REGIONAL ECONOMIES

MONETARY AND BANKING SYSTEMS OF THE CENTRAL EURASIAN COUNTRIES IN THE CONTEXT OF THE WORLD FINANCIAL AND ECONOMIC CRISIS

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Introduction

The financial crisis that has shaken the world dealt a rather hard-felt blow to the economy of the Central Eurasian countries, thus aggravating its weaknesses and ailments. Some countries in this group are keenly feeling the consequences, which are expressed primarily in imbalances in their monetary and banking systems, as well as in decreased trade, tougher conditions for acquiring funds in the world financial market, and so on. The independence of the market economies of the Central European states has made it possible for different scenarios to be enacted for developing and integrating the above-mentioned systems in conditions of financial globalization. Various opinions are being expressed on this account, thus making this a pertinent research topic in the context of the growing dynamism of the processes designed to achieve closer cooperation in the financial and currency spheres.

The World Financial and Economic Crisis and its Manifestation in the Central Eurasian Expanse

Over the course of history, the world economy has periodically undergone financial upheavals. Between 1970 and 2007, IMF experts counted 124 systemic banking, 208 currency, and 63 debt crises accompanied by defaults on certified debts and affecting many countries. They have been covered in sufficient depth in the economic literature.[1] We will only list a few that have occurred in the past decade and encompassed entire groups of countries. For example, in 1992-1993, several countries of the European Union (Great Britain, Italy, Sweden, Norway, and Finland) experienced currency crises. In the past two years, a severe crisis, which began in Mexico, spread to other countries of Latin America. In 1997-1998, a global financial crisis began in the countries of East (Korea) and Southeast (Malaysia, Thailand, Indonesia, and the Philippines) Asia and later spread to Eastern Europe (Russia and several of the former Soviet republics) and Latin America (Brazil).

The crisis the global financial system is currently experiencing is one of the most serious and widespread of any that have occurred during the past few years. It differs from all the previous ones both in its severity and scope and perhaps for the first time since the Great Depression has encompassed the whole world. The uniqueness of the current financial crisis is manifested in different ways. First, we should stress its global nature: after beginning in the U.S., it spread rather rapidly to most other countries and became a global crisis, which distinguishes it from the above-mentioned crises. It is just as important to single out the scope of the crisis: it covers all spheres of the economy, not just its individual segments—financial, stock market, housing, and so on.

The crisis has proven extremely serious and arduous for the banking system and investment companies. It has caused an unprecedented collapse in stock markets and a very abrupt drop in prices for various kinds of raw materials, particularly oil (of almost three-fold) and metals (by one third). As early as its first phase in 2008, the crisis was accompanied by galloping inflation in the developed countries (2-3-fold) and its significant acceleration in the developing countries. Unparalleled resources within the framework of anti-crisis programs were required in order to alleviate its consequences—up to 10-15% of GDP in those countries most inflicted by these consequences and trillions of dollars in total. Forecasts told of the exceptional measures needed to fight the crisis and the enormous funds that this would require.

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[1] See: D. Daianu, L. Lungu, "Why Is This Financial Crisis Occurring? How to Respond to It?," *TIGER Work Paper Series*, No. 113, Warsaw, July 2008; N.P. Goriunova and P.A. Minakir, *Finansovye krizisy na razvivaiushchikhsia rynkakh.* Nauka Publishers, Moscow, 2006; Z.F. Mamedov, *Anatomiia finansovogo krizisa.* St. Petersburg State University, St. Petersburg, 2005; A.G. Carstens, D.C. Hardy, C. Pazarbasioglu, "Avoiding Banking Crises in Latin America," *Finance&Development*, Vol. 41, No. 3, 2004, pp. 30-33; I.K. Kovzadadze, *Sistemnye bankovskie krizisy v usloviiakh finansovoi globalizatsii,* ed. by Vl. Papava, Tbilisi University Publishers, Tbilisi, 2003; A.V. Anikin, *Istorii finansovykh potriaseniy. Rossiyskiy krizis v svete mirovogo opyta,* Olimp-Biznes, Moscow, 2002; C.P. Kindleberger, *Manias, Panics, and Crashes: A History of Financial Crises*, J. Wiley, New York, 2000; B. Eichengreen, A. Arteta, "Banking Crises in Emerging Markets: Presumptions and Evidence," *CIDER Working Paper,* No. 115, Center for International and Development Economics Research (University of California, Berkeley), 2000; S. Fischer, *The Asian Crisis: A View from the IMF*, Address by First Deputy Managing Director of the International Monetary Fund at the Midwinter Conference of the Bankers' Association for Foreign Trade, Washington, D.C., 22 January, 1998; A. Demirguc-Kunt, E. Detragiache, "The Determinants of Banking Crises in Developing and Developed Countries," *IMF Staff Papers*, Vol. 45, No. 1, 1998, pp. 81-109; J. Sachs, A. Tornell, A. Velasco, "Financial Crises in Emerging Markets: The Lesson from 1995," *Brookings Papers on Economic Activity*, 1996. No. 1, and others.

It was also predicted that recovery from this crisis would most likely be a long and drawn-out process. The measures needed to effect serious recovery and an upswing in the economy after the crisis cannot yet be implemented in the required way. The crisis could very easily slip into stagnation and some countries where high inflation remains can expect to encounter the extremely painful and destructive process of stagflation.[2]

On the whole, the world financial upheavals occurring at present have exceeded the most pessimistic expectations. These problems have also had a serious impact on the countries of Central Eurasia (CEA), which are becoming increasingly drawn into the world financial and economic system and actively integrating into the world financial markets with each passing year. It is these countries, particularly Central Asia and Central Europe, according to the World Bank, that have suffered more than other regions from the crisis.[3] Admittedly, the main socioeconomic indices of the CEA countries during the current period of 2009, i.e. in conditions of the ongoing global financial crisis, are distinguished by significant differences.

Since many of the region's states proved vulnerable to the sudden outflow of capital and decrease in demand for export provoked by the crisis, the World Bank predicts an even more profound slump this year.[4] Ukraine, for example, will experience the most serious economic difficulties, whereby its GDP will drop by 9%. GDP in Armenia, Belarus, Moldova, and Kazakhstan will decrease by 6.0%, 3.3%, 3.0%, and 1.5%, respectively, and the current account deficit will be huge: 12.1%, 7.8%, 12.1%, and 8.4%, respectively. The recovery of certain CEA countries from the crisis is being hindered by an abrupt drop in investments, particularly in Ukraine where they decreased by half.

The report also notes that in several states of the region, GDP will grow, although at more moderate rates than before the crisis. Azerbaijan's economy will increase by 3.3%. Uzbekistan will end the year with a 4.5% increase, and Georgia's GDP will grow by 1%. In 2010, the overall economic recovery will lead to all the region's countries "coming out in the black" (Table 1).[5]

The consequences of the economic slump are not the same across the board: the CEA countries are suffering from them to different degrees depending on the structure of their economy and their resistance to upheavals. A good case in point is the significant difference in the state of the economy and banking sector of Azerbaijan and Belarus. Azerbaijan sailed through the first stage of the crisis scotfree, without having to turn to any foreign financial sources and able to protect its independent position,[6] while Belarus was forced to resort to IMF and Russian government loans, agreeing in the future to transfer to the Russian ruble. On the whole, sources of external financing have been exhausted for the CEA countries, as for other developing and transition countries, which was accompanied by a significant increase in extra risk charges and dramatically increased the cost of this financing. In turn, the sharp drop in investments is aggravating the countries' recovery from the crisis.

Along with this, some Central Eurasian countries (Kazakhstan, Ukraine) have stupendous debts on external loans, which, if not promptly paid off, will become much more expensive at the current

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[2] For instance, the World Bank, compared to its previous report (see: *Global Economy Prospects 2009: Commodities at the Crossroads*, The International Bank for Reconstruction and Development / The World Bank, Washington, D.C., 20 November, 2008), gave worse forecasts of the slump in the world economy in 2009 from 1.7% to 2.9% and described the prospects for its development as extremely indefinite (see: *Global Development Finance: Charting a Global Recovery*, The International Bank for Reconstruction and Development / The World Bank, Washington, June 2009). Similar pessimistic statements are seen in the reports of the International Monetary Fund (see: *World Economic Outlook: Crisis and Recovery*, IMF, Washington, D.C., April 2009) and the Asian Development Bank (see: *Asian Development Outlook 2009*, Asian Development Bank, Manila, March 2009).

[3] See: *Global Development Finance: Charting a Global Recovery*, pp. 110-118.

[4] See: Ibid., pp. 2, 9.

[5] Ibid., pp. 115, 117-118.

[6] Attention is focused on this in particular in: N.A. Nikolaev, T.E. Marchenko, M.V. Titova, *Strany SNG i mirovoi krizis: obshchie problemy i raznye podkhody*, Analytical Report, FBK, Moscow, June 2009, p. 8.

