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Iryna Akimova, Marta Oleksiv

The Development of Industrially Oriented Small and Medium Size Enterprises in Ukraine in 2000:

Results of a Business Survey

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Reytarska 8/5-A, 01034 Kyiv,

Tel.: + 38 044 228-63-42,

+ 38 044 228-63-60,

Fax: + 38 044 228-63-36

E-mail: institute@ier.kiev.ua

http://www.ier.kiev.ua



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Iryna Akimova, Ph.D.: Director of the Institute for Economic Research and Policy Consulting. Associate Professor of Economics at the Kharkiv State Polytechnic University. Alexander von Humboldt Research Fellow at the University of Magdeburg. Teaching and research in macroeconomics and economic reforms in transition countries. Particular focus on corporate restructuring and the development of the small business sector in Eastern Europe.

Marta Oleksiv: Research Associate at the Institute for Economic Research and Policy Consulting. Focuses on corporate sector reform (privatisation, enterprise restructuring, state corporate governance) and the development of small and medium-sized business. Education at the National University of "Kyiv-Mohyla Academy" (MA in Economics) and the National University "Lviv Polytechnik" (Bachelor's Degree in International Business Management).

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The Development of Industrially Oriented Small and Medium Size Enterprises in Ukraine in 2000: Results of a Business Survey

Iryna Akimova, Marta Oleksiv

1 Introduction

Small and medium sized enterprises (SMEs) play an important role in both developed and transition countries. Recent studies provide evidence of an increasing role for the SME sector in the global economy, though its share in GDP and in employment varies from country to country. For example, in Great Britain the SME sector produces 50-53% of GDP, in Germany – 50-54%, in the USA – 52-55 %, in Italy – 57-60% and in France – 63-67% (Semikolenova, 1999). It has been found that on the average SMEs account for 31% in industrial value-added and 46% in employment in countries with low-income levels. In countries with a high-income level the same indicators are 31% and 24% respectively (Snodgrass, Biggs, 1995).

Though the development of SMEs in transitional economies has attracted a lot of attention, Ukraine was not in the research focus for some time. The situation changed in 1999-2000 when Management Systems International (MSI) together with the Kyiv International Institute of Sociology, as well as IFC undertook several surveys on SME activities. These surveys concentrated on studying the changes in the regulatory environment in which SMEs operate (enterprise registration, licensing, inspections, taxation, state interventions, etc.), as well as on their performance results. They covered mainly those sectors, which dominate the SME sector, namely trade, catering and services.

The focus of our study is the analysis of the main tendencies, determinants and obstacles of the development of industrially oriented small and medium Ukrainian enterprises. By industrially oriented enterprises we mean enterprises that are involved (at least partly) in manufacturing and construction activities. We define small and medium enterprises as enterprises with less than 250 employees. Focusing on industrially oriented companies, we tried to fill the informational gap concerning this group of SMEs, since most of the studies on SME development in transitional economies have concentrated on firms operating in the trade and services fields.

We have enlarged the scope of our research by looking into aspects such as the competitive environment of SMEs, the softness of budget constraints (including different type of arrears, state orders and barter transactions), problems of contract enforcement and the protection of property rights, as well as changes in ownership structure and restructuring activities of the firms. Special attention was paid to SME financing. Our study is based on



the results of a survey that has been conducted in three regions of Ukraine in the fall of 2000 by the Institute of Economic Research and Policy Consulting.

This is primarily a descriptive paper summarising the results of this survey and discussing the sample structure and the methodology involved. The paper is organised as follows:

Chapter 2 presents a short description of the current development of the small business sector in Ukraine based on Ukrainian official statistics.

Chapter 3 provides a short description of the survey procedures and main sample characteristics.

Chapter 4 discusses changes in the employment level and ownership structure of SMEs.

Chapter 5 analyses peculiarities of the production and sales activities of SMEs and their competitive environment.

Chapter 6 describes the hardness of budget constraints for Ukrainian SMEs.

Chapter 7 presents an analysis of SME financing including bank credits.

Chapter 8 discusses peculiarities of Ukraine's regulatory environment, such as the regulatory burden, the protection of private property rights, contract enforcement, taxation and the system of «informal» relations with representatives of the state authorities.

Chapter 9 analyses performance results of Ukrainian SMEs in the year 2000 and their growth expectations for 2001.

Chapter 10 describes the compliance of Ukrainian SME businesses with EU regulations.

Chapter 11 discusses the main barriers to SME growth.

Finally, Chapter 12 presents our main conclusions and policy recommendations.

This paper is intended to be the first one in a series of empirical project papers with the object of deepening our knowledge about SME development in Ukraine. Future papers will analyse the problems of SME financing, the linkage between SME growth and the quality of governance as well as the effects of other factors on SME performance results.

2 Small enterprises in Ukraine: official statistics

In Ukraine, the small enterprise (SE) sector² is a marginal player in the country's economy. Though the number of small enterprises has increased since the mid-90s, their share in total output and total employment is not high. According to official statistics for the year 2000, the total number of

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At present Ukrainian legislation does not define medium size enterprises, therefore our analysis of the national statistics is limited to small businesses only.



small enterprises was 217,930 with an employment (without natural persons) of 1,709,800 people. Their output constituted 5.2% of the total national output, while their employment represents 9.3% of total employment³. The legal definition of a small business in Ukraine includes all legal entities with up to 50 employees and annual sales up to 500,000 EURO (natural persons), and all individuals who are engaged in entrepreneurial activity. Ukrainian official statistics do not define medium size enterprises, making international comparisons of SME development very difficult.

Private ownership dominated in the SE sector in 2000: 95.6% of the enterprises were non-state ones. In 2000, about 45.8% of all small enterprises operated in trade and catering, only 14.3% of the firms were involved with manufacturing, and another 10.2% of the SEs were active in construction⁴. This distribution can in part be explained by the smaller amounts of investment needed for starting small businesses in the non-manufacturing sector and by lower market exit costs.

Manufacturing enterprises, accounting for 14.3% of the total number of small firms, produced 22.2% of total SE output in 2000. The shares of small manufacturing firms in total manufacturing output and employment were 2.4% and 7.2% respectively.

The regional distribution of small enterprises is quite uneven. The largest number of small enterprises is registered in Kyiv-city, and in the Donetsk, Dnipropetrovsk, Kharkiv and Lviv regions.

The Ukrainian government has directed some of its expenditures towards the implementation of national programs aimed at SE sector development on both the central and local levels. However, these programs have not produced the expected results so far. According to official statistics, the profitability of small enterprises showed a decreasing tendency in 1999. The performance results of all small enterprises being aggregated on the sector level indicated total losses⁵, at least, in 4 industries, including manufacturing. Although in 2000 the financial results of small enterprises before taxation were positive, the small business sector as a whole showed net losses. On the average, the profitability (defined as net profit/losses to sales⁶) of the SE sector was close to 0 (-0.12% in 2000). The financial results for manufacturing firms were even worse: the average rate of losses was 2.1%. About 40.2% of the total number of small enterprises made losses. The respective indicator for manufacturing SEs was 42.3%.

The decreasing profitability in SEs sector might be a result of increasing competition. Besides, it should be taken into account that official statistics do not include the "shadow" economy, which is typical for SEs. Thus, the real profits of SEs and their share in total output and employment could well be higher. However, the fact that small enterprises considered operations in the official sector to be disadvantageous shows that there are deficiencies present in the Ukrainian business environment.

According to the authors' calculations.

According to the "ZKNG" classification.

⁵ Balance profits (losses).

Sales include indirect taxes.



Real efforts to facilitate the development of Ukrainian SEs started in 1997 with the establishment of the State Committee on Regulatory Policy and Entrepreneurship, which focused on the improvement of the regulatory environment. During the following year the registration procedures were simplified by reducing the number of documents required for registration and shortening the registration time. The Presidential Decree "On some deregulatory measures for business activities" # 817/98 as of 23.07.1998 tried to further decrease the regulatory burden on enterprises by clarifying the rules for conducting inspections by state agencies. It introduced the procedure for regular inspections and determined the reasons for irregular controls. Furthermore, firms were given the right to register every inspection and to refuse access to their documentation to any state agency representative who intends to conduct an inspection without registration. Another presidential decree "On Implementation of a Unified State Regulatory Policy in the Sphere of Entrepreneurship" # 89/2000 as of 22.01.2000 tried to make the regulatory policy more transparent, defining the types of regulatory acts and classifying eligible regulatory authorities.

A lot of effort has been invested in tax reform. In 1995 the maximum marginal income tax rate was reduced to 40%, and the former turnover tax was replaced by a VAT with a rate of 20%. In 1998, in order to lower the tax burden for small enterprises several presumptive tax regimes were introduced. The unified tax (one of the most important presumptive taxes) has a rate of 6% of gross income if VAT is assessed separately, and a rate of 10% if VAT is included (Thiessen, 2001). However, the number of SEs that chose to pay presumptive tax in subsequent years is rather low and amounted to only 27% in 1999 (Yakub, Senchuk, 2000). Though the tax reform initiated important steps towards harmonisation of the Ukrainian tax rules with western principles, the whole tax regime has remained rather confusing and unpredictable for companies. Too many exemptions were maintained with respect to the profits tax, some tax rules have remained unclear, and preferential tax treatments were frequently changed, sometimes retroactively to the detriment of enterprises (Melota and Thiessen, 2001). What is more, in the absence of specific tax courts, the State Tax Administration remains entitled both to implement and interpret the tax laws.

