

**The Influence of Foreign Ownership  
On Capital Structure of Non-Financial Firms:  
Evidence from Amman Stock Exchange**

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**This thesis was submitted in partial fulfillment of the requirements for the  
Master's Degree in International Business**

**Faculty of Graduated Studies  
University of Jordan**

**August, 2011**

## Committee Decision

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## **Dedication**

*I dedicate this thesis to my mother, Iqbal Tamimi...  
You are my inspiration...*

## **Acknowledgement**

I wish to express my thanks to my supervisor, Prof. Nedal Fayoumi. This thesis would not have been completed without his expert advice and unfailing patience. Sincere thanks are extended to other committee members, Prof. Ghassan Omet, Assoc. Prof. Fayeze Haddad and Prof. Hesham Gharaibeh for their time and insightful comments.

A very special acknowledgment is due to the Securities Depository Center for providing data on foreign ownership.

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## Abbreviations

ASE	Amman Stock Exchange
BSE	Bombay Stock Exchange
CEE	Central and Eastern Europe
FE	Fixed Effects
ISE	Istanbul Stock Exchange
JSX	Jakarta Stock Exchange
LM	Lagrange Multiplier
MNC	Multinational Corporation
OLS	Ordinary Least Squares
RE	Random Effects
SDC	Securities Depository Center

# **The Influence of Foreign Ownership on Capital Structure of Non-Financial Firms: Evidence from Amman Stock Exchange**

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## **Abstract**

This thesis examines empirically the impact of foreign ownership on financing decisions from a corporate governance perspective. To explore the underlying relationship, we employ panel data analysis for a unique set of non-financial (services and industrial) firms listed on Amman Stock Exchange (ASE) over the period from 2005 to 2009. This study contributes to the literature by examining the effects of foreign ownership on capital structure in the emerging economies context. We provide empirical evidence indicating that foreign ownership is significantly negatively related to total leverage based on book value of assets and short-term leverage based on each of book value of assets and market value of equity, demonstrating that firms with foreign shareholdings are becoming less reliant on external cash financing. The results show that capital structure is affected by firm's size, profitability and liquidity. The implication of this study helps financial managers and investors to have insight into the ownership composition (local and foreign) that is associated with an advantageous selection of financing modes, in accordance with the individual firm preferences.



## Chapter 1: Introduction

### 1.1 Background

In the 1990's, foreign investments in emerging markets<sup>1</sup> have grown rapidly following financial and political reformations and deep structural changes, given that access to the global capital market provides some countries with lower borrowing costs for businesses and greater returns to investors. The sudden inflow of foreign capital into emerging countries has been induced by a number of factors, including an attempt to augment host country capital, technology, technical know-how proficiency, managerial capabilities and market access to a comparatively stable source of external financing. On the other side, low returns in developed markets inspired capital to search for higher growth potentials (Noorani, 2001).

Foreign ownership—is it a medium for economic growth or a threat to national companies? In a widely held view, most local businesses in developing countries are believed to welcome the contributions of foreign investors, since every business is expected to benefit from the extra capital, production technologies and new expertise that come with each investment (Singh and Jun, 1995; Baniak *et al.*, 2005; Abdul Mottaleb and Kalirajan, 2010). While academics generally agree that internationalization and foreign involvement in host emerging economies has a positive effect on various aspects of firm performance (e.g. Douma *et al.*, 2006; Javid and Iqbal, 2008; Arnold and Javorick, 2009), still, businesses' capital structure could be affected in an uncertain way by foreign funds. Sharma (1986) states,

The issue of the effect of foreign capital resources on economic growth of developing

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<sup>1</sup> In this study, the author has chosen to use the World Bank's official classification when pointing to countries by their development status, in which low and middle-income economies referred to as developing countries.

countries has continued to occupy a central position in the literature dealing with development problems in our time. However, questions asked by researchers in this respect have changed along with changes in predominant forms of capital resources available to developing countries (p. 60).

Some firms in developing countries might not realize the complexity that comes with foreign capital and their associated influences on the local market. It is frequently mentioned in financial governance literature that a capital structure of any firm arises from employing retained earnings, borrowing debt or issuing shares, hence, companies should seek the most advantageous level of each financing mode, whereby the costs are diminished and the benefits are maximized. In light of the growing liberalization the world has been seeing over the last twenty years, many developing countries are aiming to attract foreign capital flows (Adam and Tweneboah, 2009), especially at times when the local economy is experiencing unfavourable financial conditions. One of the approaches being pursued by those countries is to activate the stock market exchange role in intermediating funds toward investment projects, seeking the elevation of businesses capital and growth. While foreign portfolio investment is not a stable form of capital inflow, due to the fact that it is highly liquid and, therefore, can be quickly withdrawn from the country, it is still considered as a good alternative for obtaining capital from foreign countries.

