Miklós Losoncz

The new wave of the global financial crisis and a few consequences thereof on the global economy

The crisis that started on the subprime mortgage market of the U.S. in August 2007 has gradually spread to other areas of the financial market and to other countries. In the second wave, which started in September 2008, the crisis evolved into a bank crisis (liquidity and then solvency crisis) in the developed countries, into a currency crisis in other countries, and has become increasingly global, i.e. it has spread to a growing number of countries, and has increasingly affected the real sector.[1] It is now clear that in the developed market economies the financial crisis culminates in economic recession, the depth, spatial spread and expected length of which can hardly be forecasted.

This paper analyses the latest developments of the global financial crisis. The first part of the paper presents the characteristic features of the current phase of the crisis. The second part provides an overview about a few impacts of the crisis on finances and the real economy. The third part deals with crisis management at national and EU level, while the fourth part is about global crisis management. The study of the topic is made difficult by the fact that events on the money and capital markets have recently accelerated, and many of the former analyses have become obsolete within a short period of time. The fifth part of the paper presents some of the impacts on the real economy. The sixth part contains the summary and the conclusions. Due to the nature of the topic this study mostly relies on information and analyses published in foreign and domestic daily papers, weeklies, and on the internet, since for the shortness of time expositions of theoretical rigor could not be prepared about the developments of the latest weeks and months. Naturally, the wider background and the precedents were thoroughly discussed in the national and international literature, and the conclusions thereof were taken into account in this study.[2]

THE MAJOR CHARACTERISTICS OF THE FINANCIAL CRISIS

The *first phase* of the financial crisis, which became increasingly global, started on the subprime mortgage market of the U.S. in August 2007, due to the payment difficulties of debtors following a drop in property prices. (The majority of borrowers on the subprime mortgage market either lacks an adequate credit history, or has had mortgage delinquencies in the past.) The crisis spiralled into other risky fields of the financial market, such as the prime mortgage market (good debtors), the market of commercial properties, the market of vehicle loans, bank cards, shares, foreign currencies, the market of corporate loans, as well as to insurance companies (monoline insurance companies) that guarantee the repayment of the principal of the bonds in case the issuer of the bonds goes bankrupt. In parallel with this, the crisis spread spatially, too, and affected a growing number of countries. In this phase the financial intermediaries covered and mitigated their losses and growing risks by selling their risky assets. In part due to the decreasing risk-taking willingness of the economic players, the prices of instruments, which had broken away from the fundamentals of the real economy, were significantly corrected (property prices and stock exchange rates dropped, the dollar, which had become too weak, and the yen have gained strength against the major currencies).[3]

The *second wave* of the global financial crisis began on 15 September, with the bankruptcy of the U.S. investment bank Lehman Brothers, which was followed by the failure or increased risk of failure of several other financial intermediaries. On one hand, this questioned the operation and regulation, and even the existence of the investment banking sector in the current form. On the other hand, it led to a crisis of trust encompassing the entire banking system. This crisis first took the shape of a liquidity, and then that of a lending crisis, first of all in the developed countries. As a result of shattered trust, the crisis first of all manifested itself in the reduced lending willingness of banks, and consequently in the shrinkage, or occasionally in the temporary "drying up" of liquidity on the interbank market, as well as in the rapid rise in the costs of liabilities (due to mutual lack of trust the banks were not willing to lend to one another, or if they were, only with a short maturity and high interest rate). The shrinkage of the interbank market adversely affected corporate and retail lending, too. In parallel with this, several emerging countries became the targets of speculative attacks, and the risk of speculation against their currencies increased (Iceland, Hungary, the Baltic states, Romania and Bulgaria). The global financial crisis began to spread into the real economy.

The aforementioned segmentation of the crisis does not reflect reality completely realistically, since the two phases cannot be separated in a clear-cut manner. The first phase had characteristics typical for the second phase, however the rate and stability of these characteristics were weaker than those typical for the second phase. Likewise, some trends of the first phase continued in the second phase.

The global financial crisis reflects the aggregate impact of a large number of factors, a real economic and financial imbalance that accumulated for a longer period of time. The process started with the quick rise in risky *subprime mortgage loans* given to people with poor credit ratings between 2004 and 2006. This type of lending was made possible by the low interest rates of the market, as well as the fact that the American banks made their lending conditions more lax. Within all mortgage loans, the share of subprime mortgages grew from 3–4 per cent in 1998 to 20 per cent in 2006. In the 1990s as much as 25 per cent of household consumption was covered from loans in the U.S., which rate increased to 35 per cent in 2007. Credit expansion occurred at a time when real wages hardly grew in the U.S. As a result, consumption in the U.S. economy grew while wages did not or did only slightly increase, which significantly contributed to the maintenance of the international wage competitiveness of the U.S. The real innovation was that the U.S. economy could increase its lending and pass its outstanding debts on to the global investors.[4]

The crisis of the U.S. real estate market spread to Western Europe with a delay of 1.5–2.5 years, albeit to a different extent and with different characteristic features in the individual countries. The downturn of the real estate market is the strongest in the United Kingdom, Spain, Denmark and Ireland. The size of the now illiquid U.S. mortgage market, which reduces in value and consists of securities which offer doubtful return, is estimated to be USD 11,000 billion.

