

## **Firm financing in Turkey in 1999-2006**

Fatma Ogucu<sup>1</sup>

*Department of Economics, Zirve University, TURKEY*

*From late 1990s up until mid 2000s, the financial sector in Turkey had witnessed turbulent spells. However, through sound management and learning-by-doing experience the system evolved into one of the strongest in the Mediterranean featuring robust financial performance and fostering unprecedented economic growth in mid 2000s. In this paper the author reviews the development of the Turkish financial sector between 1999 and 2006. It provides an assessment of equity and debt financing by relying on various financial data. Emphasis is placed on understanding the dynamics of banking financing for small and medium enterprises. The paper also examines the dynamics of leasing and factoring services in Turkey.*

Copyright © 2011 JAEBR

Keywords: *Firm financing, banking, emerging markets, Turkey*

### **1. Introduction**

The managers of the small and medium sized firms are conventionally exposed to a high level of risk. In the emerging markets such as Turkey, the existence of the increased competition and dynamics of the small and medium sized enterprises (SME) emphasize their importance in the economy (Cinar, 2008). As the share of the SME and the complexity of the industry increase, the demand for the effective and creative system increases. It means that optimal strategies need to be created with the low investment, greater profit margins, and efficient use of labor and technology.

Firms in Turkey are conventionally classified into three categories small, medium and large sized firms. Classification is based on number of employees, size of the equity, capital, and fixed capital, total assets; total taxes paid and market share. Small firms have the headcount of the workers between 10 and 49; turnover is between EUR 2 millions and EUR 10 millions, and the balance sheet in the range of EUR 2-10 millions. The firms with values smaller than small firms are categorized as micro firms (OECD, 2005). The headcount for medium firms is between 50 and 250 and the turnover is between EUR 10 and 50 millions. The firms that have headcount higher than 250 and the turnover ratio more than EUR 50 millions are large sized firms. Although there are three criteria in terms of headcount, turnover and the balance sheet values, the number of employees working is the common criteria through classification.

---

<sup>1</sup> Correspondence to Fatma Ogucu, E-mail: fatma.ogucu@zirve.edu.tr

This paper focuses on the financing option of firms in Turkey between 1999 and 2006. The paper is organized as follows. Section 2 provides a short review of existing studies. Section 3 covers material and methods used in the study. In particular, I review equity financing, debt financing, leasing and factoring. In Section 4 of the paper, I discuss important findings and provide concluding remarks.

## **2. Literature review**

The development of the firm financing in Turkey has received a decent coverage in recent literature. For instance, Denizer (1997) argues that until 1980, Turkey's financial system was shaped to support state-oriented development. Since 1980 the financial system has seen a trend toward liberalization. Reforms eliminated interest rate controls, eased the entry of new financial institutions, and allowed new types of instruments. Regulatory barriers were relaxed, attracting many banks (both Turkish and foreign) into the system, and Turkey's banking system became integrated with world markets.

Focusing on retail banking system, the study finds that although reform reduced concentration in the industry, leading banks were still able to coordinate their pricing decisions overtly. High profitability appeared to have resulted from the banks' uncompetitive pricing rather than their efficiency. The entries of small-scale firms alone were not enough to increase competition, so new banks should probably not be expected to alter the market structure. Along the similar lines Denizer et al (2000) investigate to what extent reforms of the financial system in Turkey achieved the objectives.

Isik and Hasan (2003) discuss the Turkish banking system throughout 1980s. They claim that overall firm financing system witnessed a series of legal, structural and institutional changes. To enhance their competitive viability, Turkish banks responded by streamlining their operations and investing in new technology. The study finds that all forms of Turkish banks, although in different magnitudes, have recorded significant productivity gains driven mostly by efficiency increases rather than technical progress. Efficiency increases, however, were mostly owing to improved resource management practices rather than improved scales.

In 2003, World Bank reviewed Turkey's financial services industry. The study focused on non-bank financial institutions and capital markets. The findings from the report indicate on the need of mobilizing savings; building an institutional investor base comprising insurance companies, private pension funds, and mutual funds; developing equity markets, debt markets, and derivative markets; developing leasing, factoring and venture capital companies; and strengthening confidence in financial markets through improved corporate governance.

Steinherr et al (2004) explore the readiness of the Turkish banking sector for integration into the European Union. The study reviews the structure and health of the sector, including the state of the regulatory framework. Furthermore Steinherr et al assess the sector's financial solidity in 2003 obstacles to financial deepening and productivity in the sector. The authors conclude that in 2004 the Turkish banking sector compared well with those of the new members of the EU.