The enforcement of economic rules remains a serious problem. On the country level, it is reflected in the gap between the extensiveness and effectiveness of legal reform⁷. The Legal Indicator Survey 2000 conducted by the EBRD, assigns Ukraine to the group of countries with a serious "implementation gap", meaning that relatively comprehensive laws are not being properly implemented (EBRD, 2000).

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p.33).

According to the methodology of the EBDR Legal Indicator Survey, extensiveness of legal reform measures the extent to which key commercial and financial laws approximate internationally acceptable standards. Effectiveness reflects the degree to which these laws are implemented or enforced (EBRD, 2000,



3 Principal sample characteristics

The survey was organised in the form of personal interviews with the managers of small and medium sized enterprises (SMEs). The questionnaire that was used for the interviews contained a wide range of questions on the firm's products, its marketing strategies, investment, competitive environment, performance, and obstacles to development. The original sample included only enterprises that were founded in or before 1998, employed less than 250 people at the time of the survey, and (among other activities) were involved in manufacturing or construction.

The sample of 300 firms was drawn from the official regional registers. Managers of 25 firms refused to participate in the survey. During another 65 interviews the managers/owners of the SMEs answered less than 50% of the questions. Therefore, only 210 complete questionnaires could be and were used in the final analysis.

The survey was run in three cities of Ukraine (Kyiv, Kharkiv and Donetsk), where - according to official statistics - the largest number of small enterprises is located. The regional distribution of the sample is presented in Table 3.1.

Table 3.1 Regional distribution of the sample

City	Number of enterprises	Share in the total sample, %
Kyiv	102	48.6
Kharkiv	81	38.6
Donetsk	27	12.9
Total	210	100.0

Ukrainian SMEs often operate in several different spheres of economic activity. Therefore, our selection criteria did not require activities in manufacturing/construction to be the main source of their revenues. However, Table 3.2 shows that for the majority of SMEs in our sample these spheres do actually constitute the main source of revenues.

Table 3.2 Distribution of the SMEs in the sample by the main source of revenues

Sources of revenues	Number of enterprises	Share in the total sample, %
Trade	12	5.7
Catering	11	5.2
Services	36	17.1
Industrial orientation (manufacturing, construction)	151	71.9
Total	210	100.0

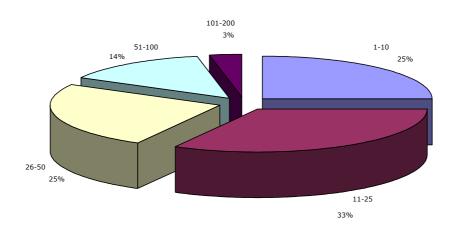


Non-state ownership is typical for SMEs. Our sample also demonstrates the clear predominance of the private form of ownership (see Table 3.3). The limited number of state enterprises is explained by the almost completed «small enterprise» privatisation process and by the dominance of non-state-owned firms among recent starts-ups.

Table 3.3
Distribution of the SMEs in the sample according to the form of ownership

Form of ownership	Number of enterprises	Share in the total sample, %
Private (private enterprises)	134	63.8
State (state enterprises)	5	2.2
Collective (collective/joint stock enterprises)	71	33.8
Total	210	100.0

Graph 3.1 Distribution of the SMEs in the sample according to the size of their labour force (employment level at the end of 2000)



Graph 3.1 shows the distribution of sampled SMEs according to the size of their labour forces. As can be seen from the figure, the vast majority of the enterprises employ less than 50 people. The average employment level in our sample was 32 people.

The "age" distribution⁸ of the enterprises in our sample is shown in Table 3.4. 85% of the firms have been operating within their markets for 2 to 10 years. A rather small percentage (7.4%) of firms in the sample had started

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⁸ The age of an enterprise is defined as number of years since its foundation.



operations more than 10 years ago. This is not surprising, since the active development of SMEs in Ukraine started only after 1991 with the beginning of the «small enterprise» privatisation programme.

Table 3.4 "Age" distribution of the SMEs in the sample

Age of the enterprise, years	Number of	Share in the total
	enterprises	sample, %
Up to 2	15	7.7
2 to 5	93	44.2
6 to 10	86	40.7
More than 10	16	7.4
Total	210	100.0

The sectoral distribution of the enterprises (according to their main type of the business activity and products) is presented in Table 3.5.

Table 3.5 Sectoral distribution of the SMEs in the sample

Industry	Number of enterprises	Share in the total sample, %
Manufacturing	•	
Fuel industry	1	0.5
Non-ferrous metals	4	1.9
Chemical industry	10	4.8
Machine building and machine	43	20.5
working and wood pulp	18	8.6
Woodworking and wood-pulp industry	10	6.0
Construction materials industry	5	2.4
Glass industry	3	1.4
Light industry	21	10.0
Food industry	28	13.3
Microbiological industry	1	0.5
Flour-milling and feed mill industry	2	1.0
Medical industry	5	2.4
Printing industry	9	4.3
Other industries	5	2.4
Transport	4	1.9
Communication	1	0.5
Construction	13	6.2
Trade and catering	12	5.7
Computer technologies	1	0.5
Marketing services	4	1.9
Other services	14	6.7
Housing	3	1.4
Not answered	3	1.4
Total	210	100.0



4 Structural changes

The majority of the enterprises in the sample (78%) were founded as start-ups in the form of private (single proprietorship) or collective (partnership of joint-stock company) firms (see Table 4.1). The other processes through which SMEs were created were privatisation of state SMEs (about 9%) and split-offs from large state-owned firms (during their privatisation) (9%) and large collective enterprises (3.3%).

Table 4.1
Distribution of the SMEs according to their process of founding

Methods of founding	Number of enterprises	Share in the total sample, %
Newly founded enterprises (private or collective)	164	78.1
Parts of former state enterprises that split-off during privatisation	18	8.6
Privatised former small (medium) size state enterprises	19	9.0
Parts of larger collective enterprises that split-off	7	3.3
State enterprises	2	1.0
Total	210	100.0

Only 19.5% of the surveyed firms reported changes in their ownership structure that occurred since the date of founding. These changes demonstrate a further shift to non-state ownership. 57% of the firms were originally founded as private companies, 29% as collective or joint-stock companies, and 14 % as state enterprises. At the end of 2000 (when the survey was conducted), 64% of the enterprises were private, and 34% of the firms were organised as joint stock companies or collective enterprises (see Table 3.3).

Some changes occurred in the distribution of the shares within the small/medium joint stock companies (see Table 4.2). The average stake of managers and employees has remained almost unchanged, while the average stake of foreign owners decreased, and the stake of Ukrainian outside owners (non-employees) increased. The increase in the average of state stake is related to the peculiarities of the privatisation process: some of the state enterprises were corporatised and, thus, entered the category of joint-stock companies. This change produced a statistical increase in the average of state stake.

Private enterprises were typically owned by 2-3 persons (see Table 4.2). More than a half of the enterprises started their activity with 10 or less employees (56%), 22% of the firms – with 11-25 employees, and 16% of the enterprises – with 26-100 employees (see Graph 4.1). On average, at the time of foundation the SMEs of our sample employed 31 people (see Table 4.2).



Graph 4.1
Size distribution of the enterprises (employment level at the time of foundation)

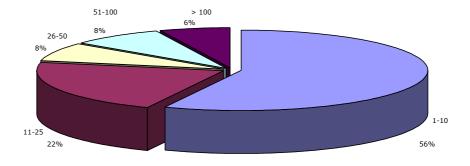


Table 4.2 Average indicators of structural changes since the firms' foundations

Indicator	Mean	Standard deviation	Minimum	Maximum
Employment (end of 2000)	32	31	1	153
Employment (at foundation)	31	68	1	400
Structure of ownership for joint-				
stock enterprises in 2000				
State	2.35%	13.06%	0	100%
Managers	35.16%	42.21%	0	100%
Employees	36.78%	42.01%	0	100%
Ukrainian outside owners	19.35%	33.08%	0	100%
Outside foreign owners	4.88%	16.64%	0	100%
Structure of ownership for joint-				
stock enterprises at the time of				
founding				
State	1.17%	6.48%	0	43%
Managers	35.02%	43.82%	0	100%
Employees	36.14%	44.03%	0	100%
Ukrainian outside owners	18.41%	33.46%	0	100%
Outside foreign owners	7.53%	21.37%	0	96%
Number of owners of private	2		1	4
enterprises (scores from 1 to		0.85		
4)*/Typical number of owners	2-3		1	> 5

 $^{^*}$ 1 corresponds to 1 owner; 2 – 2-3 owners; 3 – 4-5 owners; 4 – owners more than 5



Table 4.3
Average employment at SMEs of different "age" categories

	Up to 2 years	2 to 5 years	6 to 10 years	More than 10 years	F
Average level of employment at the time of founding	17.8	20.4	28.1	127	12.10*
Average level of employment in 2000	15.3	23.0	40.7	51.7	5.9*

^{*} p-value<0.01

Table 4.3 shows the average level of employment at the time of foundation and in 2000 across the "age" categories. As can be seen, the more recently the enterprise was founded, the lower is the initial average employment. This can be explained by the fact that the tendency for "overemployment", inherited from the former socialist enterprises, has decreased since the beginning of the privatisation and restructuring processes in the state sector. The over-employment problem is especially pronounced in cases of state SMEs that were founded right at the beginning of the privatisation process. Thus, the highest "starting" level of employment (127 persons) in our sample pertains to the group of the enterprises that operate for more than 10 years already. This "old" group contains all the state enterprises of the sample, and the share of privatised portions of former state firms (after the split-off processes) is significantly higher in this category than in the other "age" groups. At the same time, the share of private and collective start-ups in the "old" group is considerably lower than in any other "age" group. Start-ups in the "old" group are represented mainly by "co-operatives" that appeared at the beginning of the "co-operative" movement (end of the 80s).