Table 1

Central Eurasia
World Bank Forecast
(*annual percent change*)

	Countries	2009	2010	2011
	Central Europe			
1	Belarus GDP at market prices *Current account bal/GDP*	–3.3 –7.8	2.6 –5.7	4.4 –3.6
2	Moldova GDP at market prices *Current account bal/GDP*	–3.0 –12.1	2.0 –10.1	4.0 –9.3
3	Ukraine GDP at market prices *Current account bal/GDP*	–9.0 0.1	1.0 1.0	3.5 –0.8
	Central Caucasus			
4	Azerbaijan GDP at market prices *Current account bal/GDP*	3.3 10.3	5.2 15.5	9.0 19.0
5	Armenia GDP at market prices *Current account bal/GDP*	–6.0 –12.1	–2.0 –10.3	1.0 –6.5
6	Georgia GDP at market prices *Current account bal/GDP*	1.0 –19.6	2.0 –16.8	4.0 –15.5
	Central Asia			
7	Afghanistan	n/a		
8	Kazakhstan GDP at market prices *Current account bal/GDP*	–1.5 –8.4	1.5 –7.8	3.0 –6.3
9	Kyrgyzstan GDP at market prices *Current account bal/GDP*	0.5 –6.0	2.5 –7.2	3.5 –7.8

Table 1 (continued)

	Countries	2009	2010	2011
10	**Tajikistan**	n/a		
11	**Turkmenistan**	n/a		
12	**Uzbekistan** **GDP at market prices**	4.5	5.0	6.5
	Current account bal/GDP	11.8	15.2	13.6

interest rates than at the interest rates that existed when the loans were initially issued. The drop in growth rates of export earnings is also having an impact on the acceptability of the level of their debts. Due to the fact that the main part of the external debt of these countries is redenominated in the leading reserve currencies, their ability to service their debts largely depends on the fluctuations in the foreign exchange rates. The deterioration in external conditions and increase in the U.S. dollar exchange rate in August 2008 have been creating downward pressure on the exchange rates of the national currency. Over the last year such countries as Kazakhstan, Ukraine, Tajikistan, and Armenia have been encountering a significant devaluation of their currencies. This drop in the exchange rate of their currencies has led to a significant increase in the cost of servicing the external debt when calculated in the national currency and is already having an impact on the state budgets and the budgets of companies. The indicated factors are creating a situation in which enormous debts have been generated in several CEA countries.[7]

The world monetary and banking system proved to be the most adversely affected by the crisis phenomena, which is generally recognized as being the main victim of the financial collapse. In so doing, according to international experts, in the next few years (until 2012), this system will undergo enormous changes. Certain problems have also arisen in the monetary and banking sector of the CEA countries, for example, in Ukraine and Kazakhstan. The banks of these countries have primarily been negatively affected by the high lending risk and liquidity risk in conditions of the deteriorating macroeconomic situation in these countries due to the faltering world economy, the difficult situation in the world banking system, and the sharp drop in access to external liquidity.[8] Due to the outflow of foreign capital and the problems caused by this in the banking sector, the governments of the CIS countries have had to allot budget funds to support the national financial systems. As of today, the amount of direct assistance in Ukraine's and Kazakhstan's banking sectors reaches 5% of GDP, according to S&P's experts.[9] Their national currencies were also unable to withstand the pressure of the financial upheavals and had to be devaluated.

The monetary and banking systems of other countries of this region were better able to cope with this crisis fever. This is partly explained by the underdevelopment of their financial institutions (banks, insurance companies, and so on), the low influence of the current situation in the

[7] The report of U.N. Secretary-General Bang Ki-moon at a U.N. Conference on the Problems of the World Financial and Economic Crisis and its Impact on Development points out this trend (New York, 24-26 June, 2009) (see: *The World Financial and Economic Crisis and its Impact on Development*, Report of Secretary-General, pp. 5-6, available at [http://www.un.org/ga/ econcrisissummit/docs.shtml]).

[8] Standard & Poor's points this out in particular (see: "Kazakh, Russian, and Ukrainian Banks Face Another Tough Year of Poor Asset Quality and Thin Liquidity," *S&P*, 18 May, 2009, available at [http://www.standardandpoors.ru]).

[9] See: "Russia, Kazakhstan, and Ukraine: Counting the Cost of the Crisis," *S&P*, 29 May, 2009, available at [http://www.standardandpoors.ru].

stock markets on the real sector of the economy, and the absence of a developed stock market infrastructure.

Such a differentiated reaction to the global financial and economic crisis also has a certain historical connotation. In this respect, the characteristics of the monetary and banking structures of the CEA countries during their independence is extremely interesting, which will make it possible to ensure an individual approach to their recovery in the context of the continuing cataclysms.

The Restoration of Monetary and Banking Systems in the CEA Countries: Common and Specific Features

An analysis of the collapse of the ruble zone—dissociation of the national currencies of the CEA countries from the Soviet ruble[10]—made it possible to identify common traits and specific features of the establishment of their monetary and banking systems.

During the first years of independence, the political and economic situation in the CEA countries was characterized as extreme, which in turn was aggravated by the undermining financial pressure applied by the Russian Federation which froze the foreign exchange accounts of physical and legal entities in all the post-Soviet republics. During this period the Soviet and then the Russian (federative) ruble circulated for a certain amount of time in the Central Eurasian countries. But Russia began to squeeze these countries out of the circulation sphere of its new currency—the Russian (federative) ruble. Due to the collapse of the clearing payment mechanism, not only external (Union-wide) but also internal economic and production relations began to fold up. Extensive salary arrears gave rise to a noticeable increase in social tension; industrial, agricultural, construction, trade, transportation enterprises and others either dramatically cut back their activity or were simply closed down. The main form of mutual settlement both within each CEA country individually and between them and the Russian Federation was barter. Under these conditions, in order to avoid general chaos, each country had to immediately create its own national currency and banking system.

The common features characterizing the formation of the monetary system of the CEA countries are: the absence of foreign exchange reserves and work experience in market conditions; a shortage of professional personnel; the extremely low level of the legal base; the functioning of a black currency market; an extreme increase in dollarization of the economy; and the absence of systemic relations with international financial institutions.

The following summary of the specific features of the establishment of national currencies in the CEA countries can be suggested:

- In some CEA countries (Ukraine, Belarus, Uzbekistan and Georgia) money substitutes, coupons, and checks, and in Tajikistan, the Russian ruble, were in circulation prior to the introduction of national currencies.
- Political and ethno-territorial conflicts had an influence on the intensity and efficiency of the formation of the monetary and banking systems. The conflicts occurred both within certain countries (the military confrontation of 1992 in Tajikistan that ended in national

[10] For more on these processes, see: E. Ismailov, "National Currencies of the Central Eurasian Countries in the Context of Financial Globalization," in: *Central Eurasia: National Currencies*, CA&CC Press, Stockholm, 2008, pp. 17-20.

reconciliation in 2000, as well as the continuing problem of Georgia's[11] and Moldova's[12] territorial integrity) and between CEA countries (the Armenian-Azerbaijani Nagorno-Karabakh conflict, as a result of which Armenia occupied approximately 20% of Azerbaijan's territory).

- The monetary and banking system of Turkmenistan was formed apart, essentially under conditions of self-isolation and absolute presidential power that ignored objective market mechanisms and the integration trends in the world financial system. In 1990-2006, the Turkmen manat was essentially completely isolated from the international currency processes.
- In some countries of the region (Uzbekistan and Turkmenistan) there is still no free internal conversion of the national currencies, which means that illegal foreign exchange transactions continue to be carried out there at times.
- The large volume of raw hydrocarbon export, due to which the countries in question (Azerbaijan, Kazakhstan, and Turkmenistan) have achieved high economic growth indices in the past few years and formed large international reserves, is having a serious influence on the stabilization of their national currencies.

Let us now take a closer look at the dollarization phenomenon, which has become very widespread in all the CEA countries, although to varying extents (see Table 2).[13]

According to the evaluations of the rating compilers, the highest level of dollarization in the Central Eurasian region is seen in Tajikistan (13), and the lowest in Uzbekistan (5). Azerbaijan (6), along with Ukraine (8), Kazakhstan (7) and Uzbekistan, is in the group of moderately dollarized countries, while other countries of the Central Caucasus, Armenia and Georgia (9), are classified as highly dollarized. It should be noted that the IMF also placed the latter two Central Caucasian states in this group when evaluating the dollarization in developing countries in 1996-2005: according to it, dollarization in them, particularly in the past five years, was higher than 70% (in Georgia more than 80%). Diversification of assets, underdevelopment of the financial markets, and instability of the macroeconomic environment (primarily ongoing inflation and unstable dynamics of the exchange rate), due to which economic agents prefer foreign exchange holdings to national in order to avoid devaluation of savings and exchange risk, are some of the reasons for the rapid growth in the dollarization level in the national economies of these countries.[14] The Asian crisis and economic up-

[11] With respect to the separatist policy of Abkhazia, South Ossetia, and Samtskhe-Javakhetia.

[12] With respect to the separatist policy of Transnistria.

[13] The rating of developing countries and countries with a transition economy in terms of degree of partial dollarization was compiled by the Center of Economic Research of the Moscow International Institute of Econometrics, Information Technology, Finance, and Law according to the method of the U.S. National Bureau of Economic Research. In compliance with this method, the level of dollarization is determined by the percentage of household and company funds kept in international assets and how many loans the state and companies have in foreign currency. The summary index of dollarization is used to evaluate partial dollarization, calculated as the sum of three variables: (1) ratio of bank deposits in foreign currency to the broad money aggregate; (2) ratio of foreign debt to the country's GDP; (3) percentage of debt of the private sector in the country's total external debt. The data bases of Global Development Finance (World Bank), International Financial Statistics and World Economic Outlook database (IMF), and Joint OECD-BIS-IMF-World Bank Statistics as of March 2005 served as the initial data.

