
# Leasing

A Comparative Study of Swedish and Japanese Retail Firms

**Bachelor Thesis in Industrial and Financial Management**

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## Abstract

There are many rationales for firms to use leasing as a financing alternative. Today, leasing is a widely used means for asset acquisition and constitutes a considerable part of firms' total capital investments. In Japan, leasing constitutes around 9 percent of total capital investments. In Sweden, the ratio is somewhat higher. According to many previous studies, retail is the industry segment associated with the highest use of leasing. Within this industry segment, however, leasing is utilized to a considerably higher extent by Japanese firms.

This study aims to investigate similarities and dissimilarities in firm characteristics of Swedish and Japanese retail firms and to use those findings to explain why Japanese retail firms use leasing to a much greater extent than Swedish retail firms. Data has been collected from three sources: surveys and interviews with company representatives, surveys and interviews with industry experts, and company-specific financial reports.

The findings of this study suggests, that out of many points of differences and similarities between Swedish and Japanese retail firms the most significant ones concern: (1) types of assets leased, (2) firms' profitability, (3) bankruptcy risk, (4) the roles of convenience and cost-effectiveness, and (5) the importance of ownership. Further, the study identifies three main factors that explain the large difference in use of leasing between Swedish and Japanese retail firms, i.e.: the maturity of Japanese retail firms' leasing market, the defensive mindset of Swedish retail firms, and the relatively low profitability of Japanese retail firms.

## Swedish Abstract

Det finns många anledningar för företag att använda leasing som ett finansieringsalternativ. Idag är leasing ett vida utbrett medel för förvärv av anläggningstillgångar och utgör en markant del av företags totala kapitalinvesteringar. I Japan utgör leasing ungefär 9 procent av totala kapitalinvesteringar. I Sverige är andelen något större. Enligt många tidigare studier är detaljvaruhandel det industrisegement som är förknippat med störst andel leasinganvändning. Inom det industrisegmentet använder dock japanska företag leasing i mycket större utsträckning än svenska företag.

Denna studie ämnar att undersöka likheter och skillnader mellan svenska och japanska detaljhandelsföretags karaktärsdrag. Vidare skall funna resultat ligga till grund för att förklara varför japanska detaljhandelsföretag använder sig utav leasing i mycket större utsträckning än svenska detaljhandelsföretag. Data har insamlats ifrån tre källor: enkäter och intervjuer med företagsrepresentanter, enkäter och intervjuer med industriexperter och företagsspecifik finansiell data.

Denna studie har funnit många likheter och skillnader mellan svenska och japanska detaljhandelsföretag där de mest signifikanta berör (1) typen av tillgångar som leasas, (2) företagens lönsamhet, (3) konkursrisk, (4) bekvämlighet kontra kostnadseffektivitet och (5) den uppfattade vikten av ägarskap. Studien identifierar sedermera tre huvudsakliga faktorer som förklarar skillnaden i leasinganvändning mellan svenska och japanska detaljhandelsföretag: mognaden av japanska detaljhandelsföretags leasingmarknad, svenska detaljhandelsföretags defensiva inställning och japanska detaljhandelsföretags relativt låga lönsamhet.

# 1. Table of Contents

# 1. Introduction

## 1.1 Background

At present, leasing constitutes a considerable part of firms' total investments. Whether it is in production enhancing machinery, computer networks, vehicles or office supplies, leasing is a widely used means of acquiring assets. According to the 2008 Global Leasing Report, approximately $630 billion worth of equipment was leased throughout the world in 2006. European and Japanese firms accounted for more than half of that leasing. The report also states that while being a widely popular method of asset acquisition for start-up companies, the financial flexibility leasing offers makes it a solid financing alternative for firms regardless of size. Although already sizable, equipment leasing is still a rapidly growing industry.

A distinction is usually made between two different types of leases: operating leases and financial leases (also called capital leases). According to the International Accounting Standards Board (IASB) the substance of a lease transaction determines whether it should be treated as a financial or operating lease. A financial lease is considered to have the economic characteristic of asset ownership. IASB states that a lease that "substantially transfers all the risks and rewards incident to ownership" should be classified as a financial lease. All other leases are classified as operating leases. The classification therefore determines the lease's accounting treatment (IASB). An operating lease is, according to Berk and DeMarzo (2007), treated as a rental. The lessee has the right to use the asset, but the lessor maintains title to the asset. The entire lease payment is reported as an operating expense. An asset acquired through a financial lease is listed on the lessee's balance sheet and is subject to depreciation expenses. Additionally, future lease payments are listed as liabilities and the interest component of those future payments is, hence, tax deductible. However, definitions and classifications differ between some countries. The Japanese Leasing Association (JLA) states that in Japan, for instance, assets acquired through financial lease contracts have not until recently required on-balance sheet treatment[1].

### 1.1.1 Measuring the Use of Leasing

The extent to which leasing is used is most commonly measured in terms of volume and penetration. Leasing volume refer to the total value of all new leasing contracts signed under a certain period. Most national leasing associations keep track of leasing volumes on a monthly basis. The London Financial Group (LFG), which publishes the Global Leasing Report, measures leasing penetration in two ways. One way is by measuring leasing as a proportion of all fixed investments in plants and

[1] As of April 1st 2008, Japanese accounting standards have been amended to converge with IASB.

equipment while the other, which they refer to as the LFG/GDP ratio, is to relate the use of leasing to gross domestic products. LFG's David Porter claims that while the lease- to total investments ratio obviously is most indicative of the popularity of leasing compared to other investment alternatives, the LFG/GDP ratio is a more reliable indicator for the reason that it is based on a broader denominator. Moreover, GDP is often the more easily accessible statistical measure. However, national leasing associations tend to rely on the lease- to total investments ratio as the primary measurement of leasing penetration. (World Leasing Year Book, 2002) Consequently, when the term leasing penetration is mentioned in this thesis, it refers to the level of leasing as a proportion of total investments. When leasing penetration as a ratio of GPD is discussed, it will be referred to as the LFG/GDP ratio.

### 1.1.2 Leasing in Japan

Today, 45 years after the financial lease was adopted as a means of investment by the industry, the Japanese leasing market is one of the biggest in the world. In annual leasing volume Japan is second only to the United States. According to the JLA, in 2007 Japan's total leasing volume was approximately 400 billion SEK[2]. The leasing penetration has, since 1990, on average been approximately 9%. In other words, leasing has represented about 9% of total capital investments. That ratio, however, the JLA argue differs comprehensively from industry to industry. Industry segments associated with high leasing penetration in Japan is machinery production in the manufacturing sector and wholesale and retail in the non-manufacturing sector. In terms of leasing volume, the same segments dominate its respective industry sectors. In Japan, the term "lease" has until recently referred to financial or capital leases only. The reason for this is a difference in accounting standards (JLA). While U.S. and EU accounting standards stipulate mandatory on-balance sheet treatment for all financial leases, corresponding Japanese standards have allowed for off-balance treatment as long as there is no transfer of ownership of the leased asset. Consequently, one might think that this would have rendered the operating lease obsolete in Japan. However, the JLA states that the operating lease has, through rising demand for shorter lease periods, gained popularity and its use is gradually increasing.

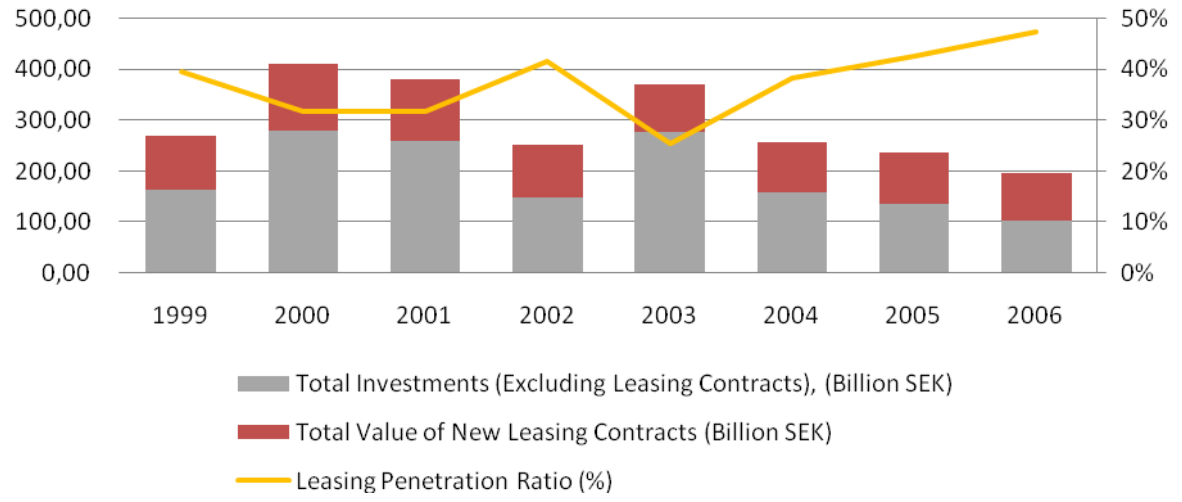
### 1.1.3 The Japanese Retail Sector

Within the Japanese retail industry, which by the Japan Leasing Association's definition encompasses retailers and wholesalers, leasing is a widely used means for

[2] Where 100 Y = 5.57 SEK, exchange rate as of 21/6-07 according to Nordea (http://www.nordea.se/Företag/Placeringar/Priser+räntor+och+kurser/Historiska+valutakurser/1044492.html), 2008-10-14

acquiring new assets. Within the non-manufacturing sector, it is the segment that utilizes leasing to the greatest extent in terms of both leasing volume and penetration. In 2006 the leasing volume was approximately 96.2 Billion SEK within this segment. This can be compared to the leasing volume of 51.2 Billion SEK of the machinery segment, which has the highest leasing volume within the manufacturing sector. The leasing penetration ratio within the retail segment was 47% in 2006 which far exceeded the total industry average of 8.82%. This ratio has, however, fluctuated between 25% and 47% between 1999 and 2006. Even so, in absolute numbers, the fluctuations in investments in leasing contracts during the period were more subtle. The wide span of the ratio is hence, explained by greater fluctuations in investments other than lease contracts, which can be observed in Graph 1.

**Graph 1: Investments in the Japanese Retail Sector**




**Sources**: Statistics on total investments, Ministry of Finance Japan (http://www.mof.go.jp/english/e1c002.htm), statistics on leasing contracts from Japan Leasing Association (http://www.leasing.or.jp) 2008-10-16. Currency converted to SEK using historical ¥/SEK exchange rates on dates 21-23/6 from Nordea.

### 1.1.4 Leasing in Sweden

For a country of Sweden's fairly small size, its leasing market is rather large in terms of annual volume. In 2000, Sweden's leasing market was the tenth largest in the world with a leasing volume of SEK 44.3 billion[3] (Global Leasing Report, 2000). Although being much smaller than leasing giants like the U.S. and Japan (with leasing volumes of SEK $2,258.8 billion and SEK 608.1billion respectively) the Swedish leasing market still outsized others like the Netherlands, Australia, Russia and Korea. The Association of Swedish Finance Houses (AFINA) concludes that "*Leasing is well established in Sweden, both as a form of financing equipment and as a form for vendors to provide their products*" (World Leasing Yearbook 2002). This statement is

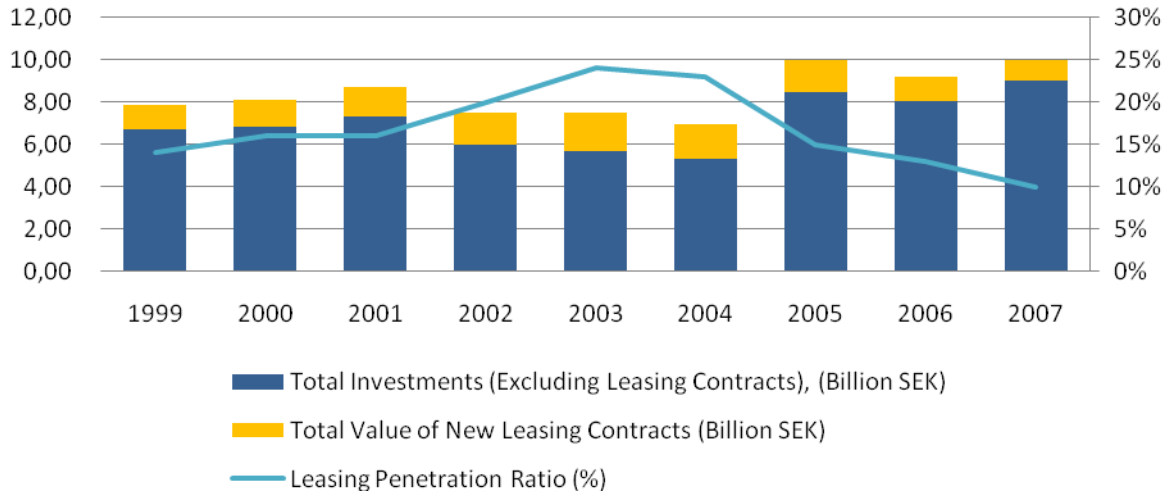
[3] Converted from USD to SEK where 1 USD = 8,6875 SEK, exchange rate as of 21/6-00 according to Nordea (http://www.nordea.se/Företag/Placeringar/Priser+räntor+och+kurser/Historiska+valutakurser/1044492.html), 2008-10-14

supported by the fact that Sweden's LFG/GDP ratio also places the nation in the top ten worldwide. In 2000, Sweden's LFG/GPD ratio was 2.24, which then was the eighth highest ratio in the world. It was higher than that of countries with much larger domestic markets and higher leasing volumes, such as Japan, Germany, France and the UK. The leasing penetration in Sweden was, in the same year, 12.9% (Global Leasing Report, 2000). Swedish industry segments associated with high leasing penetration are the graphic industry (35%) within the manufacturing sector and service companies (20%, excluding financial services) within the non-manufacturing sector (Statistiska Centralbyrån – Majenkäten, 2007).

### 1.1.5 The Swedish Retail Sector

While a large number of articles mentions retailing as the industry segment usually associated with a high leasing penetration ratio (e.g. Kang and Long, 2001), the Swedish retail industry displayed a leasing penetration lower than the domestic market average in 2007. The penetration ratio for 2007 was the lowest ratio measured in the 21st century, reaching only 10%. In 2003, however, the leasing penetration within the Swedish retail industry was 24%. Similar to the Japanese retail industry, the leasing penetration ratio fluctuates due to changes in the value of total investments that seem uncorrelated to the utilization of leasing. In terms of leasing volume, values fluctuated between SEK 1 billion and SEK 1.8 billion between 1999 and 2007 within the retail industry sector. Since 2003, when the highest volume was registered, leasing volume has declined every year. During the same period the value of total investments within the retail sector, however, did not follow the same trend. Graph 2 illustrates total investments and leasing volumes between 1999 and 2007.