It has been cited that the increasing number of corporations whose securities are traded on foreign exchange is rapidly blurring the distinction between domestic and international capital markets (Saudagaran, 1988). Nevertheless, according to the World Institute for Development Economic Research of the United Nations University (1990), although most developing countries have equity markets, many are embryonic or dormant. Nonetheless, stock market expansion is assumed to be a natural progression of a country's economic and financial status. One of the key importance of international stock

ownership to investors who aspire to minimize their risk stems from their ability of driving cross-sectional variation in returns (Bartram *et al.*, 2010). However, in reality, most investors hold nearly all of their wealth in domestic assets, because shareholders in each nation expect returns in their domestic equity market to be several hundred basis points higher than their returns in other markets (French and Poterba, 1991), bearing in mind the regulations and rules governed by each country which may limit the level of foreign ownership of any project.

Why would firms with higher foreign shareholdings have different financial capabilities from those with less foreign ownership? Ramachandran and Shah (1998) provide an evidence that attracting foreign ownership has a significant positive effect on firms' added value of the particular country where the stocks are being traded when foreign shareholdings exceeds a majority share. Besides, a difference in the usage of foreign debt can emerge as a result of credit scarcity level in the firm's home country (Saito and Hiramoto, 2010). The literature on corporate finance investigates the interrelationships among the many stakeholders involved in all activities of a business project and the capital structure of the operating firm. One of those interactions is the way that the firm's capital structure is responding to the stake of foreign ownership. Yet, until now a limited number of researches were published about the subject of concern of foreign ownership effects on capital structuring decisions across different economies (e.g. Fatemi, 1988; Kang and Stulz, 1997; Chen *et al.*, 1997) and, so far, few have attempted to investigate the relationship in the Middle East region (e.g. Gurunlu and Gursoy, 2010). The attention by some literature was not only focused on the differences between domestic and foreign ownership, but also on differences between the foreign owned firms themselves. For example, Hake (2008) showed that the origins of foreign investors in eleven Central and Eastern European (CEE) countries do account for performance differences among foreign owned firms, explained to some

extent by the interaction between the foreign investor legal system and the legal system of the recipient country, in that investing in a country with a legal system of the same type would alleviate the amount of resources a firm should incur to adopt to the new legal and economic conditions. All in all, interestingly, variations of corporate ownership structures are assumed to vary systematically in ways that are consistent with value maximization (Demsetz and Lehn, 1985).

Since the establishment of the Amman Stock Exchange (ASE) in the 1970s, the ownership concentration of various listed firms has changed drastically. The ongoing privatization programs play an important role in shaping and adjusting ownership structures consistently in compliance with a set of rules governed by the ASE. The specific regulations on foreign investments in the exchange<sup>2</sup> identify particular rates of ownership not to be exceeded by non-Jordanian nationals. For example, the non-Jordanian investor ownership shall not exceed 50% of the capital of any project in the commercial activities of wholesale trade and retailing, while not to exceed 49% of the capital of any business in the scheduled and non-scheduled passenger, freight and mail air transport services. Furthermore, non-Jordanians are not allowed to own or participate, wholly or partially in a number of projects and activities outlined by the regulations of foreign investments, such as those related to security and investigation services. The Jordanian government still holds a large stake of firms operating in media, utility, energy, steel, mining and heavy engineering businesses since they are all considered to be strategic industries (Zeitun, 2009).

Table 1 presents the percentages of ownership concentration classified in accordance with the investor's nationality, grouped into Jordanian, Foreign Arab and Foreign Non-Arab investors.

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<sup>2</sup> Amman Stock Exchange, 2011

**Table 1. Percentages of ownership concentration according to nationality**

Year	Jordanian		Foreign Arab		Foreign Non-Arab	
	Services	Industrial	Services	Industrial	Services	Industrial
2005	87.09	75.22	11.06	12.61	1.86	12.17
2006	84.84	70.82	12.53	14.24	2.63	14.94
2007	80.23	68.95	15.93	16.45	3.85	14.60
2008	79.35	68.18	17.68	17.02	2.97	14.80
2009	81.37	67.73	15.81	17.49	2.81	14.78

*Source:* Securities Depository Center, 2011

It is obvious from Table 1 that the majority of foreign ownership is possessed by investors of Arab nationals. In particular, statistics from Securities Depository Center (SDC) show that the mainstream of foreign ownership in Jordan comes from Saudi Arabian, Kuwaiti and Lebanese nationals, respectively. This study is based on data from 92 listed non-financial firms, which has been hand-collected and verified for the period from 2005 to 2009. The ASE is the main source of financial data, and the SDC of ownership composition (i.e. domestic vs. foreign ownership). We aim at examining the effect of foreign ownership on capital structures for a sample of Jordanian services and industrial firms.