Akyuz et al. (2006) review financing preferences and capital structure of micro, small and medium sized firm owners in forest products industry in Turkey. The study explored the capital structure and financing preferences of firms' owners and focuses more narrowly on the debt vs. equity preferences revealed in the initial and ongoing financing of MS firms in forest products industry. Based on the survey data of 851 firms from 18 cities across the Black Sea Region in Turkey the authors find firm owners in the industry prefer internal financial sources as opposed to high cost external capital financing.

### 3. Material and Methods

#### 3.1. Equity financing

Equity financing is a method of financing in which a company issues shares of its stock and receives money in return. Equity financing does not involve a payback in contrast to debt financing. However, with the shares issued, people who buy the stock are now part owners and have influence on the management.

Types of equity financing include common stock, preferred stock and warrants. A corporation needs at least one class of common stock to issue a capital. Common stock holders are the owners of the company. In other words, the value of their stock increases as the company grows. Another type of equity financing is preferred stock which carries the obligation of a fixed dividend but no voice in company affairs (Finney, R 2004). Preferred stock is generally known as a hybrid between debt and common stock. The preferred stock is placed as equity side on the balance sheet, which increases the debt-equity ratio while it's sold. Financing with preferred stock could be advantageous when the company has excessive debt because of the fact that it decreases the debt to equity ratio however, the bad news about the usage of the preferred stock is that it's not tax deductible as interest payments are. Therefore, it is less popular option to finance than common stock or debt (Finney, R 2004). Another type of equity financing is warrants which are known as options to buy a given number of shares of common stock at a given price, usually over a specified time but possibly perpetual. In this case, again no tax deduction is possible both at the time issuance and exercising.

Turkey is comparably new than emerging countries such as Greece and Poland. If equity financing is divided into two categories according to the sources, categories would be private equity and public offerings. As understood from its name, private equity has one or a few in contrast to public offerings. Total Private Equity investment in 1999 in the US was USD 95.5 billion, in Europe EUR 25.1 billion, in Greece, USD 500. However in Turkey, aggregated private equity investments since early 90's is not more than USD 100 million. The primary source of equity financing for SME is venture capital which is commonly appropriate for high risk return businesses. Generally, venture capitals finance firms during the early and second stages, when growth is rapid and cash out of the venture once it's established. Second source of equity financing is public equity offerings, which takes 6 to 18 months. It includes the selection of the underwriter, analysis and evaluation by the underwriter, preparation of the registration statements and the prospectus, SEC reviews, the final price setting, the offering itself and post offering activities.

#### 3.2. Debt financing

Debt is the obligation to pay or return an asset and debt financing is the use of money and resources in return for the obligation. Although there are various types of debt financing, the most frequently used in Turkey are bank debt (loan) and leasing. The startup companies generally uses venture capital, the debt financing option provides them to deduct from tax. As of the firm gains volume, the period of the debt increases as well.

##### *Bank Financing*

Bank financing is the mostly used technique to finance the firms. SME generally prefer to diversify the loans between banks in order to diversify the risks involved. The types of loans can be grouped under three in terms of long, medium and short term. Long term loans are paid back using the cash flow of the business in five years or less. Whereas intermediate term loans are paid back within three years and short term loans are typically paid back within six to 18 months. SME and start up businesses generally prefer short term loans. A growing business may obtain a term loan from its bank of credit to cover monthly fluctuations in collections and inventory

purchases. Bank loan agreements carry covenants that protect the bank against adverse events or management practices that could jeopardize its loans. Bank financing and the system depend on the country-based circumstances, so there is a need to focus on Turkish case.

In 2006, the amount of endowment from international financial institutions to finance small and medium sized firms is USD 225 million. It results that the total derived income from small and medium sized firm through 1999-2006 is USD 3.1 billion with the composition of foreign currency in order of Euro with 67.6%, USD 24% and Japanese Yen 8.4% in the period of 1999-2006. If the usage of the loans considered the number of firms used loans are 288 in 2006. According to the fact, it is calculated that the loans usage per firm is USD 1.7 million. In 1999-2005 periods, it was USD 323 thousand. Clearly, the usage of the loans increased by the amount of USD 1 377 (OECD, 2005).