**Graph 2: Investments in the Swedish Retail Sector**




Sources: Statistiska Centralbyrån, Majenkäten (http://www.scb.se), 2008-10-15.

## 1.2 Problem Discussion

The global use of leasing has grown for more than 20 years but its role as an alternative form of financing is still questioned (Global Leasing Report, 2008). Many firms, however, do not seem to put in the effort to evaluate the different forms of financing presented to them. There has been much discussion and research on the rationales for leasing. Previous studies on leasing have mainly tried to explain what differentiates a leasing firm from a non-leasing firm. These studies have managed to identify correlations between certain firm characteristics and the use of leasing. In these studies, firms have mainly been investigated through single-market studies whereas no specific comparisons between firms in different countries have been made (Kang and Long, 2001; Krishnan and Moyer, 1994; Lasfer and Lewis, 1998; Sharpe and Nguyen, 1995; Smith and Wakeman, 1985). What these studies might have overlooked is the potential existence of market specific factors. In other words, correlations found through a single-market study may only be applicable to firms in that market. Since the level of leasing penetration often differs from market to market, a comparison between markets is valid. By comparing firms in two different markets similarities and dissimilarities that can explain variations in leasing penetration may be identified.

Sweden has been described as a strong leasing market, where leasing has "*spread into almost every area of business investment*" (World Leasing Yearbook 2002). Additionally, Sweden has been top 10 in the world in terms of total annual leasing volume, while Japan has been in second place for the last decade. Furthermore, the overall leasing penetration within the Swedish market is higher than in the Japanese market. (Global Leasing Report, 2008) The leasing penetration within specific industry segments, however, differs between the countries. Within the retailing segment, Japanese firms have a significantly higher leasing penetration ratio than Swedish firms.[4] This is an interesting observation since many previous studies single out retailing as a sector associated with the highest usage of leasing. (Kang and Long, 2001) Even though Japan is the second largest leasing market in the world, few international studies on the subject can be found in relevant research publications. Also, no leasing studies have been conducted on Swedish retail firms. Therefore, a comparison between Japanese and Swedish firms may identify possible similarities and dissimilarities which can be used to explain why the penetration ratio for retail firms is higher in Japan than in Sweden.

[4] As presented in Graphs 1 and 2 in section 1.1.3 and 1.1.5.

## 1.3 Aim

Since the Japanese retail firms' leasing penetration is higher than the Swedish firms', we aim to identify unique or similar features between them. We, therefore, seek to answer the following question (Q1): *What similarities and dissimilarities exist between Japanese and Swedish retail firms?* By doing so, we aim to better understand key factors that influence the leasing usage for firms in the respective countries' retail market.

We intend to use discovered similarities and dissimilarities as a foundation for qualified speculations as to the large difference in leasing penetration. We seek to find possible links between the leasing penetration and firm characteristics which will provide a deeper insight into leasing in different markets. We, therefore, aim to answer the following question (Q2): *Why is the leasing penetration higher for Japanese retail firms?*

Therefore, we want to extend previous research by comparing firms in two different markets. Since similar research has not been done it can offer a new perspective to the subject of leasing and contribute to a deeper understanding for factors that affect firms' leasing penetration. Furthermore, it can improve managers' knowledge of leasing which can be used for future financing decisions.

# 2. Methodology

## 2.1 Research Design

In this thesis, we have constructed a research design that is customized to the thesis' purpose. Consequently, the study conducted in this thesis can, in essence, be categorized as a comparative one. However, a significant part of the study is of explorative nature, i.e. it investigates relationships that previously were unknown (Andersen, 1998). Data has been collected from various sources using different methods and approaches. The sources of data used in this thesis are (1) surveys and interviews with firm representatives at different levels within the firms (2) surveys and interviews with industry experts and (3) firm-specific financial data and accounting reports. The choice to include different types of data, both primary and secondary, was made to facilitate a more thorough analysis. Empirical findings from different sources (e.g. interviews with both company representatives and industry experts) create a more nuanced, holistic basis for analysis. This is in keeping with a "Multi Trait Multi Method" approach, which Garson (2002) argues achieves a higher level of confirmation of results. In total, representatives of three Swedish and two Japanese firms were interviewed or surveyed. Further, one Swedish and two Japanese industry experts were consulted. Thirdly, financial data from a sample of eleven Swedish and eleven Japanese retail firms was collected.

The collected data was subsequently reviewed, compiled and analysed from two perspectives. Primary data collected through interviews and surveys were discussed in a manner that highlights similarities and dissimilarities in the use of, and opinions about leasing between Swedish and Japanese retail firms. Financial data in the form of key ratios was discussed against the theoretical framework to investigate correlations between financial characteristics and utilization of leasing. In accordance with the thesis' purpose, similarities and dissimilarities found through the discussion of the three types of data was used to try to analyze the comprehensive differences in leasing penetration ratios. The following three sections will describe the data selection and collection processes for the three types of data. The last two sections will describe the data analysis and discuss the validity and reliability of this thesis.

## 2.2 Firm Interviews and Surveys

A part of this thesis' analysis is based on contact with Swedish and Japanese retail firms. According to Ekengren and Hinnfors (2006), the direct contact with respondents that is achieved through interviews can have positive effects. For instance, it enables interviewers to influence the material that subsequently will be analysed. The approach used in this thesis aims to investigate differences in firms'

practical use and perception of leasing as a financing alternative. The surveys and interviews were designed and reviewed with this in mind. The only condition that needed to be fulfilled for a firm to be a prospective respondent was that it is a listed firm within the retail sector. The importance of the firm being public is primarily based on accessibility to key financial data and accounting records. In this study, the classification of retail firms is based on categorizations made by Mizuho Securities[5] for Japanese firms and E24.se[6] for Swedish firms. We assume that firms categorized as retail firms by Mizuho Securities and E24.se also are categorized as retail firms by each country's statistic institutions. Consequently, we assume that the contacted or investigated firms in this thesis also are represented in the statistics on which parts of the problem discussion is based. These assumptions will be further discussed in the validity and reliability section.

With regard to the process of constructing and distributing surveys, Eriksson and Wiedersheim-Paul (2001), to some extent, discuss the importance of modification to prospective respondents' expectations or needs. Consequently, when contact was initiated with Swedish and Japanese firms the method of approach needed to be adjusted to conform to the business culture in each country respectively. As a result, the data collection process differed depending on the firms' origin. In Sweden, several firms were contacted by phone. Out of these firms, three agreed to participate in a telephone interview. In Japan, on the other hand, such an approach would not be possible. Initial contact with Japanese firms proved unfruitful where attempts to book telephone interviews failed. For that reason, it was decided that Japanese firms would be investigated through a mailed out survey. However, the survey was constructed to give the respondent as much freedom as possible when formulating answers. In Japan, possible respondents were chosen as a random sample of all public retail firms, where two of the respondents submitted answers. In Sweden, telephone interviews were carried out with three randomly selected retail firms.

The interview questions as well as the survey questions were designed in a manner where there were no predetermined answer alternatives for the interviewees and respondents to choose from. However, the interviews and surveys were standardized with similar structure. This design was chosen to enable interviewees and respondents to provide answers that are representative for each firm's leasing activities. This is in line with arguments of Eriksson and Wiedersheim-Paul (2001), who suggests that formulation of questions should be based on what information the interviewer is seeking to obtain. Moreover, the design was chosen to minimize

[5] Mizuho Securities Co., Ltd. is the brokerage arm of Mizuho Financial Group, Japan's second largest financial services group. (www.mizuho-sc.com/en/index.html)
[6] E24 is a Swedish online business newspaper. (www.e24.se)

comparability problems. Survey questions were deliberately made fairly short and straight forward to eliminate the risk for misinterpretations. The questions concerned respective firm's most commonly used form of leasing, the kind of assets most often leased, usual lease contract structures and perceived advantages and disadvantages of the use of leasing (See Appendixes V and VII).

## 2.3 Industry Experts

In order to complement the data collected from firm interviews and surveys, interviews and consultations were made with professionals having genuine knowledge of Sweden's and Japan's leasing markets, respectively. While the firm interviews provided firm specific data on a subjective level, the interviews with leasing industry experts were conducted in order to get a holistic view of the leasing market of each country. Their knowledge of the conditions in leasing markets of Sweden and Japan, respectively, made them an excellent source of information that also allowed for further examination of perceived advantages and disadvantages of the use of leasing. Respondents and interviewees were chosen on basis of their knowledge. We have chosen to consider interviewees that have acquired extensive knowledge about leasing either through significant work experience or research as industry experts. All in all, three industry experts were consulted in this study, one in Sweden and two in Japan. For this type of data, we believe that it is rational to look past the issue of representative samples, mentioned by among others Eriksson and Wiedersheim-Paul (2001). The reason for that is that data obtained from industry experts mainly was collected to validate findings from company interviews and surveys.

Much like when initiating firm contacts, the approach used to make contact with industry experts was different in Sweden and Japan. In Sweden, the interview was conducted in person. In Japan, the method of approach had to be adjusted to meet the prospective interviewees' wishes. Consequently, one interview was carried out in person, while one was carried out with the use of email. The interview questions as well as the survey questions were designed in the same manner as questions intended for the firms. One of the Japanese experts, however, wanted more of a discussion than predetermined questions. As a result, one of the Japanese expert's and the Swedish expert's answers are based on predetermined questions. In the case of the Swedish expert, questions were used as a starting point for further discussions. The questions were, apart from some small alterations, about the same as the questions asked to the different retail firms in each country, i.e. structured and open. (See Appendixes VI and VIII)

## 2.4 Financial Data

A number of prerequisites were used in the selection process to reach a final sample for which financial data could be collected and then analyzed. The prerequisites were that the firms are (1) publicly traded, (2) provide annual reports for the last five years in English or Swedish and (3) are categorized as retail firms (by Mizuho Securities and E24.se categorizations). For Swedish firms, these restrictions narrowed the sample down to 11 firms. Due to suspicions that sufficient data could be hard to obtain for all companies in Japan, we chose to make the initial sample of Japanese firm data somewhat larger. Firm specific financial data was therefore selected for a sample of 16 Japanese retail firms. Eventually, five of the initially selected Japanese firms were excluded because of limitations in the financial data provided. Hence, the final sample consisted of 11 Swedish and 11 Japanese firms. We believe that the aforementioned selection process is detailed enough to provide a sample upon which conclusions of a general nature can be drawn. We consider this to be in line with claims by Ekengren and Hinnfors (2006) who accentuate the interrelationship between thorough data selection and reliable analyses. The data collection process was fairly straight forward. Annual reports were collected from official company websites. For some Japanese firms, complementary financial data was collected from the Japan Company Workbook[7]. This was made for firms whose provided annual reports contained time lapses, but were judged too representative to exclude on basis of the previously mentioned prerequisites.

## 2.5 Data Analysis

Eriksson and Wiedersheim-Paul (2001) find that since some things are difficult to measure, interpretation plays an important role in analyzing empirical findings. This is also the case in this thesis, since we aim to reach general conclusions based on observation of small samples or fragments as Eriksson and Wiedersheim-Paul choose to call it. Findings from interviews and surveys with companies and industry experts are compiled and presented in plain text in order to improve readability. Further, findings are presented for one country at a time and structured similarly. In the thesis' analysis section findings are discussed in a manner that highlights similarities and dissimilarities found between retail firms in Sweden and Japan. The section's structure revolves around the main points of difference and feasible reasons for them are discussed.

For the analysis of the financial data, relevant key ratios that are used in previous research were selected from the theoretical framework. A fundamental assumption

[7] The Japan Company Workbook is a collection of Japanese corporate financial data provided by Roderick Seeman (www.japancompanyinfo.com/xls/workbook.xls)

for the analysis of the financial data is that each Japanese retail firm, based on the differences in leasing penetration, represents a higher level of leasing than each Swedish retail firm does. Earlier research on leasing has mostly focused on comparing leasing firms with non leasing firms to understand what differentiates them from each other. For this thesis, the same characteristics that previous research has found for these leasing firms is expected to exist for Japanese firms that represent a higher level of leasing than Swedish firms. Previous research is therefore used to select relevant key ratios for the analysis of the firms' annual reports. Some of the measures have been divided by respective firms' total assets to account for the differences in firm size. For each financial ratio calculated, the mean of the sample is calculated in order to obtain one representative set of ratios for each country's retail firms. The highest and lowest values are excluded when calculating the mean value. The reason for this is that some firms in each country either lack certain information or produce numbers that deviate abnormally from the rest. The mean values of the key financial ratios are subsequently presented in a manner that displays expected outcomes, based on previous studies. This structure is in line with what Ekengren and Hinnfors (2006) finds to be systematic and easily understandable. Further, findings are discussed and analyzed against the theoretical framework. Deviations from expected outcomes are addressed and correlations between different financial ratio values and leasing utilization are discussed.

## 2.6 Validity and Reliability

Rienecker and Stray Jørgensen (2002) stress the importance of evaluating the validity and reliability of used sources through impartial argumentation. In this thesis, there are both potential validity and reliability issues that need to be addressed. However, based on the collected data, validity might be the more prominent point of discussion. Since this thesis aims to analyze existing similarities and dissimilarities between Swedish and Japanese retail firms and to explain the difference in leasing penetration, data samples need to be representative of the entire population. Eriksson and Wiedersheim-Paul (2001) refer to this as external validity. Results discussed in this thesis pertaining to analysis of firm-specific financial data should be considered to achieve high external validity. The reason for this is that the sample contains a substantial part of the entire population. In other words, financial data from all listed Swedish retail-categorized firms are included. For Japanese firms, financial data of all retail-categorized firms with English annual reports are included. Findings from interviews and surveys, however, are perhaps not based on a large enough sample to be deemed as representative of the entire industry. Yet, as part of a Multi Trait Multi Method approach, consistent findings from different sources (i.e.

company- and industry expert interviews) should, following the reasoning of Garson (2002), somewhat improve validity despite small samples.

In terms of reliability, which according to Eriksson and Wiedersheim-Paul (2001) is a measure of a method's ability to provide trustworthy and stabile results, the interviews and surveys used in this thesis should be considered sound. Should the companies be given the same questions again, they would most likely provide the same answers. The main reliability issue of this thesis lies in the analysis of financial data. More specifically it lies in the assumption that differences between leasing and non leasing firms that has been found in previous research also applies to firms that lease high and low volumes. However, we feel that the assumption is plausible with regard to correlations between financial characteristics and leasing utilization found in previous studies.

