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# Bank financing of Hungarian SMEs: Getting over to credit crisis by state interventions

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Abstract

In this article we aimed to present and analyse the 21st century history of bank financing in the Hungarian small and medium enterprise (SME) sector in the period ranging from 2000 to 2012. The credit products offered by banks and credit unions are the most fundamental means of external financing capable of fulfilling the financing needs of a wide array of SMEs. The conditions of accessing credits and their prices exert a decisive influence on the profitability and business opportunities of SMEs. As a result of economic slowdown SMEs had to face higher interest rates, decreasing credit limits, and bank financing options that became increasingly slowly accessible alongside stricter conditions. Due to this process SMEs business performance had been falling continuously which has a destructive contribution to the national economy.

In the first chapter of the article we present the dynamic development of credit financing in the Hungarian SME sector, along with the causes that triggered it, then we will continue with the negative tendencies dating from the onset of the 2008 debt crisis. In the second chapter we discuss the vicious circle, due to which the business performance of the SMEs, as well as the conditions of access to credits and their prices, have entered into a negative spiral. In the third and final chapter we make suggestions regarding the direction and means of necessary government intervention, in order to stop and reverse the negative tendencies observed in SME credit financing.

Keywords: SME, financing, credit crisis, state intervention, bank sector, Hungarian market

# 1. The history of SME credit financing in the 21st century

#### 1.1. The period of quick rise in financing 2001-2007

Until the mid 90s credit institutions turned their attention towards larger enterprises. Between 1995 and 2000 the resources of the Hungarian banking sector were used to establish a large corporate client portfolio. According to the statistics of the Central Bank of Hungary, a mere 27% of all corporate loans were SME-related in 1999, which proportionally represents less than half of the level measured in EU-15 countries at that time. (Árvai, 2002) Starting from 2000 Hungarian credit institutions also stated in their business policies an intention to increasingly open up to small and medium-sized companies. This shift in strategy can be accredited to a decrease of credit margins and intensifying competition on the market of large corporate lending. Furthermore the various forms of government subsidies and generally decreasing interest rates resulted in the necessity and opportunity to turn towards this sector. (Bilek-Borkó-Czakó-Pellényi, 2006)

The rise in the strategic importance of SME clients are explained by the following factors (Csubák, 2008):

- Significant unsatisfied loan demand, high growth potential: According to international comparison the loan penetration in the case of SMEs was extremely low, since 90% of the firms possessed no resources from external institutional financing at the time. The expected growth in demand was positively affected by decreasing interest rates, an increasing number of government subsidized credit facilities and the growing activities of guarantee funds, as well as positive forecasts regarding GDP growth based on an increase in domestic demand.
- Applicability of high-profit margins: Due to information asymmetry and weak bargaining power, SMEs are willing to accept higher margins and fees, than large corporations (risk margin: 150-600 bps as opposed to 50-100 bps<sup>1</sup>)
- Cross-selling opportunities with the help of SME credit products: Thanks to credits the SME is bound to the bank, presenting excellent opportunities with regards to asset side products (deposits,

<sup>&</sup>lt;sup>1</sup>bps: term used in lending, basis point. 100bps = 1%

account management, insurance, other transactions and investment products). Due to the unpredictable nature of their cash flows compared to their size and turnover, SMEs tend to keep more money in their current account, which is a very cheap source of funding for banks.

• Gaining retail customers with high customer value: The owner/director of the SME connected to the bank by a loan, as well as his/her family members may represent further income potential for the retail banking business unit of the bank as individual customers.

The credit institutions had to carry out significant modifications to their organization, product proposition, business process and risk management practices in order to successfully capture the business potential of the SME sector. They took the following steps between 2001 and 2007 to execute this change in strategy (Csubák, 2008):

- **Expansion of bank branch network:** between 2001 and 2007 the number of bank branches grew by 40% in the case of the twelve largest banks in Hungary.
- **Dynamic rise in the number of colleagues acquainted with SME financing:** through intensive internal training programs and workforce expansion, the growing bank branch network is supplied with branch experts possessing specific SME financing knowledge
- Central organizational units responsible for the SME business unit: Along with the establishment of the SME business unit, central organizational units were set up, which are responsible for the development and execution of the strategy relative to SME clients.
- SME-specific lending process and product portfolio: They introduced a simplified credit evaluation system based on fewer data, linked to a standardized lending process, with the goal of ensuring that SMEs have access to credit as fast, and with as little administrative burden as possible. As a result of this simplified lending process, the unit transaction costs related to SME financing decreased, thus meeting gradually lower-sum financial needs became attractive to the banking sector. The product portfolio was equally adjusted to needs of SMEs, thus loan products became available to clients of varying debtor ratings, which were capable of satisfying the SMEs' financing needs, with reviewable and understandable documentation requirements.
- Marketing campaigns focusing on SMEs: The rise in importance of the SME client base is well demonstrated by the fact that credit institutions launched increasingly intensive mass media campaigns to gain their trust, as well as aiming to turn SMEs into active clients with customized offers through ever more sophisticated methods.

As a result of the change in strategy, the volume of disbursed bank credits extended to the SME sector rose from HUF 1424 billion in 2001 to HUF 3482.2 billion by the end of 2007; this altogether 220 % growth corresponds to an average annual growth rate of 16.09 %, which significantly surpasses the 9,3 % increase measured in the case of large corporations. (PSZÁF, 2008)

Year (expressed in HUF billion)	2001	2002	2003	2004	2005	2006	2007
Credit volume all non-financial enterprises	3 233,8	3 284,2	4 030,6	4 613,0	5 236,2	5 840,6	6 566,4
Large corporations	1 809,0	1 989,6	2 353,9	2 944,8	2 680,2	2 831,6	3 084,1
All small and medium-sized enterprises	1 424,8	1 294,7	1 676,7	1 668,3	2 556,0	3 009,0	3 482,3
medium-sized enterprises	660,9	582,7	818,4	834,8	1 143,5	1 237,0	1 227,8
small-sized enterprises	381,1	299,1	377,8	358,7	787,9	981,2	1 017,9
micro-sized enterprises	382,9	412,9	480,5	474,8	624,5	790,8	1 236,5

Table 1: Loan volume disbursed to non-financial enterprises by the banking sector	
Source: own editing based on PSZÁF	

Within the corporate credit portfolio the ratio of SME credits rose, and surpassed 53% by the end of 2007, which can be considered a major step forward compared to the 27% measured in 1999 (Némethné, 2008). Besides the change in the banks' business policy, the credit expansion in the 2001-2007 period was aided by the following:

- The value and volume of investments rose in every year, except for 2006. In the 2001-2007 period the average growth rate in the value of investments was 7.7%, while volume growth was at 4% on average. (KSH, 2012)
- Actual household consumption rose by an average of 3.4% annually between 2001-2007. (KSH, 2012)

- The wide-ranging spread of foreign currency loans allowed SMEs to access credits with low interest rate burdens. The expansion of foreign currency lending was the most significant in the case of long term loans. In 2007 the proportion of foreign currency credits stood at 66% as opposed to 25% in 2001, while the percentage of foreign currency credits in the case of short term loans also rose from 17.8% to 29% between 2001 and 2007. (Csubák, 2008)
- Within the SME sector, the most significant growth in loan volume was experienced among micro-sized enterprises. Between 2001 and 2007 this segment grew more than threefold, which corresponds to an annual average growth rate of 21.58%. (Némethné, 2008)

The banking sector turned specifically towards micro-sized enterprises since the beginning of 2005, underpinned by the fact that between 2005 and 2007 the volume of disbursed loans to micro-enterprises almost doubled, while during that same period the disbursed loan volume to medium-sized enterprises expanded by merely 7%, and credits given to large corporations only grew by 15%. (Csubák, 2008)

The fact that micro-sized enterprises became the primary focus within the SME financing business can be explained by the following:

- The behaviour of micro-enterprises is in many ways similar to that of retail consumers (GKM, 2007), thus the favourable experiences of the retail banking business unit in banking process automation and sales techniques can successfully be adapted with regards to micro-enterprises. The transmission of these techniques commenced in 2005, which embodied a certain paradigm shift in SME credit practices, since credit facilities and loan-granting processes characterized by automated mass customization gained ground in the wide ranging and dynamically expanding bank branch network.
- Due to the appearance of collateral-free credit facilities the continuously simplified lending process and credit institutions' intensive marketing activity a wide group of micro-enterprises, that previously avoided external institutional financing, could now be made clients that were willing to undertake bank financing.
- As a result of their weak bargaining power and information asymmetry micro-enterprises are the least price-sensitive among companies.
- The families who have ownership of micro-enterprises are important clients of the retail business unit, thus retail business strategy is unimaginable without a specific focus in micro-enterprises.
- The revenue generated by micro-enterprises supports the shortening of the payback period of investments associated with the development of the branch network.

#### 1.2. The effect of the credit crisis on SME credit financing (2008-2012)

The period of major credit expansion was ended by the 2008 economic crisis, which shows similarities based on its extent and effect with the Great Depression of the 1930s. Due to the so-called "subprime<sup>2</sup>" crisis which unfolded in 2007 on the secondary mortgage market, one of the most significant investment banks in the United States, Lehman Brothers Holdings Inc. declared bankruptcy on September 15th, 2008. The financial crisis began when the bubble founded on "cheap" financing burst. The unsubstantiated and extravagant flight of the real estate market ended when it became apparent, that an unrealistic amount of collaterals were activated in the books of credit institutions. Assets that were overpriced due to neglectful valuation and disregard for risks, were admitted into the asset portfolio of banks. When a few bad debtors attempted to auction off their real estates, it turned out that the market prices differently than the credit evaluation managers of banks. It then became clear, that there is no real collateral behind the mortgages, which constituted the banks' assets. This news led to an increase in supply, in turn resulting in sinking prices, and so on. This asset-side crisis caused serious liquidity problems for banks, as a result of which many turned insolvent (principally due to bad debtors). The expanding bad debtors' list raised suspicion within the banking sector, which manifested itself as a crisis of trust, as banks no longer trusted other economic players.

The real estate bubble burst, the liquidity crisis and the uncertainty predominant on the entire market led to economic repercussions such as tightening credit financing resources, increasing interest rates, decreasing willingness to invest, rising unemployment and sinking domestic demand. The crisis reached a global scope, as a result of which even countries such as the United States, Germany, Japan, France, Russia and Great Britain, which are key players in the global economy, had to face negative GDP results. Furthermore, setbacks could be observed in the developing countries as well, however in India and China only a slowing growth cycle began, as opposed to a shrinking one (IMF, 2009). Hungary found itself in an increasingly disadvantageous position, as its macroeconomic foundations were weak, which allowed for speculative activity, while at the same time the

 $<sup>^{2}</sup>$  A subprime mortgage is a high credit risk mortgage, which do not qualify as "prime" risk mortgages based on neither the debt-to-income ratio, nor the debt-to-collateral ratio, meaning that the latter is above 55% and the former exceeds 85%.

German economic downturn affected the Hungarian GDP negatively through trade exposure.

The willingness to take on risks ceased worldwide, money markets froze and banks have adopted a more conservative lending behaviour since. The credit crisis culminated in a certain liquidity crisis, as a result of which capital began to abandon developing markets around the world and flow to safer ones. This process affected Hungary by means of a drop in the value of the Forint, which significantly increased the payments expressed in Forint of foreign currency loans both for retail and corporate clients, while both the risk-free interest rate specific to the country and the risk margin rose.

The Hungarian economy and within it the bank system became this vulnerable due the crisis, because previously an overly liberal and consumption-boosting economic policy was in place. As a result, credit based financing became the primary source of funding, which was clearly visible, as the previously 110-120% credit-deposit ratio reached 150% in 2008 (MNB, 2009). An immanent element of expansive bank lending is the rise in risks. The primary source of risks is the pressure of the competitive market, as banks racing to disburse more loans dedicated less energy to evaluating potential debtors, instead they increased the loan to value (LTV) and the term of loans (Várhegyi, 2010).

The formidable increase in foreign currency loan burdens on the one hand set back residential consumption, on the other hand decreased the quality of banks' credit portfolio, as people's solvency deteriorated. Due to suspending foreign currency-based lending and the high country risk, the high interest rate burdens expressed in HUF turned a part of investments unfinancable. As a result, both residential consumption (at an average annual rate of -2.2%) and the volume and value of the country's investments (at an average annual rate of -4.4% and - 2.5%) continuously decreased between 2008 and 2011. (KSH, 2012)

The efficiency of banks' lending activity was influenced by the fact that their own financing options became more expensive, their previously stable capital position weakened. Banks' earning power was also negatively affected by the bank tax introduced in 2010, the possibility of fixed exchange rate pay-off in 2011, and the financial transaction tax introduced in 2012.