The mortgage crisis is aggravated by the profiteers of the crisis. When the first signs of the crisis appeared on the U.S. subprime mortgage market in 2006, many lenders and loan intermediaries shifted the focus of their activities to loans backed by the Federal Housing Administration (FHA). The FHA issued licenses to many intermediaries with a questionable background, too, and ill-reputed companies registered themselves under new names. A lot of market players resumed the old practice of lending to clients of modest means. By the autumn of 2008, FHA backed loans accounted for 26 per cent of all new mortgages being issued nationwide, up from 4 per cent a year earlier, with a high rate of actual and potential bankruptcy. According to estimates, over the next five years fresh loans backed by the FHA will generate a loss of around USD 100 billion.[5]

The various *financial innovations* fostered securitisation and the development and spread of various derivative transactions. As far as *securitisation* is concerned, lenders sold a significant portion of mortgages in the form of so called *structured securities* around the globe. Structured investment or loan products are special securities that are backed by the portfolios of homogeneous debt groups (mortgage or motor vehicle loans, credit cards, bonds and other assets). The banks sell the assets they lend (mortgages, etc.) in the form of securities (bonds) on the free market, and through "repackaging", bank loans turn into assets-backed securities.[6] Structured securities convert loans, as well as securities derived from loans into bonds of various quality in terms of credit rating. However, in the course of this transaction it is ignored that the losses of primary securities exponentially grow in the structured products, and take heavy toll of the principal.[7] In the U.S. and Europe the aggregate issue value of the different structured loan products is estimated to be USD 2,600 billion[8]. Within this amount debt-backed securities or collateralised debt obligations (CDOs) and mortgage-backed securities (MBSs) total USD 1,200 billion and USD 1,000 billion, respectively. Credit rating institutions favourably rated the risks implied in the products that had been repackaged several times despite the fact that they were unable to assess the actual threat they carried with their traditional methods.

The other large group of financial innovations is made up of loan-based and highly leveraged *derivatives*, wherefore they are very sensitive to changes in market prices, exchange rates and interest rates. A significant portion of these derivatives serves speculative purposes. One of the most important derivatives is the *credit default swap* (CDS), which provides security against the insolvency of the borrower. This derivates transaction makes it possible to transfer the credit risk: the buyer of protection makes periodic payments *(swap spread)* to the seller of protection, who in return provides a guarantee for the debtor's obligations. This transaction allows investors to separate risks implied in changes in the interest rate from the risk of non-payment by the borrower. CDS issuance exploded during the credit market boom after 2001. They were used to secure not only government and corporate bonds, but also mortgage-backed securities. The value of outstanding CDS grew from USD 1,563 billion at the end of 2002 to USD 54,611 as of 30 June 2008[9] (this latter amount equals 88 per cent of the global GDP). Early 2008, this value was as high as USD 62,200 billion.[10] The financial system is placed under significant pressure even if only one of the major participants of CDS transactions becomes insolvent. The liquidity problems of Fannie Mae, Freddie Mac and Lehman Brothers in August and September 2008 affected USD 700 billion worth CDS.[11] AIG (American Insurance Group) was thrown a lifebelt partly because it was a major seller of CDS.

Risky financial instruments also include the so called *carry trade* transactions, in which the economic players borrow low-yielding (e.g. Japanese yen) and lend high-yielding currencies (e.g. New Zealandian, Australian or US dollar, etc.), or invest in futures contracts on the market of raw materials, or indexes, or often in high risk, leveraged speculative instruments (that by far exceed their own capital) on risky markets (in developing or emerging countries). Carry trade significantly contributed to the development of the currency market bubbles (to the considerable undervaluation of the Japanese yen, and the excessive strengthening of target currencies – Australian and New Zealandian dollar, etc.), and it also nourished the stock market bubbles. The size of the currency market bubble has recently reduced due to the dollar and the yen gaining strength.

In addition to other factors, low interest rates also encouraged investments into the futures raw material and energy markets (mainly into the oil market). Apart from the traditional market players, institutional investors (primarily investment funds) and to a smaller extent individual speculative investors have also appeared. Raw material and fuel futures and indexes have become a separate class of investment. Speculations on the commodity and energy exchange contributed to the soaring prices of raw materials and fuels on the world market – which was naturally very much linked to changes in the prices of underlying products due to fundamental reasons. However, the weight of this role is seen rather differently according to the literature.

A FEW FINANCIAL CONSEQUENCES OF THE CRISIS

There is no doubt that securitised loans and leveraged derivatives reduced or eliminated the individual risks of the economic players, by spreading such risks throughout the international financial system. However, they did not eliminate the risk of the financial system as a whole; in fact, they increased such risks. The size, spatial existence and the location of these risky financial products in the sector of financial intermediaries are not known. Their identification and regulation are made difficult by the fact that it is often difficult to draw the borderline between certain financial products and institutions. On one hand, banks in the regulated segment can also possess mortgages and other securities embodying loan relations and derivatives, etc. On the other hand, the interaction between the individual products and the financial intermediaries is extremely strong. The latter can explain the fact that the bankruptcy of relatively small financial intermediaries can trigger a strong domino effect, i.e. the spiralling effects of their failure can be significant. The clearly distinguishable institutions of the "shadow banking system" are hedge funds that invest into risky assets.

Several estimates have been made about the size of securitised loans and leveraged derivatives. The largest estimate is USD 516,000 billion, which is nearly ten times the world's GDP calculated on the basis of purchase power parity. The current global financial crisis can be compared to the world economy crisis of 1929–1933 only on the basis of the size of imbalances that need to be alleviated. Otherwise the causes, driving forces, real economic effects and other consequences of the two crises are different.

According to the latest data, the losses of the financial intermediary sector incurred (written off) so far are close to USD 1,000 billion. The developments of the latest period have further decreased the value of mortgage bonds and other securities that embody debts, wherefore further write-off for losses can be expected. The World Bank estimates the total loss caused by the global financial crisis to be USD 3,000 billion, or 4.5 per cent of the world's GDP. The USD 1,400 billion estimate of the International Monetary Fund is smaller than that, but it significantly exceeds the loss of USD 945 billion forecasted in April.