# 3. Theoretical Framework

Previous research on leasing have centered on three different areas. The first area regards the debate on whether or not leasing and regular debt act as substitutes or complements (Ang and Peterson, 1984; Branson, 1995; Lewis and Schallheim, 1992; Marston and Harris, 1988). If they are considered substitutes, firms either use regular debt or leasing. However, if they are considered complements, firms that use leasing usually use more regular debt than otherwise. In theory, when the two are considered complements, more value can be created.

The second area examines the relationship between taxes and the level of leasing in a firm. Furthermore it discusses how different tax advantages affect the choice between leasing and regular debt (MacKie and Mason, 1990; Brick, Fung and Subrahmanyam; 1987; Abedeji and Stapleton, 1996).

Finally, the last area centers on firm specific characteristics that exist for firms with different levels of leasing. Basically, this area covers all research on leasing that does not fit in under the two areas above. This thesis will focus on the last research area which provides a more general view of leasing. Before focusing on this research, however, reasons for leasing which have been discussed in Corporate Finance textbooks will be addressed.

## 3.1 Incentives to Lease

Finance textbooks discuss several potential reasons for leasing. According to Ross, Westerfield and Jordan (1996), the possible reduction of uncertainty is one of them. Uncertainty is created due to the difficulty of measuring the value of the leased property when the lease expires. By using a lease contract, that uncertainty is transferred from the lessee to the lessor. Therefore, leasing offers something more than just long term financing. They claim that reduction of uncertainty is the most quoted reason for leasing by corporations. Lower transaction costs are another potential reason for leasing. Basically, the costs for changing ownerships of an asset many times over its useful life is much more expensive than writing a new lease contract. This, however, is only the case for short-term leases (operating leases). (Ross, Westerfield and Jordan, 1996) Berk and DeMarzo (2007) also mention a number of reasons for leasing. For instance, they argue that lessors often have efficiency advantages over lessees in maintenance of certain assets. Consequently, lessors can make lease rates more attractive to prospective lessees by offering assets and services as a bundle. For lessees, this means independence from price increases of external service providers. Further, Berk and DeMarzo claim that leasing bundled

assets and services gives lessees flexibility to easily switch to competing equipment. According to Ross, Westerfield and Jordan (1996), fewer restrictions and security requirements are other potential reasons for leasing. There are generally restrictive covenants connected to secured loans but these restrictions do not exist for leasing agreements. Furthermore, unlike secured loans, the lessee is not forced to pledge other assets as security for the leased assets. Berk and DeMarzo (2007) mention reduced resale costs as another incentive for leasing. Specialized lessors are often able to find new users faster and for lower costs than users of a purchased product. For lessees, this means that costly and time consuming resale processes can be avoided. Lessors who are able to find new users fast and at a lower cost are able to reduce their lease rates. Finally, for firms with low tolerance for risk, leasing provides a means for risk transfer. For such firms, Berk and DeMarzo (2007) argue, leasing is a preferable form of financing since the inherent risk of residual value uncertainty can be borne by lessors.

## 3.2 Firm Specific Characteristics

### 3.2.1 Bankruptcy Risk

In a lease contract, the lessor retains title to the asset and as long as there is no default on the lease payments, the lessee uses the assets. Should a default situation or bankruptcy occur, then it is easier for the lessor to take control over a leased asset than if the similar situation should arise for a secured debt holder (Smith and Wakeman, 1985). The lessor can normally seize back the asset with a minimum of legal costs and unnecessary losses and delays are avoided. The superior claim lessors enjoy offers them an important advantage relative to secured lenders. As shown, leasing has lower bankruptcy costs for the lessor than an equivalent loan for the lender which results in lower financing costs for the lessee than for the borrower. The risk of bankruptcy for a firm has therefore shown to have a positive effect on leasing, where higher risk is associated with a higher level of leasing. As these circumstances show, for a high risk company, leasing may be the only long-term financing alternative available. (Krishnan and Moyer, 1994)

A factor that can offset the lower bankruptcy costs are the potentially higher transaction costs associated with leasing. Smith and Wakeman (1985) find that if the period over which the firm expects to use the asset is shorter than the useful life and the costs for transfer of ownership is considerably, there can be advantages to leasing. These lower transaction costs seem to apply only to short-term leases (operating leases) where the transfer of ownership occurs more often. (Ross, Westerfield and Jordan, 2006) Financial leases on the other hand are expected to have

higher transaction costs which offset the lower bankruptcy costs for leasing. There are several factors that can explain the higher transaction costs. First of all, financial leasing contracts are more complex than the ones used for assets financed by secured debt. Second, the process of disposing a leased asset may involve a complicated process of cancellation and negotiations. Lastly, leasing will inhibit the firm's ability to vary its asset mix which may well be the largest source of the higher transaction costs. All in all, financial leases can be expected to have higher transaction costs than secured borrowing. It is impossible to measure the transaction costs for leasing and secured debt. However, transaction costs for leasing should at any give amount be higher than for secured debt. (Krishnan and Moyer, 1994), (Lease, McConnell and Schallheim, 1990)

In forecasting a firm's likelihood of a bankruptcy, Krishnan and Moyer (1994) use a number of measures; these were divided between profitability and risk measures:

*Earnings before Interest and Taxes/Total Assets (EBIT/TA),*
*Retained Earnings/Total Assets (RETEARN),*
*Market Value of Common Equity/Book Value of Common Equity (MBRATIO),*

These three ratios measure the firms' profitability and according to the hypothesis formulated by Krishnan and Moyer, these ratios should be higher for a leasing firm. Their findings did however deviate slightly from the hypothesis by claiming that the EBIT/TA ratio was in fact lower for leasing firms.

When measuring the risk of a firm, Krishnan and Moyer used the following measures:

*Earnings Before Interest and Taxes/Total Interest (EBITCOVR),* it measures the firm's ability to service its debt obligations and is expected to be lower for leasing firms, based on the bankruptcy theory.

*Long-Term Debt/Total Assets (LDA),* it measures the firm's use of financial leverage and since a higher ratio is connected to a higher risk it is expected to be higher for the leasing firms.

*The Coefficient of Variation of EBIT (EBITVAR***)**, it measures the operating risk facing a firm and is expected to be higher for leasing.

In addition to the variables above, Krishnan and Moyer used another measure to estimate the bankruptcy risk of the firms. The Z-score, created by Altman (1968), provides a singular measure of the financial distress potential within a firm. By using a singular measure, singular variations in other measures can be eliminated. According to Krishnan and Moyer, the Z-score should be lower for leasing firms, indicating that these firms face a higher risk of bankruptcy.

### 3.2.2 Debt Rating

Finucane (1988), using a cross-sectional analysis, find that the level of capital leasing in a firm is related to the bond rating of that firm. Firms with a lower bond rating are expected to use more leasing. These findings are supported by Sharpe and Nguyen (1995) who find that firms with a higher bond rating have a lower propensity to use leasing. Their findings, which are based on an analysis of Standard and Poors Compustat data of US companies from 1985 to 1991, showed that firms in the highest bond rating category had a 15 to 20 lower lease share than that of the low-rated or unrated firms.

### 3.2.3 Agency Costs

Modern firms characterized by a separation between ownership and control faces cash flow problems due to managers' incentive to undertake negative NPV projects. The conflict between shareholders and managers give rise to agency costs. One of the significant rationales for leasing is the resolution of these agency cost conflicts (Lasfer and Lewis, 1998). Smith and Wakeman (1985) view agency cost reduction as an obvious rationale for long-term no cancellable leases. When using leasing, the firm is given a specific asset rather than discretionary cash. Therefore it becomes more difficult to shift the firm's assets to riskier investments by the managers, thus reducing agency costs. Since firms using excessive levels of leverage will incur greater agency costs, they are also expected to have higher levels of leasing. This hypothesis is supported by the findings of Kang and Long (2000) who find that high leveraged firms that face greater agency problems use high levels of leasing.

Long and Malitz (1985) introduce the calculation of discretionary investment which were R&D expenditures plus advertising as a fraction of total assets. This kind of investment was according to them difficult to monitor which could lead to underinvestment and greater agency costs. Undertaking high levels of discretionary investments reduced the firm's ability to support fixed financing. According to Smith and Wakeman (1985), assets highly specialized to a specific firm are more valuable to that firm than any other alternative user. This fuel higher agency costs due to conflicts between lessor and lessee over the increased administration and negotiation costs. As a result, leasing is less likely to be used if the firm uses firm-specific assets. Findings by Williamson (1988) support these results, claiming that easily re-deployable assets are more likely to be leased than assets with lower resale value, such as firm-specific assets. Krishnan and Moyer (1994) use firm-specific asset ratios, measured by R&D expenses to sales, as an explanatory variable for variations in leasing level between different business sectors. Kang and Long (2000) arrive at the same conclusion, claiming that firms in retailing use significantly more leasing than

all other industries. They explain this relationship through the firm-specific asset argument.

### 3.2.4 Growth Opportunities

Leasing firms have showed higher growth rates than non-leasing firms which support the theory that, firms with high growth opportunities use more leasing Barclay and Smith (1995), Lasfer and Lewis (1998), Krishnan and Moyer (1994). Myers (1977) claim that a firm's growth opportunities are less likely to be financed with debt due to investment disincentives and asset substitutability problems. The problems are solved through the use of leasing, since a lease is associated with a specific asset. Also, firms in rapid growth tend to be cash poor. Lease financing requires a lower down payment than debt financing at the start of the transaction. Therefore, the equity commitment is not as high as with debt financing leaving high growth firms with perhaps only one financing alternative.

For measuring the level of growth opportunities, Lasfer and Lewis (1998) use a number of variables:

*Additions to Other Tangible Fixed Assets:* This variable represents the reported fixed capital investment in the firm's cash flow statements. It excludes property and investments. The higher this variable is, the higher the growth, thus the higher the leasing propensity. This variable is also deflated by total assets to account for size differences across firms.

*Sales growth:* this variable is the average percentage change in turnover over two consecutive financial years. Companies with high sales growth are assumed to be at growth stage.

*Payout ratio:* this variable is the ratio of dividend over earnings. It is included only for quoted companies for which the data is available. It is expected that growth firms should pay less dividends compared to mature companies.

# 4. Empirical Findings

The empirical findings are divided into two parts. In accordance with the methodology, a number of key ratios have been selected from the theoretical framework to be used in the analysis of the Swedish and Japanese firms' financial data. The first part summarizes the results from the calculations of these ratios. The second part summarizes the answers from the interviews and surveys made with different firms and experts in the two countries. Each interview and survey is summarized based on its key findings.

## 4.1 Financial Data

The theoretical framework displays previous research on firm specific characteristics in four different categories: Bankruptcy Risk, Debt Rating, Agency Costs and Growth Opportunities. Relevant key ratios have been selected from these categories and subsequently been used to analyze the firms' financial data. The findings from the analysis of the annual reports are summarized in table 2 below. Following the table are explanations for each ratio used and interpretations of the results.

| | Japanese Firms[8] | Swedish Firms[9] |
|---|---|---|
| **Estimating Bankruptcy Risk** | | |
| EBIT/TA | 0.069 | 0.161 |
| RETEARN | 0.285 | 0.313 |
| Market to Book Ratio | 1.051 | 3.424 |
| EBIT/TI | 119.983 | 53.280 |
| LD/TA | 0.156 | 0.110 |
| EBITVAR | 0.131 | 0.352 |
| Z-Score | 8.341 | 12.812 |
| **Growth Opportunities** | | |
| AddFixed/TA | 0.050 | 0.048 |
| Sales Growth | 1.059 | 1.210 |
| Payout Ratio | 0.383 | 0.753 |
| Cash/TA | 0.108 | 0.071 |

[8] The population consists of 11 firms, the mean value for each ratio include 9 firms, highest and lowest excluded.
[9] The population consists of 11 firms, the mean value for each ratio include 9 firms, highest and lowest excluded.

| Agency Costs | | |
|---|---|---|
| Firm Specific Assets[10] | | |
| Debt/Equity | 1.189 | 1.068 |
| Total Debt Ratio | 0.503 | 0.463 |
| LD/LD+Equity | 0.238 | 0.171 |
| **Other Measures** | | |
| Debt Rating[11] | | |

**Table 1** The table shows the mean values for the calculated key ratios on the Japanese and Swedish firms' financial data. For more extensive tables see appendix I – IV.

### 4.1.1 Estimating the Bankruptcy Risk

Krishnan and Moyer (1994) find a correlation between bankruptcy risk and the level of leasing usage in a firm. The measures they use will therefore be used in this thesis to estimate the risk of bankruptcy. Krishnan and Moyer use two approaches to estimate the bankruptcy risk for a firm. The first approach is designed to measure the firms' profitability and risk in order to assess its risk of bankruptcy. The second approach they use is a singular measure, called the Z-score, which is specifically designed to measure firms' bankruptcy risk.

To measure the firms' profitability, Krishnan and Moyer (1994) use three measures. The EBIT/TA ratio measures the current profitability of the firm. The RETEARN, which is calculated by dividing retained earnings by total assets, shows the accumulated past earnings. Finally, the MBRATIO is used to measure the markets assessment of the firms' profitability. To calculate the MBRATIO, the market capitalization of a firm is divided by the equity's book ratio. To calculate the market capitalization of a firm, the number of outstanding share is multiplied with the stock price. We used the stock price at the final balance day for each firm. Together, these three measures are expected to show the firms' profitability. The calculations show that the expected profitability is higher for the Swedish firms than for the Japanese firms. All three measures are higher for the Swedish firms, see table 1.

The risk of the firms was measured using three ratios which were selected from Krishnan and Moyers (1994) research. The first ratio, EBIT/TI, measures how well a firm manages to meet its current debt obligations. The LD/TA, long-term debt divided by total assets, ratio measures the firms' usage of leverage, a higher ratio means a higher risk. Finally, EBITVAR is used to measure the firms' operating risk.

[10] The investigated firms did not have R&D expenses.
[11] Unfortunately, when trying to find debt ratings for all of the firms, we could not receive access to that data.

EBITVAR is calculated by dividing the EBITs standard deviation for the last five years by its mean value over these years and the higher the ratio, the higher the operating risk. These calculations show a different pattern than the profitability calculations, see table 1. The calculations on the EBIT/TI ratio and the EBITVAR point towards the conclusion that Swedish firms are riskier than Japanese firms. However, the LD/TA ratio is higher for the Japanese firms which mean that the risk created from a higher leverage is higher for these firms. All in all, the Swedish firms face a higher risk but are significantly more profitable than the Japanese firms.