As an effect of the crisis that began in 2008, the disbursed loan volume of SMEs decreased, compared to the peak year of 2008, the disbursed SME loan volume fell by more than 35%, nearly HUF 1300 billion by the end of 2011; despite of a HUF 750 billion increase in 2012 lending remained 11% short of the 2008 peak. In 2012 the overall corporate loan volume was stagnating, so the SME loan volume growth in 2012 can be explained by the fact that some large enterprises have been reclassified into SME category.

# Table 2. Disbursed loan volume to the SME sector 2008-2012

Source: PSZÁF (2013)

HUF Billion	2008	2009	2010	2011	2012
All SMEs	3 896,971	2 901,288	2 881,652	2 753,319	3 484,774
medium-sized	1 384,659	1 129,032	1 183,294	1241,432	1 717,035
small-sized	1 275,594	990,107	1 020,905	797,307	1 039,321
micro-sized	1 236,718	782,149	677,453	714,580	728,418

Due to the crisis the quality of the SME credit portfolio has deteriorated. The proportion of the SME loan volume deemed problematic rose from 5% at the end of 2007 to 26.6% by the end of 2012. Due to the deterioration of portfolio quality and the business environment of SMEs, credit institutions tightened the conditions of access to credit, increased their expectations of collateral value, solely focusing of the credit needs of higher-rated enterprises.

To end and summarize this chapter, we would like to illustrate the major milestones and development stages of the bank financing of Hungarian small and medium-sized enterprises.

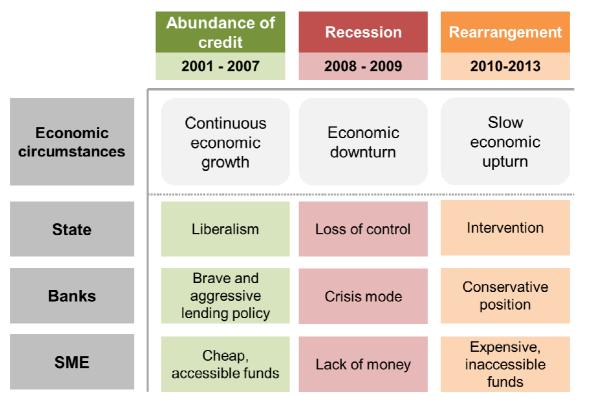


Figure 1. The evolution of SME financing with regards to stakeholders and development stages

The figure aims to show the fundamental changes that the Hungarian credit market underwent since the millennium up until today. Starting with the boom period of the economic cycle characterized by growth (conjuncture), when the liberal-minded state did not overly intervene in the mechanisms of the lending and credit institutions markets. By consequence growth brought along a credit-based expansion, which didn't seem to have neither demand, nor supply-side limits. Banks flooded the market with cheap funds, a good part of which ended up at companies and households in the form of loans. The period in which credit was abundant lasted up until the beginning of the 2008 global economic crisis, when the attitude of economic players towards credit financing changed drastically in the blink of an eye. The crisis brought about perplexity in government policy, and resulted in extending credits more prudently which also became more expensive. The lack of money led to a sensible shortness of resources for SMEs, which resulted in a complete freeze on the credit market in Hungary.

By 2010, the government in power began to take steps in order to overcome the credit market crisis. However these actions have not yet changed the banks' conservative (credit evasive, moderate) stance on lending, meaning that financial resources for SMEs continue to be expensive and difficult to access.

Our article attempts to explore options for resolving this specific problem.

### 2. Situation analysis

In this sub-chapter we carry out a short analysis concerning the situation of the Hungarian banking sector as well as the Hungarian SME sector. It is of fundamental importance to understand the market position of each stakeholder, in order to solve the problems experienced in SME financing. With regards to SME financing, the most important stakeholders are:

- small and medium-sized enterprises
- commercial banks

In this sub-chapter we would like to discuss the economic traits and main characteristics of these two stakeholder groups. The role of the state will be addressed in detail at a later stage.

#### 2.1 SME situation analysis 2013

It is a known fact, that SMEs take an important role in realizing the country's economic performance (close to 50% of the Gross Value Added). This group of entrepreneurs creates jobs, promotes regional and local development and aids in establishing social cohesion. SMEs employ two thirds of all employees, and compared to large corporations, they are less likely to let people go in times of crisis. With their flexible and innovative nature they contribute greatly to the competitiveness of large corporations in the given region.

The major characteristics of the SME sector (based on Appendix 1):

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- fragmented enterprise structure (nearly 95% of Hungarian companies are micro-enterprises)
- lack of a strong stratum of medium-sized enterprises (the proportion of Hungarian medium-sized enterprises is below 1%)
- the competitive market employs more than 2.6 million people, of whom 70% work at SMEs
- the majority of companies lack sufficient collateral
- high rate of tax evasion
- many enterprises were founded out of necessity
- relatively low productivity (weak ability to create added value)
- ageing management (succession problems)
- insufficient financial knowledge
- low willingness to innovate
- starting from October 2008 the limit in credit supply induced by the economic crisis significantly decreased SMEs' ability to access external funding (Kállay, 2010).

#### 2.2 Banking sector situation analysis 2013

In 2013 35 joint stock companies and 128 union-based financial institutions were present on the Hungarian market. These financial institutions conduct the transactions occurring on the Hungarian money and capital markets. On the Hungarian banking scene German and Austrian interests are predominant, but besides them many American, French and other foreign-owned institutions are present on the market. Small saving and loan unions are Hungarian-owned almost without exception.

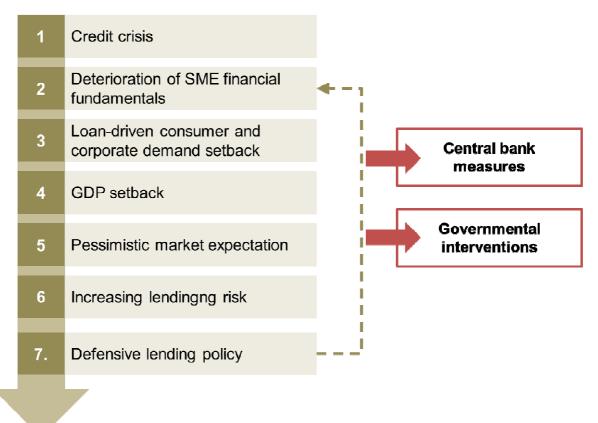
The players of the bank system cooperate intensively on the interbank money market, which activity creates a plurally embedded institutional system, where the failure of one institution – based on the domino effect – can mean the failure of numerous other banks it is linked to. Since the 2008 economic crisis the possible "bank crisis scenario" was in the spotlight due to the bank defaults that have occurred. For example in September 2008 AIG and Merrill Lynch filed for bankruptcy protection, as did Lehman Brothers, which ultimately defaulted. The bankruptcy of such global banks principally entails two types of consequences. Firstly, the mentioned interbank money market activity decreases (in a worse scenario all money movements stop). Secondly the question of whether the debts of bankrupt banks are settled on the market (insolvency, bank panic) or by the state (pumping money behind uncovered debts, bailout) (Benczes-Kutasi, 2010).