[14] See: M. Savastano, "Dollarization in Latin America: Recent Evidence and Policy Issues," in: *The Macroeconomics of International Currencies: Theory, Policy and Evidence*, ed. by P. Mizen, E.J. Pentecost. Edward Elgar, Gloucestershire, 1996; T. Balino, A. Benett, E. Borensztein, "Monetary Policy in Dollarized Economies," *IMF Occasional Paper,* No. 171, 1999; J. Mongardini, M. Johannes, "Ratchet Effects in Currency Substitution: An Application to the Kyrgyz Republic," *IMF Working Paper*, WP/99/102, 1999; S.P. Moiseev, "Ekonomika dollarizatsii," *Digest-Finansy*, No. 10, 2000, pp. 9-13; I. Vetlov, "Dollarization in Lithuania: An Econometric Approach," *BOFIT Discussion Papers*, 2001/1; R.V. Piont-kovskiy, "Dollarizatsia, izmenchivost infliatsii i nerazvitye finansovye rynki v perekhodnykh ekonomikakh," in: Konsortsium ekonomicheskikh issledovanii i obrazovania. Nauchniy doklad No. 03/02, EERC, Moscow, 2003, p. 7; S. Heysen, "Dollarization: Controlling Risk Is Key," *Finance & Development*, Vol. 42, No. 1, March 2005, pp. 44-45.

Table 2

Rating of Dollarized CEA Countries (March 2005)

Summary Index	Countries
Highly dollarized countries	
13	Tajikistan
11	Kyrgyzstan
10	Moldova
9	Armenia, Georgia, Turkmenistan, Belarus
Moderately dollarized countries	
8	Ukraine
7	Kazakhstan
6	Azerbaijan
5	Uzbekistan

heavals in Russia that followed (1997-1998) also helped to maintain the high level of dollarization in the CEA countries, thus giving rise to growing mistrust both in the Russian ruble and in the national currency, although in some of them it was manifested to a relatively lesser extent. The situation was aggravated by the increase in dollarization of the advances portfolio, which was related to receiving loans from international financial institutions for long-term economic development needs.

The measures undertaken in the past few years to improve the monetary and banking system have promoted a partial reduction in the dollarization level in the CEA countries, although the problem of optimizing this level is still pertinent.

So a brief review of rehabilitation of national monetary systems of CEA countries shows that:

- After the disintegration of the Soviet ruble zone new currencies in sovereign CEA states, in particular paper money of various denominations, small change, and jubilee and commemorative coins made from precious metals (platinum, gold, and silver);
- Whereas the security feature of the first paper money was not always satisfactory, subsequently its quality fully met international standards (this applies, in particular, to Azeri, Georgian, and Kazakhstan money)[15];

[15] The evolution of the national currencies in the CEA countries occurred in two stages. At the first stage, that is, during the first years after state independence was gained, full-fledged currencies were put into circulation in Afghanistan, Armenia, Azerbaijan, Kazakhstan, Kyrgyzstan, and Turkmenistan, as well as intermediate currencies in Belarus, Georgia, Ukraine, Uzbekistan, and Tajikistan. They had a low degree of security and during the same period became extremely devaluated due to hyperinflation. The second stage is characterized by redenomination of the currencies, which promoted a qualitative improvement in the monetary economy. In the first group, redenomination was carried out in Afghanistan (October 2002) and Azerbaijan (January 2006), that is, old money was exchanged for new at a rate of 1,000:1 (afghani) and 5,000:1 (manat). In the second group, the first full-fledged national currency was issued in Georgia (September 1995), the lari, with a coefficient of 1,000,000:1, and in Uzbekistan (July 1994), the soum, at a rate of 1,000:1. In Belarus, where in

- As a rule, the names of currency denominations were printed on the banknotes in the national languages; excluding Kazakh tenge and Belarus rubles, where indications are in Russian as well as Georgian lari and Tajik somoni, using also English indications;
- The exchange rates were established with respect to the U.S. dollar; at the same time, other elements of the national monetary economy were introduced, including credit currency (bonds, checks, bills of exchange, etc.), and regulatory documents were adopted that envisaged the system and procedure for organizing and regulating money supply.

Consequently, the foundations for development of monetary and banking systems have formed in the CEA countries over the past seventeen years.

Development of Banking Systems of the CEA Countries Today

The functioning and development of the banking system in the Central Eurasian countries is intrinsically related to the establishment of their banking system. A two-tier model consisting of a central (national) bank (first tier) and commercial banks (second tier) was taken as the basis for creating the banking system. This structure was enforced in corresponding laws, which made it possible for the central (national) banks of the CEA countries to concentrate entirely on regulatory and supervisory functions, thus avoiding purely commercial functions.

The two-tier banking system[16] formed in these countries after they acquired state independence was largely modeled on the standards generally accepted in international practice. This system ensures streamlined payments among all economic entities, redistributes temporarily free monetary resources, and provides an entire range of banking services by means of constant and close interaction in the market among themselves and with the outside world. These components form a single banking system intended for servicing national money circulation.

In order to accelerate the formation of a market banking environment in the CEA countries, the central (national) banks carried out an extremely liberal policy during the first years of independence. The mechanism for issuing licenses for banking activity, the requirements for the size of authorized capital, and the procedural formalities in general were extremely simplified, which promoted the creation of a large number of commercial banks within a short time in the Central Eurasian countries, most of which did not comply with even the elementary standards of banking activity, not to mention international standards. In subsequent years, due to the economic development of the region's countries, more stringent demands were made on local commercial banks, and so most of these banks, unable to withstand the new work conditions, folded up. The transformation and qualitative development of commercial banks is continuing, and as of the beginning of 2009, there were 448 banks in the CEA countries, while only in Azerbaijan and Ukraine in 1994 there were as much.

At present legislation has been drawn up in the CEA countries that determines the legal status of and regulates interaction among the banking system's main participants. The regulatory-legal acts that monitor its activity in the region apply,

1992-2000 20 types of banknotes in 18 denominations were issued, redenomination occurred twice: in August 1994 at a rate of 10:1, and on 1 January, 2000, at a rate of 1,000:1. And, finally, a new national currency was introduced in Tajikistan (October 2000), the somoni, which was converted in relation to the previous Tajik rubl at a rate of 1:1,000. In some CEA countries, the national banks (Georgia and Azerbaijan) introduced their currency in keeping with the concept "A single money family," which met international standards both in design and denomination.

[16] Apart from Afghanistan.

- first, to the central banks,
- second, to the commercial banks and,
- third, to the various entities of the banking infrastructure.

During the years of sovereignty new laws have been adopted in many of these countries—on mortgage and bank deposit insurance—and amendments have been made to foreign exchange legislation aimed at its further liberalization. The laws and regulatory acts relating to banking activity have been drawn up on the basis of models accepted and functioning in Western countries keeping in mind the local specifics in each of the CEA countries. The only exception is Afghanistan, which plans to transfer to a monetary and banking system based on Islamic financing and lending principles. Throughout the entire transformation of the economic and legal foundation of the region's states, banking legislation has been modified and improved in step with the changes occurring in the economy. In many countries, it is no longer the early versions of the corresponding legislation that are in effect. A case in point is Azerbaijan, which has already amended its banking laws three times; in Belarus the first laws were adopted in December 1990, and on 25 October, 2000 they were incorporated into the Banking Code.

Table 3

Banking Network in the Central Eurasian Countries

No.	Region / Country	Number of Banks	Including:		Number of those with a share of foreign capital
			state-owned	private	
	Central Europe				
1	Belarus	33	4	29	25
2	Moldova	16	1	15	15
3	Ukraine	185	2	183	54
	Central Caucasus				
4	Azerbaijan	46	1	45	24
5	Armenia	22	—	22	12
6	Georgia	20	—	20	17
	Central Asia				
7	Afghanistan	16	3	13	5
8	Kazakhstan	37	1	36	18
9	Kyrgyzstan	21	2	19	11

Table 3 (continued)

No.	Region / Country	Number of Banks	Including: state-owned	Including: private	Number of those with a share of foreign capital
10	Tajikistan	12	1	11	3
11	Turkmenistan	11	5	6	2
12	Uzbekistan	29	3	26	5
Total for the CEA:		448	21	427	191

Source: Data collected from the central banks of the CEA countries.

Today the central banks of the CEA countries largely ensure the internal and external stability of the national currency, a steady exchange rate, and development of the banking and payment systems, while they are also determined to prevent inflation upheavals. Along with this, they are engaged in more selective licensing, regulation, and control of the activity of commercial banks and are carrying out a flexible monetary and foreign exchange policy.

Commercial banks hold a special place among the credit institutions. As of the beginning of 2009, as mentioned above, there were 448 such banks, 23 of which are state-owned and 425 private, whereby 191 of the latter have a share of foreign capital (see Table 3).

Transformation of the banking sector in the CEA countries, which was being carried out keeping in mind national specifics and macroeconomic reality, has led to several positive results. The banking systems of most of these countries are playing an increasingly greater role in the national economy. Their commercial sector is characterized by accelerated development that outstrips overall economic growth, and in recent years there has been a significant increase in banking assets, deposits, and capital, as well as in lending in the non-financial sector and to the population.

