.960	.050*	-.014	.000
AsTu	.003	.004	.660	.511	-.005	.010
ROA	.015	.008	1.790	.074*	-.001	.031
ROE	-.003	.001	-3.820	.000***	-.004	-.001
PM	-.000	.000	-.340	.732	-.001	.001
Ind1	.060	.032	1.870	.062*	-.003	.124
Ind2	-.006	.005	-1.260	.207	-.015	.003
Ind3	.002	.004	.370	.710	-.007	.010
Ind4	.002	.008	.290	.771	-.013	.018
Ind5	.013	.008	1.660	.097*	-.002	.029
Ind6	-.010	.004	-2.640	.008***	-.018	-.003
Ind7	-.013	.005	-2.530	.011**	-.023	-.003
Ind8	-.010	.004	-2.450	.014**	-.019	-.002
Ind9	-.015	.004	-3.360	.001***	-.023	-.006
Ind10	.008	.024	.350	.726	-.038	.055
Ind11	.016	.013	1.290	.198	-.009	.041
Ind12	.008	.013	.630	.526	-.018	.034
Constants	.111	.035	3.210	.001***	.043	.179

Appendix 3: Full regression results Model 2 with industry dummy coefficients included

OPDiff Sales	*Coefficient*	*Robust std. err.*	*t*	*P > | t |*	*Low. 95% conf. int.*	*Upp. 95% conf. int.*
BoardM	-.002	.003	-.700	.482	-.008	.004
IntCEO	.019	.012	1.600	.111	-.004	.042
FemCEO	-.006	.022	-.290	.775	-.051	.038
PropFem	-.010	.023	-.430	.667	-.056	.036
D/E	.000	.000	.150	.881	-.000	.000
lnTotAs	.019	.009	2.190	.029**	.002	.035
lnSales	-.031	.011	-2.930	.004***	-.052	-.010
AsTu	.019	.009	1.390	.164	-.005	.029
ROA	-.006	.027	-0.240	.812	-.059	.046
ROE	-.003	.002	-1.950	.051*	-.006	.000
PM	.000	.001	.190	.853	-.002	.003
Ind1	-.045	.020	-2.290	.022**	-.084	-.007
Ind2	.072	.087	0.830	.409	-.098	.241
Ind3	-.039	.012	-3.390	.001***	-.062	-.017
Ind4	-.043	.013	-3.300	.001***	-.069	-.018
Ind5	.039	.025	1.530	.125	-.011	.088
Ind6	-.009	.018	-.520	.600	-.044	.025
Ind7	.094	.077	1.220	.221	-.057	.244
Ind8	-.026	.018	-1.430	.152	-.060	.009
Ind9	.021	.044	.470	.636	-.065	.106
Ind10	.017	.035	.470	.636	-.053	.086
Ind11	.012	.035	.340	.736	-.058	.081
Ind12	-.047	.019	-2.520	.012**	-.084	-.011
Constants	.300	.103	2.920	.004***	.099	.501

Appendix 4: Paired t-tests disclosed operating leases with 2014 BFNAR 2012:1 rules

year	*N*	*Mean*	*Std. dev.*	*Low. 95% conf. int.*	*Up. 95% conf. int.*
2013	434	38,400,000	118,000,000	27,300,000	49,600,000
2014	434	42,700,000	146,000,000	28,900,000	56,500,000
Diff	434	-4,306,137	801,000,000	-11,900,000	3,252,423

H0: mean(Diff) = 0

H1a mean(Diff) < 0 p-value: .132
H1b mean(Diff) ≠ 0 p-value: .264
H1c mean(Diff) > 0 p-value: .868

Appendix 5: Paired t-tests disclosed financial leases with 2014 BFNAR 2012:1 rules

year	*N*	*Mean*	*Std. dev.*	*Low. 95% conf. int.*	*Up. 95% conf. int.*
2013	272	30,400,000	187,000,000	8,028,743	52,800,000
2014	272	20,800,000	92,300,000	9,795,046	31,800,000
Diff	272	9,579,769	163,000,000	-9,894,276	29,100,000

H0: mean(Diff) = 0

H1a mean(Diff) < 0 p-value: .833
H1b mean(Diff) ≠ 0 p-value: .334
H1c mean(Diff) > 0 p-value: .167