The main characteristics of the banking sector (based on Appendix 2):

- banks operate on a regulated market
- continuous shrinking of the stock of client credits (PSZÁF, 2013)
- household savings turn away from credit institutional deposits, in favor of government bonds and treasury bills (PSZÁF, 2013)
- the market is characterized by a decrease in consumer and corporate credits (PSZÁF, 2013)
- as an effect of the crisis, the Hungarian subsidiaries of foreign-owned banks needed financing from the parent companies
- work with a strict credit rating system
- sector-specific extra tax, tax on interest earned and financial transaction tax burden banks
- they offer expensive loans
- continuous decline of the bank portfolio quality (more bad debtors)
- the entire banking industry is unprofitable since 2011
- the crisis did not cause any major pullouts from the Hungarian bank market
- the bank market is in a shrinking spiral

All in all it can be concluded, that both groups of stakeholders face increasingly difficult business circumstances as a result of the crisis. The most common scenario is that creditors are overly sceptical and strict, while debtors are not competitive and their business activity is financially unsustainable. That means there is demand, but there is no solvent demand. There is supply, but none of the credit structures are affordable. This demonstrates how the balance of demand and supply was disturbed by the crisis, and for now it seems very difficult to restore it by means of the market.

#### 2.3 The vicious circle of the credit crisis



#### Figure 2. The mechanism of action of credit crisis

The figure above shows that the process of deterioration in SME financing was induced by the process itself. This process decreases economic performance on a sectoral and national economy level as well. A strong correlation exists between credit supply and economic growth. Economic growth and the players' expectations improve along with increasing credit supply. Currently SMEs are in a negative spiral, because:

- loans became more expensive as a result of the credit crisis, and higher interest rates decrease a company's profitability
- increasingly expensive credits induce a setback in the willingness to invest and consumer demand, which in turn affect negatively the course of business and financial ratios of SMEs
- the weakening financial performance of SMEs causes a drop in credit score and rating, thus credit becomes even more expensive and the credit limit decreases
- stricter conditions for accessing credit result in the decreased profitability of SMEs, their business activity drops, which occurs on the macroeconomic level as economic setback.

As a result of the above the profitability of enterprises drops increasingly visibly, which means that they have to turn to external financing options. Thus the vicious circle closes, since the characteristics of the credit crisis influence external resources.

The figure clearly shows that the ultimate consequence of the credit crisis is stricter credit financing by banks, which indirectly affects the origin of the problem, since increasingly strict conditions deteriorate the credit market and business activity of SMEs, as well as their profitability, which only strengthens the phenomenon of the credit crisis, thus the credit crisis results in a general economic crisis.

In this current situation intervention has become necessary, as market mechanisms are incapable of halting the negative process. The self-regulation of the liberal free market does not work as efficiently in the case of an economic crisis of such an extent, therefore the *"invisible hand"* of Adam Smith must be changed to the *"government hand"* of John Maynard Keynes, when the state must intervene in the economy in favor of the common good.

Deterioration can be halted, and optimally reversed, by two principal means of intervention. One of them is action taken by the central bank:

1. low risk-free interest rate (decreasing the base rate of the central bank)

2. controlling inflation (decreasing)

The other is through government intervention, such as:

- 1. Increasing loan demand by decreasing the price of loans interest subsidy
- 2. facilitating access to credit state credit guarantee schemes
- 3. building business trust driving domestic demand

We will not discuss classic central bank actions in detail, considering that the primary objective of the central bank is to fight against inflation, thus maintaining price stability is at the forefront of its interventions. In this article we will discuss the government's and the central bank's – not classical, but unorthodox – means of intervention, in order to answer the question of how getting the Hungarian SME financing system back on its feet is possible.

#### 3. Search for an end to the vicious circle of the credit crisis: What can the state do?

The state's involvement in aiding the credit financing of SMEs isn't an intervention for its own sake, instead it's a series of steps, which shakes up the stagnating SME sector that is currently avoiding investments and developments. This article mainly focuses on the credit-type financing resources, since it is a viable mode of financing for a wide range of small and medium-sized enterprises, as opposed to forms of capital financing, which are only available to a small elite of entrepreneurs with strong growth potential, who are open towards sharing ownership with outside partners. We do not discuss the necessity of state intervention in capital financing and in educating a group of entrepreneurs who can meet its requirements, but instead focus on improving the conditions of credit financing, as its positive effects can be observed in a much higher penetration among SMEs. We do not handle in that publication the question of microfinancing as it uses different lending methods and processes than classical bank lending business.

#### 3.1 Decreasing the price of loans – State interest subsidy

The crisis created a particular economic environment for SMEs and banks from a multitude of points of view. The cost of accessing credit for SMEs is relatively high, because risk margins rose and the risk-free reference rate is still high compared to that of developed countries. The number of SME developments that are able to bear the high cost of financing has significantly decreased, while financing daily operations is also becoming a remarkable burden for them. High financing costs reduce the demand for new loans on the one hand – resulting in stagnating investment and operations activity -, and drastically decrease the profitability of enterprises that have loans on the other hand, which in part contributes to the unfortunate expansion of problematic SME loan volume.

Moderating the cost of accessing resources – even through intervention – contributes to increasing demand for credit, as well as easing the interest rate burden on enterprises that have loans, thus helping to improve profitability.

The state, in a regulating and supporting role, is capable of creating artificial credit supply through interest subsidy schemes, which can serve as a temporary solution, until the competitive market's conditions are settled. In the internationally accepted model of extending interest-subsidized credits a "donor" institute - representing the state – gives refinancing loans at lowered interest rates to credit institutions, that are involved in the distribution of credit products including government interest subsidy. The credit institutions directly distribute subsidized loans to SMEs, performing the evaluation of the client and transactions, and they bear the risk of non-payment.