These processes were being accompanied by enhancement of the institutional base of the CEA banking systems. The banks have begun introducing international standards of corporate management and accounting.[17] The infrastructure of the banking system was being fortified at an accelerated rate: centralized credit registries, national card processing centers, national payment systems, mortgage funds, and bank deposit insurance funds have been created; foreign currency exchanges and stock markets, as well as national depositary centers, are functioning; and the securities markets are consistently evolving. Increased attention is being given to the use of progressive information technology and bank management systems. Most Central Eurasian banks have become members of well-known international payment systems (Reuters and Europay International) and the Society for World Interbank Financial Telecommunications (SWIFT).

Nevertheless, at present, the banking systems in the CEA countries are rather fragmented and the level of their development, as well as the structure and volume of transactions they carry out, differ quite significantly and still lag far behind the European countries with transition economies, not to mention the developed countries. The assets of the CEA banking systems, the total size of which amounted to approximately 268.6 billion dollars at the beginning of 2008 (insignificant by world stand-

[17] Apart from Afghanistan, Turkmenistan, and Uzbekistan, whose banking systems are closed in nature.

ards), are distributed unevenly among them and are characterized by a high degree of concentration. In this context Ukraine and Kazakhstan occupy a leading position, the shares of which are relevantly 44.2% and 36.2% of all the banking assets of the CEA countries. The banks of these CEA countries are consistently building up their financial potential: in terms of size of assets the largest of them are competing with the leading private banks in the post-Soviet and post-CMEA expanses. The banks of Azerbaijan and Georgia are on the up and up. The banking systems of some CEA countries are primarily characterized by a high share of state capital: Uzbekistan and Turkmenistan—more than 90%, Belarus—71.7%. A similar trend, although to a lesser extent, is also seen in Afghanistan. In Moldova, as in Kazakhstan, the largest banks were controlled by national private capital, while in Ukraine the arrival of foreign banking capital is an extremely tempestuous process—most of the largest banks were bought by transnational financial groups. Foreign banks predominate (approximately 50%) in Armenia and Kyrgyzstan. The banking system in Armenia is still very underdeveloped—its assets amount to less than 20% of GDP, which is one of the smallest indices in the CEA. Shares in Kyrgyzstan's leading banks were purchased by Kazakhstani banks, which boosted integration of the banking systems of these countries and promoted acceleration of their socioeconomic development. Due to the absence of a financial market, Tajikistan's banks are still not involved in financial transactions, although an increase has been noted in recent years, and their capital base constitutes a mere 5% of the republic's GDP. As a result, only five of the Central Eurasian countries are represented among the CIS's one hundred largest banks: 21 from Ukraine, 10 from Kazakhstan, 4 from Belarus and one each from Uzbekistan and Azerbaijan.

One of the main indices that is commonly used in international practice to evaluate the level of development of the national banking system with respect to the dimensions of the economy is the ratio of total assets of the banking system to GDP, which shows the level of financial intermediation in the country. An analysis of such coefficients for various CEA states according to the results of 2007 confirms the absolute leadership of Kazakhstan's (93.0%) and Ukraine's (84.1%) banking services in terms of support of the economy, which is much higher than the next two positions occupied by Armenia (67.0%) and Moldova (59.9%). Many Central Eurasian countries have the lowest capitalization indices in the world. The low level of financial intermediation,[18] although it also shows its high growth potential, primarily indicates sluggish money flows, which is due to the informal economy, tradition of making payments in cash, and the population's low level of trust in banks.[19] In other words, the banking systems of the CEA countries are still not performing their direct mission in full. However the ongoing reforms, although they have not raised the systems to a level comparable with the developed countries, are still opening up significant prospects for their growth.

The essential differentiation in the development level of the banking systems of the CEA countries is also manifested in their international rating assessments.[20] According to the data of the largest rating agencies, the risks of these systems are the highest in the world, which, in addition to the abovementioned reasons, is due to the immense increase in the banks' loan debt and the low quality of the advances portfolio. According to the reports of Fitch Ratings,[21] even the most advanced countries in this respect—Kazakhstan, Azerbaijan, and Georgia—have low macro-prudential indices. For example, in 2008, Kazakhstan was given one of the highest risk categories—MPI 3. In Fitch's Systemic

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[18] In several cases, as for example in Azerbaijan, the drop in the financial intermediation and capitalization index was due to the high economic growth rates.

[19] See: "Banking Systems of the CIS Countries: Different Prospects, but the Same Risks," *S&P*, December 2004.

[20] For more detail, see: N. Muzaffarli (Imanov), *Reiting Azerbaidzhana v mezhdunarodnykh sravnitelnykh issledovaniakh*, Kavkaz, Baku, 2006, pp. 364-370; idem, "Comparative Economic Competitiveness of the Central Caucasian States," *The Caucasus & Globalization*, Vol. 1 (4), 2007, pp. 75-76.

[21] See: *Bank Systemic Risk Report*, April 2008, Fitch; *Bank Systemic Risk Report*, September 2007, Fitch, available at [http://www.fitchratings.com].

Risk Matrix, it was classified as having a low level—D3 (the BSI D category). The dependence of Kazakhstan's banking system on foreign borrowing meant that it quickly felt the effect of the global credit crisis. A sharp slowdown in the growth of lending activity is currently observed, although thanks to strong government support, a systemic crisis was avoided. Azerbaijan has been placed in the weakest cell of the matrix MPI 3 and BSI E for several years now, although the agency's analysts say that the saving grace here is the low ratio of lending activity to GDP.[22] Out of CEA countries Georgia is also in this category, although it is in a slightly stronger segment—MPI 2-BSI D. On the whole, the banking systems of these countries remain "unstable" or "very unstable," with a high level of vulnerability in terms of macro-prudential indices and a low ability to counteract the effect of macro-prudential stress factors.[23]

Now it is obvious that in the context of the global financial upheavals the situation in the banking systems of the CEA will significantly change. The world crisis has led to an increase in the cost of funds in the international markets, thus making them out of bounds for many credit organizations. In these conditions, highly integrated systems will suffer the most, primarily Kazakhstan. International rating agencies have already lowered the sovereign rating of Kazakhstan, the banks of which were extremely dependent in their business on borrowing in the debenture markets. The banks of several other Central Eurasian countries (for example, Kyrgyzstan, Moldova, and Ukraine) were also forced to lower their development rates. Experts agree that credit institutions with state participation and a developed deposit base will suffer less from the crisis. However the leading Kazakhstan-Ukraine tandem may not remain a twosome for long since banks from other countries of the region, for example, Azerbaijani, Belarusian, and Georgian, may pull up their socks and reach the level of the CEA's leading credit institutions. The global crisis has had a significant impact on the sovereign lending ratings. Ukraine particularly felt this impact: since mid-2008, Standard & Poor's Credit Rating Service has lowered its rating twice and its forecast is still "Negative." Meanwhile, its forecast for Kazakhstan's ratings was recently changed to "Stable," which was largely explained by the assessment of the measures the Kazakhstan government adopted to limit the number of potential contingent liabilities associated with the problems in the banking system.[24]

During institutionalization of the banking systems of the Central Eurasian countries, systemforming banks were singled out in the structure of each of them: The International Bank of Azerbaijan (Azerbaijan), VTB (Armenia), TBC (Georgia), Kazkommertsbank, BTA Bank (Kazakhstan), The National Bank of Uzbekistan (Uzbekistan), and others. These leading banks in their respective countries have been recognized by the foreign financial community, and their image is confirmed annually by nominations of the main analytical entities of the world banking industry (Euromoney, The Banker, Global Finance). It is precisely the system-forming banks that are first included in the ratings conducted by the main international rating agencies (see Table 4), in which they, as a rule, are given high ratings. In some cases (for example, the International Bank of Azerbaijan), these ratings could be even higher, but they are limited to assessments of the sovereign rating of the CEA countries.

An objective assessment of the economic conditions for running the banking business in the region in keeping with international standards is also presented in the World Bank's country report called

[22] For more detail on international assessments of Azerbaijan's banking system, see: F. Murshudli, "Azerbaijan Banking System: Challenges and Prospects of Globalization," *The Caucasus & Globalization*, Vol. 2, Issue 2, 2008, pp. 79-87; idem, "Mezhdunarodnye otsenki bankovskoi sistemy Azerbaidzhana—vazhnyy indikator ee integratsii v mirovoi finansovyy rynok," *Banki i biznes*, No. 2, 2008, pp. 46-53; V. Fakhri, "Fitch Ratings: Azerbaidzhan vse eshche v spiske autsaiderov mirovoi bankovskoi industrii," *Banki i biznes,* No. 2, 2008, pp. 42-45.

[23] See: *Bank Systemic Risk Report*, April 2008, Fitch; *Bank Systemic Risk Report*, September 2007, Fitch.

[24] For more detail, see: "Russia, Kazakhstan, and Ukraine: Counting the Cost of the Crisis"; "Kazakh, Russian, and Ukrainian Banks Face Another Tough Year of Poor Asset Quality and Thin Liquidity."