The singular measure Krishnan and Moyer (1994) use to estimate the bankruptcy risk of the firms is called the Z-score. The Z-score was developed by Altman (1968) and consists of several measures that are put together to create a weighted average of a firms bankruptcy risk. Since all the individual measures are put together it ignores possible single deviations in the risk measurement. The Z-score model was originally adopted for manufacturing firms. However, newer research by Altman (2000) provides a second type of Z-score that is suitable for non-manufacturers. Since the target firms are retail firms, the second type has been used for the calculations on the financial data. The individual measures that this Z-score consists of are, EBIT/TA, RETEARN, NTWC/TA (Net Working Capital/TA) and EQUITY/DEBT. Furthermore, these measures are weighted to create the following Z-score formula:

$$Z\text{-}Score = (1.05*EBIT/TA)+(3.26*RETEARN)+(6.56*NTWC/TA)+(6.72*EQUITY/DEBT)$$

After doing the calculations, table 1 shows that the risk of bankruptcy is considerably higher for the Japanese firms. However, for a firm to have an obvious risk of bankruptcy, the Z-score needs to be below 2.9%. (Altman, 2000)

### 4.1.2 Growth Opportunities

Previous research by Lasfer and Lewis (1998) identified a correlation between growth opportunity and the level of leasing usage. Therefore, based on their research, three ratios have been selected to measure the growth opportunities for the Swedish and Japanese firms. First of all, the AddFixed/TA ratio shows the amount of fixed investments in the firms' cash flow divided by total assets in order to discard the size of the firm. The second ratio used is the Sales Growth Ratio which measures the sales growth between the last two years. Firms with a high Sales Growth Ratio are assumed to be growing. The third ratio used is the payout ratio which is calculated by dividing dividends with net income. A fourth ratio has been selected based on research by Myers (1977) who claims that fast growing firms tend to be cash poor. The fourth ratio therefore measures firms' cash in relation to total assets, Cash/TA.

Table 1 show that the results from the calculations are split where two out of four ratios, the AddFixed/TA ratio and the Payout ratio, point towards higher growth opportunities for Japanese firms. The two other ratios, however, point towards the opposite. An interesting observation can be made from the large difference in the firms' payout ratios. Swedish firms pay 75% of their net income as dividends, a number that is more than twice what the Japanese firms pay. While the difference for this ratio is quite large, the differences for the other ratios are smaller.

### 4.1.3 Agency Costs

Agency costs are difficult to measure but since previous studies by Lasfer and Lewis (1998), Smith and Wakeman (1985) and Kang and Long (2001) have identified the connection between leverage and agency costs, different leverage ratios will be used to measure the propensity for agency costs. Three ratios have been used, the debt/equity ratio, the total debt ratio and the long term debt ratio (LD/LD+EQUITY) (Ross, Westerfield and Jordan, 2006). The leverage ratios are all higher for the Japanese firms, see table 1. That shows that the agency cost is expected to be higher for these firms.

## 4.2 Interviews and Surveys

This section presents findings from the interviews and surveys made with different firms and experts in the two countries. Each interview and survey is summarized based on its key findings. The interviews with the Swedish firms and expert are presented first (SWE1, SWE2, SWE3 and SWE4) and then the Japanese surveys and interviews (JAP1, JAP2, JAP3 and JAP4) follow.

### 4.2.1 Interviewee - SWE1

This interview was carried out with the chief accountant of a well known Swedish retail firm. The firm has approximately 68,000 employees globally and had in 2007 a turnover of MSEK 92,123. The core operations include designing, producing and selling fashion products in physical stores, over the internet and through mail order catalogues.

According to the interviewee, financial leasing is the type of leasing primarily utilized by the firm. Vehicles, copiers and coffee machines are products usually leased. Concerning the structure of lease contracts, the firm's lease contracts are signed with a lease period of three years as standard. Contracts near expiration are evaluated, if more favorable alternatives are unavailable, the current lease contract may be renegotiated and extended.

The personal opinion of the interviewee is that it is important that different financing options exist and whether the solution is purchasing or leasing is of secondary nature as long as the problem is solved. The firm evaluates leasing from a lease/buy perspective where the cost of acquiring the needed asset is related to the potential benefits from that asset. It is basically a matter of finding the solution best fitted for the firm to the lowest cost. Further, coffee machines are mentioned as an example where a purchase would incur costs for hiring and paying maintenance personnel whereas a leasing contract could be supplemented to include service and maintenance. In this particular case, a purchase would be more expensive than leasing. However, it is generally difficult to determine profitability in buy versus lease situations; it is often a matter of assessment. Independent ownership of assets is a part of the firm's corporate policy. Leasing situation often arise when it offers a simpler, or more fitting solution to the firms' need

The interviewee is of the opinion that the main advantage of leasing is that it frees the lessee from responsibility and cost incurred by maintenance. The actual lack of ownership is, however, perceived as a disadvantage. The interviewee further highlights sometimes poor maintenance service provided by lessors as a negative aspect of leasing.

### 4.2.2 Interviewee - SWE2

This interview was carried out with a representative of a Swedish retail group within the grocery store business. There are 1,400 stores within the group, of which 100 are fully owned subsidiaries. The remaining stores are managed as independent businesses though being part of the group.

The retail group was formerly engaged in leasing activity with its independent subsidiaries. The activity included credit and loans offered to subsidiaries in startup phases. The purpose was to provide startups with funds for investments in inventories and stock building. Though this activity is no longer undertaken by the group, operational leasing contracts are still active. According to the interviewee, the active leasing contracts primarily concern store inventories where lessees are responsible for service cost. The interviewee says that leasing to independent subsidiaries have certain advantages. The fact that operating income can be decreased through leasing is advantageous for subsidiaries. A lower operating income means a lower payment[12] to the parent firm, which is compulsory for the group's independent subsidiaries. The interviewee claims that leasing fees have greater impact on operating income than other financing alternatives. Furthermore,

[12] As part of its agreement with the parent company, the group's independent subsidiaries are required to share a part of its annual income

the possibility to lease for a shorter period of time than the actual life of the asset is mentioned as an advantage.

The interviewee is of the opinion that the use of leasing has increased recently. Stricter legislation has resulted in more stringent mortgage loans. Consequently, banks prefer to lease to companies instead of granting loans.

### 4.2.3 Interviewee - SWE3

This interview was carried out with the CFO of a large Swedish retail group. The group consists of three grocery store chains that combined has 222 physical stores in Sweden. The group holds a market share of approximately 17%. In 2007, the group employed 6,463 people and had a turnover of MSEK 29,189.

According to the interviewee, operational leasing contracts constitute the majority of held leasing contracts within the group. Financial leasing is primarily used for acquiring vehicles. Office space and store locations are rented through operational leasing contracts. Business premises were formerly owned through a separate real estate firm but have been sold and leased back. Other assets associated with operational leasing within the group are office equipment and coffee machines. Concerning lease contract structures, the interviewee says that operational leasing contracts run over one year periods with the possibility of termination outside the last three months of the contracts. If the contract is not terminated within the designated time period, it is extended for another year. Financial lease contracts, which within the group only are used for acquiring vehicles, are negotiated and signed with financial companies. The financial companies purchase the vehicles and lease them to the group. Financial leasing contracts are renegotiated on a three year basis. The interviewee is of the opinion that, within the group, the lease versus buy evaluation comes down to the issue of credit rating. With the group's current credit rating, purchasing needed equipment incurs lower cost than leasing it. Further, a direct purchase only generates one invoice, which reduces administration cost.
The interviewee considers it difficult to identify advantages and disadvantages of operational leasing and is of the opinion that it is a strategic decision. Usually, financial leasing has the advantage of being a product from already existing collaborations. That means that additional services are provided as part of previous arrangement which reduces further administrative and personnel costs associated with the new asset. Further, the interviewee is of the opinion that the main disadvantage of financial leasing is that interest rates are higher for leasing than for bank loans.

Because of a strong financial position and solidity the group wants to minimize the use of financial leasing. The group's financial policy limits its subsidiaries' use of leasing. The reason for this is the risk associated with unregulated use of leasing within the group. The perceived risk lies in the notion that subsidiaries' unregulated use of leasing would lead to deviant credit ratings within the group. Consequently, subsidiaries may not sign financial leasing contracts without permission.

### 4.2.4 Interviewee - SWE4

This interview was conducted with an employee of one of Sweden's largest banks. The interviewee works in the financial department and is consistently involved in customers financing choice. The bank offers both leasing and regular loans depending on the request from the customer.

According to the interviewee, the Swedish leasing market has grown about 10% over the last ten years. Financial leasing is the most common whereas operational leasing is less common due to the fact that the risk is considered higher for the lessor. The large actors in the market include; bank-owned companies, insurance companies, independent contractors and manufacturers who mostly work with operational leasing.

The interviewee thinks there are several advantages from using leasing. The leasing firm does not need to provide collateral for the loan, the object itself is the collateral. The cost is the same over the period of use which makes it easier when doing profitability assessments for different projects. Furthermore, leasing is considered to be both more flexible and easier than regular loans. The flexibility comes from being able to vary the stream of payments where the lessee can pay more during some periods and less during some.

The main disadvantages from using leasing are difficult to appreciate but that it depends on the situation and timing. Usually, leasing is advantageous at the beginning of the asset's life but disadvantageous at the end. The interviewee thinks that it is often policy for larger companies not to lease since they are afraid that the costs will end up in the operational budget and therefore they will lose control over the investment budget. Also, during a recession, companies are expected to lease more since they would be afraid to invest more. Furthermore, it is risky to tie up capital in machines since the company will lose value created during upgrades.

In the future the interviewee expects financing options to be more flexible where perhaps operational leasing will be more common.

### 4.2.5 Survey - JAP1

The respondent of this survey is a representative of a large Japanese retail group. Several supermarket chains are included in the group. In total, the group manages 12,099 stores throughout Japan. The group has a number of subsidiaries and employs 55,815 people globally.

According to the respondent, financial leasing, both with and without transfer of ownership is utilized by the group. Operating leasing is used as well. It is, however, unclear which type is most usually utilized. The types of equipment that are most commonly leased by the group are system machinery and tools, sales equipment appliances and business related vehicles.

Concerning the structure of lease contracts, the respondent says that standardized contracts, based on the assets legal service life are used. Differences between operating and financial leases are not mentioned.

In the respondent's opinion, the greatest advantage of leasing, when compared to other investment alternatives, are asset management and reduction of paper work. Furthermore, the respondent says that the perceived convenience aspect of leasing is the primary reason to why the group uses leasing. Possible financial implications of the use of leasing are of secondary nature. Interest payments are the greatest drawback of leasing, according to the interviewee.

Even though new leasing relevant accounting standards have recently been implemented in Japan, the respondent is of the opinion that it will not have any effect on the group's view on or use of leasing. No changes in the group's leasing strategy are planned as of now.

### 4.2.6 Survey - JAP2

The respondent of this survey is a representative of a large Japanese retail group in the health and nutrition business. The group's core operations include production, distribution and sales of food products and amino acids. Production and sales of pharmaceuticals is also a part of its operations. Although the group's operations are concentrated on the domestic market, it has several subsidiaries in other countries. The group employs 25,893 people globally.

According to the respondent, both financial and operating leases are utilized by the company. Office supplies (such as multifunction machines, PCs, projectors etc.), plant and production equipment and vehicles as the types of assets most commonly leased by the group. External leasing companies are always consulted in relation

with new leasing acquirements. Regarding the structure of lease contracts, the duration of lease contracts depends on the type of equipment being leased. The duration of leased office supplies is between 4 and 5 years, vehicles 5 and 7 years and plant- and production equipment between 5 and 10 years.

The respondent is of the opinion that the greatest advantage of the use of leasing is that it facilitates allocation of debt while freeing large amounts of needed capital. Convenience, however, is above financial reasons the main reason for the group's use of leasing. Concerning disadvantages of leasing, the respondent is of the opinion that there are none.

The recently implemented new accounting standards, made to converge with IAS 17, will probably not have any effect on the group's view on or use of leasing. The respondent believes that the group's leasing strategy will remain unchanged.

### 4.2.7 Survey - JAP3

The respondent to this survey is an employee of a national leasing association. In addition to managing research on leasing, the association publishes leasing related statistics on a monthly basis. The association's core objective is to promote the development of the leasing business and related industries in Japan.

According to the respondent, financial leasing is the type mostly used by Japanese firms. Further, he says that even though it is difficult to assess that actual use of operating leasing, he is of the opinion that it is only utilized on a modest level. Assets most commonly leased by retail firms are store equipment (all from interior to refrigeration equipment). Other equipment that is commonly leased by retail firms are computers and related paraphernalia.

Concerning common lease contract structures, the respondent says that contracts negotiated between lessor and lessee often differ depending on the type of equipment being leased. Lease duration is restricted by tax regulation that stipulates that the length of the lease period may not be below 70% of the asset's service life. Therefore, lease contracts are mainly standardized where additional clauses usually do not differ significantly from firm to firm. Concerning financial leasing, however, the respondent thinks it is hard to create appealing solutions that fit each firm's distinguishing features.

The respondent is of the opinion that Japanese managers evaluate lease opportunities against an investment plan in a lease versus buy context. If leasing is estimated to be more profitable, it is usually utilized. There are also cases where leasing is perceived

as the more advantageous alternative but firms still opt for a purchase. An important driver in the lease decision seems to be financial necessity. When seeking to lease, Japanese firms consult leasing companies without much consideration of their leasing fees, which the respondent finds regrettable.

The respondent states that the greatest advantage of leasing is that it, from an administrative perspective, is easy to manage. Additionally, the cost of leasing is easy to grasp and can be treated as an operating expense. Because of the recent amendment of Japanese accounting standards, firms will not be able to enjoy the latter in the future. In the respondent's opinion, there are no disadvantages of leasing.

Japan's accounting standards were revised in March 2007 and are effective as of April 2008. After the revision, the standard will be convergent with IAS17 and FAS13, which means that financial leasing will require on balance sheet treatment. The respondent says that it is still too early to conclude what effects this change will have on Japanese companies' use of leasing.

### 4.2.8 Interviewee - JAP4

This interview was carried out with a professor of Kyoto's Ryukoku University who has written a book about leasing. Although the book is not available in English, the professor would translate its title to "Analysis of leasing from a viewpoint of industrial organization" or "Leasing and monopoly".