In Hungary until the end of 2012 the Hungarian Development Bank (MFB) had the role of biggest "donor" in the case of state-subsidized small-enterprise credit schemes, possessing a credit portfolio for enterprises development valued at HUF 356.3 billion at the end of 2012. (MFB, 2012)

Besides the MFB's credit scheme involving interest subsidies, we would like to highlight the Central Bank of Hungary's Funding for Growth Scheme, whereby the central bank provides interest-free refinancing loans to credit institutions, which the credit institutions - at an interest margin regulated from above which they have accepted - in turn lend out to SMEs at an exceptionally favourable annual interest rate of 2.5%. (MNB, 2013)

The second pillar of this same scheme aims to further the debt settlements of SMEs possessing foreign currency loans, by converting them into forint loans. The first phase of the Funding for Growth Scheme, which is refinanced by the central bank, had a funding of HUF 750 billion, while the second phase launched in September 2013 under unchanged conditions has a funding of HUF 2000 billion.

The funding made available through lending schemes with state-backed interest subsidies (HUF 450 billion in the MFB Enterprise development lending scheme + HUF 2750 billion in the Central Banks's Funding for Growth Scheme) represent more than 90% of existing SME loan volume in 2012, we can thus conclude that SMEs have at their disposal a significant amount of refinancing credit products at subsidized interest rates.

The presence of low interest-rate state-refinanced loans is a necessary, but not sufficient condition of

invigorating SME credit financing, and by means of it the course of business in the SME sector.

Although loans with interest subsidy are available in abundance, they cannot spread widely in the SME sector, because banks follow a conservative lending policy – due to previous unfavourable experiences – only granting access to these subsidized funds to the highest-rated debtors and deals.

The government must equally encourage banks' increasing willingness to take on risks, the means of which are the internationally prevailing and popular state credit guarantee funds.

#### 3.2 Facilitating access to credit – State credit guarantee funds

Nowadays the main problem in SME credit financing is that credit institutions – due to negative experiences – have developed stricter debtor and loan rating procedures, meaning that a wide group of SMEs face decreasing credit limits on current assets and – save for a few examples – inaccessible investment loans.

The essence of the service of credit guarantee funds is that the fund agrees to cover even up to 80% of the credit risk, meaning that it would repay up to 80% of losses of the credit operation. With their services guarantee funds are able to significantly improve the deal rating of SMEs, thus counterbalancing the disadvantages of weaker debtor rating and missing collateral, meaning that SMEs that would have been rejected by the bank can gain access to credit.

According to international literature one of the most efficient means of government intervention in supporting SMEs, is by getting involved in credit guarantee funds. (Elkan-Schmidt, 2010)

Credit guarantee funds can be private, state or jointly owned. The essential in government intervention is that to a certain extent (60-85% depending on the country) the state refunds the losses of the credit guarantee fund, incurred from deals with guarantee redemption.

In Hungary this task is handled by Garantiqa Credit Guarantee Co. Ltd., providing third-party guarantees in order to support the development of enterprises. This institution has signed over 29 000 contracts of guarantee agreement, thus assuming HUF 304 billion worth of guarantees for HUF 382.6 billion financing resources (Garantiqa, 2013). Other institutions operating along similar principles are the Rural Credit Guarantee Foundation (AVHGA) and the entirely state-owned Eximbank, whose goal is to aid the export financing of the SME sector.

The extent of the activities of credit guarantee funds is usually measured by the loan volume they have agreed to guarantee. Internationally, the intensity of Asian credit guarantee funds is outstanding, as is the value of the credit portfolio they guarantee. In Japan the value of the portfolios covered by guarantee funds reach 7.3% of the GDP, in South Korea this number stands at 6.2%, while in China (only Taipei) at 3.6%. (CFE/SME, 2012)

In the EU, Hungary is among the top three countries regarding the intensity of guarantee fund activity (1.4% of GDP), the value of the covered credit portfolio compared to the GDP is only higher in Italy (2.2%) and Portugal (1.9%). (CFE/SME, 2012)

In 2012 in Hungary, the proportion of SME credit portfolio that was covered by guarantee funds was 11 % out of all SME credits. We judge necessary the intensification of the activity of credit guarantee funds, if it is the state's objective to reach perhaps an even double-digit growth rate in SME credit portfolios, since the effect of state-funded interest subsidized credit constructions manifests itself, in that enterprises which have good deal rating switch their market-priced loans to government-funded loans with favourable interest.

SME loan volume can grow by as much as HUF 300-400 billion compared to the base year 2012, if credit guarantee funds cover not 11%, but up to 30-40% of this new portfolio (In Japan every third SME loan is covered by a guarantee fund), meaning that the portfolio covered by guarantee funds should grow by HUF 90-160 billion each year. In order to expand the activities of guarantee funds, the following steps ought to be taken:

- **Reviewing the results of the existing portfolio-guarantee program** and altering the condition of the portfolio-guarantee program, in order for it to be substantially more intensive and effective. Portfolio guarantee prove to be an efficient solution in the case of credit operations of smaller value, which however occur in great numbers, typical of micro and small-sized enterprises. The crisis has most gravely affected the credit options of micro-enterprises. Between 2008 and 2012 the portfolio's value decreased by nearly HUF 500 billion, that is by 41%. Therefore improving the conditions of portfolio guarantee programs, and thus intensifying their use in a wider range of enterprises would positively affect that group of enterprises which were the hardest hit by the crisis;
- In the case of individual credit guarantee operations, processes that entail parallel work have to be optimized: in the case of individual credit guarantee operations, both the credit institution extending the loan and the guarantee fund analyse the debtor and the deal, thus performing the same job parallelly; moderating and optimizing this would liberate significant reserves of productivity;
- **Capitalizing credit guarantee funds:** The equity of Garantiqua Creditguarantee Co. Ltd. in 2012 corresponded to only 3% of the value of the credit portfolio it pledged to guarantee. (Garantiqua, 2013)

The low rate of equity could hinder the annual growth of 25-40% of the guaranteed portfolio (CFE/SME, 2012);

• Higher rate of risk coverage in investment loans: Extending investment loans has always been a weak point of Hungarian SME bank financing. In the "golden age" of SME credit financing, that is between 2001 and 2007, while the number of short-term credit operations grew by 758%, meaning a nine-fold growth, the number of long-term credit operations merely grew by 52% (Csubák, 2008). Studies analysing the efficiency of international guarantee funds have shown, that the gain for the entire economy is significantly higher on guarantee agreements covering long-term loans, as opposed to the ones covering short-term loans. (Allinson. Robinson-Stone, 2013) The explanation to this phenomenon is that even in unfavourable cases problems surface over a longer period of time, than in the case of short-term loans, however the economic driving effect of longer-term loans has immediate positive consequences. In the case of investment loans a higher rate of risk coverage could be justified, as this could counterbalance the stricter credit evaluation of banks applied for long-term loan application.