The lowest "starting" level of employment (18) is typical for the youngest group of enterprises, which have the highest percentage of private and collective start-ups. A decrease in the "starting" level of employment in the "younger" groups of enterprises might be connected with an increase in the level of competition at the end of the 90s, which forced newly founded SMEs to use their labour forces more efficiently from the very beginning of their operations.

The analysis of the average employment level in 2000 across the "age" categories brings out another interesting point. The "youngest" firms (less than 2 years old) have decreased their average employment level from 17.8 to 15.3. This shows that the problem of "survival" is not yet solved for them. The enterprises of the "older" age groups increased their average employment: more "mature" (6 to 10 years) enterprises increased their average number of employees from 28 to 41 people, and less "mature" firms (2 to 5 years) from 20 to 23 people. This indicates a possible positive relationship between the level of employment and an SME's "maturity".

On the other hand, "old" enterprises (founded more than 10 years ago) decreased the average level of employment by more than half. This shows that the state-owned and privatised firms (concentrated most heavily in



the "old" group) were forced to start restructuring processes including necessary lay-offs.

Table 4.4
Average employment for SMEs with different foundation backgrounds

	Private or collective start-ups	Part of a former state firm that split- off during privatis- ation	Privatised former state SMEs	Part of a large collective enterprise that split-off	State SMEs	F
Average level of employment at the time of foundation	14.9	92	125.3	11.1	120	20.9*
Average level of employment in 2000	27.5	47.9	57.5	17.1	53.5	5.8*

^{*} p-value<0.01

Our conclusions are supported by the data presented in Table 4.4. The highest level of average "starting" employment was typical for the state enterprise (120), privatised former state enterprises (125) and the firms that split off from state enterprises during the privatisation process (92). All these enterprises cut their employment by more than half as a consequence of the restructuring processes. The average "starting" level of employment at newly created private firms and of companies that split-off from large collective enterprises was significantly lower: 15 and 11 persons respectively. Both groups of enterprises have since increased their average employment. This means that the firms, which had no "state" past and did not need restructuring, showed a tendency to grow.

We can therefore conclude that industrially oriented SMEs, which survived the first two years after their creation, showed a general tendency to grow. Positive dynamics of average employment are related to the firm's maturity.

Table 4.5 Plans by SMEs managers concerning changes in the employment level

Plan	Number of enterprises	Share in the total sample, %
Decrease the level of employment	6	2.9
Do not change the level of employment	103	49.0
Increase the level of employment	101	48.1
Total	210	100.0

With respect to plans for changes in employment levels during the next 2 years, the surveyed firms split into two groups: "survivors" (no plans to



increase employment levels in the future) and "expanders" (planning to increase the number of employees within the next 2 years) (see Table 4.5). Almost half of the firms in our sample showed a reluctance to increase the employment level in the very near future. Among other explanations, this might indicate some uncertainty by the SMEs' managers/owners about their future, which should be treated as a warning by policy makers that the business environment is not yet favourable enough to facilitate SME sector growth.

Conclusions:

- 1. Three fourths of the industrially oriented SMEs were founded as new private or collective/joint stocks enterprises (start-ups). Almost two thirds of all industrially oriented SMEs are private firms with on the average 2-3 owners, whereas one third of the SMEs are collective/joint stocks enterprises.
- 2. Since the times of their foundations, changes in the ownership structure of SMEs have occurred mainly with respect to the distribution of shares across the groups of owners in joint-stock companies. The stake of foreign outsiders has decreased, while the stake of Ukrainian outside owners has increased. The proportion of managerial and employee ownership has remained unchanged.
- 3. Those SMEs in the manufacturing sector, which survived the first two years of existence, showed a general tendency to grow. Increases in average employment levels are related to the maturity of the firms.
- 4. An increase in the average level of employment is typical for private and collective start-ups. Enterprises with a "state" past showed a tendency to significantly decrease the level of average employment during the process of restructuring.

5 Production and sales. Competitive environment

Due to their small size, SMEs tend to normally have a narrow product line. Our sample shows that SMEs produced 12 products on average (see Table 5.1). However, this number becomes even smaller if we drop several outliers with an unusually broad product line. In our sample, almost 21% of the firms produced only one product, and 76.6% made 10 products or less.

The breadth of the product line does not depend on the form of ownership, but is positively correlated to the age of the firm. More mature enterprises showed the tendency to have a broader product line (see Table 5.2).

In order to produce their main products SMEs used about 74 different inputs on average (Table 5.1). However, after dropping out several outliers (three enterprises that have more than 1000 types of inputs) we arrive at a mean value of 38. About two thirds of the respondents had relatively simple production processes: 43% of the enterprises needed up to 10



different inputs, 23% between 11 and 25, 13.7% between 26 and 50, 13.1% between 51 and 100; and only for 7% of the companies did the amount of inputs exceed 100. As expected, the broader the product line, the greater is the number of different inputs (see Table 5.2).

Table 5.1 Average indicators of enterprise activities

Indicator	Mean	Standard deviation	Minimum	Maximum
Number of the main products	11.83	25.71	1	300
Number of different inputs	73.98	322.39	1	3800

The number of suppliers for any single input is between 2 and 5. Most SMEs change some of their suppliers over time. Between 1999 and 2000 more than 50% of the surveyed firms changed fewer than half, while about 40% changed more than a half of their suppliers.

Table 5.2
The average number of main products and inputs for SMEs of different "age" groups

Indicator	Up to 2 years	2 to 5 years	6 to 10 years	More than 10 years	F
Average number of main products	8.8	9.2	11.4	30.8	3.2*
Average number of different types of inputs	6.4	46.5	66.2	338.4	3.5*

^{*} p-value<0.05

The geographical distribution of suppliers was the following: 52.7% of SMEs used Ukrainian suppliers, thus reducing the risk of delivery disruptions due to political or economic instability on foreign markets or unfavourable exchange rate fluctuations (e.g. Hryvna devaluation). At the same time, 47.3% of the enterprises imported some inputs. The largest amount of imported inputs (see Table 5.3) came from Russia and other FSU countries (32%) and from Western European economies (23%)⁹.

The export activities of SMEs were very limited. The majority of SMEs (about 80%) serve the domestic market exclusively. The share of non-exporters has even increased since 1998. In 2000, 81.3% of the firms did not sell their products on FSU country markets, and only 96% did not export to Western European markets.

The sum of the shares in Table 5.3 is not equal to 100.0%, since some of the SMEs had suppliers simultaneously in different regions.



The number of enterprises holding international product certificates was also low (6.6%). About three fourths of the respondents had Ukrainian quality certificates, however, this was rather a consequence of compulsory certification requirements for some products than due to the initiative of the producers.

Table 5.3 Geographical distribution of suppliers

Country origin of the inputs	Share in the total sample, %
Russia and other FSU countries	32
Eastern European countries	13
Western European countries	23
Rest of the world*	10

^{*} This category does not include Ukraine

The mean values for the share of exports in total sales as well as the share of non-FSU exports in total sales in 1998 were very low (5.4% and 1.2% respectively). For 2000, they even decreased (see Table 5.4). Though the export potential of the SMEs is rather low, almost half of the SMEs depend on the imported inputs.

Table 5.4 Average export indicators in 1998 and 2000

Indicator	Mean	Standard deviation	Minimum	Maximum
Average share of exports in total sales in 1998	5.46	15.6	0	100
Average share of exports in total sales in 2000	4.53	15.7	0	100
Average share of exports to countries outside the FSU in total sales in 1998	1.22	7.53	0	95
Average share of exports to countries outside the FSU in total sales in 2000	1.17	8.67	0	70

International experience shows that small enterprises either work in highly competitive markets producing final goods, or become a part of the production chain of larger enterprises. Most SMEs in Ukraine are involved in the production of final goods (or services) and work in highly competitive markets. In our sample enterprises had more than 5 competitors on average.

The respondents generally deemed the level of competition from Ukrainian producers as "strong", while estimating the competitive pressures from Russian/FSU, Eastern and Western European producers to be "weak", and even "very weak" from Asian producers (Table 5.5). The dominance of



domestic competitors on the markets served by Ukrainian SMEs might be due to the following reasons. 1) The orientation of Ukrainian SMEs on the local market segments for non-durable consumer goods uses positioning strategies different from those of the major foreign competitors (i.e. a medium/low quality – low price positioning strategy by Ukrainian SMEs versus a high quality – medium/high price positioning strategy by foreign competitors). 2) Domestic products are able to substitute for foreign ones due to the real devaluation of Hryvna between 1998 and 1999.