The professor has conducted research on the topic of leasing as a monopolizing measure and is of the opinion that if a firm within a certain industry sector gains a large enough market share, they can use leasing as a measure to attain monopoly. This strategy is most easily deployable for firms in industries that deal with relatively small cash flows. The professor exemplifies the theory with the actions of IBM on the Japanese computer market during the mainframe age[13]. During this time, IBM was a major actor on the Japanese computer market. IBM only offered its customers the option to lease computers. By offering its products on leasing contracts only, IBM effectively reduced the opportunity for Japanese rivals to gain market shares. Domestic firms could not afford to offer deals at a cost that could match what IBM offered. In order to solve this issue, the Japanese government incorporated leasing in its industrial policy. A governmental special purpose company called Japan Electronic Computer Corporation (JECC) was established. The founding of JECC made it possible for domestic companies to sell their products to JECC, which in turn

[13] The period before the computer market became dominated by Personal Computers (PCs) can be referred to as the mainframe age.

leased them out to private customers. The professor hence argues that in the absence of sufficient governmental policy, leasing can be used as a means to monopolize certain markets.

On a more general topic of leasing, the professor is of the opinion that financial leasing can be considered to incur sunk cost. Operational leasing cannot. However, the main reason to why operational leasing is not commonly utilized in Japan is that it is considered risky by lessors.

# 5. Analysis

The analysis is divided into three parts. Part one analyzes the findings from the financial data while part two analyzes the findings from the interviews and surveys. The focus in part one and two lies on identifying possible similarities and dissimilarities between the Japanese and Swedish firms. Part three then uses the findings from part one and two to analyze why the leasing penetration is higher for the Japanese firms.

## 5.1 Part One – Analysis of Financial Data

For the analysis of the companies' yearbooks we used a number of key ratios. These ratios were, as already mentioned, selected from previous research. In this section we discuss the results from the analysis of the annual reports for the different firms. Since we expect that the results only will reflect dissimilarities, the discussion will focus on comparing the results with the theoretical framework. The results that correspond to what previous research have found are marked blue and when they deviate they are marked red (italics). Just to clarify, as mentioned before, the Japanese firms represent a higher level of leasing while the Swedish firms represent a lower level.

| | Expected Outcome | Japanese Firms[14] | Swedish Firms[15] |
|---|---|---|---|
| **Estimating Bankruptcy Risk** | | | |
| EBIT/TA | Higher | 0.069 | ***0.161*** |
| RETEARN | Lower | **0.285** | 0.313 |
| Market to Book Ratio | Lower | **1.051** | 3.424 |
| EBIT/TI | Lower | 119.983 | ***53.280*** |
| LD/TA | Higher | **0.156** | 0.110 |
| EBITVAR | Higher | 0.131 | ***0.352*** |
| *Z-Score* | Lower | **8.341** | 12.812 |
| **Growth Opportunities** | | | |
| AddFixed/TA | Higher | **0.050** | 0.048 |
| Sales Growth | Higher | 1.059 | ***1.210*** |
| Payout Ratio | Lower | **0.383** | 0.753 |

[14] The population consists of 11 firms, the mean value for each ratio include 9 firms, highest and lowest excluded
[15] The population consists of 11 firms, the mean value for each ratio include 9 firms, highest and lowest excluded

| | | | |
|---|---|---|---|
| Cash/TA | Lower | 0.108 | ***0.071*** |
| **Agency Costs** | | | |
| Firm Specific Assets | Lower | - | - |
| Debt/Equity | Higher | **1.189** | 1.068 |
| Total Debt Ratio | Higher | **0.503** | 0.463 |
| LD/LD+Equity | Higher | **0.238** | 0.171 |
| **Other Measures** | | | |
| CFVAR | - | 8.683 | 5.578 |
| Solidity | - | 0.497 | 0.537 |

**Table 2** The table shows the mean values for the calculated key ratios on the Japanese and Swedish firms' financial data including the expected relative outcome based on the theoretical framework.

### 5.1.1 Profitability and Risk

The three profitability ratios, as seen in table 2, are significantly lower for the Japanese companies. The results on both the RETEARN and MBRATIO, which shows the accumulated past profitability and the markets assessment of the firms performance, supports the findings made by Krishnan and Moyers. Their hypothesis states that a leasing company's performance is expected to be lower than for a non-leasing company. Since we assume that this relationship is expected to be true for two leasing companies with high and low leasing usage, the Japanese companies are expected to show a lower performance than the Swedish. While this was the case for the RETEARN and MBRATIO, Krishnan and Moyer found the EBIT/TA ratio to be opposite that hypothesized. Our findings, on the other hand, support their original hypothesis and show a strong correlation between the level of profitability and leasing. Japanese firms have an overall lower level of profitability than the Swedish firms.

When measuring the risk of the company which Krishnan and Moyer expect to be higher for leasing firms, they use three measures. Two out of the three risk measures are expected to be higher for leasing firms than for non-leasing firms. LD/TA and EBITVAR, which measures the firm's debt ratio and its operating risk, are expected to be higher for leasing firms. EBIT/TI measures the firm's ability to meet its ongoing debt and is expected to be lower for leasing firms. When comparing Japanese and Swedish firms, we expect that the same relationship should exist in favor of the more lease intense Japanese firms. That, however, is not the case. Only one out of the three ratios supports Krishnan and Moyers findings, see table 2. Both the EBIT/TI ratio and the EBITVAR indicate that Swedish firms face a larger risk than Japanese firms. Only

the LD/TA ratio support Krishnan and Moyers claims. On the other hand, according to Berk and DeMarzo (2007) leasing provides a means for risk transfer which can be useful for firms with a low risk tolerance. Since the inherent risk of residual value can be borne by the lessors, the lessees may therefore have both a high level of leasing and low risk. This can be one explanation for the higher level of risk among the Swedish firms.

### 5.1.2 Z-Score

To use a singular measure of the firms risk for bankruptcy we used the Z-score which is used by Krishnan and Moyer (1994). They expect that leasing firms would experience a higher bankruptcy risk than non-leasing firms. Smith and Wakeman (1985) support Krishnan and Moyer by claiming that, in a bankruptcy or default situation for the lessee, it is easier for the lessor to take control over the asset than in a similar situation for a secured debt holder. Therefore, for firms with a higher bankruptcy risk, lessors might be able to offer a lower interest rate than lenders which should give these firms incentives to use more leasing. With this in mind, the Japanese firms would be expected to have a higher bankruptcy risk and thus a lower Z-score than the Swedish firms. This relationship is also found to be true for Japanese firms compared to Swedish firms, see table 2. The Japanese firms experience a significantly higher bankruptcy risk. Furthermore, Krishnan and Moyer (1994) and Lease, McConnell and Schallheim (1990) discuss the possibility that higher transaction costs associated with leasing would offset the lower bankruptcy costs. The lower Z-score for the high leasing Japanese firms, however, insinuate that the lower bankruptcy costs offset the higher transaction costs thus making leasing more profitable. With the same reasoning, the Swedish firms' transaction costs are, due to the significantly lower Z-score, most likely offsetting the potential gains from a higher bankruptcy risk.

### 5.1.3 Growth Opportunities

Another important variable found to affect the leasing volume for the firm is the level of growth opportunity. The key ratios used by Lasfer and Lewis (1998) to measure the level of growth opportunity are the AddFixed/TA, Sales growth and the Payout ratio. According to Myers (1977), since financing with regular debt requires larger cash down payments than leasing, rapidly growing firms have less cash and are expected to use more leasing than slow growing firms. Therefore, a lower Cash/TA ratio is anticipated for the Japanese firms compared to the Swedish firms. However, no unanimous correlation were found between growth opportunities and leasing level. Only two out of the four ratios supported previous findings by Barclay and Smith (1995), Lasfer and Lewis (1998) and Krishnan and Moyer (1994). Out of the

two ratios, Addfixed/TA and the Payout ratio, that supported the hypothesis, only the Payout ratio showed a strong distinction between Japan and Sweden. Both the Sales growth and Cash/TA, however, pointed towards stronger growth opportunities for Swedish firms. One can argue that the payout ratio and Cash/TA ratio have a strong connection where a higher payout ratio makes it difficult to maintain a high cash ratio. Nevertheless, based on these findings, no strong correlation can be expected to exist between growth opportunities and the level of leasing in a firm.

### 5.1.4 Agency Costs

As the amount of leverage increase in a firm, the agency costs are expected to increase as well. From previous research by, Kang and Long (2000), it has been concluded that firms with high leverage and thus higher agency costs use more leasing. Smith and Wakeman (1985) and Lasfer and Lewis (1998) view leasing as a rationale for the resolution of agency cost conflicts. With this in mind, Japanese firms are expected to have a higher leverage than Swedish firms. Also, it has been found that a strong correlation between firm specific assets, measured by R&D expenses to sales, and the level of leasing exist (Smith and Wakeman, 1985), (Williamson, 1988). Since our research did not find any R&D costs for the firms, that variable is excluded. However, when measuring the level of leverage there exist a distinct difference between the Japanese and Swedish firms. Three different leverage measures were used and all three showed that Japanese firms use more leverage than the Swedish firms, see table 2. These findings support previous research and indicate that a strong correlation exist between the level of leasing in a firm and its amount of leverage. Based on the research made by Smith and Wakeman (1985), Lasfer and Lewis (1998) and Kang and Long (2000), the Japanese firms can be expected to use more leasing in order to resolve their higher agency costs.

### 5.1.5 Other Measures

Previous research has shown that a firm's debt rating is associated with its level of leasing. Unfortunately we were unable to identify the debt rating for the firms in Sweden and Japan. Therefore, that variable is excluded.

The bond rating reflects a thorough analysis of the firm's long term ability to survive financially. Since we were unable to receive access to the firms' bond ratings another measure has been used. Even though it is much less extensive than the bond rating it can provide some insight into the firms' long term ability to finance its debt. It is called solidity and is calculated by dividing the firms' equity by its total assets. Although this ratio has not been used in previous research it would be reasonable to assume that the Japanese firms will have a lower solidity. This assumption is first of

all based on the research made by Krishnan and Moyer (1994) regarding the correlation between bankruptcy costs and leasing. Furthermore, the research made by Finucane (1988) and Sharpe and Nguyen (1995) conclude that firms with a lower bond rating use more leasing. Since both the bond rating and the solidity reflect the firms' long term ability to survive it would be reasonable to assume that the Japanese firms have a lower solidity than the Swedish firms. As the results show in table 2, this is also the case where Japanese firms have a lower solidity and can therefore be assumed to be more risky from a lender's or lessor's point of view.

We also constructed a ratio that would measure the volatility of the firms' cash flows. The CFVAR ratio is calculated by dividing the cash flow standard deviation for the last four years by its mean value for the same period. By doing so we wanted to measure two things. First of all, we see all kinds of volatility as a risk measure. Second, we wanted to see if there was a correlation between a fluctuating cash flow and the leasing level for the firms. The reason for this is that leasing has a different effect on cash flows than regular debt which is expressed by Myers (1977). Regular debt requires a substantial cash deposit when the asset is acquired while leasing costs are more evenly spread. Based on the research made by Krishnan and Moyer (1994), high leasing firms would be expected to experience an overall higher risk than low leasing firms. The result shows that the cash flow volatility is much higher for the Japanese firms than for the Swedish firms, see table 2. This also indicates that Japanese firms face a higher risk as indicated by the EBITVAR thus supporting the findings made by Krishnan and Moyer. Furthermore, as in the case of the agency costs where leasing is used to reduce the firms' agency costs (e.g. Kang and Long, 2000), the connection between higher leasing usage and the high CFVAR might indicate the firms' intention to reduce the cash flow volatility.

## 5.2 Part Two – Analysis of Interviews and Surveys

This section discusses similarities and dissimilarities between retail firms in each country. It is based on the interviews and surveys that have been conducted with firms and experts in respective country.

### 5.2.1 Leased Assets

From interviewing the retail firms in Sweden and Japan it is clear that the types of assets leased in the two countries differ. In Sweden, the firms mainly lease copiers, coffee machines and vehicles. Leased assets that seem to be less common include office equipment and inventories. Japanese firms on the other hand have a wider array of leased assets. Examples stated in the surveys include; system machinery and

tools, appliances, office supplies, different equipment and vehicles, see JAP1 – JAP2. Furthermore, one of the Japanese experts, JAP3, mentions that assets most commonly leased are store equipment and computers. In general, the leasing market seems to be more evolved in Japan where it is common for firms to lease many different assets.

### 5.2.2 Convenient and Cost Effective

A common factor for the Japanese and Swedish retail firms seem to be the role convenience and cost effectiveness plays for the leasing process. Swedish firms mention that the choice to lease depend on what extra costs they can avoid to incur. For example, when acquiring a coffee machine, repair and maintenance is included in the leasing agreement while a purchase would force the firm to hire extra personal to handle this. These types of deals make leasing much more convenient and cost reducing than buying the same product. This is one of the perceived advantages from leasing where the lessee is freed from responsibility and cost from maintenance. The same opinion is supported by Burk and DeMarzo's (2007) who claim that the process of bundling products and services together is one the advantages of leasing. Furthermore, one of the interviewee states that their group formerly was engaged in providing financing alternatives for their independent subsidiaries. Although this activity has ended, operational leasing contracts remain active where the subsidiaries are responsible for service costs. Rather than assessing different solutions, the subsidiaries hold on to the current contracts which is further evidence for the convenient path many firms takes when assessing different financing alternatives. More information behind the convenience discussion seems to arise from the possibility to extend previous cooperation to include additional services. By doing so, administration costs can be reduced and other asset specific costs can be avoided.

Japanese firms provide a similar view of leasing where convenience is the main reason for using leasing. They mention reduction of paper work as an advantage of leasing which further emphasizes its convenience. One of the Japanese experts also mentions that leasing from an administrative point of view is easier to manage than debt financing. Furthermore, he feels that the cost of leasing is easy to grasp. This is supported by the Swedish expert who also finds leasing simple to use. Since the cost is the same it is easy to use for project planning.

All in all, firms from both countries seem to let convenience govern their financing decisions. Both Swedish and Japanese firms mention low administrative costs as an important advantage of leasing. One Swedish firm's view is that leasing situations arises when leasing offers a simpler and more fitting solution than traditional debt

financing. This view appeals to convenient solutions that can be characterized by cost effectiveness, lower administrative costs or easier managing.

### 5.2.3 Ownership

The question of ownership is raised by a respondent for one of the Swedish firm, SWE1. The firm has a clear strategy to own its assets which affect its view on leasing as a financing alternative. One of the Japanese experts discusses a similar situation where firms choose to purchase even though it is considered more advantageous to lease. The respondent for the Swedish firm, SWE3, also addresses this subject where their policy seems to be to avoid financial leasing. The firm is afraid that by allowing subsidiaries to sign financial leasing contracts without permission, different entities with dissimilar credit ratings will be created. These cases reflect another dimension within the buy/lease decision that go beyond discussing the mere profitability of different financing alternatives. There is however one interesting aspect to this. Even though the interviewee for SWE1 states that the firm has a clear policy to own its assets, there are some cases where they seem to lease no matter what. According to the interviewee, leasing situations arise when it is the easier option. Therefore, situations where leasing predominantly is considered the best financing alternative, seem to exist. As we can see, two of the Swedish firms have addressed different parts of the ownership question while only one of the Japanese experts and firms has mentioned it.