Credit guarantee programs can act as a catalyst in newly reviving SME credit financing. Thus indirectly contributing to making numerous new investments, preserving and creating jobs. In light of international best practice (Asia, Japan, South Korea, Chinese Taipei) there is room for growth in the activity of guarantee funds, which however requires that their services be rethought and refreshed - especially with regards to portfolio guarantees - as well as recapitalizing the institutional background.

#### 3.3 Restoring the entrepreneur attitude - building trust on the market

The recommendations we have presented in this article concerning means of furthering SME credit financing mainly focus on state interventions with direct effect. However we must emphasize, that growth in demand from the side of SMEs can only be hoped for, if they have positive expectations regarding the future.

The problem is that only those companies, that have established export markets, and their suppliers, can demonstrate increasing turnover, so they are the ones that can consider development-oriented investments. A wide range of SMEs have based their activity on the demand of domestic resident customers and enterprises, but this group of clients has moderated its consumption and investment-related demand since the beginning of the crisis. Therefore SMEs' business outlooks have been moderate, they do not plan new investments, developments, and they've made arrangements in order to survive.

The business activity of a larger group of small and medium-sized enterprises will only pick up, if their main target market, namely domestic demand, will begin to grow. In this case pessimist expectations would cease, SMEs would start new investments and developments, in turn boosting domestic demand by their behaviour, positively influencing business morale.

The growth in domestic demand in Hungary would threaten to bring about a deteriorating commercial balance, therefore Hungarian economic policy must take such steps to stimulate domestic demand, which increase the demand for products and services that contain high Hungarian added value.

A deeper analysis of economic policy programs aimed at improving the business outlook of SMEs and driving domestic demand does not correspond with the main idea of the article, nor would it fit into its structure. However we would like to highlight some fundamental tendencies and directions of development in the current sub-chapter:

- **Increasing residents' real wage**: An excellent tool for driving the growth of domestic demand is increasing residents' real wage, which is closely linked to the fight against inflation, raising the minimum wage, settling the wage level of certain professions that have been unsettled for decades (teacher, doctor, nurse wage raise)
- National state-owned flat program: Construction is typically the industry, whose upswing indirectly brings along growth in numerous service industries. We are convinced that a national state-owned flat program would have a positive effect on labor market mobility, as well as the construction and real estate sectors. One pillar of the program would support renting individuals with tax reductions, thus increasing solvent demand for state-owned flats. The other pillar would establish a special legal enterprise form supported with tax reductions, aimed at constructors and those who possess such flats, thus creating greater supply. Several models exist that discuss the details of establishing such a program, however the ultimate goal would be to stimulate the real estate sector and make the labour market more

mobile and flexible.

- Supporting flat renovation and modernization investments: Expanding the range of economic policy programs that support flat renovation and increasing energy efficiency would also positively influence construction service enterprises, furthermore creating better and more economic living circumstances for residents.
- Developing the market of private health care services: The demographic processes predict a constantly growing demand for health care services, which state healthcare providers cannot satisfy neither in quality, nor in volume. Adequate state incentives can stimulate solvent demand for private supplementary health care services. This would enable enterprises providing private supplementary health care services to operate profitably, and to expand later on. Such a market development would improve the health condition of the general public, as well as positively affecting SMEs and large corporations working in the health care services sector.
- Developing the market of private education services: State incentive programs aimed at increasing solvent residential demand for state education services subject to fees, or private ones would have a double effect: on the one hand it would ensure the social ascent of talented people lacking financial resources, on the other hand businesses offering educational services, and their suppliers (stationery, real estate, utilities) would benefit. Another breakout opportunity would be developing education tourism-consciously, which would attract foreign students to Hungary. Foreign students studying in Hungary can later on serve as the future basis of international relations, and the Hungarian economy benefits from their consumption during their stay.
- **Developing tourism:** The demand side of domestic tourism can be developed by extending current forms of incentives (SZÉP card), which positively affect the course of business and the willingness to invest of local tourism and hospitality service providers. Efforts to attract foreign tourists to visit Hungary have to be intensified by means of well-targeted marketing campaigns. As a result of campaigns aiming to increase the number and spending of foreign tourists, domestic touristic demand and inflowing foreign currency both increase. The tourism industry generates nearly 10% of the GDP (MT Zrt., 2013), and activates other connected sectors such as transportation, real estate development, food trade, entertainment, hospitality, consultancy and even agriculture.

Policy aimed at economic and SME development have to have several objectives besides intensifying domestic demand, namely developing a business ecosystem (incubator house, business angel network, venture capital) adequate for fast-growing - highly innovative - SMEs, supporting activities driving innovation - which increases the enterprise's competitiveness - and internationalization.

#### 4. Conclusion

In this article, our goal was to present and analyse the 21st century (2000-2012) history of credit financing in the Hungarian small and medium-sized (SME) sector, as the history of SME credit financing is a reflexion upon the future vision and business trust characteristic of this segment. A further goal was to explore options for breaking out of the negative SME credit financing spiral, induced by the credit crisis, as well as the tendency of falling-stagnating SME business activity.

Between 1995 and 2000 the Hungarian banking sector has dedicated its resources to building a circle of large corporate clients, underpinned by MNB statistics stating that in 1999 only 27% of corporate loans extended by banks were SME-loans, a fourth part of the value in the EU-15 at that time.

Starting from 2000, Hungarian credit institutions have stated in their business policy an opening towards the SME sector, as a result of which the volume of credit extended to SMEs grew by more than 220% between 2001 and 2007. Furthermore the institutional background for extensive SME credit financing was formed, independent SME business units were established, special credit facilities satisfying the needs of SMEs were devised, along with a branch network and credit approval process capable of handling and evaluating a multitude of credit facilities.