Table 5.5
Competitive environment as estimated by the respondents

Competitors	Average score	Estimated strength of the competitors
Ukrainian producers	4	Strong
Producers from Russia and other FSU countries	3	Weak
Producers from Eastern European countries	3	Weak
Producers from Asian countries	2	Very weak
Producers from developed Western countries	3	Weak

Due to their small size, SMEs cannot afford an extensive promotional budget. 65.1% of the respondents advertised their products (29% of the firms used only occasional advertisements). 90% of the firms spend less than 10% of their annual sales on promotion.

Most SME managers lack marketing skills: only 35% and 40% of SMEs prepared strategic and marketing plans respectively. Only 22.2% of the managers of the surveyed firms took part in a training program during the last 3 years.

Conclusions:

- 1. The majority of Ukrainian industrially oriented SMEs have narrow product lines and a production process of limited complexity (as measured by the number of inputs per product).
- 2. SME production is oriented towards domestic markets. The export potential of the SMEs is rather low, while almost a half of the SMEs depend on imported inputs.
- 3. Ukrainian SMEs operated in highly competitive markets. The main competitive pressure came from other domestic producers, while potential foreign competitors might occupy other market segments using higher price/quality positioning strategies for their products.



6 Budget constraints

Soft budget constraints (e.g. extensive barter operations, state orders representing a large part of total sales, large amounts of overdue payables and receivables) are usually accompanied by poor financial results. Empirical studies in other transition economies suggest that SMEs generally face harder budget constraints than large enterprises. Our survey provides evidence that Ukrainian SMEs are no exception to this rule. In our sample, about 78% of respondents reported having no state orders at all, and for half of those firms which had state orders, their share in total sales did not exceed 15%. Similarly, about 75% of the firms were not involved in barter operations, buying their inputs or selling their output. Those enterprises that used barter, arranged these transactions directly with their clients without any mediator (88.1%). The percentage of barter in total input purchases and in total sales remained steady for 62% and 68% of enterprises respectively, and decreased for 32% and 31% of the firms respectively.

The average share of state orders in total sales was significantly higher (22%) for the group of the enterprises that were created 10 years ago (see Table 6.1). This could be an indicator of an existing (continuing) system of informal relations ("web of mutual support") between managers of the former state enterprises and representatives of the state authorities that issue state orders. There was no significant difference across the "age" groups with respect to the average share of barter in total purchases or total sales. No significant differences were found either with respect to the share of state orders and barter in total sales between different groups of enterprises, based on their founding process (see Table 6.2).

Table 6.1
Budget constraint variables in 2000 according to the "age" group of the enterprises

	Up to 2 years	2 to 5 years	6 to 10 years	More than 10 years	F
Average level of state orders in total sales (%)	3.1	6.2	5.2	21.8	4.9**
Average level of barter in total input purchases (%)	5.3	5.05	3.84	1.31	0.65
Average level of barter in total sales (%)	3.54	4.02	4.97	0.52	0.81
Average level of overdue payables in total sales (scores from 0 to 4)*	0.40	0.87	0.87	0.40	0.21
Average level of overdue receivables in total sales (scores from 0 to 4)*	0.66	0.98	1.18	0.46	2.8**

^{* 0} corresponds to 0% of overdue payables/receivables in total sales; 1 - less than 10%; 2 - 11-40%; 3 - 41-70%; and 4 - more than 70%

^{**} p-value<0.05



Ukrainian SMEs cannot afford to accumulate large amounts of overdue payables and receivables due to significant working capital constraints. In our sample, about 44.1% of the firms had no overdue payables, and 31.5% of enterprises had accumulated no overdue receivables, while for 37.6% and 40.2% of SMEs overdue payables and receivables constituted less than 1 to 10% of total sales respectively. Compared to the previous year, the share of overdue payables in total sales did not change for 68% of the enterprises, and demonstrated a tendency to decrease for another 26.6% of the firms. In case of overdue receivables, most of the enterprises (73.7%) claimed no change compared to the previous year, 16.2% of the firms reported a decrease and only 10.2% of SMEs admitted to an increase in this indicator.

Table 6.2
Budget constraint variables according to the founding method of the enterprises.

	Private or collective start- ups	Part of a former state firm that split off during privatisation	Privatised former state SMEs	Part of a large collective enterprise that split off	State SMEs	L
Average level of state orders in total sales (%)	6.7	8.5	5.2	1.8	0	0.26
Average level of barter in total input purchases (%)	4.0	6.0	6.94	1.25	0	0.42
Average level of barter in total sales (%)	3.2	7.14	7.4	0	0	1.4
Average level of overdue payables in total sales (scores from 0 to 4)*	0.7	1.15	1.38	0.71	0.5	2.2**
Average level of overdue receivables in total sales (scores from 0 to 4)*	0.95	1.3	1.22	0.81	1.0	0.69

^{* 0} corresponds to 0% of overdue payables/receivables in total sales; 1 - less than 10%, 2 - 11-40%, 3 - 41-70%, and 4 - more than 70%

A significant difference in the average share of overdue receivables in total sales was observed across the "age" groups: this indicator was considerably higher in the group of firms that were created 6 to 10 years ago (see Table 6.1). Significant differences in the average levels of overdue payables in total sales were observed when the enterprises were grouped by their founding method: indicators were higher for former state enterprises that either were privatised as a whole or split-off from larger state firms (Table 6.2).

Wage arrears did not seem to be a big problem for the SMEs. Among the respondents only 20% claimed to have experienced wage arrears. For a

^{**} p-value<0.05



half of these cases the delay in paying wages did not exceed 2 months. The distribution of these enterprises according to the length of arrears is shown in Table 6.3.

Table 6.3 SMEs ranked according to the length of wage arrears

	Number of enterprises	% of the number of firms with wage arrears	% of the total sample
1 month	11	26.8	5.2
2 months	12	29.3	5.7
3-4 months	11	26.8	5.2
5-6 months	4	9.8	1.9
More than 6 months	3	7.3	1.4
Total	41	100.0	19.5

27.1% of the SMEs sent their employees on unpaid leave. Only 7% of all enterprises paid part of their wages in kind. Table 6.4 ranks enterprises that pay wages in kind by the percentage of wages thus paid.

Table 6.4 SMEs ranked according to the percentage of wages paid in kind

	Number of enterprises	% of the number of firms that pay part of their wages in kind	% in total sample
1-5%	4	28.6	1.9
5-10%	4	28.6	1.9
10-20%	3	21.4	1.4
20-40%	3	21.4	1.4
Total	14	100.0	6.7

Table 6.5 Average indicators of soft budget constraints

Indicator	Mean	Standard deviation
Percentage of enterprises that sent employees on unpaid leave (vacations)	27%	-
Percentage of enterprises that had wage arrears:	20%	-
 Number of months in arrears 	3.22	2.82
Percentage of enterprises paying part of their wages in kind:	7.7%	-
 Percentage of the wage that was paid in kind 	15.18%	11.86%
State orders as a share of total sales	6.57%	18.46%
Percentage of barter in total input purchases	4.87%	12.64%
Percentage of barter in total sales	4.28%	11.97%
Price discount (% of market price) in barter	8.90%	21.40%



Conclusions:

- 1. Ukrainian SMEs face relatively hard budget constraints.
- 2. Only about 22% of respondents received state orders, which were mainly concentrated in the group of the enterprises 10 years and "older".
- 3. 27% of respondents sent their employees on administrative leave, and 20% of respondents had 3 months' wage arrears on average.
- 4. The majority of the enterprises (75%) did not use barter operations.
- 5. Overdue receivables and payables by SMEs were generally less than 10% of total sales.

7 SME financing

One of the main aims of this survey was to investigate how Ukrainian SMEs finance their operations and, in particular, how they use bank credits. We believed that our bias towards industrially oriented firms should help us to collect the relevant data, since we assumed that these enterprises had higher capital requirements and were therefore more inclined to apply for bank loans than their trade/service counterparts. Among the main sources of SME financing we considered bank loans, non-bank financing and investment of self generated profits.

The managers/owners of the firms were asked whether they bought or rented their premises and equipment. It turned out that respondents preferred to rent the premises and own the equipment. In our sample, 71% of the firms rented and 35% of the enterprises owned their premises¹⁰. Since the time of their foundation, 61% of the firms had made major renovations to the premises. As can be seen from Table 7.1, in order to renovate their premises the firms used mainly their own capital (93%) or private loans from friends, relatives, etc. (11%). Bank loans for these purposes were used by only 3% of respondents.

Table 7.1 Sources of capital for renovation of the premises

Number of enterprises what renovated their premises

Own capital 119 93.0

Private (non-bank) borrowings 14 10.9

Bank loans 4 3.1

Other 7 5.5

 $^{^{10}}$ The sum is not equal to 100% since some firms owned one part of their premises and rented others.



Ukrainian SMEs were inclined to buy both used and new equipment (66% and 54%, respectively) (see Table 7.2). 24% of respondents rented their equipment.