### 5.2.4 Flexibility

Flexibility was mentioned by the Swedish expert as an important advantage of leasing. The flexibility, according to the expert, comes from the possibility to vary the streams of payments to the lessor. This possibility to vary payment streams could be a means to reduce uncertainty, which according to Ross, Westerfield and Jordan (1996) is an often quoted advantage of leasing. Similar arguments were raised by one of the Swedish firms, SWE3, who saw the possibility to lease for a shorter period of time than the life of the assets as an important advantage. The possibility to lease for a shorter period of time is clearly an increase in flexibility for the firm. Among the Japanese firms, the respondent for JAP2 thinks that the greatest advantage of leasing is that it frees up a large amount of capital. This can also be seen as a sign of the increased flexibility that leasing may possess compared to traditional financing. Flexibility is therefore an important similarity between the two countries retail firms.

### 5.2.5 Other Aspects

The respondent for SWE1 mentions the use of discounts by suppliers as a way to encourage leasing contracts. Overall, the Swedish firms seem to avoid leasing if they can and use it only when special circumstances exist. One example is the Swedish firm, SWE3, which seeks to limit its use of leasing in order to maintain its high credit rating. This seems to be in line with the findings of Finucane (1998) that argue that firms with low credit rating are more likely to use leasing than firms with high rating. Japanese firms, on the other hand, who we know use leasing to a larger extent and for more assets, do not seem to follow the same pattern. The Swedish expert discussed several explanations behind variations in the firms' leasing levels. One of these is the view that during a recession firms will be afraid to invest and therefore lease more instead. This basically means that the risks associated with leasing are lower than for regular debt financing.

## 5.3 Part Three – Analysis of Variations in Leasing Penetration

This section focuses on analyzing why the penetration rate is higher for Japanese retail firms compared to their Swedish counterparts. The previous discussions on the financial data, interviews and surveys will act as a foundation for this analysis.

### 5.3.1 Developed Market

The Japanese leasing market seems to be more developed for several reasons. First of all, the interviews lead us to believe that Japanese firms lease more different types of assets than Swedish firms. Overall, as the leasing markets become more developed we assume that firms use leasing within a wider product span.

Second, graph 1 and 2 in section 1.1.3 and 1.1.5 show the development of the leasing penetration ratios in the two countries. These graphs show that the penetration ratio, since 2003, has steadily decreased in Sweden and steadily increased in Japan. In Japan, total investments have decreased while the amount of new leasing contracts have stayed the same or almost increased, see graph 1. In Sweden, on the other hand, total investments have overall increased while the amount of new leasing contracts has decreased, see graph 2. The Japanese leasing market consistently remain at about the same level while the Swedish leasing market seems to be decreasing. Overall, this can be interpreted as the Japanese leasing market is more developed and mature.

Thirdly, based on the answers from the different interviewees, we got the impression that the perceived advantages among the different countries' firms focused on different subjects. The Swedish firms mainly discussed leasing advantages

concerning flexibility and simplicity. The Japanese firms instead mentioned more in depth aspects such as asset management and that it facilitates the allocation of debt. The Swedish firms gave the impression that the leasing aspect is not especially important when analyzing different financing alternatives. In that sense, the assets that they lease remain quite few and seem standardized among other retail firms. This could also be evidence that points toward a more developed leasing market in Japan.

All in all, we think that the above mentioned reasons support the fact that the Japanese leasing market for retail firms is more developed than the Swedish. In more developed leasing markets, firms are assumed to pay more attention to leasing when considering different financing alternatives. Since the leasing market is more developed in Japan the buy/lease decision is assumed to be more important which can help explain why the penetration ratio is higher there.

### 5.3.2 Defensiveness

Two of the Swedish firms expressed opinions that reflected a reluctance to lease instead of buy. One of the firms even had a clear strategy to own their assets and only use leasing when the costs advantages are obvious or when it is more convenient. The Japanese firms, though, did not give the same impression as the Swedish firms. In our opinion this constitutes one of several signs that point toward a defensive attitude among the Swedish firms.

There is, however, further evidence that point toward this conclusion. The analysis of the Swedish and Japanese retail firms' annual reports revealed more interesting facts. Previous research made by Krishnan and Moyer (1994) has found clear correlations between specific bankruptcy risk ratios and leasing. Since we believe that firms possess the ability to control the amount of risk they are exposed to, it should be included when discussing the firms' defensive attitude. When looking at different bankruptcy risk ratios, firms that use more leasing are according to Krishnan and Moyer also expected to reflect a greater risk. There are mainly two explanations for this according to Krishnan and Moyer and Lease, McConnell and Schallheim (1990). First of all, when a firm has a low risk the potentially higher transactions costs for leasing will make debt financing a less costly option. Second of all, as a firm gets exposed to more risk, the higher transaction costs get offset by the higher cost of bankruptcy which makes debt financing more costly than leasing. Table 2 in section 5.1 shows the analysis of the firms' annual reports which provides us with some answers regarding the correlation between leasing and risk. The Swedish firms, which are expected to show a lower bankruptcy risk than the Japanese firms, are in

fact more risky according to the EBIT/TI ratio and the EBITVAR ratio. Nevertheless, when measuring the overall bankruptcy risk of the firms and thereby eliminating the effect of single stray ratios it clearly shows that the Swedish firms are experiencing a lower risk. With this in mind, we can once again state that the Swedish firms are more defensive than the Japanese firms. The lower leasing levels for the Swedish firms can therefore, from a theoretical point of view, be explained by higher transaction costs offsetting the lower bankruptcy costs.

Another factor that we believe the firms can control is the level of leverage and thereby the prerequisite for agency costs. According to the theories of Modigliani and Miller, when a firm increases their leverage, additional value can be created up to a certain point where costs for financial distress becomes too high. This quest for the optimal capital structure is called the trade-off theory. (Brealy, Myers and Marcus, 2007) Therefore, as the firms increase their leverage, one of the costs that grow is the agency costs. When the firm increases its leverage, either regular debt or leasing is used. Once the agency costs are put into the equation, it becomes interesting. Previous research by Kang and Long (2000) find that high leveraged firms in general use high levels of leasing due to greater agency costs. As the leverage in a firm is increased, managers are expected to make risky decisions which fuel conflicts with the shareholders and produces agency costs. According to Smith and Wakeman (1985), leasing locks the increased leverage value to a specific asset and makes it difficult for the managers to shift this value to more dubious investments which thereby reduce agency costs. This is further supported by Lasfer and Lewis (1998) who claim that one of the significant rationales for leasing is the resolution of agency costs. We therefore assume that a firm can push its optimal capital structure higher by using leasing to increase its leverage. The reason for this is that we believe that leasing, up to a certain level, reduces the costs associated with higher leverage. The Japanese firms therefore predictably display an overall higher leverage level. As we see it, from a theoretical point of view, they have chosen to push up their leverage level by using leasing which reduces agency costs. The Swedish firms on the other hand have chosen not to do so which provides yet another evidence for their defensive leasing and financing strategy.

Lastly we would like to address the statement one of the Swedish firms' interviewees made, see SWE3 section 4.2.3. The interviewee stated that the firm did not want to use financial leasing since it would affect its key ratios and more specifically the solidity ratio. It is important for the firm to have a high solidity ratio since it otherwise would affect their credit rating. A lower credit rating would then increase the interest rates the firm has to pay on its loans. Since the solidity measures a firm's

long term ability to finance its operations, we can use it to further investigate the relationship between leasing and risk for the Japanese and Swedish retail firms. Based on what we know about leasing and risk the solidity should, from a risk point of view, be higher for the Swedish firms, see section 5.1.5. However, with the statement from the interviewee in mind, another aspect comes into play. This aspect refers to the already covered subject of defensiveness. The interviewee stated that they were afraid to increase the use of leasing since it could worsen their solidity. This clearly seems like a defensive strategy. With this in mind, the solidity of the Swedish firms should definitely be higher than for the Japanese firms. Unsurprisingly, the solidity is higher for the Swedish firms, see table 2 in section 5.1, which further strengthen the claim that they avoid risk and focus on a more defensive financing strategy than the Japanese firms.

Based on the answers the interviewees have given and the findings from the analysis of the annual reports, we have reached the conclusion that the Swedish retail firms are more defensive and less willing to take risks than the Japanese firms. There seem to be a correlation between risk and level of leasing due to mainly agency-, transaction- and bankruptcy costs. For firms that take more risks, leasing appears to play a more important role in the buy versus lease decision. Since the Swedish firms seem to be more defensive and take fewer risks than the Japanese firms, it might explain why the leasing penetration is lower.

### 5.3.3 Profitability and Cash Flow Volatility

The profitability calculations performed in this thesis show that the investigated Japanese retail firms are less profitable than the Swedish retail firms, see table 2 in section 5.1. All three profitability ratios are lower for the Japanese firms. This is in keeping with findings by Krishnan and Moyer (1994) that also display relationships between level of leasing usage and lower profitability. Furthermore, this thesis' findings, presented in table 2, suggest that Japanese retail firms have a significantly higher volatility in their cash flows. The Swedish industry expert state that he would expect firms to lease more during economic recessions. In our opinion, the rationale behind this reasoning is that firms would be more reluctant to cash out on capital investments in times of economic uncertainty and instead opt for leasing. If the same reasoning is applied on Japanese retail firms, it contributes to explaining why their leasing penetration is so much higher than their Swedish counterparts. The relatively low profitability of the Japanese retail firms means that fewer funds are available for capital investment projects. Further, a high volatility in cash flows creates higher uncertainty concerning the firm's future performance. In conjunction, low profitability and high volatility in cash flows would, in our opinion, act as pull

factors for use of leasing. This is first of all based on the statement by one of the Japanese firms, JAP2, that leasing has the advantage of freeing up large amounts of capital. Secondly, according to the Swedish expert, leasing provides the tool for spreading expenses over time with the option to vary the stream of payments. Additionally, low profitability will, in extension, lead to a higher cost of debt which further strengthens the incentives to lease.

## 6. Conclusion

The aim of this thesis was to, through a comparative study; identify similarities and dissimilarities between Swedish and Japanese retail firms, and to use those findings to explain the significant difference in leasing penetration between the two countries' retail firms. Data was collected from three different sources and compiled and analyzed against a background of existing theories on the topic of leasing. By using this kind of triangulation approach, a higher confirmation of the results can be achieved.

The analysis of empirical findings gathered through annual reports, interviews and surveys with firm representatives and industry experts singled out several points of difference and similarity between the two countries. The most significant points, in terms of firm characteristics concern: (1) the types of assets leased, (2) profitability, and (3) bankruptcy risk. In short, the Japanese retail firms seem to lease a wider array of assets than Swedish retail firms. Further, they appear less profitable according to three different profitability ratios. The Japanese retail firms also display a considerably higher bankruptcy risk than the Swedish firms (according to the Z-ratio).

In terms of sentiments and opinions concerning use of leasing, the most significant topics concern: (1) the roles of convenience and cost-effectiveness, and (2) the importance of ownership. Retail firms in both countries jointly mention the possibility to acquire assets bundled with services as the main advantage of leasing. Firms in both countries seem to let convenience govern their financing decisions to a large extent. However, Japanese firms also seem to pay closer attention to financial implications of leasing than Swedish firms. On the topic of ownership, empirical findings suggest that corporate policy adds a new dimension to lease versus buy decisions. In situations where leasing is considered more profitable, some firms still opt for a purchase. Still, corporate policy seems to play a more important role in Swedish retail firms' financing decisions than in that of Japanese firms.

When combining the findings against the theoretical framework, three main factors that can explain the difference in leasing penetration was identified: (1) the maturity of the Japanese retail firm's leasing market, (2) the defensive mindsets of Swedish retail firms, and (3) the relatively low profitability of Japanese retail firms. The Japanese leasing market for retail firms seems to be more mature than the Swedish one. This is mainly signified by a wider array of assets being leased, steady levels of leasing (compared to total capital investments), and that Japanese firms seem to pay more attention to financial aspects of the use of leasing. Swedish retail firms seem to

take a more simplistic approach to leasing decisions. Concerning the mindset of retail firms, Swedish firms' outspoken reluctance to utilize leasing in order to sustain key financial ratios indicates a defensive attitude. Also, previous studies have associated a higher use of leasing with a higher bankruptcy risk. This thesis' findings suggest that Swedish retail firms, overall, are less risky than its Japanese counterparts. Since Japanese firms use leasing to a higher extent our findings support previously found relationships between high bankruptcy risk and high use of leasing. For firms that are not risk averse, leasing seems to be a more viable asset acquisition alternative. The relatively low profitability of the Japanese retail firms, in conjunction with a high volatility in cash flows, might increase incentives to lease. The rationale behind this is that leasing creates opportunities to spread out expenses over time and to vary payment streams.

This thesis has helped us recognize that it is more important for some firms to follow their overall corporate policy than to evaluate the different financing options for a purchase. Therefore, as a suggestion for further research, we would like to bring up the role of corporate policy in firm's financing decisions as a possible subject.