The course of the global credit crisis depends on how soon and at what pace the accumulated real economic and financial imbalances can be reduced and eliminated. For example, in the US 1.1 million residential properties are being foreclosed, but even without these foreclosures more than 400,000 homes are on sale. According to the forecasts of market players, residential property prices will drop by a further 15 per cent in the next one and a half years. Even if the decline of property prices stops in 2010, the demand for homes will remain low. The consolidation of the housing sector in the United Kingdom, Ireland and Spain will also require a longer period of time.

The cut-back of securitised positions and leveraged derivative instruments will also last longer. It will definitely imply tensions, it may last longer than expected, and may increase the risk of unpredictable capital flows due to the concomitant hectic exchange rate fluctuations. In the case of deteriorating financial and economic outlooks the markets set prices in anticipation of a much higher rate of corporate bankruptcies, as well as of higher losses on loans and securities. Although the extremely strong financial stress of 15 September died down within a short time, the financial upwind and permanent uncertainty will sustain until the end of 2009, and even then only slow consolidation can be expected. In addition to the direct impacts of the financial crisis, economic activities are largely restrained by the low level of trust. As the financial crisis progresses, households and companies are getting pessimistic about jobs and profits for a longer period of time. It is a significant negative risk that a greater than expected recession in the developed countries may start a second wave of crisis in consumption and corporate loans, which may further weaken the capital adequacy of banks and other financial institutions. Overcoming the global financial crisis can be accelerated, and the aggravation of the crisis can be prevented by state intervention.

THE MAIN CHARACTERISTICS OF CRISIS MANAGEMENT AT NATIONAL AND EU LEVEL

In the current phase of the global financial crisis the most important objective of crisis management has been to sustain the operability of the financial intermediary system in the developed market economies.[12] Almost every country's banking system has been stricken with three interrelated problems: having taken huge losses the banks need capital. The shaken balance can be restored or at least mitigated by reducing the amount of the balance, by buying out bad debts, or by raising capital. Reduction of the amount of the balance leads to the further shrinkage of loan offers, wherefore recapitalisation is a better solution. On the other hand though, because the short-term money markets are closed, the banks are cut off from the main source of liquidity. Finally, since they cannot borrow in the longer-term paper markets, they are short of the funds they need to finance the share of their assets not covered by their deposits.[13]

Earlier, sovereign investment funds participated in crisis management by contributing to the equity raise of certain financial institutions by buying stakes therein, and thus saved the U.S. financial intermediaries concerned from bankruptcy. Lately, these investment funds have given up their role in crisis management. This can partly be explained with the fact that some of their former investments have proved to be loss-making, while on the other hand they find it extremely risky to acquire financial intermediaries with liquidity and solvency problems, since it may turn out that their portfolios include a lot of bad debts. Therefore, they are more interested in taking over companies.

Under such circumstances, recapitalisation of the banks must be undertaken exclusively by the state by way of individual (bilateral) transactions as requested by the banks. The outcome of such transactions is usually not public, information about them can only be obtained from indirect information.[14] In the U.S. the state first tried buying all or part of risky assets from the banks. In Western Europe certain states acquired stakes in the banks' share capital through capital raise. Recently, the U.S. has also shifted to this practice. According to the calculations of the International Monetary Fund, U.S. and European banks need USD 675 billion of new capital to restore their solvency. Two thirds of this sum is needed by European banks.[15]

Efforts for the elimination of money market disturbances have so far focused on short-term loans from the central banks. Short-term loans are secured by securities and other illiquid instruments backed by mortgages. The state intends to encourage the resumption of long-term lending by giving guarantees for new loans, which it will provide after the expiration of old loans. Since the beginning of the crisis, the Federal Reserve has increased the liquidity of the financial system by around USD 2,000 billion in the framework of "quantitative easing". Assistance to domestic banks, and securing the liquidity and solvency thereof have international aspects, too, if the financial institutions in need of help have foreign subsidiaries, too. Since the bankruptcy or lending problems of the parent banks may aggravate the position of the foreign subsidiaries, too, since they depend on the foreign exchange resources of their respective parent banks. The extension of state guarantees to retail deposits – differing in size and content country by country – was devised to avoid a bank panic.

Apart from making the above mentioned liquidity loans and guarantees available, the monetary policy actors in the U.S. and Western Europe wanted to contribute to crisis management, and the improvement of the liquidity of the financial system by cutting the central bank base interest rates. Following earlier interest rate cuts, the major central banks of the world (the Federal Reserve of the U.S., the European Central Bank, the Bank of England and the Swiss central banks) collectively slashed their base interest rates by 0.5 per cent on 8 October 2008. (Since 2001, this was the first coordinated action for reducing the interest rate). However, in certain emerging countries the interest rate was raised to avoid capital flights.

The leeway of monetary policy in crisis management is rather limited. On one hand, the central bank base interest rate cannot be reduced below zero. (The reference interest rate of the Fed, which acts as a central bank in the U.S., is 1 per cent, and that of the Japanese central bank is even lower.) On the other hand, in the midst of general mistrust the interbank interest rate is much higher that the central bank base interest rate. The interest rate policy of the central banks did not achieve the desired goal in that the interest rate cuts of the central banks failed to boost borrowing and consumption. Consumption has not been encouraged by the drop in raw material and fuel prices either despite the fact that lower prices mean income saving for households. Probably, this effect was significantly neutralised by the rise in unemployment, and the growth in savings due to fear of losing jobs.