Table 7.2
Distribution of SMEs according to their method of acquiring equipment

	Number of enterprises	Share in the total sample, %
Bought, new	139	66.2
Bought, old	113	53.8
Rented	50	23.8
Other	13	6.2

The distribution of enterprises according to the sources of financing for purchasing equipment is similar to that for renovation of the premises (see Table 7.3). The enterprises used mainly their own capital (87%) or private loans (14%). Again, bank loans were used only by a small number of firms (6%).

Table 7.3
Sources of capital for the purchase of the equipment

	Number of enterprises	% of the number of firms that bought their equipment
Own capital	166	86.9
Private borrowings	27	14.1
Bank loans	12	6.3
Other	25	13.1

Table 7.4 Reasons for not applying for bank loans

Reasons		% of the number of firms that did not apply for bank loans
No need	41	25.2
Could not provide the necessary material security	67	41.1
High interest rates	65	39.9
Other	11	6.8

During the period from 1998 to 2000, only 22.5% of SMEs applied for bank loans. At the same time, only 25% of SMEs claimed that they did not need a bank loan (see Table 7.4). The prime reasons for not applying for bank loans were the inability of the firms to provide the necessary collateral (41%) and high interest rates (40%). Those who applied for loans usually did it more than once (Table 7.5).



Table 7.5

Number of applications for bank loans filed during 1998-2000

Number of applications	Number of enterprises	% of the number of firms, which applied for bank loans
1	14	29.8
2	12	25.5
3 to 5	13	27.7
6 to 10	4	8.5
More than 10	4	8.5
Total of those who applied for bank loans	47	100.0

It is noteworthy that 51% of enterprises that applied were refused a bank loan and another 17% succeeded only once (see Table 7.6).

Table 7.6 Number of loans obtained

	Number of	% of the number of the firms,
	enterprises	which applied for bank loans
0	24	51.1
1	8	17.0
2	7	14.9
More than 2	8	17.0
Total of those who applied	47	100.0
for loans	4 /	100.0

The results show that obtaining a bank loan for investment purposes was a difficult task for Ukrainian SMEs. What were the main constraints? As can be seen from Table 7.7, the major constraints were the inability of the enterprise to provide collateral (64%), and inability of the bank to provide a long-term loan.

Table 7.7
Reasons for the banks' refusal to provide loans to SMEs

		% of those that were refused at least once
Absence of collateral	18	64.3
Non-profitability of the enterprise	2	7.1
Absence of long-term funds at the bank	6	21.4
Other	6	21.4

For those firms, which succeeded in getting a loan, the loan's size usually did not exceed one monthly sales volume. Taking into account that the monthly turnover of SMEs is usually small, it is clear that the interest



earned by the bank is often not in proportion to the risk it faces by providing a loan to an SME. On the other hand, this further constrains the demand for bank loans, since limited borrowing is more readily available from private individual "creditors".

A positive credit history is an important factor in obtaining a bank loan. In our sample, about 46% of the firms, which received a bank loan during the last two years, had also been successful with their applications at the same banks in the past. In 91% of the cases previous loans had been successfully repaid in the past.

Usually, enterprises applying for a bank loan are required to provide collateral. Ukrainian SMEs that succeeded in getting bank loans offered their equipment (48%) and commercial or private estates (30% and 30% respectively) as a collateral (see Table 7.8).

Table 7.8
Types of collateral for bank loans by SMEs

	Number of enterprises	% of the number of bank loan receivers
Equipment	11	47.8
Commercial estate (production facilities and office premises)	7	30.4
Private estate (flat, private automobile)	7	30.4
Other	4	17.4
Nothing	2	8.7
Total (bank loan receivers)	23	100.0

The value of the collateral often exceeds the value of the loan. As can be seen from Table 7.9, at least half of the firms provided collateral that significantly exceeded the value of the loan. This represents another method used by the banks to lower their risks.

Table 7.9
Value of the collateral as a percentage of the value of the bank loan

Collateral, % of the bank loan	Number of	% of the bank loan
value	enterprises	receivers
Up to 50%	8	34.8
51%-100%	2	8.7
101%-200%	8	34.8
More than 200%	5	21.7
Total (bank loan receivers)	23	100.0

It is worth mentioning that none of the respondents has obtained a bank loan for a period exceeding 3 years. On the average, firms received loans for one year (48%), or less than one year (35%) (Table 7.10).



Short-term loans turned out to be as difficult to get as the long-term ones. Only 8% of the respondents reported using short-term bank loans on a regular basis. At the same time, the vast majority of SMEs admits that a lack of working capital constitutes a serious problem for the enterprise's development.

Table 7.10 Duration of the loan

Time	Number of enterprises	% of the number of bank loan receivers		
6 months	8	34.8		
1 year	11	47.8		
1 to 3 years	4	17.4		
Total (bank loan receiver)	23	100.0		

Another source of SME financing is re-investment of their own profits. In the past, about 70% of our respondents re-invested on the average 34.6% of their profits (standard deviation 31.61), while 23.1% of the firms re-invested more than a half of their profits (this includes the 8.5% of firms that re-invested all their profits). In the future, about 80% of the enterprises plan to re-invest, on average, 34% (standard deviation 30.98). The remaining 20% of respondents plan to re-invest more than a half of their profits (including 9%, which are going to re-invest all their profits).

Conclusions:

- 1. SMEs tend to rent the production facilities (premises) and own the equipment.
- 2. Self-financing and private borrowings were the main sources of financing the renovation of premises and the purchase of equipment. SMEs very rarely used bank loans (less than 6% of the firms).
- 3. More than three fourths of the respondents never applied for bank loans, mainly due to their inability to provide suitable collateral, or due to high interest rates.
- 4. The lack of collateral (on the demand side) and unwillingness of the banks to provide long-term loans to SMEs (on the supply side) were the main reasons for unsuccessful loan applications.
- 5. On average, the size of a bank loan did not exceed one monthly sales volume of the SME. At the same time the value of the collateral usually significantly exceeded the value of the bank loan.
- 6. A positive credit history played an important role in SMEs being able to receive further bank loans.
- 7. The re-investment of profits remains the main source of financing new investment projects for SMEs.



8 Business environment

The quality of the business environment was investigated with respect to the following indicators: registration barriers, the frequency of visitations by different state authorities, protection of private property rights, enforcement of contracts (trust in the Arbitrage courts as a means of contract enforcement) and the degree of tax evasion.

Table 8.1

Number of enterprise activity inspections by different state authorities within 6 months

	Mean	Standard deviation	Minimum	Maxi mum
Tax authorities	1.22	1.57	0	10
Fire safety inspection	0.68	0.95	0	6
Sanitation authority	0.66	2.89	0	36
Ecology authorities	0.22	0.77	0	6
Committee on standardisation, certification and metrology	0.28	1.08	0	10
Antimonopoly committee	0.01	0.12	0	1
Architecture authority	0.07	0.31	0	2
Police	0.23	0.77	0	6
Other authorities	0.56	2.72	0	36
Total number of inspections	4.11	5.68	0	43

The mean value for the number of different permits and licenses required for official registration of an SME was found to be 7.94 (standard deviation 5.71, max=30, min=1). In order to estimate the regulatory burden, managers were asked to answer the question: "How many times during the last 6 months has your enterprise been inspected by different state regulatory authorities?" The mean values for frequency of inspections by different regulatory state authorities are presented in Table 8.1. Most frequent were inspections by the tax authorities (1.22 for the last 6 months or 2.44 for the year), fire safety inspections (0.68 and 1.36 respectively) and sanitary inspections (0.66 and 1.32 respectively). The survey of Ukrainian SMEs by the IFC conducted in 1999 produced similar results: in terms of inspection frequencies the first three positions were occupied by the tax, the fire and the sanitation authorities (the corresponding mean values being equal to 2.4, 1.4 and 1.4 respectively). Thus, the structure of the inspections as well as the level of regulatory pressure from the three main state authorities did not undergo significant changes. The mean value of the total number of checks experienced by the firms during the 6 months just prior to the survey was 4.11 (or 8.22 for the whole year). In 1999, according to the IFC survey, the average number of inspections was 9.6. Thus, level of the regulatory burden decreased slightly in 2000. There were significant fluctuations in the average number of inspections across the enterprises, which deserve special attention. 10.7% enterprises were not inspected at all during the last 6 months. 62.9% of enterprises were checked 5 times by different authorities, and 26.4% of enterprises were checked more than 5 times (including 6% of companies that experienced



more than 10 checks). These significant differences in the level of regulatory burden between firms were not related to industry specifics: the correlation coefficients between the average number of inspections and industry dummies turned out to be statistically insignificant.

Table 8.2 shows that during the inspections the enterprises were fined for different violations mainly by the tax authorities (in 24% of cases), by standardisation and certification authorities (about 20%) and by other controlling authorities (about 50%), specifically for consumer rights protection issues.

Table 8.2 «How often (% of total number of inspections) was your firm fined for violations?»