Loans are generally intermediated by Vakıfbank, TSKB, TKB and Halk Bank. Generally, sectors supplied by most loans include mainly industry, energy and service sectors. Subsectors which use loans more are manufacturing, textile, metal industry, tourism and electronic industry and energy sectors. For the year 2006, industry gains 74.2% shares from the total loans distributed. Other sectors shared the remaining part, such as service sector with 15.6% share, energy sector with 5.4%. Number of total loans issued in 2006 is 353 loans for the sectors (OECD, 2005).

In the regional distribution of the loans, they are mostly derived by Marmara region (163 units and 46%) in 2006; it is followed by Southeast Turkey with 13%, Aegean Region with 12%, Middle East Region with 11%, Mediterranean Region with 8.5%, Black Sea region with 7% and east part of Turkey. According to loans units, year 2006 compared to the period of 1999-2005, the share of Marmara, Aegean Region and Mediterranean Region decreased however, Southeast, Middle East Region and Black Sea Region regions share increased. Overall, geographical trend of the loans in Turkey moved slightly from developed regions to less developed regions as clearly visualized below Figure 1 (Directorate General of Foreign Economic Relations, 2008).

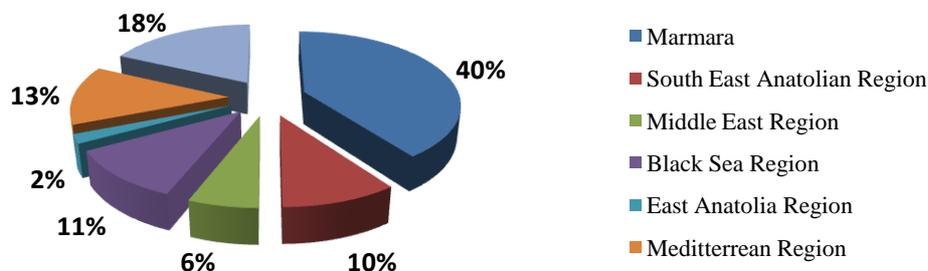


Figure 1. Loans Distributions in 2006 by geographic regions

The framework changes a bit if the usages of the loans are considered. In 2006, number of the loans used the most by Marmara region with USD 191.2 million, 40% and the least by East Turkey with USD 9 196 thousand and 2%. The Table 1 shows the composition of the sectors according to the regions with percentage included.

Table 1. Loan Amount distribution by region and sectors in 2006 (USD thousand)

Name of Region	Sector				TOTAL	Shares From the TOTAL %
	Industry	Services	Energy	Other		
Marmara	131 824	33 466	24 493	1 450	191 235	40
Aegean	48 832	20 284	14 780	-	83 897	18
Mediterranean	27 886	34 705	-	-	62 591	13
Black Sea	20 742	2 790	27 815	395	51 743	11
South East Anatolian	32 380	14 765	44	608	48 800	10
Middle East	22 709	5 156	-	2 254	30 121	6
East Anatolia	642	-	8 554	-	9 196	2
<b>TOTAL</b>	<b>285 018</b>	<b>111 169</b>	<b>75 688</b>	<b>5 709</b>	<b>477 586</b>	<b>100</b>

Source: Republic of Turkey Prime Ministry Undersecretariat of Treasury, Directorate General of Foreign Economic Relations, 2008.

In 2006, the order of the loans with respect to size, they are owned by firms is commonly medium sized firms with 144 unit and 40.8%, small sized with 86 units and 24.4% (Directorate General of Foreign Economic Relations, 2008). The new enterprises established and they get the 7.1% share from the total loans used.

If the size of the firms according to number of the loans owned is compared by the region, all regions except Black Sea Region and East Turkey used the efficient number of loans. However, it is obvious that medium sized firms own most of the loans. Marmara, South East Anatolia and Aegean regions have the highest share by the means of loans in comparison to other regions.

If the size of the firms according to number of the loans owned is compared by the sector allocation, it can be concluded that industry and service sectors own loans the most. Especially medium sized firms in service sector owned loans more than other sectors in service (Directorate General of Foreign Economic Relations, 2008).

The average of the period 1999-2005 and year 2006 are compared, the percentage of the loans usage of the small and micro sized firms increased in 2006 but medium and large sized firms share about loans usage decreased. In 2006, medium sized firms are the first with 30.8% usage of loans, followed by large firms with 23.8% and small firms with 16.9%.