Table 4

Activity of International Rating Agencies in the Banking Sector of the CEA Countries[25]

No.	Region / Country	Number of Banks Rated by:		
		Fitch	Moody's	Standard & Poor's
	Central Europe			
1	Belarus	7	6	1
2	Moldova	0	0	0
3	Ukraine	18	34	6
	Central Caucasus			
4	Azerbaijan	6	6	0
5	Armenia	2	4	0
6	Georgia	6	0	1
	Central Asia			
7	Afghanistan	—	—	—
8	Kazakhstan	11	20	10
9	Kyrgyzstan	0	0	0
10	Tajikistan	0	0	0
11	Turkmenistan	0	0	0
12	Uzbekistan	4	3	0

Doing Business 2009, upon which the influential international investors rely. According to this research (see Table 5), in 2008, in terms of such an indicator of the business climate as accessibility of credit information, the best situation developed in Azerbaijan (12th place), followed by Armenia, Georgia, Kyrgyzstan and Ukraine (28th), Kazakhstan (43rd). Other CEA countries—Afghanistan, Tajikistan, Uzbekistan, Belarus and Moldova—lag noticeably behind them in this ranking.

So an analysis of the development of the monetary and banking systems in the CEA countries and the sophisticated assessments of the leading international rating agencies confirms that they have largely already passed through the initial stage of institutionalization, are ready for self-regulation and self-development, have a high growth potential, and are open to integration both within the region and into the global financial structure.

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[25] See: [http://www.fitchratings.com]; [http://www.moodys.com]; [http://www2.standardandpoors.com/portal/site/sp/en/eu/ page. my_homepage].

Table 5

Ranking of CEA Countries in Terms of Accessibility of Credit Information

No.	Region / Country	Ranking	Legal Rights Index	Credit Information Index	Coverage of Borrowers: Public Registry Coverage	Private Bureau Coverage
	Central Europe					
1	Belarus	109	2	5	2.4	0.0
2	Moldova	84	8	0	0.0	0.0
3	Ukraine	28	9	3	0.0	3.0
	Central Caucasus					
4	Azerbaijan	12	8	5	3.1	0.0
5	Armenia	28	7	5	2.6	24.4
6	Georgia	28	6	6	0.0	4.5
	Central Asia					
7	Afghanistan	178	1	0	0.0	0.0
8	Kazakhstan	43	5	6	0.0	25.6
9	Kyrgyzstan	28	7	5	0.0	3.7
10	Tajikistan	172	2	0	0.0	0.0
11	Turkmenistan	—	—	—	—	—
12	Uzbekistan	123	3	3	2.3	2.2

The Central Eurasian Region in the New Architecture of the World Monetary and Financial System

The evolution of the world monetary and financial system has created objective prerequisites for the appearance of new strong currencies that perform monetary functions not only at the national, but also at the international level, as well as for the formation of various currency areas. These processes have led to structural changes in the world financial architecture, that is, to a transfer from the unipolar structure of the world financial system to a multi-polar model, which is the essential developmental characteristic in today's monetary relations. In the current situation, analyzing ways to integrate Central Eurasia's monetary and banking systems into the global financial centers is becoming very important. In so doing, the scenarios will become more diversified, particularly in the countries of regions such as CEA which are currently in search of efficient ways to incorporate into the global monetary and financial system.

Today's monetary and financial environment is also giving rise to very complicated, often contradictory, problems in the monetary and banking sphere which cannot be resolved without taking the new development trends in the world economy into account. The nature of these trends, namely, the increased integration of certain regions (particularly the countries of the European Union, the Persian Gulf, Southeast Asia, and others), as well as the promotion of this process in Central Eurasia, indicated that the dollar-based international monetary system evolving during the post-WWII period,[26] is set to develop toward the emergence of currency counterbalances.[27] The financial crises that have engulfed the world markets in recent years only made the expediency of these processes more obvious, since with the growing instability of the global economy it is better to have several points of reference and diversify investments and reserves.

In this respect, the problem of choosing the main vectors, principles, forms, and methods of interaction of the monetary and banking systems of the CEA states both among themselves and with similar systems of other countries is becoming particularly urgent. The attempts made by the monetary authorities of certain Central Eurasian countries to intensify monetary relations both within the region and with the countries of the EU, APR, South Asia, the Greater Middle East, as well as Russia and the U.S., show that the region's foreign exchange integration could develop in diverse ways. At present, the Central Eurasian states are being drawn very slowly into interregional interaction within the new architecture of the nascent world monetary system, while its geographic vector is still oriented toward the West. The practice of using the dollar and euro in international and partially in domestic payments does not fully meet the demands of sustainable development of the national economies of the CEA countries, increases the risks associated with the outside world, and lowers the effectiveness of foreign trade transactions, which, ultimately, slows down integration of the monetary and banking systems of the region's countries as competitive participants into international monetary relations.

Before moving on to an analysis of the possible scenarios of monetary integration within the CEA's financial and economic expanse, it is worth identifying from the viewpoint of the special development features of this region the main trends in the formation of a contemporary international financial architecture, that is, defining the structural ties and interaction dynamics of its system-forming elements—the leading currencies of the world, in the zone of influence of which are the monetary and banking systems of the Central Eurasian countries.

The globalizing economy and geopolitical expediency have led to the appearance of geo-economic prerequisites in the center of the Eurasian continent for the establishment of a new independent economic regional formation—Central Eurasia (CEA).[28] If we envision the continent in the form of an ellipse and Central Eurasia as its nucleus, it is easy to see that several nations and integration formations are putting financial and economic pressure on it. Diagram 1 shows clear ranking of the lead-

[26] The Bretton Woods currency system (1944-1978).

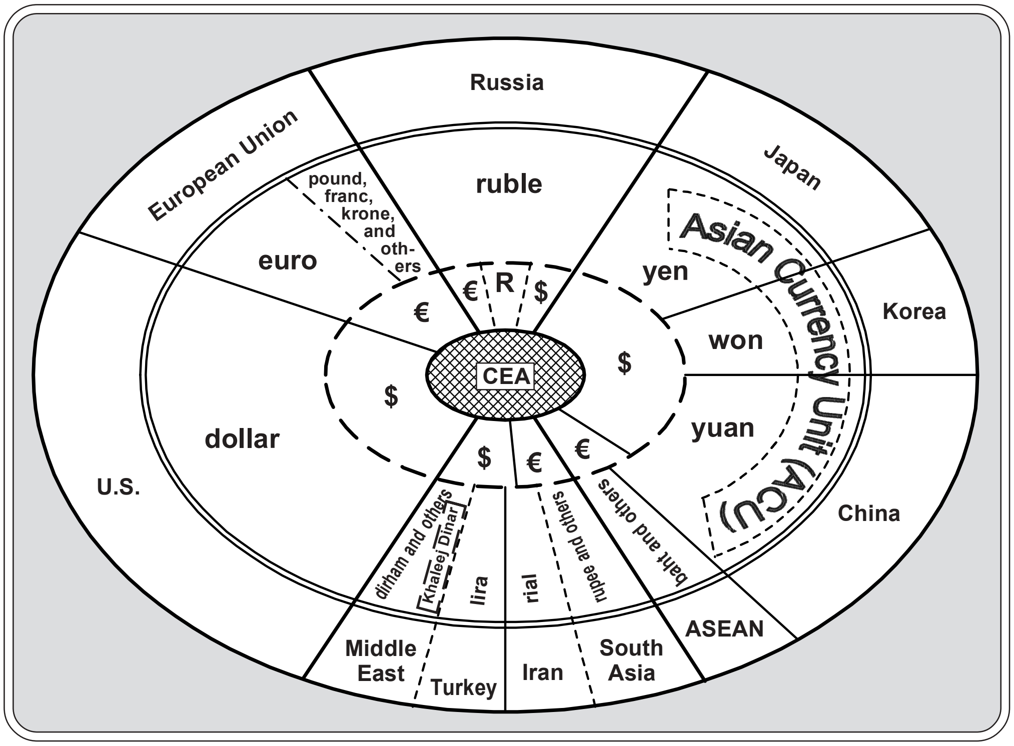
[27] This is particularly pointed out in: M. Ershov, *Ekonomicheskiy suverenitet Rossii v globalnoi ekonomike*, Ekonomika, Moscow, 2005, p. 12.

[28] For more detail, see: E. Ismailov, M. Esenov, "Central Eurasia in the New Geopolitical and Geo-Economic Dimensions," in: *Central Eurasia 2005. Analytical Annual*, CA&CC Press, Sweden, 2006, pp. 11-43.

ing world currencies in terms of the degree and scale of their influence on the development of the foreign economic and foreign exchange activity of the CEU countries.

Diagram 1

The CEA Countries in the Global Monetary Expanse



The largest of these countries and unions, from which the strongest impulses also come, are in the West—in the Euro-Atlantic Region (the U.S., EU, and others)—and in the East—in the Asia Pacific Region (China, Japan, Korea, and others). Both impulses directly affect Central Eurasia. In addition, a local, but powerful, integration impulse is bearing down on the CEA from the north (Russia) and from the south (Iran, Turkey, India) due to their direct proximity and obvious geographical advantages. Along with this, financial and economic ties with the countries of the Middle East and ASEAN have been strengthening in recent years.