	Mean	Standard deviation	Minimum	Maximum
Tax authorities	24.7	40.8	0	100
Fire safety inspection	17.65	36.6	0	100
Sanitation authority	11.43	38.29	0	100
Ecology authorities	9.55	27.0	0	100
Committee on standardisation, certification and metrology	20.97	41.0	0	100
Antimonopoly committee	2.63	16.22	0	100
Architecture authority	4.95	20.62	0	100
Police	1.92	13.8	0	100
Other authorities	50.6	20.56	0	100

In order to estimate the degree of protection of private property rights and the level of corruption, the respondents were asked whether, according to their knowledge, firms similar to their own firm had to provide "nonofficial" payments for obtaining different allowances and licenses as well as for "protection" of their business (including payments to racketeering groups). All questions concerning property rights and corruption were asked in an indirect form, i.e. concerning the experience of other firms within the same industry. Indirect questions are widely used in surveys on corruption and tax avoidance, when the probability of receiving answers to direct questions is very low because of the unwillingness of the respondents to admit their own participation in "illegal" transactions. It is assumed that answering indirect questions involves the personal experience of the respondent and reflects his own behaviour. In our sample, 62.9% of the respondents admitted to the necessity of "illegal" payments for obtaining licenses and allowances. This indicates a high level of corruption and a low level of protection of private property rights. 15.6% of respondents admitted to a necessity of making non-official payments for the "protection" of their business (including racketeering). The average level of unofficial payments for obtaining licenses was 3.94% of total sales (standard deviation 3.72), while average "protection" payments constituted 6.48% of total sales (standard deviation 8.72).

Imperfections of the regulatory environment are reflected in the existence of "informal" relations between private entrepreneurs and the representatives of different state authorities that are often connected with



corruption. The respondents were asked to estimate the importance of maintaining informal relations with the representatives of different state authorities for the success of their business activity, using a 4-point scale (1 – not important at all, 2 – important to some extent, 3 – important, 4 – very important). The mean values for the variables of informal relations are presented in Table 8.3. As can be seen, informal relations with the central state authorities received the highest value of importance (2.48).

The protection of private property rights is closely connected with the efficiency of contract enforcement within the framework of the existing legal system. The respondents were asked the following question: "If your enterprise had a conflict with a customer (e.g. for non-payment for delivered goods/services) to whom would you appeal in order to solve this conflict?" The data in Table 8.4 shows a low level of trust in the official system of contract enforcement. Only about 46% of respondents were willing to use the Arbitrage court for the solution of commercial conflicts, while 31% of the respondents believed that nobody could help them. 59.5% of the respondents had various commercial conflicts between 1998 and 2000 (see Table 8.5). Only 43% of them applied to the Arbitrage court. 43.9% of the firms that did apply to the Arbitrage court got a positive decision and reimbursement of overdue payments. 26.4% of the firms got a positive decision, but at the time of the survey were still waiting for reimbursements. 24.4% of the firms were still waiting for a decision from the Arbitrage court. Why do enterprises that experience violations of commercial contracts show such a reluctance to use the Arbitrage courts for contract enforcement? More than one third of the 78 respondents who had commercial conflicts but did not apply to the Arbitrage court, believed that additional postponing of overdue payments was better than a court enforcement, since in case of a debtor's court forced bankruptcy the value of his assets might not cover the debt. Another 26.3% of the respondents believed that the Arbitrage court was unable to enforce a contract or considered the procedure of court hearings to be too long.

Table 8.3 Importance of informal relations for maintaining a successful business activity

	Mean	Standard deviation	Minimum	Maximum
Ministries and other central state authorities	1.26	0.75	1	4
Presidential administration	1.23	0.78	1	4
Parliament	1.13	0.54	1	4
State banks	1.13	0.52	1	4
Oblast administration	1.41	0.85	1	4
Municipal authorities	1.44	0.92	1	4
District authorities	1.59	0.94	1	4
Customs	1.20	0.65	1	4
Tax authorities	2.48	1.30	1	4
Office of the Public Prosecutor	1.17	0.54	1	4
Police	1.27	0.64	1	4
Others	1.10	0.52	1	4



Table 8.4 "To whom would you appeal for solving a commercial conflict?"

		0/ 6/1 1 1 1
	Number of	% of the total number
	enterprises	of enterprises
Arbitrage court	94	45.9
Local state authorities	14	6.8
State authorities	4	2.0
Trade and industrial associations	2	1.0
Commercial intermediaries	11	5.4
Others	11	5.4
Nobody	64	31.4

Another important indicator of the quality of the regulatory environment is the degree of tax evasion. Respondents were asked the following question: "It is thought that under current conditions entrepreneurs are forced to evade taxes. From your point of view, what is the share of the official amount of taxes that is, on average, paid by the entrepreneurs in your industry?" With respect to this question, the rate of response was only 57%. 21.5% of the firms that answered this question, reported that the enterprises in their industries paid less than 50% of the official amount of taxes. Another 25.1% of the enterprises reported a tax payment rate of about 50-70%. 36.2% said that SMEs paid more that 70% of their taxes. and only 13.8% reported that the firms in their industry represented "honest" tax-payers. The high variation in the level of "reported" real tax payments reveals the weakness of the regulatory environment, which allows the level of the tax burden to vary widely between SMEs. In the long run this might cause an ineffective redistribution of production resources. The mean value for the level of real tax payments is 59.29%; in other words, the average level of tax avoidance is 40.71%.

The respondents were also asked about the percentage of the total amount of actual taxes that entrepreneurs could pay without damaging their business. The mean value of the desired level of taxation as a percentage of the present level of taxation is 40.7 (standard deviation 21.12). There is a positive correlation (correlation coefficient = 0.38) between the real and desired levels of tax payments. This shows that the evaluation of the damaging effect of a high tax burden on successful business development is more connected to existing opportunities of tax evasion, rather than to the absolute level of the tax burden.



Table 8.5 Enforcement of contracts via the Arbitrage court

	% of the total
	number of
	enterprises
	(number of
	enterprises)
Firms that had commercial conflicts with customers during the past two years, including	59.5 (122)
Firms that applied to the Arbitrage courts	21.0 (43)
Firms that did not apply to the Arbitrage courts	38.5 (79)
Result of the appeal to the Arbitrage court:	
The claim is under consideration, but a judgement has not yet been reached	4.9 (10)
A positive judgement has been reached, however the	5.4 (11)
debts have not yet been paid back	
A positive judgement has been reached, and the debts have been paid back	8.8 (18)
Other	1.0 (2)
Reasons for unwillingness to apply to the	110 (2)
Arbitrage courts:	
"The procedure is too time consuming"	9.8 (20)
"I think that the Arbitrage court cannot help to enforce	9.8 (20)
debt repayments"	5.6 (=0)
"It is easier to postpone the payments than to try a	12.7 (26)
court enforcement, since in case of bankruptcy, the	()
value of the debtor's assets might not cover the debts"	
Other	6.2 (13)

Conclusions:

- 1. The regulatory burden on SMEs (expressed as the average annual number of inspections conducted by different state authorities per enterprise) did not change from 1999 to 2000.
- 2. The level of the regulatory burden varied between SMEs. These variations were not related to industry or regional effects.
- 3. SMEs operated under conditions of low protection of private property rights and high levels of corruption. Acquiring licenses, permits and business protection, requires making "unofficial" payments to the representatives of the state authorities.
- 4. The confidence of SMEs in the Arbitrage courts as a means of contract enforcement is low. The main reasons for distrust are the slowness and inefficiency of the court procedure, which does not guarantee a real enforcement of payment.
- 5. The level of tax evasion by SMEs is high. The regulatory environment allows for a significant variation in the level of real tax payments between the SMEs, which in the long run might cause an ineffective distribution of the production resources.



9 Performance results and growth expectations

The respondents were asked to estimate the changes in their performance indicators and market conditions in 2000 compared to 1999, and to make a forecast of these indicators for the next year. The responses of the enterprises regarding performance and market results and forecasts are presented in Table 9.1

Table 9.1 demonstrates that almost half of the surveyed firms increased their sales volume, labour productivity and production capacity utilisation in 2000; and about 38% of the enterprises also increased their profitability. The improvement of the performance indicators was related to an increase in demand (as reflected by an increase in the order volume). A majority of the enterprises reported an increase in prices for inputs and final products. In 2001, more than a half of the enterprises expect a further increase in demand for final products and in the order volume. They plan to increase their sales volume and the level of labour productivity. Positive and statistically significant correlation coefficients¹¹ between the change of the respective indicator in 2000 (compared to 1999) and the expected change in 2001 (compared to 2000) point to a further differentiation of the enterprises: companies with better performance results in the past foresee future growth, while less successful enterprises do not expect significant improvements in their activities.

It turned out that 22% of the respondents were unable to forecast changes in market conditions and performance indicators for their firms, demonstrating great uncertainty about the future. However, for more than 70% of the respondents that provided no forecast, uncertainty about the future was not related to bad performance results in the past: their performance indicators in 2000 remained at the same level or even improved compared to 1999.

Table 9.2 presents the coefficients of pairwise correlations between the change in profitability, sales, labour productivity (2000 compared to 1999) on the one hand, and some variables representing determinants of growth, on the other.

We do not present these coefficients in this paper.