In 2006, loans of enterprises in Marmara, Aegean Region, Southeast Anatolian and Middle East Anatolian are mostly used by medium sized firms, loans of enterprises in Mediterranean Region are mostly used by new established firms, loans of enterprises in Black Sea Region are mostly used by micro institutions and loans of firms in East Anatolia Region are at most used by small firms. This information provides the knowledge about the development situation of the industries in the areas. For instance; the enterprises in the Southeast, Marmara, Aegean, Middle East Anatolian parts of Turkey has been developing for a while, thus the loans are mostly used by medium sized firms. However, Black Sea Region has mostly new established firms, thus the loans are mostly used by them. Table 2 provides further detailed information.

According to size of the firms, distribution according to sectors of the firms, in 2006, large firms have the highest amount of loans in industry sector with USD 108 444, service sectors have the highest amount in medium sized firms with USD 40 969. Total amount of the loans in 2006 is USD 477 586. It is obvious from the distribution that the industry and the service sectors have the highest amount in the loans in comparison to the other sectors. The amount of the loans in industry sector is USD 285 018 and in service sector is USD 111 169.

Table 2. Distribution of amount of loans by regions with respect to firm size in 2006 (USD)

Name of Region	Firm Size				New established firms	TOTAL
	Micro Sized Firms (1-9 Headcount)	Small Sized Firms (10-49 Headcount)	Medium Sized Firms (50-250 Headcount)	Large Sized Firms (>250 Headcount)		
Marmara	20 179	38 392	69 834	48 725	14 103	191 235
Aegean	5 336	1 246	28 932	27 782	20 599	83 897
Mediterranean	7 492	7 231	9 385	17 653	20 829	62 591
Black Sea	29 924	11 812	2 593	-	7 413	51
South East Anatolian	2 191	4 881	22 658	15 631	3 437	743
Middle East	2 122	8 811	12 924	3 683	2 579	48 800
East Anatolia	-	8 554	642	-	-	30
TOTAL	67 245	80 929	146 971	113 476	68 962	121

Source: Republic of Turkey Prime Ministry Undersecretariat of Treasury, Directorate General of Foreign Economic Relations, 2008

### *Halk Bank (Loans Guarantee Fund)*

Halk Bank, a state bank, is the most common bank in Turkey to support development of the small and medium sized enterprises by providing the financial instruments to them. The bank not only provides loans but also low interest rates and international funds such as German KFW Incentive funds with the funds allocated by the World Bank.

Halk Bank provides the guarantee liability fund for the guarantees issued by the Loans Guarantee Fund (LGF). LGF established in 1991, and is a joint stock company with six public and semi public institutional shareholders in terms of TOBB, TESK, TOSYOV, MEKSA, KOSGEB, and Halk Bank. LGF provides guarantees to SMEs up to 70%-80% of the loan depending on the size of the loans.

During the crisis periods of Turkey, the loans decreased from EUR 172 million in 1999 to EUR 153 million in 2000. In 2001, the sharp decline in the amount of the loans which decreased to EUR 26 million. In the case of SME, the distribution of Halk Bank loans through year 1997 to 2003 decrease in all years and severe decrease after 2001 crises. It is also obvious in the employment data for the same time period.

Another issue related to loans is the requirements for the enterprises that they need to accomplish. In order to get the credit guarantee, the firms need to be member of TOBB or TESK and need to have employees less than 250. For 80% credit, the firm needs to guarantee up to EUR 200.thousand maximum and for 70% credit, the firm needs to guarantee over EUR 200.thousand up to EUR 400.thousand maximum. The maturity period for the credit is maximum 8 years with interest rate of 3% pa (OECD, 2005).

### *Leasing*

Leasing is utilized to obtain an access to machinery, vehicles or other equipment on a rental basis which decreases the need of capital to invest into the equipment. The equipments actually belongs to the financial institutions (leasing company), however it's used by firms. The use of leasing option to finance the company helps to increase the efficiency and profitability of the firm.

Leasing option to finance a company is commonly used for big investments needs. For instance, a company which plans to enter a business which requires integrated system of computers is likely to use leasing; however, to buy a single computer it may not be necessary to work with leasing company. According to the Equipment Leasing Association of America, approximately 80% of U.S. companies lease some or all of their equipment, and there are some thousands of equipment-leasing firms nationwide catering to that demand. In Turkey, the percentage of usage of leasing is around 5% to 10% which can be increased by time. Generally leased goods in Turkey are medical products, computational systems, energy plants, transportation vehicles, textile machines, integrated plants.