Due to the 2008 crisis the volume of SME credit financing has fallen; compared to the 2008 peak year a drop of more than 35%, nearly HUF 1300 billion in SME credit volume was registered by the end of 2011, which fell 11% short of the 2008 peak year despite the HUF 750 billion growth in 2012.

The vicious circle of the drop in SME credit financing formed as a result of the crisis:

- loans became more expensive as a result of the credit crisis, and higher interest rates decrease a company's profitability
- increasingly expensive credits induce a decrease in the willingness to invest and in the consumer demand, which in turn affect negatively the course of business and financial ratios of SMEs
- the weakening financial performance of SMEs causes a drop in credit score and rating, thus credit becomes even more expensive and the credit limit decreases

As a result of market processes SMEs had to face higher interest rates, decreasing credit limits, and bank financing options that became increasingly slowly accessible alongside stricter conditions. As a result their performance and business activity decreased, which significantly deteriorated the quality of the SME credit portfolios of credit institutions.

We deem that government intervention is necessary to halt negative processes. When exploring options we examined how the state can directly help the development of SME credit financing:

- Concerning state interest-subsidized credit we have come to the conclusion, that the limit amount of the credit programs seems sufficient, as its value exceeds 90% of the 2012 SME stock of lending, while interest rates stand at a historic low. The presence of low interest-rate state-funded loans is a necessary, but not sufficient condition of invigorating SME credit financing, and by means of it the course of business in the SME sector. Although loans with interest subsidy are available in abundance, they cannot spread widely in the SME sector, because banks follow a conservative lending policy due to previous unfavourable experiences only granting access to these subsidized funds to the highest-rated debtors and deals.
- Credit guarantee programs can act as a catalyst in newly reviving SME credit financing, thus indirectly contributing to making numerous new investments a reality, preserving and creating jobs. The business activity of Hungarian credit guarantee funds is satisfactory in the light of European practice, however according to best international practice (Asia, Japan, South Korea, Chinese Taipei) there is room for expanding their activities, which requires rethinking and refreshing their services especially with regards to portfolio guarantees as well as recapitalizing the institutional background.

During our search for a solution we have defined - without expanding on the details - starting thoughts for economic development directions, which would indirectly contribute to improving SMEs' future vision and business confidence. The business activity of a larger array of small and medium-sized enterprises will regain its force, in the event that their main target market, namely domestic demand, starts growing. In this case pessimistic expectations would seize, SMEs would start new investments and developments, and their such behaviour would in turn intensify domestic demand, which would positively influence business expectations.

As a future research topic in 2-3 year time we can analyse how the above mentioned governmental interventions work out and we can extend our longitudinal research with a new phase of bank financing of Hungarian SMEs.

#### References

- 1. ALLINSON-ROBSON-STONE (2013): Economic evaluation of the enterprise finance guarantee (EFG) scheme.

   BIS
   2013
   Februray,
   Downloaded
   from:

   https://www.gov.uk/government/uploads/system/uploads/attachment\_data/file/85761/13-600-economic-evaluation-of-the-efg-scheme.pdf;
   Scheme.pdf;
- 2. ÁRVAI ZSÓFIA (2002): A vállalatfinanszírozás új fejlődési irányai, MNB, műhelytanulmány
- 3. BENCZES I. KUTASI G.(2010): Válság és konszolidáció, Pénzügyi Szemle, 48. Közgazdász vándorgyűlés, 2010., Szeged
- 4. BÉZA D.- CSUBÁK T. K. (2005): Kisvállalkozások Pénzügyei. Egyetemi jegyzet Budapesti Corvinus Egyetem Kisvállalkozás-fejlesztési Központ
- BILEK P.- BORKÓ T.- CZAKÓ V.- PELLÉNYI G. (2006): A mikro-, kis-, és középvállalkozások külső forrásbevonásának alakulása 2000-2005 között. ICEG EC, Downloaded from: http://www.icegecmemo.hu/hun/\_docs/kutatasi\_jelentesek/kkvfin.pdf
- 6. CFE/SME (2012) 1/Final: SME and Entrepreneurship Financing: The Role of Credit Guarantee Schemes and Mutual Guarantee Societies in supporting finance for small and medium-sized enterprises, Downloaded from:

http://search.oecd.org/officialdocuments/publicdisplaydocumentpdf/?cote=CFE/SME(2012)1/FINAL&docL