Under such circumstances, it was for the fiscal policy to ease the burden on monetary policy. Countries affected by the crisis have launched fiscal programmes that are primarily based on the expansion of the expenditure side of public finances and/or tax cuts to counteract the consequences of the global financial crisis, with a total of EUR 2,600 billion so far.[16] Fiscal expansion means that on one hand automatic stabilisers are allowed to play their role, while on the other hand, discretionary expenditures are raised. (Automatic stabilisers are budgetary items that follow the fluctuations of the GDP. For instance, during weaker booms tax revenues drop, unemployment benefits grow, i.e. automatic stabilisers increase and decrease the public finance deficit in times of recession and boom, respectively.) The increase of discretionary spending must be timely, the rise in expenditures must be targeted (must focus on households that use their income, increased due to fiscal stimuli, on consumption) and shall be temporary.[17] Fiscal policy and public finance expenditures are both affected by the measures that aim to provide assistance to the debtors of non-speculative mortgages (by the rescheduling of loan repayment and other means). The social costs of this move are significantly lower than massive forced liquidations. *Fiscal expansion and recapitalisation of the banks by the state increase the public finance deficit, and consequently, government debts, wherefore it could be considered only in countries with tolerable government debt.*

In the European Union the interest rate policy of the ECB still has reserves: it can reduce the current base interest rate of 3.25 per cent. Despite this fact, a fiscal incentive programme was tabled at the December meeting of the European Council, which fosters both economic growth and long-term competitiveness (infrastructure development, R&D, innovation, environment friendly technologies, investment projects, etc.). The programme was tailored to the specific features of the member states; the governments may choose between expenditure raise or tax-cuts depending on the strengths and weaknesses of public finances. Countries with poor public finances cannot use the tool of fiscal incentive. The budget of the programme totals EUR 200 billion, or 1.5 per cent of the GDP of the member states. As much as EUR 170 billion of this sum is financed by the member states; EUR 30 billion is provided equally by the European Investment Bank and the European Commission.

The fiscal programme does not affect the basic principles of the Stability and Growth Pact, however, in line with the practice followed so far, it treats them flexibly. In 2009, Ireland, the United Kingdom, Spain, Portugal, France and Italy will violate the requirement of the Stability and Growth Pact, according to which the public finance deficit cannot exceed 3 per cent. Therefore, the European Commission will launch the excessive deficit procedure. However, since the reason behind the violation of the Pact is not irresponsible fiscal policy, but recession triggered by the global financial crisis, no sanctions will be imposed. The limit specified in the Stability and Growth Pact can be temporarily exceeded, if the member state concerned undertakes to restore the balance of public finances in the medium run, i.e. by 2013.

In addition to the fiscal incentive package the Commission also wants to use the existing programmes for crisis management in part by reducing red tape, and in part by rescheduling the given programmes. For example, the payment of EUR 6.3 billion from the Structural Funds (2 per cent of the appropriation for the period between 2007 and 2013) will be brought forward. This amount, which will be used as an incentive for small and medium-sized companies, the development of education, the establishment of scientific parks, the development of environment friendly technologies and infrastructure, will become available for the beneficiaries by the middle of 2009. This practically means pre-financing instead of post-financing. The Commission will make efforts for the better utilisation of the resources of the European Social Fund, too (EUR 11 billion per year, which will first of all be used for the alleviation of employment problems.). The new EU member states will be allowed to receive regional grants originally scheduled to be disbursed at a later time (a total of EUR 347 billion between 2007 and 2013) in 2009 and 2010. Special support will be given to the automotive and construction industries that are especially hit hard by the global financial crisis. The provision of support is linked to certain conditions. Passenger vehicle manufacturers must speed up the development of environment friendly cars, otherwise they will not be eligible for the support of EUR 5 billion. Similarly, construction industry players must meet energy saving requirements during construction projects. The resources of the European Investment Bank are also increasingly rendered to serve crisis management. For instance, the bank wants to lend EUR 15 billion more than planned to small and medium-sized companies.

The fiscal incentive programme of the European Union coordinates the national measures. It renders short-term crisis management to serve the Lisbon objectives. At the same time however, it is not clear to what extent it is about retailoring the existing programmes, and to what extent it is about new resources. The fiscal incentive jeopardises the sustainability of public finances, fiscal easing and the recapitalisation of the banks lead to a growth in government debts in certain countries, and may create a debt trap.

As a rule, during financial crises there is a need for stronger state regulation. One of the proposals for the regulation of the CDS market is that only economic actors licensed to conduct insurance business should be permitted to issue CDS. This proposal also attacks "naked" CDS (buying protection on a company in which the protection buyer does not hold debt). (This is similar to the ban on short selling, in which a market player sells a financial instrument that the seller does not own at the time of the sale.) The activity of the most active players of the CDS market, the so called monoline insurance companies (insurance companies that guarantee the repayment of bonds should the bond issuer become insolvent) has been regulated since the late 1990s. Paradoxically, these financial intermediaries have become the largest victims of the recent market turbulences. Market transparency would definitely improve if CDS were traded on the stock exchange, or at least there existed a clearing house for the completion of transactions. The most significant risk of such proposals is that in case privately negotiated contracts are treated as securities, these derivatives may be pushed back into market segments in which the supervisory authorities have no jurisdiction.[18]

CRISIS MANAGEMENT AND INTERNATIONAL COOPERATION

The global financial crisis has hit hard the liquidity and solvency of certain emerging countries, too, in part due to the rise in risk margins and the decline in global financing liquidity. The growth of risk premiums has severely affected countries with a vulnerable macroeconomic balance. The shortage of global liquidity has severely affected states the banking sectors of which heavily depend on external money market, and in which loans increased at a higher rate than it would have been desirable to maintain to the balance.[19] Iceland experienced a financial crisis, while Hungary could avoid a speculation driven financial crisis through international cooperation (loans from the

International Monetary Fund, the European Central Bank and the World Bank). The external balance and liquidity are vulnerable in Pakistan, Ukraine, the Baltic states, Romania, Bulgaria and Turkey. Had a few at-risk countries become insolvent, it would have threatened the spread of the crisis to other countries with unpredictable consequences, which raised the issue of the need for international cooperation with dramatic force. It is worth noting that the global financial crisis has also adversely affected – through the banking system of significant international exposure – countries that possess large currency reserves by international comparison (Russia, the Republic of Korea, Singapore, etc.).