As the nucleus of the Eurasian expanse, this geographically united and historically interrelated region has been rapidly transforming and integrating into the global economy since the end of the 1990s. The CEA's advantages are its large supplies of natural riches (oil, gas, gold, and other ferrous metals), relatively well-developed infrastructure (common transportation routes, energy system, joint oil and gas-pipeline network inherited from the former Soviet Union), and human capital, as well as strategically important location at the crossroads between Europe and Asia.[29] It should be noted that

[29] After the collapse of the Soviet Union, the CEA states became an active hub at the meeting point of the three super civilizations (the Western-Christian, the Muslim, and the Chinese-Confucian) (see: S.P. Huntington, *The Clash of Civilizations and the Remaking of World Order*, Simon & Schuster, New York, 1996, 368 pages).

this region largely possesses the necessary resources and development potential to become a self-producing entity of the world economy. But full-fledged implementation of its planetary (geopolitical and geo-economic) function in the 21st century presumes the establishment of stable and efficient land ties both along the West-East horizontal and the North-South vertical.[30] In other words, the countries of the Central Eurasian region have been called upon to develop foreign trade and monetary and financial relations both latitudinally (with the countries of the Euro-Atlantic and Asia Pacific regions) and longitudinally (with Russia, Turkey, Iran, Pakistan, India, and the Middle Eastern countries).

At present, the Central Eurasian region has not reached the level of an independent object-subject of world finances nor has it clearly designated its own development trajectory in the geofinancial system of coordinates. The sociopolitical problems of most of its countries are still being resolved, and in geopolitical terms, the main political and financial players are still vying for their place in the balance of power. This continues to be a source of tension, not to mention the urgent problem of cooperation with the Central Eurasia's main economic partners—Russia, the U.S., the EU, China, Japan, as well as Turkey, Iran and India—whose interest in the region is primarily aroused by its geopolitical and geo-economic potential. The Central Eurasian countries are the main zones of their currency influence. Relations between the Central Eurasian countries and these nations are not equal due to the differences in territory size, geographic location, strategic and economic importance, development demands, political orientation, and interest in integration into the world economy, which have all caused a significant lack of coordination at the level of foreign exchange interrelations with entities of the world financial community.

The currencies, like commodities, are competing among themselves. When the movement of capital is liberalized, competition between currencies increases and the stronger currencies squeeze out the weaker ones, whereby not only from the global, but also from the regional market. More than that, the domestic foreign exchange market is protected to a certain extent by the policy of the monetary authorities. Due to the fact that the capacity of the world's currency markets[31] is much higher than that of the commodity markets, the main competition between countries is played out precisely in the global foreign exchange market. So the foreign exchange market is not so much economics as geopolitics. This is why many regional and world states strive to predominate on the world monetary and financial expanse, including on the Central Eurasian.

It should be noted that for many centuries political, economic, and foreign exchange rivalry with respect to the region mainly developed longitudinally, that is, between Russia, on the one hand, and Iran, Turkey, and India, on the other. At the end of the 20th century, the U.S., China, Japan, Korea, and European Union, Middle East, and ASEAN countries joined them, which dramatically transformed the financial-economic expanse of the region and the principles of its functioning and integration.

Keeping in mind the multi-vector political and financial-economic cooperation forming between the CEA countries and the world and regional nations and unions, it is expedient to give a general financial-economic description of the Central Eurasian region. The CEA states have rich natural and human resources and a sufficiently large underdeveloped market, the consumer potential of which is steadily rising along with the simultaneous increase in foreign direct investments in the region's economy, which is indicative of the high attraction not only of its commodity and raw material, but also financial market.

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[30] For more detail, see: E. Ismailov, "Central Eurasia: Its Geopolitical Function in the 21st Century," *Central Asia and the Caucasus*, No. 2 (50), 2008, pp. 7-29.

[31] In 2007, the average daily turnover of exchange transactions in the world market topped 3.2 trillion dollars (see: "Triennial Central Bank Survey: Foreign Exchange and Derivatives Market Activity in 2007," in: *Bank of International Settlements,* December 2007, p. 4).

The CEA region, which is comprised of 12 states, covers an extensive territory—about 5.7 million sq. km. with a population of approximately 162.3 million people. In 2007, the total GDP in the countries of this region, keeping in mind the purchasing power parity (PPP), amounted to approximately 842.0 billion dollars, while foreign trade turnover reached 301.4 billion dollars. The foreign direct investment stock (FDI stock) in the region topped 110.6 billion dollars. The total external debt reached 203.7 billion dollars, while international reserves amounted to 78.6 billion dollars. Ukraine's economy appears to be the most developed and accounts for 38.2% of GDP (PPP), 36.5% of the foreign trade turnover, 34.4% of the FDI stock, and 41.3% of the CEA's international reserves. Then follows Kazakhstan with 20.0%, 26.7%, 39.2%, and 22.4%, respectively. Only Azer-baijan, Kazakhstan, Turkmenistan, and Uzbekistan have a positive foreign trade balance. In terms of the per capita GDP (PPP) index, only four countries—Belarus, Kazakhstan, Azerbaijan and Ukraine—exceed its average regional level by 111.0%, 108.9%, 46.8%, and 34.3%, respectively. At the same time, Kazakhstan and Ukraine have a largest share in the region's external debt—47.3% and 33.9%, respectively.

A comparison of the main indices characterizing the socioeconomic potential of the CEA, on the one hand, and the global and regional nations and active integration groups, on the other, shows that this region lags significantly behind most of them in terms of its human, partially territorial, and particularly production resources (see Table 6).

So, Central Eurasia is 15.0-fold, 7.3-fold, and 57.6-fold larger in terms of territory and 1.3-fold, 2.4-fold, and 3.4-fold in terms of population than Japan, Turkey, and South Korea, respectively, although it lags behind them in terms of GDP (PPP) production 5.1-fold, 1.1-fold, and 1.4-fold, respectively. A perceptible unfavorable difference is seen in terms of GDP (PPP) between the CEA and the U.S., EU, China, Japan, India, ASEAN, Russia, and the Middle East.

Keeping in mind the main functions of international currency—payments in international trade transactions, international private investments, and the state's international reserves, it is worth analyzing the development trends in the foreign trade relations of the CEA countries, their investment interaction, as well as the structure of international reserves.

CEA's main trade partners are the EU, Russia, and China. The following three countries hold much less significant places—Turkey (4.7%), the U.S. (3.4%), and the Middle East (2.4%). The list of trade partners of significance is rounded off by Iran (1.9%), Pakistan (0.9%), Korea (1.2%), Japan (1.1%), ASEAN (1.1%), and India (0.9%). It should be noted that although the U.S.'s percentage in the region's international trade structure is insignificant, most of the foreign trade contracts (particularly the largest—oil) and settlements on export-import transactions are carried out in dollars (approximately 50%).[32] A similar ratio is characteristic of the structure of foreign direct investment into the economy and of the international reserves of most CEA countries. Nevertheless, a somewhat different picture has emerged in certain states of the region. For example, the national banks of Kyrgyzstan and Kazakhstan have greatly diversified the structure of their foreign exchange portfolio of reserve assets: in 2005, in addition to the customary dollar (48.3% and 84.0%, respectively) and euro (16.5% and 6.3%), Swiss francs (3.7% and 1.0%), British pounds Sterling (3.3% and 2.5%), Australian (7.9% and 0.7%) and Canadian dollars (20.3% and 0.7%) were incorporated into it. In Azerbaijan and Georgia, a bicurrency basket of international reserves formed at the same time consisting of American dollars (85% and 75%, respectively) and euros (15% and 25%). In 2007, the percentage of dollar reserve assets decreased in Kyrgyzstan to 28.6%, whereas in euros and pounds Sterling it rose, vice versa, to 32.3% and 11.6%. In Azerbaijan, the international reserve portfolio was supplemented by a third currency

[32] Exceptions are non-oil contracts with EU countries, as well as, partially, settlements with Russia. For example, according to experts of Dresdner Bank, the percentage of euros in servicing world export approximately corresponds to the export volume of the European Union countries in the total volume of world export (see: [http://www.dresdner-bank.de]).

Table 6

Main Indices of CEA, World, and Regional Nations and Associations, 2007

Indices / Regions	Territory[33]		Population[34]		GDP (PPP)[35]	
	thou. sq. km	percent	million people	percent	$bn	percent
CEA	5673.2	100	162.3	100	842.0	100
U.S.	9,826.6	173.2	302.0	186.1	13,807.6	1,639.9
EU (27)	4,324.8	76.2	494.0	304.4	14,754.2	1,752.3
Russia	17,075.2	301.0	142.1	87.6	2,089.6	2,48.2
Japan	377.8	6.7	127.8	78.7	4,292.2	509.8
South Korea	98.5	1.7	48.5	29.9	1,201.9	142.7
China	9,597.0	169.2	1,321.1	814.0	7,034.8	835.5
ASEAN	4,495.6	79.2	574.6	354.0	2,585.5	307.1
India	3,287.6	58.0	1,169.0	720.3	2,996.6	355.9
Pakistan	803.9	14.2	158.2	97.5	410.3	48.7
Iran	1,648.0	29.1	71.7	44.2	757.5	90.0
Turkey	780.6	13.8	68.9	42.5	885.9	105.2
Middle East*	4,756.9	83.9	197.,6	121.8	1,925.4	228.7

* Without Iran.

and looked as follows: dollars—60%, euros—30%, and pounds Sterling—10%. Georgia still has a bicurrency basket, only the proportion of their distribution changed: dollars—65%, euros—35%. A total of 99.2% of the Belarus' structure of international reserves until mid-2006 consisted of the SDR[36] currencies (dollars—63%, euros—25%, other currencies—12%),[37] but during the later periods the assets in Russian rubles (since September 2006) and Chinese Yuan (since October 2007) were included therein.[38] As for FDI, a non-standard example can be given in the form of Kyrgyzstan, which received a few loans in yuan from China to implement several investment projects.