To finance the firm, leasing is the commonly used technique especially inflationary economies in which the need of capital increased day by day. One of the advantages leasing provides in Turkey is the option to finance 100% of the project which results no need to use capital owned with fixed financing rate instead of a floating rate. It is also beneficial for tax purposes, conserving working capital. Second advantage of leasing is the option to have flexible repayment plan, lower monthly payments than having a loan. It provides the option to purchase the equipment at the end of the period while using with the profit generated by the investment. In the inflationary economies such as Turkey, firms may feel more secure towards risk. The final advantage that leasing provides to enterprises is that the equipment also shows up on your income statement as a lease expense rather than a purchase. If you purchase it, your balance sheet becomes less liquid.

Besides the advantages, there are also disadvantages of leasing financing option. Renting the equipment leads to a higher price over the long term. Another disadvantage about leasing is that commits you to retaining a piece of equipment for a certain time, which can be problematic if your business is about to fail.

Types of leasing companies include banks and banks affiliated firms, equipment dealers and distributors, independent leasing companies, captive leasing companies, broker/packagers. Banks and bank-affiliated firms that will finance an equipment lease may be difficult to locate, but once found, banks may offer some distinct advantages, including lower costs and better customer service. Equipment dealers and distributors can help to arrange financing using an independent leasing company. Independent leasing companies can vary in size and scope, offering many financing options. Captive leasing companies are subsidiaries of equipment manufacturers or other firms. Broker/packagers represent a small percentage of the leasing market. Much like mortgage or real estate brokers, these people charge a fee to act as an intermediary between lessors and lessees.

Leasing regulations in Turkey are titled as regulation on the incorporation and operating principles of leasing, factoring and finance companies which is published in official gazette on 10 October 2006 Tuesday number 26315 (FIDER, 2006). It has been regulated by banking regulation and supervision agency.

The largest players in the industry feature Ak Lease, Deniz Leasing, Garanti Leasing, Is Leasing, Suzer Leasing, Yapı Kredi Leasing, etc. Table 3 shows descriptive statistics as of 2008. Total amount of invoice value is, USD 5 302 million and the amount taken from rent is USD 6 504 million.

Table 3. Leasing computations concerning sectors (2008) (USD million)

Name of Region	Amount of Invoice	Share of the TOTAL (%)	Amount of Rent	Share of the TOTAL (%)
Agriculture	235	4.44 %	301	4.63 %
Manufacturing Industry	2 332	43.99 %	2 825	43.44 %
Service	2 679	50.53 %	3 310	50.89 %
Others	55	1.04 %	67	1.04 %
<b>TOTAL</b>	<b>5 302</b>	<b>100%</b>	<b>6 504</b>	<b>100%</b>

Source: FIDER, 2008.

### 3.4. Factoring

Factoring is a financing method in which a business owner sells accounts receivable at a discount to a third-party funding source to raise capital. It is the oldest method for cash-management tool for the firms which receive the cash in long term manner.

Factoring is commonly used in Turkey in the following way:

- Firms expresses its interest to have factoring service, and delivers the required documents.
- Factoring company conducts investigations and makes an offer for fees and commissions.
- After making the arrangement with factoring company, the firm makes a sale transaction, delivers the product or service and generates an invoice. The factor (the funding source) buys the right to collect on that invoice by agreeing to pay you the invoice's face value less a discount--typically 2 to 6%. The factor pays 75% to 80% of the face value immediately and forwards the remainder (less the discount) when your customer pays.

Factoring is not a loan; it does not create a liability on the balance sheet or encumber assets. It is the sale of an asset, in this case, the invoice. Although factoring is known to be an expensive method to finance a company, it's not true for all aspects. If it's compared the discount rate factors charge with the interest rate banks charge, factoring costs more. However, if it can't qualify for a loan, the interest rate becomes irrelevant. Factoring firms also provide services that banks do not: They typically take over a significant portion of the accounting work for their clients, help with credit checks, and generate financial reports to let the firm know where it stands.