In conjunction with the European Central Bank and the World Bank, the International Monetary Fund played a prominent role in crisis management in Iceland, in crisis prevention in Hungary, as well as in the aforementioned countries. The IMF has USD 200 billion in equity, and USD 50 billion in quickly accessible foreign resources. The Charter of the Fund allows the disbursement of loans funding current payments account deficits, but does not allow lending for liquidity purposes. This problem seems to have been solved: as much as USD 2 billion has already been given to Iceland, USD 16.5 billion to Ukraine and USD 15 billion to Hungary. The size of the assets falls short of the forecasted needs, and is extremely modest in general terms, too, compared to the imbalances accumulated in the global financial system. Countries struggling with financial problems can receive maximum three times their national quotes. Yet, Ukraine and Iceland received 8 and 11 times their respective quotas. The IMF would not be able to help countries of the size of Brazil, Turkey or Argentina. However, it must be added to the rather complex picture that the International Monetary Fund was established at a time when international capital flows were not liberalised. Its equity was adjusted to the realities and needs of that period.

The IMF requires adequate resources for successful crisis management (in the form of credit guarantees and the availability of additional credit sources). This can be implemented either through capital increase, or through a scheme in which countries with a positive balance on current account and significant foreign exchange reserves (mainly China, Japan and the oil exporting countries) offer part of their resources unconditionally to the International Monetary Fund to mitigate global imbalances and to assist countries hit by the global financial crisis. Japan has already done so, it has offered USD 100 billion from its USD 980 billion foreign exchange reserve to the IMF. The World Bank intends to provide USD 100 billion in new resources to the developing countries, especially to those with modest means and medium-level income.

The financial crisis has brought to the surface and highlighted a few strengths and weaknesses of the European Union and the Economic and Monetary Union (EMU). The most significant strength is that through the common currency the Economic and Monetary Union protected its member states from potential exchange crises, wherefore the appeal of EMU membership has grown for EU and non EU countries (Iceland) alike.

As far as the weaknesses are concerned, according to the EC Treaty the Community is not responsible for the obligations of the government agencies and other public law institutions of the member states, and the member states are not responsible for the obligations of government agencies and public law institutions of other member states. With the exception of liquidity loans the European Central Bank cannot provide loans to the organisations or agencies of the Community, or to the central public administration agencies and other authorities of the member states. Therefore, in the case of a financial crisis the EU member states must turn to the International Monetary Fund for help.

Otherwise the competence of the European Central Bank extends to the EMU member states, and in certain cases to countries involved in the ERM-2 exchange rate mechanism, considered as the "ante-room" of the Economic and Monetary Union. This latter means that if the exchange rate of the currency of a given country relative to the euro leaves the ±15 per cent intervention band around the middle rate of the central bank, then not only the central bank intervenes, but also the ECB in order to keep the exchange rate within the band on the foreign exchange market. However, this can happen only if the exchange rate leaves the intervention band for reasons other than the economic policy failure of the given member state. This is a theoretical possibility of assistance. In line with the specific characteristics of convergence to the developed countries (Balassa–Samuelson effect, etc.), the currencies of the new EU member states are, as a rule, revalued both in real and nominal terms, and at the strong end of the band the central banks can intervene even without assistance from the ECB (euro must be bought for national currency). The weak end of the band is "farther away", and the central banks cannot allow the devaluation of the national currencies to the weak end of the band. They must prevent further devaluation much earlier by intervening into the foreign exchange market, and by using other means.

Due to these institutional and operational obstacles, the governments of the members states, the European Central Bank and the central banks of EU member states that do not belong to the EMU acted independently, yet in harmony with one another to remedy the liquidity and solvency problems of financial intermediaries.

At the same the European Union's room for manoeuvre was increased by the fact that in anticipation of situations similar to the current one, in 2002 the European Council created a credit line of EUR 12 billion, which is at the disposal of the European Commission, and which has not yet been activated. (Hungary has received a lump sum of EUR 6.5 billion from this credit line.) It must be noted that the U.S. Fed also assumes an active part in crisis management. It has offered a liquidity credit line of USD 30 billion for Argentina, South Korea and Singapore.

Another example of international cooperation is the G-20 summit held in Washington on 15 November, which envisaged the elaboration of a crisis management action programme by March 2009. The G-20 group was set up by the finance ministers and central bank presidents of Argentina, Australia, Brazil, Canada, China, France, Germany, India, Indonesia, Italy, Japan, Mexico, Russia, Saudi Arabia, the Republic of South Africa, South Korea, Turkey, the United Kingdom and the U.S. in 1999, in the wake of the Asian and Russian financial crisis so that the representatives of the major industrialised and developing countries would regularly meet to discuss the key problems of the global economy. These countries account for 90 per cent of global production and 80 per cent of global trade. The composition of the G-20 is not perfect for today's problems. It excludes Spain, which is considered to be a big economy, but includes a mid-sized country that has become irrelevant to global finance because of its own mismanagement (Argentina).[20] Still, due to its composition the G-20 is a better forum for crisis management than the G-7 group of developed countries.