Table 9.1 Changes in performance results and market conditions between 2000 and 1999, and a forecast for 2001 compared to 2000

	2000 d	compared	l to 1999)			2001 fore	cast cor	npared to	2000
Increased	Remained unchanged	Decreased	Don't know	Irrelevant	Indicator	Increase	Remains unchanged	Decrease	Don't know	Irrelevant
37.8	35.6	24.3	1.7	0.6	Profitability	43.9	27.4	5.5	22.6	0.6
53.0	29.8	16.0	3.7	0.6	Sales volume	57.6	18.2	3.0	20.6	0.6
47.2	38.8	10.0	3.4	0.6	Labour productivity (sales per employee)	52.1	24.5	1.2	21.6	0.6
24.1	39.7	20.7	1.7	13.8	Stock of products at the warehouse	25.0	29.5	9.0	24.3	12.2
26.5	44.8	20.7	1.1	6.9	Stock of inputs	33.3	28.8	8.4	22.4	7.1
51.1	28.1	18.2	0.5	1.1	Volume of new orders	56.7	13.4	6.7	22.6	0.6
48.3	31.0	15.5	0.6	4.6	Production capacity utilisation	51.9	19.0	3.8	22.8	2.5
42.5	28.5	25.6	1.7	1.7	Domestic demand	50.9	16.6	6.8	24.5	1.2
10.6	8.8	4.7	3.5	72.4	World demand (export)	10.3	7.1	4.5	10.3	67.8
51.4	29.6	16.7	0.6	1.7	Domestic price of the output	49.7	25.2	4.9	19.0	1.2
12.4	9.4	2.4	2.9	72.9	Export price of the output	11.0	9.0	1.3	9.7	69.0
79.2	11.5	4.6	1.1	3.4	Inputs prices	62.0	12.7	3.2	20.3	1.8



As can be seen from Table 9.2, increases in labour productivity are positively correlated with the availability of bank loans for investment purposes, a high level of competition, the size of the enterprise (as measured by its employment level) and the availability of a strategic plan. Increases in sales are positively correlated with the availability of bank loans, the availability of a strategic plan, and low level of overdue payables in total sales. Increases in profitability are positively correlated with the availability of a strategic plan. The relationship between the age of the enterprise and its performance results in 2000 turned out to be statistically insignificant. However, taking into account a positive correlation between the age of the enterprise and its employment level (the correlation coefficient is 0.42, the p-value <0.001), we can assume that the positive relationship between performance results and the firm's size absorbs the positive effect of the firm's "maturity" on the employment level. The results presented in Table 9.3 support this assumption.

Table 9.2
Pairwise correlation coefficients between performance indicators (change between 2000 and 1999) and selective variables for determinants of growth

	Increased profitabilit y in 2000 compared to 1999	Increased sales in 2000 compared to 1999	Increased labour productivity in 2000 compared to 1999
Age of the enterprise	-0.04	0.02	0.08
Size (employment level) in 2000	0.08	0.02	0.17*
Availability of bank loans for investments in 1998-1999	-0.002	0.13*	0.17*
Level of competition	0.06	0.03	0.19*
Overdue payables (% in total sales) in 2000	-0.06	-0.18*	-0.04
Availability of a strategic plan for enterprise development	0.18*	0.25*	0.25*

^{*} statistically significant, p-value <0.01

Table 9.3
Performance results in 2000 by "age" groups of the enterprises

	Up to 2 years (%)	2 to 5 years (%)	6 to 10 years (%)	More than 10 years (%)	χ^2
Increase in profitability	15.8	38.2	35.8	12.5	6.94*
Increase in sales	31.6	47.2	51.9	37.5	3.15
Increase in labour productivity	10.5	43.8	37.5	31.3	9.38**

^{*} p-value <0.1 ** p-value <0.05



Table 9.3 suggests the possibility of a positive non-monotonic relationship between the age of the enterprise and an increase in profitability and labour productivity. Table 9.3 shows that enterprises of "medium" maturity (2 to 5 and 6 to 10 years old) contain a higher percentage of "good" performers (enterprises that improved their performance results in 2000 compared to 1999), than the "youngest" and the "oldest" groups.

The respondents were asked additional questions about their growth plans for 2001. 47.3% of the managers/owners intended to increase the employment level, 50.2% of the respondents planned no changes in the number of employees, and only 2.4% of the firms planned some lay-offs. To our question about their main strategic aim, we got the following replies. For 18.1% of the SMEs the main aim was "to survive under these complicated economic conditions". 27.3% of the enterprises planned "to support the existing level of business development". 32.2% of the firms intended "to increase the production and sales volumes without attempts to gain market share from their competitors". Finally 22.4% of the firms planned "to increase the production and sales volumes in order to try to gain market shares from their competitors".

Table 9.4
Coefficients of pairwise correlation between the variables of strategic aim and change in employment level in 2001, on the one hand, and selective variables for determinants of growth, on the other hand

	Strategy of "survival" in 2001	Strategy of maintaining the achieved level" in 2001	Strategy of "non- aggressive growth" in 2001	Strategy of "aggressive growth" in 2001	Planned increase in employment in 2001
Age of the enterprise	-0.003	-0.12*	-0.05	0.20*	-0.008
Size (employment) in 2000	0.08	-0.11	-0.05	0.10	0.14*
Availability of bank loans in 1998-1999, received for investments	0.01	-0.20*	0.10	0.08	0.06
Level of competition	0.06	0.03	-0.05	0.07	-0.02
Overdue payables (% in total sales) in 2000	-0.05	-0.02	0.03	0.04	0.06
Availability of a strategic plan for the enterprise	-0.06	-0.23*	0.01	0.28*	0.24*

 $^{^{*}}$ statistically significant, p-value <0.01

Table 9.4 represents the pairwise correlation coefficients between the variables for the strategic aims of the firms and the changes in



employment level in 2001, on the one hand, and selective variables for determinants of growth, on the other. The strategies of future growth are not correlated with the size of the enterprise, its financial situation (as measured by the level of overdue payables in total sales), and the level of competition. However, statistically significant relationships were found between the strategies of future growth and a firm's "age", and the availability of a strategic plan. "Old" enterprises were less inclined to maintain the achieved level of business development than "young" firms; instead, they were more oriented towards aggressive growth including attempts to gain a market share from their competitors. Enterprises that possessed strategic plans were more likely to pursue aggressive growth strategies than the firms that had no strategic plans.

Enterprises that had received bank loans for investment in the past were less inclined to maintain the "status quo" than firms that had never received such loans. Plans for increasing the employment level were positively correlated with the availability of strategic plans. Finally, the larger enterprises (those having more employees than the sample's mean value of 36 people) were more likely to plan an increase in the employment level than smaller firms (with less than 36 employees).

Conclusions:

- 1. More than half of the enterprises in the sample had improved their performance results in 2000 compared to 1999, and planned further growth in 2001.
- 2. An increase in labour productivity in 2000 was positively correlated with having received bank loans in the past, high levels of competition, the size of the firm, and the availability of a strategic plan.
- 3. More "mature" firms and those that possessed strategic plans were more likely to pursue a growth strategy in 2001 than "younger" firms and SMEs without strategic planning.

10 Compliance with European standards

With the prospective of EU enlargement to the East in mind, it is important to analyse the attitudes of SME managements toward integration and the extent of compliance of the business activities of Ukrainian SMEs with the different EU standards.

The respondents considered the economic integration both with the EU and with Russia and the other FSU countries as «necessary». On a scale of 1 ("completely unimportant") to 5 ("very important") the integration with Russia and other FSU countries was however considered to be more important (mean value = 3.37, standard deviation = 0.79) than the integration with the countries of European Union (mean value = 2.87, standard deviation = 0.86).

Respondents were also asked to evaluate the level of compliance of their business organisations with different EU directives and their awareness of



important EU directives. Again we used a 5-point scale (5 = complete compliance, 1 = absolute non-compliance; or 5 = I know the directive very well, 4 = I know it quite well, 3 = I know some basic issues of the directive, 2 = I heard something about it, 1 = I know nothing) and presented the results in Table 10.1. Table 10.1 demonstrates that Ukrainian SMEs meet the EU requirements concerning their labour forces and safety at the work place, though not completely.

Furthermore, respondents were asked to evaluate their level of awareness of the EU directives concerning obligatory certification of products exported to the EU. The majority of the respondents had heard about the certification requirements, but did not have knowledge about its peculiarities. Concerning environmental protection, the production processes of the vast majority of the surveyed SMEs did not require any special pollution controls.

Conclusions:

- 1. Ukrainian SMEs meet the EU requirements concerning the labour force and safety at the work place, though not completely.
- 2. Managers/owners of SMEs have only a basic knowledge regarding the issues of international certification.
- 3. Production processes in the majority of Ukrainian SMEs do not require special environmental pollution controls.