Although factoring provides reasonable solutions, it is just short-term solution for two years or less. Some of the largest factoring companies in Turkey are Acar Factoring, Ak Factoring, Anadolu Factoring, Demir Factoring, Fortis Factoring, Garanti Factoring, Is Factoring, etc. Below table shows the revenues handled with factoring in compare of Turkey to the world. As seen in the table 4, revenue of Turkey from factoring is USD 51 594 million in 2010 which means that 1.36% of world's factoring revenue

Table 4. Factoring revenues with respect to the regions of world (USD million)

Name of Region	Domestic	Foreign	TOTAL
Europe	1 193 808	195 637	1 389 445
USA	229 952	16 332	246 284
Africa	21 405	765	22 171
Asia	354 857	113 175	468 033
Australia	60 363	113	60 476
TOTAL	1 860 385	326 023	2 186 408
Turkey	46 919	4 675	51 594

Source: FIDER, 2010.

#### 4. Conclusion

In this paper I provide an assessment of equity and debt financing by relying on various financial data. The review of the data indicates that despite frequent ups and downs between 1999 and 2006 Turkish equity markets and bank lending expanded to unprecedented level. Much of the success in the industry has been due to macroeconomic stability and sound financial policy.

The economy is mostly based on small and medium enterprises. The SME use several financing options such as equity financing, debt financing and factoring. Equity financing is mostly preferred by small enterprises, even it has the disadvantage of being no-tax deductible. Debt financing has two major distinctions in Turkey in terms of bank financing and leasing. Bank financing is preferable because of the fact that its being tax deductible. To conclude, clearly Turkey is an emerging country with the increasing number of enterprises which creates need of financial sources. Turkey dealt with the financing problem in cooperation with the developing world techniques.

The study also reports a vibrant and growing leasing and factoring industries. Both of the industries are likely to tap a larger market share as Turkish economy grows over time. Overall, through sound management and learning-by-doing experience the financial system evolved into one of the strongest, in the Mediterranean featuring robust financial performance and fostering unprecedented economic growth in mid 2000s. Through these experiences, methods of firm financing become a crucial area and necessitating a further investigation at country specific level.

#### References

- Akyüz, K., Akyüz, I., Serin, H., Cindik, H. 2006. The financing preferences and capital structure of micro, small and medium sized firm owners in forest products industry in Turkey. *Forest Policy and Economics* 8:3, 301-311.
- Cinar, S. 2008. Türkiye'deki kobi'lerin finansman sorunları. *Paradoks Ekonomi, Sosyoloji ve Politika Dergisi* 4:1, 1305-7979.
- Denizer, C. 1997. The effects of financial liberalization and new bank entry on market structure and competition in Turkey, *World Bank Policy Research Working Paper No.* 1839. Retrieved from; <http://ssrn.com/abstract=604998> (07/08/2011)
- Denizer, C., Gultekin, M.N. and Gultekin, N.B., 2000, Distorted incentives and financial development in Turkey. *Financial Structure and Economic Development Conference by World Bank* Washington DC.
- FIDER. 2006. Regulation on the incorporation and operating principles of leasing factoring and finance companies. Retrieved from: <http://www.fider.org.tr/?intPageStructureNo=14&sintLanguageID=0&bytContentType=2&intPageNo=97&strHitCountParam=2%7C14%7C0%7C279%7C802>. FIDER, Istanbul. (July 22, 2009)

- FIDER. 2008. *Factoring report with respect to Sectors*. FIDER Publication, Istanbul.
- FIDER. 2010. *Factoring world report*. FIDER Publication, Istanbul.
- Finney, R. 2004. *Every manager's guide to business finance*, DIANE Publishing Company.
- Isik, I., Hassan, K. 2003. Financial deregulation and total factor productivity change: An empirical study of Turkish commercial banks. *Journal of Banking and Finance* 27:8, 1455-1485.
- KOBI Information system web site. Retrieved on June 12, 2009, from: <http://www.kobi.org.tr/sanayiveritabani.php>
- World Bank. 2003, *Non-bank financial institutions and capital markets in Turkey*, World Bank Report.
- OECD, 2005. *A Framework for the development and financing of dynamic small and medium sized enterprises in Turkey*. OECD Publication, Istanbul.
- Steinherr, A., Tukul, A., Ucer, M. 2004. *The Turkish banking sector: challenges and outlook in transition to European Union membership*, EU-Turkey Working Paper No. 4, CEPS, Brussels.
- Republic of Turkey Prime Ministry Undersecretariat of Treasury. 2008. *SME Credit Report 2006*, Republic of Turkey Prime Ministry Undersecretariat of Treasury, Directorate General of Foreign Economic Relations.
- World Bank, 2008, *IFC financing micro, small and medium enterprises: An independent Evaluation of IFC's Experience with Financial Intermediaries in Frontier Countries*, 57-85.