In 2009 the G-8 Group may expand to include China and India. A smaller, and therefore more efficient group than the current one can be formed only if European representation is reduced. For the time being Western Europe is over-represented in all international organisations. It would be reasonable if only the EU, and not the member states represented themselves in the International Monetary Fund. This is a significant precondition for the international regulatory reform.

When in the autumn of 2008 the United Kingdom was the first country to announce intervention in the banking system, the markets did not react positively. However, when the enlarged Eurogroup embraced the same proposition, the market reaction was already positive. The decisive role was played by a body that has no formal existence: the eurozone heads of government and state (France and Finland are represented by their respective heads of state due to their public law status), as well as the head of the British government, the European Central Bank and the European Commission. The enlarged Eurogroup is not in conformity with the provisions of the Lisbon Treaty.[21]

Recently, it has been more and more widely realised in the European Union that in addition to interest rate cuts by the central banks and the recapitalisation of banks, crisis management requires fiscal incentives, too.

Joining international cooperation frameworks China has taken measures to increase domestic demand. In the next two years it wants to spend a sum equalling EUR 468 billion on infrastructure development, environment protection, tax cuts and welfare expenditures. This amount equals 14 per cent of the annual GDP, and is considered as a significant fiscal incentive in time of peace. According to the signs, the Chinese leadership has understood the weight of the problem, and the risks of non-action. It is not negligible either that China has the resources needed for crisis management. After the two-digit growth rates of the past years the deceleration of the GDP dynamics to 6 per cent is like a recession, and may generate significant social tensions. (According to the Chinese leaders, GDP dynamics of at least 8 per cent are needed in order to avoid a jump in unemployment.)

Crisis management is made difficult by the tug-of-war between globalisation and national sovereignty. On one hand, big financial institutions have far outgrown their domestic markets, wherefore finance has become the most globalised and unstable segment of the world economy. In a crisis the state has to play a big role in making lending safer in return for more stringent regulation and oversight. Governments broadly welcome the benefits of global finance, yet they are not prepared to set up either a global financial regulator, which would interfere deep inside their markets or a global lender of last resort.[22] In such circumstances it is already progress if national regulators coordinate their standpoints and measures.

REAL ECONOMIC EFFECTS

Until mid-September, macroeconomic forecasts assumed that the growth rate of the global economy would slightly decrease. However, after the liquidity, trust, and then the solvency crisis set in, which hit the financial institutions, the concomitant wave of bankruptcies and near-bankruptcies in the U.S. and in Europe, the increasing costs of loans, the plummeting share prices and the growing exchange rate of the dollar against the major currencies made the earlier forecasts null and void. The tightening of loan conditions affects households and the business sector alike. However, independent of this, both households and businesses have become more cautious in borrowing. The fall of share prices contributes to the decline of private consumption and investment projects primarily in the U.S. and the United Kingdom.

The most significant change triggered by the current stage of the global financial crisis, which began in mid-September, is the revaluation of risks on the money and capital markets. Among other things this is indicated by the fact that the yield margin of U.S. and European corporate bonds (the difference between the yield of BAA-rated corporate bonds and U.S. government securities with a 10-year maturity) is the highest since 1931–1933. Whenever the yield margin permanently increased by over 250 basis points in the U.S. after 1930, it led to a decline in business investments.

Under the current circumstances the reliability of the forecasts depends more on the proper assessment of risks premiums, and less on the quality of the applied models. Although the process has not ended yet, according to the currently available information, in the longer run the risk premium (the difference between the expected yield of risk-free and risky instruments) is going to be 150 to 200 basis points higher than before the global financial crisis. As far as the impact on the real sector is concerned, according to estimates based on model calculations, the growth of the risk premium by 200 basis points will reduce the long-term potential growth rate by around 2 per cent in the developed countries, i.e. the former high growth rate is not very much likely to resume after the end of the crisis. However, for the short- and medium-term growth trends it is favourable that the raw material and fuel price shock has significantly subdued, even disappeared lately, which diminishes the inflationary risks, and somewhat mitigates the negative effects of the global financial crisis on the real economy.

On this basis, the GDP is expected to fall by 2 per cent in the OECD countries in 2009 (which is the greatest recession since 1982). This decline will be followed by near stagnation in 2010 (a growth of 0.2 per cent), and a slow upswing is expected only in 2011.[23] This assumption is supported by the experience that upswing is more protracted after financial crises than after "traditional" recessions. The negative, downward risks of this forecast are significant. Recession can be stronger if the governments' efforts to save the financial institutions fail. On top of that, the risk of deflation is extremely high in Japan and the U.S. It is a positive risk if the impacts of recession can somewhat be offset by international cooperation and coordinated economic policy.

After a 1.14 per cent growth experienced in 2008, the GDP of the U.S. is expected to shrink by 1.6 per cent in 2009, and is expected to stagnate in 2010. One of the main reasons behind this is the reduction of the 70 per cent share of household consumption in the GDP (which is unsustainable already in the short run), and the downsizing of the inflated financial sector. The effects of the fiscal package of USD 700 billion accepted in the autumn of 2008 will relatively soon melt away, however new programs will follow.

As a result of the extension of crisis management by the state, the GDP relative public finance deficit of the U.S. may grow from 5.9 per cent in 2008 to over 10 per cent in 2010. The negative risk factor in the growth of the U.S. economy is represented by further bankruptcies of banks, i.e. the fact that the state will not prevent the failure of large financial institutes.