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[33] See: *CIA-2008 The World Factbook*.
[34] See: *World Economic Outlook Database*, October 2008.
[35] Ibidem.
[36] SDR currencies: U.S. Dollar, Euro, U.K. Pound, Japanese Yen.
[37] See: [http://www.president.gov.by/press24211.html]. Acceptable technical deviations within 3%.
[38] See: [http://www.nbrb.by/press/?action=search].

So, the natural, human, and economic potential of CEA is already being actively tapped in the world trade and economic and monetary and financial processes. Nevertheless, the foreign trade and monetary turnover structures are extremely different. For example, in 2007 the EU (41.9%), Russia (30.1%), and China (10.3%) were the main foreign trade partners, and the U.S. accounted for only 3.4% (other countries for 14.3%), while the monetary turnover structure looks approximately as follows: dollars—50.0%, euros—40.0%, Russian rubles—9.0%, and other currencies—1.0%. Despite the fact that these ratios constantly change in one direction or the other, this variability is the basis of sustainable and long-term socioeconomic development of the region's countries and allows them to efficiently perform their geo-economic and geofinancial functions. Their implementation in the context of the increasing degree of openness of the economies and liberalization of monetary relations of the CEA countries, however slow the process may be, makes an analysis of the development potential of the leading international currencies and the dynamics of their interaction important for determining the vectors and principles of the integration of the national currencies into the global financial system.

Main Integration Axes in Monetary and Financial Space of CEA

As they developed, international currencies consistently strove to circulate in an increasingly extensive area and reinforce their position. As mentioned above, when the ruble zone fell apart, the currencies began to assimilate the newly formed and free monetary and financial expanse of the CEA countries. This process, in turn, had a perceptible impact on the existing interrelations among the leading international currencies in the global financial markets. They began to form their own currency configurations in these markets, that is, different correlations started to take shape among the world, regional, and local currencies. The weakest are the local currencies, which applies to the Central Eurasian countries. These currencies also proved to be the most vulnerable in the context of financial crises.

Due to the tough competition among the leading global currencies in both the domestic and the foreign markets, the monetary authorities of the CEA countries are faced with the difficult task of reinforcing the security of the newly formed national monetary and banking systems. Today foreign exchange integration is one of the most efficient and long-term ways to strengthen national currencies. An analysis of the integration processes in the global monetary and financial expanse with respect to the development interests of the CEA countries reveals four main foreign exchange areas. In two of them (along the main West-East axis) freely usable currencies and strong local currencies are in use, while in the other two (along the North-South axis) only currencies with restricted convertibility circulate.

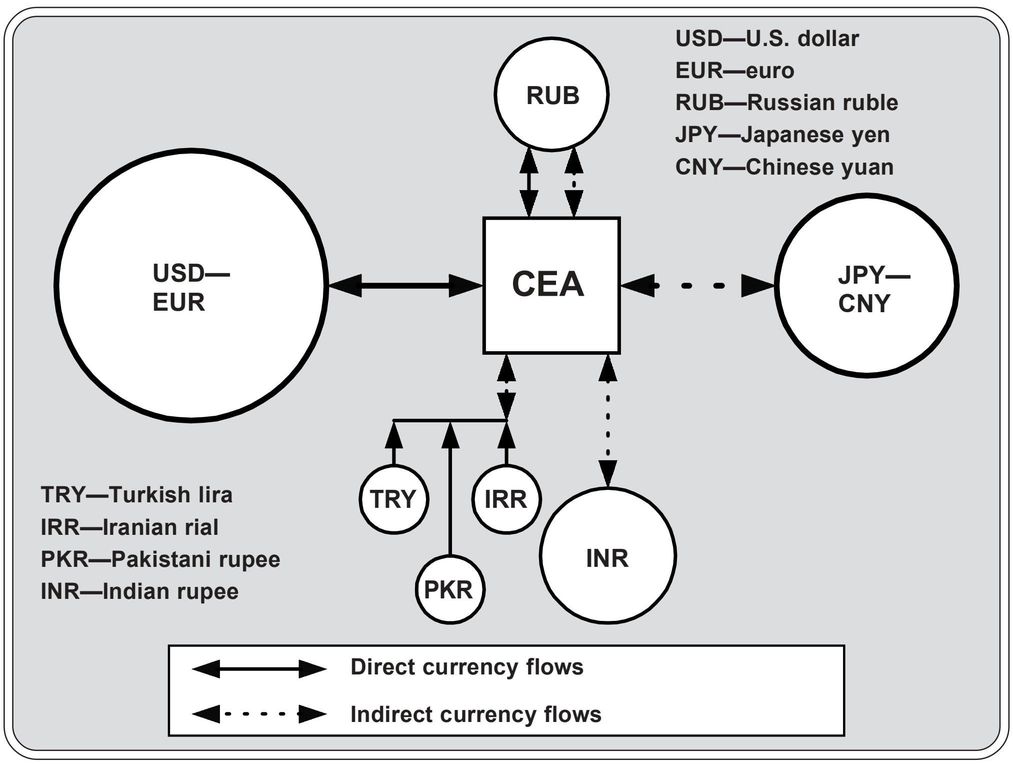
The integration processes in the Central Eurasian monetary and financial expanse are manifested in different vectors and are at different stages of development. It should be noted that the interregional monetary integration level is much lower than the external level. This is mainly due to the lack of coordination among the general country development objectives, the related economic interests, and the ways to achieve them on the basis of which the integration efforts of this group of states could be consolidated, although, as noted above, the region has all the objective prerequisites for this. The different ways to accomplish economic and monetary integration of the Central Eurasian countries are making it possible to diversify the scenarios for its implementation in today's conditions. Each of these alternatives is self-sufficient and requires independent study. On the other hand, it should be kept in mind that in the context of financial globalization[39] and the membership of certain CEA countries in the WTO, their choice of the most attractive monetary poles on which to place the main stakes in foreign exchange relations is becoming extremely important.

A comparative analysis of the possible integration scenarios of the monetary and banking systems of the CEA countries leads us to conclude that they differ from one another in terms of objectives, prerequisites required for their formation, mechanisms, and sets of financial tools. Below we will take a look at the main tasks to be solved as the different vectors of foreign exchange integration are brought to fruition.

The national monetary and banking systems were established in the CEA countries under emergency conditions. As the situation stabilized, the monetary authorities began to develop their foreign exchange relations both within the region itself and along all the main axes in the latitudinal (West-East) and longitudinal (North-South) directions (see Diagram 2). This was because the region's countries wanted to realize their socioeconomic and political interests jointly and create conditions for the

Diagram 2

Main West-East and North-South Currency Axes



[39] In this case, we are regarding globalization as the *result* of the previous stages of the foreign economic activity of states, regions, and continents, on the one hand, and as a *specific phase* in the rapprochement and interdependence of national economies, on the other.

smooth and unproblematic integration of their national monetary and banking systems into the global financial space.

The gradual waning of the U.S. dollar's dominating role in the international financial architecture made it extremely pertinent to create monetary unions in certain regions of the world that encompass specific geographic areas within which one collective currency circulates in keeping with coordinated and unified regulations. These monetary unions can be joined into two different groups—national and international.[40] They differ in terms of the political and legal foundations on which the regional monetary and banking system functions. For example, whereas national monetary unions imply a single political-economic and foreign exchange expanse with a centralized monetary authority,[41] international unions comprise of monetary and banking systems with their own national borders and commodity-money relations are managed in a decentralized way. In other words, in international monetary unions the central banks of the sovereign states jointly draw up monetary and foreign exchange policy.[42]

The creation of a monetary union and corresponding common (collective) currency has always been accompanied by a large number of risks. According to R. Mundell's studies, if a monetary union is not created according to the principle of an "optimum currency area," the members of such a union could experience various economic upheavals, and some of them could even serve as the source of such upheavals.[43] A currency area is a group of two or more sovereign states with closed monetary relations that arose as the result of one of three forms of integration (monetary, financial, or political) or their combination. Within an optimum currency area, one collective currency or several national currencies are used as the common means of payment, the exchange rates of which are tied to one another under conditions of complete convertibility and fluctuate in a coordinated way in relation to the currencies of the other countries.

A systemic analysis of the integration processes in the CEA monetary and financial expanse presumes,

- first, identifying how ripe and economically expedient the situation is for creating a monetary union of Central Eurasian states,
- second, establishing the sequence, principles, and forms of participation of the region's countries in these currency areas located along the main axes, and,
- third, evaluating the advantages and disadvantages of such monetary unions for the CEA countries.