## 1.2 Problem Statement

Statistics from the ASE demonstrate that the average volume of non-Jordanian ownership in all shareholding companies during the period starting from January 2005 to December 2009 amounted to approximately 48% of the total market capitalization. This percentage reflects the important role played by foreign investors through investing in existing equity. Yet, it is still questionable whether foreign stock ownership would help in balancing the capital structure of Jordanian firms, which have been found to have target leverage ratios, and adjust to them relatively fast (Maghyreh, 2005). Accordingly, this research extends Maghyreh's argument by questioning whether targeted leverage ratios are affected by the presence of foreign ownership. The core research problem of this study revolves around finding out

whether or not foreign ownership affects the capital structure of firms in an emerging economy, to help financial managers address issues may impact the quality of decisions taken on corporate finance. This can be articulated through seeking an answer for the question: ‘Is there any relation between the ratio of foreign ownership and leverage measures of capital structure?’

### **1.3 Objectives of the Study**

There are two main objectives underlying this thesis. The first objective is to determine whether and to what extent does foreign ownership affect capital structures of Jordanian services and industrial firms. Based on panel data analysis, we will assess the impact of foreign shareholding on capital structure using the relationships between foreign ownership and book leverage and market leverage based on total and short-term liabilities, respectively. The second objective is to examine the impact of control variables, proved to be important in corporate financing decisions, on Jordanian services and industrial firms’ capital structures. Those variables include firm size, return on assets, non-debt tax shield, tangibility, capital expenditures and liquidity.

### **1.4 Research Significance**

One of the motivations of this research is to challenge the assumption that owners from different origins constitute a homogeneous unit. Noting that the percentage of foreign ownership in Jordanian listed firms has been seeing an obvious increase in the last few years as presented in Table 2, it would be interesting to find out whether the foreign investors, who are expected to have different needs, preferences and power strengths from those of the local investor, will affect the capital structure of the Jordanian market differently. The motivation for this study is to discover whether or not foreign investors provide a better capital structuring choices and corporate financing decisions to services and industrial firms in

Jordan. The main contribution of this study is to provide valuable knowledge of cross-border stock ownership as a determinant for capital structuring in the context of the Middle East region in general, and of Jordanian services and industrial firms in particular. The findings of this study may provide valuable insights on the governance of corporate financing, which importance stems from capturing the potential gains the underlying firms may achieve by seizing proper decisions in regards to capital structuring.

**Table 2. Percentages of foreign ownership in the shareholding companies**

Year	Services sector	Industrial sector	General
2005	26.19	38.09	45.04
2006	36.55	43.71	45.53
2007	36.15	51.88	48.95
2008	33.81	53.35	49.25
2009	33.12	53.13	48.73

*Source:* Amman Stock Exchange, 2011

## 1.5 Structure of the Thesis

The structure of the thesis is as follows. In Chapter 2, we shall survey the most relevant literature in the area of ownership configuration in general, and foreign ownership in particular, as a significant determinant of capital structure. The chapter starts with a general discussion on ownership structure as an important factor influencing corporate financing decisions, then we extend our discussion with the specific relationship a firm's capital structure has with foreign ownership. The last part provides a comprehensive review into relevant research so as to emphasize the rationale of our study. Chapter 3 initiates our empirical work. First, the data and sample are described. In the analysis, we use financial and ownership data of listed services and industrial firms, collected from ASE and SDC databases. After that, the empirical model and proxies variables are defined. Further, a basic conceptual framework model is designed to postulate the relationships between foreign ownership, along control variables, and various leverage measures. The chapter ends by

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## Appendix A: Services Firms Included in the Sample