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# Appendix I – Financial Data for Japanese Firms

| (Millions of Yen) | Sunkus | Ajinomoto | Familymart | Komeri | Lawson | Mitsukoshi | Right on Business | Seven&i | Mr Max | Aeon | Aoyama |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Total Assets | 218821 | 1100709 | 351271 | 229782 | 397108 | 570727 | 55352 | 3886680 | 76376 | 3591406 | 325469 |
| Cash | 66763 | 83164 | 98844 | 9874 | 62823 | 18658 | 4540 | 667770 | 1250 | 161833 | 25600 |
| Current Assets | 94224 | 465875 | 159575 | 97089 | 138250 | 103667 | 19804 | 1354417 | 13072 | 1509930 | 170029 |
| Shareholders' Equity | 124084 | 644504 | 183237 | 97541 | 185332 | 150908 | 35253 | 1979848 | 27585,648 | 912943 | 235914 |
| Equity | 124632 | 667718 | 191281 | 97541 | 188574 | 159234 | 35353 | 2058039 | 27601 | 1167477 | 219655 |
| Debt | 94189 | 432991 | 159990 | 132241 | 208534 | 411493 | 19999 | 1828641 | 48775 | 2423929 | 105814 |
| Current liabilities | 78451 | 258769 | 141929 | 113345 | 155979 | 241100 | 19041 | 1177494 | 24838 | 1333760 | 60673 |
| Long-term Debt | 15738 | 174222 | 18061 | 18896 | 52555 | 170393 | 958 | 651147 | 23937 | 1090169 | 45141 |
| Net Working Capital | 15773 | 207106 | 17646 | −16256 | −17729 | −137433 | 763 | 176923 | −11766 | 176170 | 109356 |
| Retained Earnings | 84636 | 383648 | 157901 | 60184 | 87391 | 72207 | 22741 | 1205042 | 9298 | 453399 | 122685 |
| Dividends | 3266 | 10361 | 4794 | 1851 | 10963 | 1478 | 1328 | 50536 | 356 | 11994 | 3235 |
| Sales, 2007 | 194393 | 1158510 | 134506 | 250119 | 249476 | 804120 | 95312 | 4839554 | 89373 | 4345308 | 213703 |
| Sales, 2008 | 206373 | 1216572 | 147856 | 264304 | 260764 | 773964 | 106676 | 5223833 | 95298 | 4650088 | 214556 |
| EBIT, 2004 | 13025 | 65190 | 29093 | 12860 | 38087 | 12339 | 5997,467 | | | 132212 | 16570 |
| EBIT, 2005 | 18517 | 70916 | 30869 | 13506 | 42941 | 15241 | 7522,212 | | | 146777 | 20142 |
| EBIT, 2006 | 25785 | 60322 | 32662 | 14624 | 43867 | 15272 | 9312,85 | 244940 | 653 | 166105 | 21795 |
| EBIT, 2007 | 23113 | 63800 | 29609 | 15519 | 44513 | 12617 | 9674 | 286838 | 1026 | 189728 | 22929 |
| EBIT, 2008 | 21096 | 60523 | 31214 | 15591 | 46610 | 8455 | 5877 | 281088 | 720 | 156040 | 23762 |
| Net Income | 8580 | 28229 | 16436 | 8293 | 22119 | 4427 | 2627 | 130658 | 666 | 43932 | 7813 |
| Total Interest | 44 | 4751 | 242 | 610 | 23 | 2472 | 26 | 11666 | 333 | 12774 | 142 |
| R&D | 0 | 32874 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Add Fixed, CF | 13182 | 62404 | 0 | 15350 | 21392 | 18614 | 7515 | 177358 | 1570 | 270505 | 12421 |
| CF 2004 | 24040 | 23454 | −25669 | 3038 | 195 | 8990 | −1956 | | 188 | −7356 | 6700 |
| CF 2005 | 9983 | −17847 | 6656 | −1117 | −16144 | −5282 | 424 | | 107 | 11020 | 2168 |
| CF 2006 | −3846 | 6353 | −16639 | 11 | 15107 | −5883 | −608 | −40743 | 263 | 94143 | 9175 |
| CF 2007 | 1806 | 1678 | 29294 | −32 | −12724 | 1576 | −1892 | 97637 | −886 | −222601 | −17087 |
| Number of shares | 86,183226 | 700,032654 | 97,683133 | 54,409 | 99,6 | – | 29,6203 | 956,44198 | 39,611 | 800,446214 | 67,394 |
| Share Price, Yen | 1572 | 1264 | 3090 | 2455 | 4000 | – | 923 | 2630 | 435 | 1188 | 2165 |
| Market Capitalisation | 135480,0313 | 884841,275 | 301840,881 | 133574,095 | 398400 | – | 27339,5369 | 2515442,4 | 17230,785 | 950930,102 | 145908,01 |

# Appendix II – Financial Ratios for Japanese Firms

| Bankruptcy Risk | Sunkus | Ajinomoto | Familymart | Komeri | Lawson | Mitsukoshi | Right on Business | Seven&i | Mr Max | Aeon | Aoyama | Mean |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **EBIT/TA** | 0,096407566 | 0,054985468 | 0,088860168 | 0,067851268 | 0,117373611 | 0,014814438 | 0,10617503 | 0,0723208 | 0,009427045 | 0,043448165 | 0,073008489 | – |
| **RETEARN** | 0,38678189 | 0,348546255 | 0,449513339 | 0,261917818 | 0,220068596 | 0,126517582 | 0,41084333 | 0,310044 | 0,121739814 | 0,126245543 | 0,376948342 | – |
| **NTWC/TA** | 0,072081747 | 0,188156906 | 0,050234719 | −0,07074532 | −0,04464529 | −0,2408034 | 0,01378451 | 0,0455203 | −0,154053629 | 0,049053212 | 0,335995133 | – |
| **BV-Equity/Debt** | 1,32321184 | 1,542105956 | 1,195580974 | 0,73760029 | 0,904284193 | 0,386966485 | 1,76773839 | 1,1254473 | 0,565884162 | 0,481646533 | 2,075859527 | – |
| **Z-Score** | 10,72697673 | 12,79125686 | 9,922560561 | 5,417680601 | 6,624582622 | **1,44874698** | 13,4204614 | 8,9482995 | 3,198919949 | 4,015634818 | **17,4594146** | **8,341** |
| | | | | | | | | | | | | |
| Profitability | | | | | | | | | | | | |
| **EBIT/TA** | 0,096407566 | 0,054985468 | 0,088860168 | 0,067851268 | **0,11737361** | 0,014814438 | 0,10617503 | 0,0723208 | **0,009427045** | 0,043448165 | 0,073008489 | **0,069** |
| **RETEARN** | 0,38678189 | 0,348546255 | **0,44951334** | 0,261917818 | 0,220068596 | 0,126517582 | 0,41084333 | 0,310044 | **0,121739814** | 0,126245543 | 0,376948342 | **0,285** |
| **Market to Book Ratio** | 1,087040497 | 1,325172116 | 1,577997192 | 1,369414861 | **2,11269846** | – | 0,77333004 | 1,2222521 | 0,624281185 | 0,814517204 | 0,664259908 | **1,051** |
| | | | | | | | | | | | | |
| Risk | | | | | | | | | | | | |
| **EBIT/TI** | 479,4545455 | 12,73900232 | 128,9834711 | 25,55901639 | **2026,52174** | 3,420307443 | 226,038462 | 24,094634 | **2,162162162** | 12,21543761 | 167,3380282 | **119,98** |
| **LD/TA** | 0,071921799 | 0,158281617 | 0,051416143 | 0,082234466 | 0,13234435 | 0,2985543 | **0,017307** | 0,167533 | **0,313409972** | 0,303549362 | 0,138695237 | **0,156** |
| **Std EBIT** | 4352,844238 | 3867,597932 | 1258,123142 | 1085,325205 | 2828,665523 | 2497,724757 | 1596,79706 | 18544,789 | 162,3624204 | 19323,69878 | 2543,027062 | – |
| **Mean value EBIT** | 20307,2 | 64150,2 | 30689,4 | 14420 | 43203,6 | 12784,8 | 7676,7058 | 162573,2 | 479,8 | 158172,4 | 21039,6 | – |
| **EBITVAR** | 0,214349799 | 0,060289725 | 0,04099536 | 0,075265271 | 0,065472913 | 0,195366745 | 0,2080055 | **0,1140704** | **0,338396041** | 0,122168588 | 0,120868603 | **0,123** |

## Appendix II – Financial Ratios for Japanese Firms, Cont.

| Growth Opportunities | Sunkus | Ajinomoto | Familymart | Komeri | Lawson | Mitsukoshi | Right on Business | Seven&i | Mr Max | Aeon | Aoyama | Mean |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **AddFixed/TA** | 0,060241019 | 0,056694367 | **0** | 0,066802448 | 0,053869476 | 0,032614543 | **0,135767** | 0,0456323 | 0,020556196 | 0,075320084 | 0,038163389 | **0,050** |
| **Sales Growth** | 1,061627734 | 1,050117824 | 1,099252078 | 1,056713005 | 1,045246837 | **0,96249813** | **1,119229** | 1,0794038 | 1,06629519 | 1,070140022 | 1,003991521 | **1,059** |
| **Payout Ratio** | 0,380652681 | 0,367033901 | 0,291676807 | **0,2232003** | 0,495637235 | 0,333860402 | 0,5055196 | 0,3867808 | **0,534534535** | 0,273012838 | 0,414053501 | **0,383** |
| **Cash/TA** | **0,305103258** | 0,075554938 | 0,281389582 | 0,042971164 | 0,158201295 | 0,032691637 | 0,082020523 | 0,171809874 | **0,016366398** | 0,045061182 | 0,078655725 | **0,108** |
| | | | | | | | | | | | | |
| Agency Costs | | | | | | | | | | | | |
| **Firm Specific Assets** | 0 | 0,029866204 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | – |
| **Debt/Equity** | 0,759074498 | 0,671820501 | 0,873131518 | 1,355747839 | 1,125191548 | **2,72678056** | 0,56729924 | 0,923627 | 1,768129572 | 2,655071565 | **0,44852785** | **1,189** |
| **Total Debt Ratio** | 0,430438578 | 0,393374634 | 0,455460314 | 0,575506349 | 0,525131702 | **0,72099796** | 0,36130582 | 0,4704892 | 0,638616843 | 0,674924807 | **0,32511238** | **0,503** |
| **LD/LD+Equity** | 0,112117974 | 0,206929235 | 0,086275091 | 0,162285184 | 0,217953875 | **0,51692671** | **0,026383** | 0,2403478 | 0,464453413 | 0,482878627 | 0,17047463 | **0,238** |
| | | | | | | | | | | | | |
| Cash Flow | | | | | | | | | | | | |
| **CF Mean value** | 7995,75 | 3409,5 | −1589,5 | 475 | −3391,5 | −149,75 | −1008 | 28447 | −82 | −31198,5 | 239 | – |
| **Std CF** | 10486,98203 | 14707,84703 | 21378,07646 | 1547,2377 | 12296,13046 | 6035,797146 | 986,253517 | 69190 | 467,4564151 | 116936,174 | 10313,92183 | – |
| **CF Std (CFVAR)** | 1,311569526 | 4,313784141 | −13,4495605 | 3,257342526 | −3,62557289 | **−40,305824** | −0,9784261 | 2,4322424 | −5,700687989 | −3,74813449 | **43,1544846** | – |
| **CFVAR** | 1,311569526 | 4,313784141 | 13,44956053 | 3,257342526 | 3,625572891 | 40,30582401 | **0,978426** | 2,4322424 | 5,700687989 | 3,748134494 | **43,1544846** | **8,683** |
| | | | | | | | | | | | | |
| **Solidity** | 0,569561422 | 0,606625366 | 0,544539686 | 0,424493651 | 0,474868298 | **0,27900204** | 0,63869418 | 0,5295108 | 0,361383157 | 0,325075193 | **0,67488762** | **0,497** |

## Appendix III – Financial Data for Swedish Firms

| (Millions of SEK) | Axfood | Bilia | Hakon Invest | Hemtex, | HM | Mekonomen | Nobia | RnB | Swedol | Net on Net | Claes Ohslon |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Total Assets | 6608 | 7043 | 10379 | 884,936 | 41734 | 1481 | 10290 | 2993,022 | 355,3 | 427,563 | 2192 |
| Cash | 471 | 97 | 281 | 31,49 | 16064 | 290 | 270 | 42,36 | 16,5 | 41,174 | 280,3 |
| Current Assets | 3628 | 3916 | 2743 | 417,591 | 31045 | 1166 | 3763 | 868,839 | 297,2 | 353,228 | 1340 |
| Shareholders' Equity | 2152 | 1507 | 9796 | 472,456 | 32093 | 978 | 4150 | 1554,041 | 225,4 | 124,471 | 1499,5 |
| Equity | 2152 | 1507 | 9796 | 472,456 | 32093 | 996 | 4156 | 1565,191 | 225,4 | 124,471 | 1499,5 |
| Debt | 4456 | 5536 | 583 | 412,48 | 9641 | 485 | 6134 | 1427,831 | 129,9 | 303,092 | 692,5 |
| Short-term Debt | 3701 | 3382 | 373 | 326,542 | 8834 | 441 | 3183 | 669,169 | 81,9 | 286,218 | 665,6 |
| Long-term Debt | 755 | 2154 | 210 | 85,938 | 807 | 44 | 2951 | 758,662 | 48 | 16,874 | 26,9 |
| Net Working Capital | -73 | 534 | 2370 | 91,049 | 22211 | 725 | 580 | 199,67 | 215,3 | 67,01 | 674,4 |
| Retained Earnings | 1396 | 1288 | 6157 | 258,793 | 31623 | 555 | 2631 | 179,526 | 178,2 | 36,198 | 1335,3 |
| Dividends | 1049 | 172 | 433 | 142,286 | 9515 | 309 | 431,1 | 85,6 | 14,4 | 0 | 295,2 |
| Sales, 2006 | 28590 | 9946 | 660 | 1470,495 | 68400 | 2432 | 15590 | 1543,2 | 528,025 | 1159,698 | 4101,2 |
| Sales, 2007 | 28987 | 10939 | 1075 | 1623,924 | 78346 | 2530 | 16622 | 3475,5 | 719,7 | 1514,686 | 4661,6 |
| EBIT, 2003 | 1034 | 365 | 528 | 54,065 | 9223 | 153,5 | 565 | -38,1 | 23,139 | 13,9 | 356,6 |
| EBIT, 2004 | 1126 | 329 | 485 | 92,976 | 10667,3 | 168 | 868 | 36,1 | 25,364 | 21,6 | 420,5 |
| EBIT, 2005 | 1040 | 194 | 568 | 180,942 | 13173 | 170 | 993 | 41,6 | 48,337 | 18 | 484,5 |
| EBIT, 2006 | 1204 | 109 | 885 | 221,452 | 15298 | 220 | 1327 | 29,9 | 67,886 | 13,5 | 530,9 |
| EBIT, 2007 | 1121 | 168 | 768 | 141,136 | 18382 | 250 | 1353 | 342,2 | 100,2 | 38,1 | 577,5 |
| Net Income | 781 | 100 | 1326 | 96,468 | 13588 | 348 | 958 | 255,834 | 71,2 | 25,259 | 421,8 |
| Total Interest | 44 | 145 | 18 | 9,074 | 5 | 9 | 108 | 41,071 | 1,1 | 2,463 | 2,4 |
| R&D | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
| Add Fixed, CF | 384 | 135 | 1 | 57,187 | 3522 | 43 | 658 | 91,053 | 19,6 | 12,205 | 251,6 |
| CF 2004 | 430 | 127 | -18 | 41,797 | -1262,2 | 9 | 468 | 9,766 | -3,88581 | 9,392 | 87 |
| CF 2005 | -259 | -163 | 50 | 56,878 | -2031,1 | -52,7 | -380 | 9,249 | 6,774356 | -68,736 | -115,8 |
| CF 2006 | -355 | 175 | -206 | -56,675 | -201 | 58,6 | -14 | 19,121 | 13,9 | 9,007 | 17,6 |
| CF 2007 | 102 | -71 | -69 | -25,939 | 6010 | 194 | 38 | 11,443 | -5,2 | 19,025 | -65,8 |
| Number of stocks | 52,467678 | 20,459255 | 160,917436 | 29,3374 | 82,7536 | 30,868822 | 174,44451 | 57,078832 | 32 | 6,04068 | 65,6 |
| Share price | 260 | 92 | 132,5 | 64,75 | 399 | 146 | 57,5 | 72,5 | 52,5 | 65 | 98,25 |
| Market Capitalisation | 13641,59628 | 1882,25146 | 21321,5603 | 1899,59665 | 33018,6864 | 4506,848012 | 10030,5593 | 4138,21532 | 1680 | 392,6442 | 6445,2 |