Under the conditions of globalisation, the European Union, including the Economic and Monetary Union, could not avoid the real economic effects of the financial crisis. The consolidated GDP of the EMU is expected to decline by 2 per cent in 2009, and stagnate in 2010. The growth prospects are especially grim in Germany, where the economic players heavily depend on bank loans, and in Spain, where the hosing bubble has burst (a decline of 2.5 and 1.7 per cent in 2009, respectively). The outlooks in France and Italy are not better either. The drop in the GDP of the European Union is expected to be slightly smaller (1.8 per cent) than in the EMU, and this will be followed by near stagnation in 2010. The strong decline in the GDP of Britain will be somewhat offset by the more favourable performance of Sweden, Denmark and mostly that of the new member states.

From among the new EU member states the global financial crisis hits the Baltic countries the hardest, where recession started already in 2008. The growth rate is expected to diminish the most in Poland and the Czech Republic, but the GDP dynamics of Slovakia, Slovenia and Romania will also significantly fall. Within the OECD countries the Japanese economy will also slump into recession in 2009, which will be difficult to get through. The GDP dynamics will also fall in Canada and New Zealand, but may stay relatively favourable in Australia.

The recession expected in the OECD countries will not lead to a decline in global production. It will only strongly reduce the growth rate from 3.4 per cent in 2008 to 0.5 per cent in 2009, which is expected to be followed by a dynamics of 2 per cent in 2010. China and India play a prominent role in the stabilisation of global production. The growth rate will decline in these countries, too, but will remain dynamic due to the expansion of domestic demand. (It is another issue that the reduction of growth will cause tensions in both countries, and the effects in China will equal those of a minor recession.) As a result of a drop in raw material and fuel prices on the global market due to shrinking growth, the role of oil and raw material exporting countries (OPEC, Russia, etc.) will diminish in the regulation of global economic growth. In case no banks go bankrupt, growth promoting initiatives can be expected in Brazil, Mexico and South Korea.

The global financial crisis adversely affects the financing of international trade, too. Consequently, the growth rate of global trade measured in dollars will dip by 2.8 per cent in 2009, and is expected to grow by 3 per cent in 2010. The decline in the dynamics of global trade affects almost all countries of the global economy, but in general it will be stronger in the developed than in the emerging countries. The expected decline of global trade in 2009 has been unprecedented since the wake of world war II.

SUMMARY AND CONCLUSIONS

The financial crisis that started out in the U.S. mortgage market in August 2007, and that became a global crisis from September 2008, severely affecting the operation of the financial system, seems to be the gravest crisis in many years. However, the current crisis can be compared to the great depression of 1929–1933 only on the basis of the financial and real economic imbalances that need to be alleviated, and consequently, maybe its length. Otherwise the causes, driving forces, real economic effects and other consequences of the two crises are radically different.

In order to alleviate the *real economic imbalances* that serve as a basis for the current global financial crisis, the *oversupply of residential properties* must be reduced or eliminated in the U.S. and in several European countries (United Kingdom, Ireland, Spain, Denmark, etc.). It cannot, or can be forecasted only with great uncertainty at what housing prices the balance of the housing market will be restored. The decline of real estate prices is much likely to continue for some time. The other real economic basis of the global financial crisis is that in the U.S. the level of consumption versus the GDP swell, and the households financed a significant portion of this consumption from loans.

The *excessive consumption of U.S. households* is financed by countries – mostly emerging countries – with a positive balance on current account (China, India, Asian industrial commodity exporters, and crude oil exporters). The alleviation of this imbalance requires adaptation and more savings on the part of American households, as a result of which the rate of consumption will decrease relative to the GDP, and therefore a significant driving force of economic growth will weaken (as much as 70 per cent of the U.S. GDP is spent on consumption), as well as growth in domestic demand in countries with a positive balance on current account. According to the indications, China is interested in maintaining the high dynamics of domestic demand not only because of its increasing global role, but also for domestic reasons, to keep social tensions under control. Therefore, it is ready to take economic policy steps to boost domestic demand. Finally, imbalances can be in part alleviated by streamlining the *financial intermediary sector,* which grew excessively in the U.S. during the years of the credit market boom, and by reducing its outstanding share of 40 percent from the GDP and the profit of the business sector.

The mitigation and elimination of imbalances in the *financial sector* requires the cutback of abnormally inflated securitised and leveraged derivative instruments. On one hand, the process is made difficult by the fact that reliable information on the size of such financial instruments and on their location in the global financial system does not, and as a matter of course, cannot exist. On the other hand, risky securitised loans can and will somewhat reproduce themselves due to regulatory deficiencies and anomalies.

The cutback of securitised and leveraged instruments, together with the elimination of real economic imbalances, goes together with the destruction of values that take the form of huge paper (virtual) profit at macroeconomic level, but represent real losses for many economic actors. In order to cover losses incurred from financially innovative risky instruments non loss-making financial assets must also be sold, which leads to the general fall in the price of financial assets, and which adversely affects the playing field of the economy. On the other hand, from time to time this generates excessive tension in the financial system. In the developed countries the short-term effect is recession, which started in the middle of 2008, and may end at the end of 2009 at the earliest, but the risk of prolonged recession and slow upswing is great.

The most significant change triggered by the financial crisis is the revaluation of risks on the *money and capital markets.* Under such circumstances the reliability of macroeconomic forecasts depends more on the proper assessment of risks premiums, and less on the applied methods. As a result of the sustained growth of risk premiums, the potential growth rate, sustainable in the long run, decreases in the developed countries. This means that after the end of the recession the GDP dynamics will very much likely be slower than before the crisis, which projects the decline in the growth of the global economy, too.

Due to the strong globalisation of the financial sector witnessed in the past years, the financial crisis has also reached economic players and countries that did not, or hardly bought financial instruments backed by mortgages or other risky securities “prone” to be devalued. These economic players and countries were affected by the crisis through the general decline in risk-taking on one part, and through more difficult access to external funding resources on the other, i.e. trust and liquidity crises followed.