Table 10.1 Compliance of SME business organisations with EU directives

Directives		e (standard ation)	Level of compliance
"To what extend is the system of wage payment in your firm in compliance with the EU directive that male and female employees should obtain the same wages for the same work?"	4.55	(0.78)	Entirely compliant
"To what extend is the production operation of your firm in compliance with the EU directive that the maximum length of the work week (including extra-hours) should not exceed 48 hours?"	4.13	(0.99)	Compliant
What % of your employees works more 48 hours?	13.22%	(22.79)	
"To what extend is the production operation of your firm in compliance with the EU directive that the minimum paid annual vacation should be 4 weeks?"	3.99	(1.13)	Compliant
"To what extend is the production operation of your firm in compliance with the EU directive that a minimum uninterrupted rest during the week should have the length of 35 hours?"	4.36	(0.86)	Compliant
"To what extend is the production operation of your firm in compliance with the EU directive that all employees whose work day is longer than 6 hours, have the right to have a break?"	4.59	(0.65)	Entirely compliant
"To what extend is the production operation of your enterprise in compliance with following EU directives regarding employer responsibilities:			
To guarantee the security of work and the health of their employees?	4.48	(1.00)	Entirely compliant
To evaluate the danger to the health of the employees and to institute safety measures?	4.23	(1.09)	Compliant
To gather information on possible risks and to record accidents?	4.06	(3.23)	Compliant
To inform employees about possible risks and the safety measures that were instituted?	4.28	(1.15)	Compliant
To consult employees about issues concerning labour protection?	4.37	(1.01)	Compliant
To instruct employees about work (or production) procedures?	4.46	(0.92)	Compliant
To oblige employees to undertake training for preventing industrial injuries?"	4.42	(0.95)	Compliant
"To what extend is the production operation of your enterprise in compliance with the following EU			
directives concerning employee rights and responsibilities:			
To make proposals regarding labour protection?	4.28	(1.08)	Compliant
To appeal to the competent authorities on issues concerning labour protection?	3.98	(1.39)	Compliant
To follow the instruction of the employer regarding the issues of labour protection?	4.44	(0.92)	Compliant
To inform about the potential risks?	4.38	(1.02)	Compliant
To use personal safety equipment?"	4.26	(1.24)	Compliant



11 Barriers to SME development

The respondents were asked to evaluate the importance of different obstacles to the successful development of small and medium size businesses in Ukraine using a 4-point scale (1 = unimportant, 2 = important to some extent, 3 = important, 4 = very important). The mean values for the variables representing obstacles to the development of SMEs are shown in Table 11.1.

As can be seen from Table 11.1, the most important barriers include a high taxation level, constant changes in the tax legislation, the instability of business legislation, a lack of working capital, high interest rates and difficulties in receiving bank loans.

Table 11.1
Barriers to a successful development of entrepreneurship

Barriers		Estimation	
High level of taxation	3.70	Very important	
Constant changes of the tax legislation	3.55	Very important	
Complicated registration procedures		Important to some extent	
Excessive administrative control by state authorities		Important	
Impossibility to enforce commercial contracts		Important to some extent	
Inflation	2.77	Important	
Hryvna devaluation	2.75	Important	
Difficulties to receive bank loans for investment	3.00	Important	
High interest rates	3.25	Important	
Out-of-date equipment	2.66	Important	
Lack of working capital	3.30	Important	
Instability of the Ukrainian business legislation	3.43	Important	
High level of competition with domestic producers	2.51	Important	
High level of competition with the foreign producers	2.04	Important to	
riigii ievel oi competition with the foreign producers	2.07	some extent	
Low level of demand for production	2.11	Important to	
	2.11	some extent	

12 Summary and policy recommendations

The results of our survey provide an opportunity to create the profile of an average successful SME with industrial orientation (see Table 12.1). In this context, a "successful" firm is defined as one, which has improved its labour productivity in 2000 compared to 1999, since an increase in labour productivity is considered to be a good proxy for efficiency improvements.



Table 12.1
The Profile of an average successful SME with an industrial orientation in 2000

The Frome of an average successful SML with an i	nddstridi orientation in 2000		
Employment in 2000	38 people		
Age	6 years		
Method of creation	newly created private or		
	collective enterprise		
Form of ownership in 2000	private enterprise or joint-		
·	stock company		
Production premises	leased preferably (62%)		
Extensive renovation of production premises	yes (65%)		
Equipment	new/bought, used/bought		
Main source of financing the purchase of	capital of the enterprise		
equipment	owners (80%)		
Usage of bank loans for the financing of	very low (17%)		
investment during the last 2 years	(27.0)		
Investment of profits during the last 2 years	yes (75%)		
Average number of products	16		
Average number of different inputs for	48		
production of the main product	10		
Number of competitors at the main markets	2-5		
Percentage of state orders in total sales	6%		
Percentage of barter transactions in the total	5%		
purchases of inputs	3 70		
Percentage of barter transactions in total sales	3%		
Percentage of overdue payables in total sales	1-10%		
Percentage of overdue receivables in total sales	1-10%		
Wage arrears	very low		
Main geographical market served	Ukraine		
Location of the main suppliers	Ukraine (51%) and foreign		
Location of the main suppliers	countries (49%)		
Number of inspections by the state regulatory	7		
authorities during the last 6 months before the	7		
survey			
Level of tax avoidance (in % to the total accrued	43%		
tax payments)	45%		
"Informal" payments for receiving licenses and	often (68%)		
certificates, needed for the entrepreneurial	orten (08%)		
·			
activity	not as often (200/)		
"Informal" payments for the "protection" of the	not so often (20%)		
enterprise	math an law (470/)		
Level of confidence in the Arbitrage courts as	rather low (47%)		
instruments of contract enforcement	high lavel of bases to the high		
Main barriers for successful business	high level of taxes, instability		
development	of business legislation		

Table 12.2 presents the factors that had an impact on the growth of labour productivity of Ukrainian SMEs in 2000.



Table 12.2

Determinants of growth in labour productivity of Ukrainian SMEs in 2000

Factors	The direction of the impact
High level of competition	Positive
Availability of bank credit for investment	Positive
Well-developed strategic plan	Positive
Large size (number of employees) related to "maturity" of the enterprise	Positive

Positive trends in the development of industrially oriented SMEs in 2000:

- In 2000, more than a half of the surveyed SMEs had improved their performance compared to 1999;
- Almost half of the enterprises have positive expectations about their growth prospects for 2001;
- Privately and collectively owned start-ups tend to increase their average employment level;
- Privatised former state firms used passive restructuring measures aimed at reducing "excess" employment;
- The level of the regulatory burden on enterprises (as measured by the average number of inspections experienced by the firm over a 6 months period) did not increase compared to 1999;
- The levels of barter in total sales and purchases remained low and showed no tendency to increase;
- The levels of overdue payables and receivables in total sales and of wage arrears remained low and showed no tendency to increase;
- More than three-quarters of all enterprises re-invested part of their profits, demonstrating serious growth orientation.

Main problems for SME development in 2000:

- SMEs focus primarily on servicing the domestic market, while being dependent on importing inputs;
- The level of international product certification is very low;
- External sources of financing are extremely scarce; this limits the investment activities of Ukrainian SMEs;
- The credit risk of SMEs remains high, which is reflected in high collateral requirements by the banks, high interest rates and limited availability of long-term credit;
- A lack of marketing and management skills remains an important barrier for strategic planning in SMEs;



- There is a significant variation in the level of the regulatory burden SMEs experience, which is not related to industrial or regional effects.
- The regulatory environment of SMEs is characterised by low levels of protection of private property rights and by high levels of corruption. Receiving business licenses, allowances, etc. requires "additional" payments to representatives of the state authorities.
- The Arbitrage courts are not considered to be an efficient means of contract enforcement. The reason for non-confidence in the Arbitrage courts is the length and inefficiency of court procedures, which do not guarantee actual debt collection.
- The average level of tax avoidance among SMEs is very high. The regulatory environment allows for differences in the actual levels of taxes being paid by the firms. In the long run this may lead to an inefficient reallocation of resources.

Policy recommendations:

- The regulatory policy should be aimed at minimising the variations in the levels of the effective regulatory and tax burdens across SMEs. This requires a practical enforcement of the existing legal rules including simplification of the certification and control procedures (especially at the regional level).
- New tax and regulatory acts should be reviewed for their effect on corruption by using the principles of simplicity and stability. Simple and transparent rules are easier to follow by entrepreneurs and easier to implement by the state. At the same time, simple and clear legislation provides fewer loopholes, leaving fewer possibilities for arbitrary interpretation by bureaucrats, which in turn narrows the scope for administrative corruption.
- Once adopted, major taxation and regulatory rules should remain unaltered, at least for the medium-term. This will reduce uncertainty with making business decisions and will positively influence future investment and growth.
- Reducing the level of corruption and developing a credible system of protection of private property rights will facilitate SME growth and decrease the firms' incentives to slip into the "shadow".
- Reducing of the effective waiting time for decisions by the Arbitrage courts and timely enforcement of these decisions will increase trust in the legal institutions as protectors of private property and contract rights.
- The SME sector generates demands for legal advice for developing enforceable contracts and informational support concerning new taxation and regulatory rules. These services could be provided on a commercial basis within the business service system and/or could constitute part of central and local SME support programs.
- SME access to outside financing might be improved by:



- a) Further developing micro-credit lines for SMEs, including the training of professionals in micro-crediting;
- b) Developing agencies to offer professional evaluations of an SMEs' creditworthiness in order to lower the credit risk;
- Developing non-banking credit institutions for the SME sector (e.g. venture funds).
- The export orientation of SMEs should be supported, in particular with respect to international product certification procedures.

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