- |                                                          |                                                       |
|----------------------------------------------------------|-------------------------------------------------------|
| 1. Alia (The Royal Jordanian Airlines)                   | 29. Offtec Holding Group                              |
| 2. Arab International for Education and Investment, The  | 30. Petra Education Company                           |
| 3. Arab International Hotels                             | 31. Philadelphia International Educational Investment |
| 4. Bilad Medical Services, Al                            | 32. Salam International Transport & Trading           |
| 5. Bindar Trading and Investment                         | 33. Sharq Investments Projects, Al                    |
| 6. Consultant and Investment Group, The                  | 34. South Electronics                                 |
| 7. Darwish Al-Khalili and Sons                           | 35. Specialized Jordanian Investment                  |
| 8. Dawliyah for Hotels and Malls, Al                     | 36. Specialized Trading and Investment                |
| 9. Enjaz for Development and Multiprojects               | 37. Tajamouat for Touristic Projects, Al              |
| 10. Faris National Company for Investment and Export, Al | 38. Transport and Investment Barter Company           |
| 11. International for Medical Investment                 | 39. Unified Transport & Logistics Company             |
| 12. Irbid District Electricity                           | 40. Zarqa Educational an Investment, Al               |
| 13. Isra for Education and Investment, Al                |                                                       |
| 14. Ittihad Schools                                      |                                                       |
| 15. Jordan Electric Power                                |                                                       |
| 16. Jordan Express Tourist Transport                     |                                                       |
| 17. Jordan Hotels and Tourism                            |                                                       |
| 18. Jordan International Trading Center                  |                                                       |
| 19. Jordan Investment & Tourism Transport (Alfa)         |                                                       |
| 20. Jordan National Shipping Lines                       |                                                       |
| 21. Jordan Petroleum Refinery                            |                                                       |
| 22. Jordan Press and Publishing (Ad-Dustour)             |                                                       |
| 23. Jordan Press Foundation (Al Ra'i)                    |                                                       |
| 24. Jordan Projects for Tourism Development              |                                                       |
| 25. Jordan Telecom                                       |                                                       |
| 26. Jordan Trade Facilities                              |                                                       |
| 27. Masafat for Specialized Transport                    |                                                       |
| 28. Mediterranean Tourism Investment                     |                                                       |

## Appendix B: Industrial Firms Included in the Sample

- |                                                             |                                                                               |
|-------------------------------------------------------------|-------------------------------------------------------------------------------|
| 1. Amana Agricultural and Industrial Investment             | 31. Jordan Wood Industries (Jwico)                                            |
| 2. Arab Aluminum Industry (Aral)                            | 32. Jordan Worsted Mills, The                                                 |
| 3. Arab Center for Pharmaceuticals and Chemicals Industries | 33. Jordanian Pharmaceutical Manufacturing, The                               |
| 4. Arab Company for Investment Projects                     | 34. Middle East Complex for Engineering, Electronics and Heavy Industries     |
| 5. Arab Electrical Industries                               | 35. Middle East Pharmaceutical and Chemical Industries and Medical Appliances |
| 6. Arab Engineering Industries                              | 36. Middle East Specialized Cables Company                                    |
| 7. Arab International Food Factories, The                   | 37. National Aluminum Industrial                                              |
| 8. Arab Pesticides and Veterinary Drugs Manufacturing, The  | 38. National Cable and Wire Manufacturing                                     |
| 9. Arabian Steel Pipes Manufacturing                        | 39. National Chlorine Industries                                              |
| 10. Century Investment Group                                | 40. National Poultry                                                          |
| 11. Comprehensive Multiple Projects                         | 41. National Steel Industry                                                   |
| 12. Dar Al-Dawa Development and Investment                  | 42. Nutridar                                                                  |
| 13. Ekbal Printing and Packaging, Al                        | 43. Pearl Sanitary Paper Converting                                           |
| 14. Eqbal Investment Company, Al                            | 44. Quds Ready Mix, Al                                                        |
| 15. First National Vegetable Oil Industries                 | 45. Ready Mix Concrete and Construction Supplies                              |
| 16. General Investment                                      | 46. Rum Aladdin for Engineering Industries                                    |
| 17. General Lightweight Concrete Industries                 | 47. Travertine                                                                |
| 18. General Mining                                          | 48. Union Advanced Industries                                                 |
| 19. Hayat Pharmaceutical Industries                         | 49. Union Tobacco & Cigarette Industries                                      |
| 20. Industrial Commercial and Agricultural, The             | 50. Universal Chemical Industries                                             |
| 21. International Ceramic Industries                        | 51. Universal Modern Industries for Edible Oil                                |
| 22. Janoub Filters Manufacturing, Al                        | 52. Zay Ready Wear Manufacturing, El                                          |
| 23. Jordan Cement Factories                                 |                                                                               |
| 24. Jordan Chemical Industries                              |                                                                               |
| 25. Jordan Dairy                                            |                                                                               |
| 26. Jordan Paper and Cardboard Factories                    |                                                                               |
| 27. Jordan Pipes Manufacturing, The                         |                                                                               |
| 28. Jordan Steel                                            |                                                                               |
| 29. Jordan Sulpho Chemicals                                 |                                                                               |
| 30. Jordan Vegetable Oil Industries                         |                                                                               |

The Amman Stock Exchange (ASE) was established in March 1999 as a non-profit independent institution; authorized to function as a regulated market for trading securities in Jordan. On February 20th 2017, the ASE has been registered as a public shareholding company completely owned by the government under the name "The Amman Stock Exchange Company (ASE Company)". The ASE Company shall be the legal and factual successor to the ASE. The ASE Company is governed by a seven-member board of directors appointed by the Council of Ministers and a full time chief executive officer oversees day-