# Appendix IV – Financial Ratios for Swedish Firms

| Bankruptcy Risk | Axfood | Bilia | Hakon Invest | Hemtex, | HM | Mekonomen | Nobia | RnB | Swedol | Net on Net | Claes Ohslon | Mean |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **EBIT/TA** | 0,169642857 | 0,023853472 | 0,07399557 | 0,15948724 | 0,440456223 | 0,168804862 | 0,13148688 | 0,114332604 | 0,2820152 | 0,089109675 | 0,263458029 | – |
| **RETEARN** | 0,21125908 | 0,182876615 | 0,59321707 | 0,29244262 | 0,757727512 | 0,374746793 | 0,25568513 | 0,059981517 | 0,50154799 | 0,084661208 | 0,609169708 | – |
| **NTWC/TA** | −0,011047215 | 0,075819963 | 0,2283457 | 0,10288767 | 0,532203958 | 0,489534099 | 0,0563654 | 0,066711838 | 0,60596679 | 0,156725442 | 0,307664234 | – |
| **BV – Equity/Debt** | 0,482944345 | 0,272218208 | 16,8027444 | 1,14540341 | 3,328804066 | 2,053608247 | 0,67753505 | 1,096201861 | 1,73518091 | 0,410670687 | 2,16534296 | – |
| **Z-Score** | 4,039745863 | **2,9479092** | **116,42397** | 9,49287856 | 28,79349201 | 18,41051076 | 5,89438734 | 8,119695149 | 17,5667202 | 4,157386613 | 18,83190624 | **12,812** |
| | | | | | | | | | | | | |
| Profitability | | | | | | | | | | | | |
| **EBIT/TA** | 0,169642857 | **0,0238535** | 0,07399557 | 0,15948724 | **0,44045622** | 0,168804862 | 0,13148688 | 0,114332604 | 0,2820152 | 0,089109675 | 0,263458029 | **0,161** |
| **RETEARN** | 0,21125908 | 0,182876615 | 0,59321707 | 0,29244262 | **0,75772751** | 0,374746793 | 0,25568513 | **0,05998152** | 0,50154799 | 0,084661208 | 0,609169708 | **0,313** |
| **Market to Book Ratio** | 6,339031729 | 1,249005614 | 2,17655781 | 4,02068478 | **1,02884387** | 4,524947803 | 2,41351283 | 2,643904367 | **7,4534161** | 3,154503459 | 4,298232744 | **3,424** |
| | | | | | | | | | | | | |
| Risk | | | | | | | | | | | | |
| **EBIT/TI** | 25,47727273 | **1,1586207** | 42,6666667 | 15,5538902 | **3676,4** | 27,77777778 | 12,5277778 | 8,331913029 | 91,0909091 | 15,46894032 | 240,625 | **53,28** |
| **LD/TA** | 0,114255448 | **0,3058356** | 0,02023316 | 0,09711211 | **0,01933675** | 0,029709656 | 0,28678328 | 0,253476921 | 0,1350971 | 0,039465529 | 0,012271898 | **0,110** |
| **Std EBIT** | 133,6936797 | 102,064386 | 289,35503 | 56,7679547 | 2983,951314 | 66,94758522 | 270,591122 | 137,6374013 | 27,089622 | 8,40041931 | 74,13480964 | – |
| **Mean value EBIT** | 1105 | 233 | 646,8 | 138,1142 | 13348,66 | 192,3 | 1021,2 | 82,34 | 52,9852 | 21,02 | 474 | – |
| **EBITVAR** | 0,120989755 | 0,438044575 | 0,44736399 | 0,41102185 | 0,22353939 | 0,348141369 | 0,26497368 | **1,67157398** | 0,51126771 | 0,399639358 | **0,1564026** | **0,352** |

# Appendix IV – Financial Ratios for Swedish Firms, Cont.

| Growth Opportunities | Axfood | Bilia | Hakon Invest | Hemtex, | HM | Mekonomen | Nobia | RnB | Swedol | Net on Net | Claes Ohslon | Mean |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **AddFixed/TA** | 0,05811138 | **0,019168** | 9,6348E-05 | 0,06462275 | 0,084391623 | 0,029034436 | 0,06394558 | 0,030421761 | 0,05516465 | 0,028545501 | **0,114781** | **0,048** |
| **Sales Growth** | **1,01388597** | 1,099839131 | 1,62878788 | 1,10433834 | 1,145409357 | 1,040296053 | 1,06619628 | **2,25213841** | 1,36300365 | 1,30610383 | 1,136642934 | **1,210** |
| **Payout Ratio** | 1,343149808 | **1,72** | 0,326546 | 1,47495543 | 0,700250221 | 1,244252874 | 0,45 | 0,334591962 | 0,20224719 | **0** | 0,699857752 | **0,753** |
| **Cash/TA** | 0,07127724 | **0,01377254** | 0,027073899 | 0,035584494 | **0,384913979** | 0,195813639 | 0,026239067 | 0,01415292 | 0,046439628 | 0,096299259 | 0,127874088 | **0,071** |
| | | | | | | | | | | | | |
| Agency Costs | | | | | | | | | | | | |
| **Firm Specific Assets** | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | – |
| **Debt/Equity** | 2,07063197 | **3,6735236** | **0,0595141** | 0,87305485 | 0,300408189 | 0,49591002 | 1,47807229 | 0,918785926 | 0,57630878 | 2,435041094 | 0,461820607 | **1,068** |
| **Total Debt Ratio** | 0,67433414 | **0,7860287** | **0,0561711** | 0,4661128 | 0,231010687 | 0,327481431 | 0,59611273 | 0,477053293 | 0,36560653 | 0,708882668 | 0,315921533 | **0,463** |
| **LD/LD+Equity** | 0,259717922 | **0,5883638** | 0,02098741 | 0,15390208 | 0,024528875 | 0,042307692 | 0,41522443 | 0,326467294 | 0,17556693 | 0,119381655 | **0,0176232** | **0,171** |
| | | | | | | | | | | | | |
| Cash Flow | | | | | | | | | | | | |
| **CF Mean value** | −20,5 | 17 | −60,75 | 4,01525 | 628,925 | 52,225 | 28 | 12,39475 | 2,8971365 | −7,828 | −19,25 | – |
| **Std CF** | 310,9376947 | 138,9316379 | 93,8865672 | 46,910805 | 3173,989226 | 90,85489461 | 300,802261 | 3,967188449 | 7,86873273 | 35,39355061 | 77,67848801 | – |
| **CF Std (CFVAR)** | **−15,167692** | 8,172449286 | −1,5454579 | **11,68316** | 5,046689551 | 1,739682041 | 10,7429379 | 0,320070066 | 2,71603797 | −4,52140401 | −4,03524613 | – |
| **CFVAR** | **15,1676924** | 8,172449286 | 1,5454579 | 11,6831592 | 5,046689551 | 1,739682041 | 10,7429379 | **0,32007007** | 2,71603797 | 4,521404012 | 4,035246131 | **5,578** |
| | | | | | | | | | | | | |
| **Solidity** | 0,32566586 | **0,2139713** | **0,9438289** | 0,5338872 | 0,768989313 | 0,672518569 | 0,40388727 | 0,522946707 | 0,63439347 | 0,291117332 | 0,684078467 | **0,537** |

## Appendix V – Two-Page Survey Mailed to Japanese Retail Firms

関係者各位、

私はスウェーデンのヨーテボーリ大学に在学中で、現在国立静岡大学・人文学部・経済学科に留学中のヴィクトール・ブラゲと申します。突然のメールで恐縮ですが、私は今、日本とスウェーデンのリース産業の比較と会社のリース利用について研究を進めております。その上で御社に対して、いくつかのご質問をさせて頂きたいと思いましてアンケートをさせて頂きました。もし、可能であるならば返答を頂けたら幸いです。

質問は以下の８点です。アンケートの質問について分からない事がありましたら、私にＥメールでご連絡くださるようお願いいたします。

回答用紙にご記入の上、封筒に入れてご返送ください。なお、Ｅメールでご回答いただいてもけっこうです。

お返事お待ちしております。

敬具、

ヴィクトール・ブラゲ

## Appendix V – Two-Page Survey Mailed to Japanese Retail Firms, Cont.

リース利用についてアンケート

1. What kind of leasing does your company most commonly use? (financial, operational etc.)
   一般的に御社はどのようなリースを利用していますか？

2. What kind of equipment does your company most usually lease?
   通常、どのような設備･機器に御社はリースを利用していますか？

3. How are your company's leasing contracts usually structured? What is the most common duration of the leases?
   通常、御社の構造的リースの契約とはどのような形ですか？また、通常どのくらいの期間でリースを行っていますか？

4. In your opinion, what are the greatest advantages of leasing? (Compared to debt or other investment alternatives)
   御社の考えでは、リースによるもっとも大きな利益とは何ですか？（負債の分配、または他の投資選択）

5. In your opinion, what are the greatest disadvantages of leasing?
   御社の考えでは、リースによるもっとも大きな不利益とは何ですか？

6. How does your company evaluate possible leasing opportunities? What aspects are considered before making the decision to lease?
   御社はどのようにリース可能性を検討しますか？リースが可能かの判断をする上で、どのような角度からアプローチしますか？

7. Would you say that your company use leasing for financial reasons or convenience reasons?
   御社の考えでは、財政上の理由でリースを行いますか？それとも、便宜上の理由でリースを行いますか？

8. As I understand it, Japanese leasing legislation is currently under reconstruction to converge with IAS. Will this legislative change in any way change your view on or use of leasing?
   私の理解では、現在日本のリースに関する立法制度は IAS の基準にあわせて修正されようとしています。この立法上の変化は、リースに関する御社の見解やリースの活用のあり方を変化させますか？

## Appendix VI – Survey Mailed to Japanese Industry Expert

リース利用についてアンケート

1. What kind of leasing is most commonly used in Japan? (financial, operational etc.)
   日本は一般的にどのようなリースを利用していますか？

2. What kind of equipment is usually leased by companies in the retail industry?
   一般的に、どのような設備･機器に小売業界の会社はリースを利用していますか？

3. How are leasing contracts usually structured? What is the most common duration of the leases? Are standardized contracts used or does it vary from case to case?
   一般的に、構造的リースの契約とはどのような形ですか？また、通常どのくらいの期間でリースを行っていますか？標準契約を利用していますか？契約内容によって異なりますか？

4. In your opinion, what are the greatest advantages of leasing? (Compared to debt or other investment alternatives)
   あなたの考えでは、リースによるもっとも大きな利益とは何ですか？（負債の分配、または他の投資選択）

5. In your opinion, what are the greatest disadvantages of leasing?
   あなたの考えでは、リースによるもっとも大きな不利益とは何ですか？

6. How do Japanese retail companies evaluate possible leasing opportunities? What aspects are considered before making the decision to lease?
   一般的に、日本の小売業界会の社はどのようにリース会社を選択しますか？リースが可能かの判断をする上で、どのような角度からアプローチしますか？

7. Would you say that Japanese companies use leasing for financial reasons or convenience reasons?
   あなたの考えでは、会社は財政上の理由でリースを行いますか？それとも、便宜上の理由でリースを行いますか？

8. As I understand it, Japanese leasing legislation is currently under reconstruction to converge with IAS. Will this legislative change in any way change your view on leasing?
   私の理解では、現在日本のリースに関する立法制度は IAS の基準にあわせて修正されようとしています。この立法上の変化は、リースに関する会社の見解やリースの活用のあり方を変化させると思いますか？

## Appendix VII – Telephone Interview with Swedish Retail Firms

1. What kind of leasing do you most commonly use? (financial, operational etc.)
   *Vilken typ av leasing använder ni er av? (finansiell, operationell etc.)*

2. What kind of equipment do you usually lease?
   *Vilken typ av utrustning leasar ni vanligtvis?*

3. In your opinion, what are the greatest advantages and disadvantages of leasing? (Compared to other investment alternatives)
   *Vad anser ni är fördelarna och nackdelarna med leasing? (Jämfört med andra finansieringsalternativ)*

4. What are the main factors that affect your choice between using debt and leasing as a financing alternative?
   *Vad är det som främst påverkar ert finansieringsval mellan köp och leasing?*

5. Do you have a clear leasing strategy within your firm, do you always investigate the possibility to lease?
   *Har ni en uttalad leasingstrategi inom företaget, tittar ni alltid på möjligheten att leasa?*

6. What does your leasing contracts look like, are they standardized or are every contract individually tailored?
   *Hur ser era leasingkontrakt ut, är de standardiserade eller individuellt anpassade?*

7. Do you have any other comments or information that you think is important regarding your leasing usage?
   *Har ni några övriga kommentarer eller viktig information gällande er användning av leasing?*

## Appendix VIII – Personal Interview with Swedish Expert

1. What kind of leasing is most commonly used in Sweden? (financial, operational etc.)
   *Vilken typ av leasing används mest i Sverige? (finansiell, operationell etc.)*

2. Has the Swedish leasing market grown or shrunken during the last ten years?
   *Har den svenska leasingmarknaden vuxit eller krympt under de senaste tio åren?*

3. Has any new legislation recently been passed that will affect the firms use of leasing?
   *Har det nyligen stiftats ny lagstiftning som kommer att påverka företags användning av leasing?*

4. What role does your bank play on the leasing market, what kind of leasing contracts are mainly used?
   *Vilken är SEBs roll på marknaden, vilka typ av leasingkontrakt används huvudsakligen?*

5. In your opinion, what are the greatest advantages and disadvantages of leasing? (Compared to other investment alternatives)
   *Vad anser ni är fördelarna och nackdelarna med leasing? (Jämfört med andra finansieringsalternativ)*

6. What do you think is the main reason behind firms' use of leasing, what differences exist between different industries?
   *Vad tror du är främsta anledningen till att företag använder sig av leasing, vilka skillnader finns mellan olika branscher?*

7. What other aspects of leasing to you think is important?
   *Vilka övriga aspekter av leasing anser du är viktiga?*