anguage=En

- 7. CSUBÁK T. K. (2008): A magyar KKV-hitelezés tendenciáinak áttekintése 2001-2007 közötti időszakban. 60 éves a Közgáz Jubileumi tudományos konferencia kötet
- 8. ELKAN M. V. SCHMIDT A. G. (2010): Quantifizierung der gesamtwirtschaftlichen Effekte der Aktivitäten der deutschen Bürgschaftsbanken unter den Rahmenbedingungen der weltweiten Finanz- und Wirtschaftskrise, Institut für Mittelstandökonomie an der universitat Trier, Downloaded from: http://www.inmit.de/download/kurzstudie\_buergschaftsbanken\_2010.pdf
- 9. FÁBIÁN G.- FÁYKISS P.- SZIGEL G. (2011): A vállalati hitelezés ösztönzésének eszközei. MNB Tanulmányok 95.
- 10. GARANTIQA HITELGARANCIA Zrt. (2013): Éves Jelentés, Downloaded from: http://www.hitelgarancia.hu/files/eves\_jelentes\_2012\_evi\_20130530.pdf.pdf
- 11. GEISELER C. (1997): Das Finanzierungsverhalten kleiner und mittlerer Unternehmen, Gabler-Vieweg-Westdeutscher Verlag
- 12. IMF (2009): Update on Fiscal Stimulus and Financial Sector Measures, April 26, International Monetary Fund, Downloaded from: www.imf.org/external/np/fad/ 2009/042609.htm.
- 13. KÁLLAY, L. (2010): KKV-szektor: versenyképesség, munkahelyteremtés, szerkezetátalakítás, TM 58.sz. műhelytanulmány, Budapesti Corvinus Egyetem
- 14. KARSAI JUDIT (2011): A kockázati tőke két évtizedes fejlődése Magyarországon, Közgazdasági Szemle, LVIII. évf., 2011. október (832–857. o.)
- 15. KSH (2012): KSH statisztika a belkereskedelem hosszú távú alakulásáról (1960-2011). Downloaded from: http://www.ksh.hu/docs/hun/xstadat/xstadat\_hosszu/h\_okfa001.html
- 16. KSH statisztika a beruházások hosszú távú alakulásáról (1960-2011). Downloaded from: http://www.ksh.hu/stadat\_hosszu
- 17. MFB (2012): Éves Jelentés
- 18. MNB (2009): Jelentés a pénzügyi stabilitásról. Magyar Nemzeti Bank, Budapest, április
- 19. MNB (2011): MNB-Tanulmányok 95. Magyar Nemzeti Bank
- 20. MNB (2013): Éves átlag árfolyamok, Downloaded from: http://www.mnb.hu/Statisztika/statisztikai-adatok-informaciok/adatok-idosorok
- 21. MNB (2013): növekedési hitelprogram bemutatása, Downloaded from: http://www.mnb.hu/Root/Dokumentumtar/MNB/Monetaris\_politika/NHP/NHP\_termektajekoztato.pdf
- 22. MT ZRT. (2013): http://neta.itthon.hu/szakmai-oldalak/letoltesek/turizmus-magyarorszagon
- 23. NÉMETHNÉ G. A. (2008): A kis- és középvállalkozások banki hitelezésének alakulása (1999-2007). *Hitelintézeti Szemle*, 2008. VII. évf. 3., 265–288. o.
- 24. PSZÁF (2009): A hitelintézeti szektor 2008. évi részletes auditált adatai (eszközök, források, eredmény, egyéb), PSZÁF Downloaded from: http://www.pszaf.hu/bal\_menu/jelentesek\_statisztikak/statisztikak/hiteladat\_bev.html
- 25. PSZÁF (2010): A hitelintézeti szektor 2009. évi részletes auditált adatai (eszközök, források, eredmény, egyéb), PSZÁF Downloaded from: http://www.pszaf.hu/bal\_menu/jelentesek\_statisztikak/statisztikak/hiteladat\_bev.html
- 26. PSZÁF (2011): A hitelintézeti szektor 2010. évi részletes auditált adatai (eszközök, források, eredmény, egyéb), PSZÁF Downloaded from: http://www.pszaf.hu/bal menu/jelentesek statisztikak/statisztikak/hiteladat bev.html
- 27. PSZÁF (2012): A hitelintézeti szektor 2011. évi részletes auditált adatai (eszközök, források, eredmény, egyéb), PSZÁF Downloaded from: http://www.pszaf.hu/bal\_menu/jelentesek\_statisztikak/statisztikak/hiteladat\_bev.html
- 28. PSZÁF (2013): A részvénytársasági hitelintézetek (MFB, EXIM, KELER nélkül) mikro-, kis- és középvállalkozásoknak nyújtott hiteleinek alakulása, PSZÁF Downloaded from: www.pszaf.hu/bal\_menu/jelentesek\_statisztikak/statisztikak/pszaf\_idosorok/idosorok/igenum=1
- 29. VÁRHEGYI É. (2010): A válság hatása a magyarországi bankversenyre, Közgazdasági Szemle, LVII. évf., 2010. október (825–846. o.)
- 30. WILLIAMSON, OLIVER E. (1998): Corporate Finance and Corporate Governance, Journal of Finance No:3

#### **APPENDIX 1.**

Source: CAMBRIDGE ECONOMICS: AnnualReporton European SMEs (2011)

Number of Hungarian companies										
Company size	2005	2006	2007	2008	2009	2010	2011	2012		
0-9	527 511	512 360	517 190	515 136	521 317	516 092	521 381	516 801		
10-49	24 730	25 727	26 209	26 195	26 408	26 370	26 798	27 139		
50-249	4 1 3 6	4 217	4 409	4 4 37	4 463	4 432	4 509	4 556		
SME total	556 377	542 304	547 808	545 768	552 188	546 894	552 688	548 496		
250+	842	831	854	845	834	806	808	809		
Total	557 219	543 135	548 662	546 613	553 024	547 701	553 495	549 304		

Average numer of employees in each company size											
Company size	2005	2006	2007	2008	2009	2010	2011	2012			
0-9	902 589	898 256	909 382	909 474	920 234	917 258	931 040	928 705			
10-49	476 428	491 504	500 167	499 174	502 196	500 905	508 759	514 980			
50-249	409 015	415 344	433 098	434 472	435 511	430 770	437 004	440 394			
SME total	1 788 032	1 805 104	1 842 647	1 843 120	1 857 941	1 848 932	1 876 803	1 884 079			
250+	731 849	731 020	746 101	742 842	738 382	730 334	743 434	757 545			
Total	2 519 881	2 536 124	2 588 748	2 585 962	2 596 323	2 579 266	2 620 237	2 641 624			

Value added generating ability of Hungarian companies											
Company size	2005	2006	2007	2008	2009	2010	2011	2012			
0-9	6 345	7 364	8 512	8 988	7 893	8 143	8 364	8 889			
10-49	6 561	6 780	7 869	8 2 3 3	7 247	7 468	7 680	8 125			
50-249	7 352	7 633	9 474	10 013	8 782	9 046	9 354	9 960			
SME total	20 258	21 777	25 856	27 233	23 923	24 656	25 398	26 974			
250+	20 037	20 228	22 254	23 192	19 847	20 521	21 322	22 624			
Total	40 295	42 005	48 110	50 425	43 770	45 178	46 720	49 598			

# **APPENDIX 2.**

Source: http://www.pszaf.hu/bal\_menu/jelentesek\_statisztikak/statisztikak/hiteladat\_bev.html

		Bankin sector total (in million HUF)							
	Attributions / period	2007	2008	2009	2010	2011	2012		
I.	A hitelintézeti szektor auditált eredménye								
	Earnings Before Taxes	390 250	281 232	246 113	34 414	-211 132	-92 344		
	Earnings After Taxes (Ner income)	324 674	236 622	209 088	12 282	-243 324	-164 000		
	Balance Sheet Earnings	226 547	150 407	127 319	-19 644	-298 760	-262 022		
П.	Portfolio quality								
	Trouble free	37 085 071	22 350 658	19 545 073	18 584 804	17 395 783	14 745 523		
	Separately monitored	1 462 227	924 887	2 651 299	2 829 816	3 334 308	2 753 888		
	Below average	158 668	256 146	488 295	806 481	1 118 577	870 845		
	Doubtful	147 117	198 273	440 122	655 416	1 230 331	1 288 183		
	Bad	229 853	236 993	422 540	685 364	965 168	997 852		
Ш.	Statistic data								
	Average number of workforce	33 302	34 585	30 968	31 014	30 757	30 371		