Experience shows that market mechanisms by themselves are not able to resolve the global financial crisis; they deepen the crisis both in the developed and emerging countries in a self-exciting manner. The targets, means and institutional system of crisis management by the state are taking shape in practice. As the munition of monetary policy is running out, the focus of crisis management is increasingly being shifted to fiscal policy. The introduction of fiscal incentives is a possibility only in slightly indebted countries with relatively low public finance deficits. Despite the possible formal similarities, this is not the renaissance of Keynesian economic policy. At best this is the timely, targeted and temporary use of certain elements of that policy. The state's share acquired in the banks through capital raise does not mean wide-scale and permanent nationalisation, and proprietary role exercised by the state. In fact, this is not a state task, but temporary crisis management. As soon as the situation consolidates, the state will sell its bank shares, albeit it is another question, at what price it will do so. The impacts of governmental crisis management on the public finances and government debts of the different countries cannot be seen yet. At any rate, in the long run it will adversely affect economic growth, and represents a downward, negative risk factor.

The globalisation of the financial crisis has promoted international cooperation, too. In the European Union it has brought to the surface a few weaknesses of the Economic and Monetary Union, and the Stability and Growth Pact. Crisis management first of all requires the expansion of the scope of the international financial institutions, primarily that of the International Monetary Fund, as well as the increase of the available resources. Stronger international cooperation is hampered by the fears of losing national sovereignty.

For the time being it cannot be clearly determined how radical the changes induced by the global financial crisis will be in the global financial model based on the liberalisation and deregulation of the financial markets. It is a fact that state regulation increases during crises, and this experience is valid for the current global financial crisis, too. *For the time being it cannot be unanimously stated whether the increased role of the state in crisis management, the tightening of the regulations on the money and capital markets will put an end to the current, so called neoliberal model, or will just modify it.*

Notes

[1] In connection with the definition of financial crises see for instance Katalin Mérő: A pénzügyi stabilitás alapkérdései (The basic questions of financial stability), National Bank of Hungary, October 2003. http://lucifer.kgt.bme.hu/pub/penzugytan/torolt/Penzugyi-stab.ppt

[2] Júlia Király – Márton Nagy – Viktor E. Szabó: Egy különleges eseménysorozat elemzése – a másodrendű jelzáloghitel-piaci válság és (hazai) következményei (Analysis of a special series of events – the subprime mortgage crisis and its /domestic consequences), Közgazdasági Szemle, volume LV, July-August 2008, pp. 573–621., Éva Fischer – Gergely Kóczán: Rendkívüli hatósági intézkedések és tanulságaik a jelzálogpiaci válság kapcsán (Extraordinary measures taken by the authorities and the lessons drawn from them in connection with the mortgage crisis). Study by the National Bank of Hungary, No. 72, Budapest, February 2008, 59 pages, Downloadable from: http://mnb.hu/Engine.aspx?page=mnbhu_mnbtanulmanyok&ContentID=10766

[3] For more details see for instance Miklós Losoncz: The U.S. credit crisis and its implications on global economy, Public Finance Quarterly, Volume LIII, Issue 2/2008, pp. 253–268

[4] Viktória Dobsi quotes Frédéric Lordon: C'est la vie, or just on the contrary, what do the French think about the financial crisis? Magyar Narancs, 20 November 2008, page 26

[5] The subprime wolves are back. Business Week, 1 December 2008, pp 39 and 37

[6] For more details see Gyula Nagy: Globális pénzügyi piacok: virtualizálódó befektetési világ valóságos kockázatokkal (Global financial markets: vir-

tualising investment world with real risks, manuscript), Budapest, 2008, to be published in the journal Külgazdaság

[7] Júlia Király – Márton Nagy – Viktor E. Szabó: work cited above, page 614

[8] IMF Global Financial Stability Report – Containing Systemic Risks and Restoring Financial Soundness, April 2008, Washington D.C., page 56 http://www.imf.org/external/pubs/ft/gfsr/2008/01/pdf/text.pdf

[9] Chris Giles: Into the storm, Financial Times, 14 November 2008, page 10

[10] CDS market faces up to a new reality, Euromoney, October 2008, page 24

[11] CDS market faces up to a new reality, Euromoney, October 2008, page 23

[12] For the description of crisis management in the first phase up to January 2008 see the above cited work of Éva Fischer – Gergely Kóczán

[13] Global finance: Lifelines, The Economist, 11 October 2008, page 83

[14] Éva Fischer – Gergely Kóczán, page 7 of the above cited work

[15] Global finance: Lifelines, The Economist, 11 October 2008, page 85

[16] Chris Giles: Into the storm, Financial Times, 14 November 2008, page 10

[17] see Lawrence Summers: Why America must have a fiscal stimulus, Financial Times, 7 January 2008, page 9

[18] CDS market faces up to a new reality, Euromoney, October 2008, page 24

[19] Júlia Király – Márton Nagy – Viktor E. Szabó, cited work, page 615

[20] Redesigning global finance, The Economist, 15 November 2008, page 13

[21] Marta Dasu: Europe must act as one on the world stage, Financial Times, 20 November 2008, page 11

[22] Redesigning global finance, The Economist, 15 November 2008, page 13

[23] The source of 2008 and 2009 figures is the latest forecast of the International Monetary Fund: International Monetary Fund: World Economic Outlook Update, Global Economic Slump Challenges Policies. Washington, 28 January 2009. Downloadable from: http://www.imf.org/external/pubs/ft/weo/2009/update/01/index.htm Figures for 2010 are own forecasts.