In order to determine the prospects for monetary integration within the Central Eurasian Region, it is important to establish how this group correlates to the requirements of an optimum currency area (OCA).[44] Although, as noted above, CEA in the 21st century is geopolitically and geo-economically ripe for an acceleration in interregional socioeconomic integration, including with respect to curren-

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[40] See: M.D. Bordo, L. Jonung, *An Analysis of the Long-Run Behavior of the Velocity of Circulation*, Transactions Publishers, New Brunswick, London, 2003; idem, *Lessons for EMU from the History of Monetary Unions*, The Institute of Economic Affairs, London, 2000.

[41] For example, the U.S.S.R. and the U.S.S.R. State Bank.

[42] For example, in the Scandinavian Monetary Union the central banks of Sweden, Norway, and Denmark had a single currency unit—the Scandinavian krone, whereby each of them issued its own krone that freely circulated in the Union member states.

[43] American economist R. Mundell developed a theory of optimal currency areas at the beginning of the 1960s (for more detail, see: R.A. Mundell, "A Theory of Optimum Currency Areas," *American Economic Review*, Vol. 51, LI, 1961, pp. 657-665).

[44] The theory of optimum currency areas elaborated by R. Mundell was developed in the works of R.I. McKinnon, P. Kenen, E. Tower, T.D. Willet, *et al*. (see, in particular: R.I. McKinnon, "Optimum Currency Areas," *American Economic Review*, Vol. 53, LIII, 1963, pp. 717-725; P. Kenen, "The Theory of Optimum Currency Areas: An Eclectic View," in: *Monetary Problems in the International Economy*, University of Chicago Press, Chicago, 1969, pp. 41-60; E. Tower,

cy, the extent to which the development level of this group of countries corresponds to the necessary prerequisites and criteria for forming an OCA must still be assessed. If this assessment is positive, the principles and sequence of steps for moving in this direction must be identified.

Let us take a look at the main prerequisites of an OCA in the context of their applicability to the countries of the Central Eurasian region:

1. Mobility of production factors. Central Eurasia experiences significant restrictions on the movement of both manpower and capital. The border-crossing regimes, migration policy, and investment cooperation of the region's countries still fall far short of the requirements expected of state formations striving for economic and monetary integration. For example, it is impossible to move from one CEA country to another with an internal passport. The movement of capital does not enjoy any privileges either. The volume of mutual investment of the Central Eurasian countries constitutes a small percentage of the total foreign investment, although their absolute volume has significantly increased. For example, the share of Kazakhstan, the most active CEA country in terms of investment cooperation, in foreign investments in Azerbaijan's basic assets was a little bit higher than 0.04% in 2008.[45] This index for Georgia amounted to 4.4% of the total FDI in 2007, while the share in Azerbaijan's FDI in the Georgian economy constituted 2.1%.

   Such passive cooperation of the CEA countries in the investment sphere is due to their low investment potential, on the one hand, and low profitableness of the investment climate in some Central Eurasian countries, on the other, when potential investors encounter undeclared state protectionism. The low mobility of production factors in the region is a significant obstacle to creating a monetary union, since when the monetary authorities are unable to conduct an independent monetary and foreign exchange policy there is a sharp increase in the negative impact of asymmetrical shocks on the economy of the integrating countries. In recent years, interregional mobility of production factors has become more dynamic.

2. Development level of reciprocal trade relations. In most cases, this index is no more than a single digit, while in some (for example, export of the Central Caucasian countries to Uzbekistan and Kyrgyzstan, or of Tajikistan and Kyrgyzstan to the Central Caucasian countries) it amounts to tenths of a percent. In addition, bilateral trade is coming up against several reciprocal tariff and non-tariff restrictions. Throughout CEA as a whole, interregional foreign trade relations fall far short of the necessary requirements for an OCA. Nevertheless, in recent years, stable foreign trade relations have been developing at an accelerated rate between certain countries: for example, between Azerbaijan and Georgia (in 2007, 31.7% and 29.3% in export, respectively), between Armenia and Georgia (24.7% and 23.6%, respectively) and between Tajikistan and Uzbekistan (38.0% and 14.1%, respectively).

3. Similar institutional forms of management. The institutional lack of correspondence among the management mechanisms of the CEA countries, which is manifested in different approaches to the management of their national economies, is very evident. For example, whereas Belarus, Uzbekistan and Turkmenistan still maintain significant state control over the main sectors of production, in other countries of the region market methods prevail.

4. Diversification of production. The products of many branches are non-competitive in the world markets. The export of most CEA countries mainly consists of raw materials and is limited to a small range of commodities. The low diversification of the branch structure of production

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T.D. Willett, *The Theory of Optimum Currency Areas and Exchange Rate Flexibility. Special Papers in International Economics*. International Finance Section, Princeton University, Princeton N.J., 1976).

[45] Calculated on the basis of the following data: *Statistical Yearbook of Azerbaijan 2007*, Sada, Baku, 2007, p. 495.

in the CEA countries makes them extremely vulnerable to outside shocks and aggravates the consequences that accompany them.

5. Financial integration. The development level of the integrated foreign exchange market in the CEA countries is extremely low, and it is also encountering several administrative restrictions. On the whole, the financial markets are underdeveloped and are characterized by a low level of liquidity. Interaction in the regional banking and stock markets, although it is growing, it still very low.[46] In turn, the insufficient liberalization of the foreign exchange market is limiting the possibility of liberalizing the trade and financial markets. For example, whereas in Kazakhstan, Armenia, and Kyrgyzstan, all restrictions on capital transactions have been removed, Turkmenistan and Tajikistan apply the strictest requirements to them; while in the other CEA countries a moderately liberal regime functions. Uzbekistan and Turkmenistan even still apply some restrictions to the current account convertibility.

6. Synchronicity of economic dynamics. The absence of a serious difference in the dynamics of GDP, inflation, and foreign exchange rates, and the level of financial interaction is one of the main quantitative parameters predetermining the prospects for a monetary union. An analysis of the synchronicity of economic dynamics in the 2000s shows that Azerbaijan is way ahead of the field in terms of GDP growth index,[47] followed at a good distance by Armenia and Kazakhstan. A similar situation has also developed with respect to industrial production growth rates, only Tajikistan takes the place of Armenia here. In terms of inflation rates (2001-2007; at the end of the period), Belarus (365%), Uzbekistan (253%), Tajikistan (224%), and Moldova (206%) are out in front, followed by a close-knit group consisting of Ukraine (184%), Kazakhstan (179%), Turkmenistan (174%), Azerbaijan (168%), Georgia (161%), Kyrgyzstan (152%), and Armenia (130%).[48] The differences in GDP and inflation rates increased in 2007-2008 due to the world financial crisis in keeping with how well the Central Eurasian countries are adapting to it. On the whole, the inflation rates are still relatively high here. There is also a significant difference in the dynamics of the real exchange rates of the national currency in relation to the dollar, which naturally complicates the transition to a common currency in the context of foreign trade dynamics. Whereas in Azerbaijan and Turkmenistan the national currency is steadily becoming stronger, in Tajikistan, Kazakhstan, Armenia, Ukraine and Belarus there was devaluation in 2009.

7. Level of political integration. It terms of monetary integration among the CEA countries, political will is extremely important in creating a monetary union. As R.S. Greenberg rightly notes, "political interest is manifested not only in the willingness to transfer to a common currency, but also in assuming the corresponding commitments."[49]

In addition to the above-listed prerequisites for an OCA, the criteria of monetary integration are also important. Per capita GDP in terms of purchasing power parity is one of the particularly important criteria. For example, in 2007, there was a 5.9-fold difference between the maximum

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[46] For more detail, see: A.A. Abalkina, "Bankovskoe vzaimodeistvie stran SNG," in: *Predposylki, problemy i perspektivy finansovogo vzaimodeystviia na postsovetskom prostranstve*, The Center for Globalization and Integration Problems, Institute of Economics, Russian Academy of Sciences, Moscow, pp. 46-66; E.A. Kliushova, "Vzaimodeystvie uchastnikov i organizatorov fondovogo rynka v SNG," in: *Predposylki, problemy i perspektivy finansovogo vzaimodeystviia na postsovetskom prostranstve*, pp. 67-90; E. Ismailov, F. Amirbekov, "Kavkazkaia universalnaia birzha: mekhanizm intergratsii Tsentralnogo Kavkaza," *Izvestia of the Georgian Academy of Sciences*, Vol. 11, No. 4, 2003.

[47] There are no corresponding data for Turkmenistan.

[48] *IMF—World Economic Outlook Database*, October 2008.

[49] R.S. Greenberg, "Perskpektivy valiutnoi integratsii na postsovetskom prostranstve," in: *Formirovanie integratsionnykh ob'edinenii stran SNG: finansovyy, valiutnyy, bankovskiy aspekty*, Finansy i statistika, Moscow, 2006, p. 179.

(Belarus—10,949 dollars) and minimum (Tajikistan—1,843 dollars) value of this index[50] in the region. Other criteria of regional conversion, in addition to the inflation factor mentioned above, should be singled out, i.e. budget deficit dynamics. The achievements of recent years have made it possible for several CEA countries (Azerbaijan, Moldova, and Kyrgyzstan) to reach a budget surplus. At the same time, in some other countries (Armenia, Georgia, and Tajikistan) a rather high budget deficit is seen.

All of this shows that the current situation in the Central Eurasian region does not in general correspond to the necessary prerequisites and criteria for creating an OCA. This process is still at the initial stage. But the positive trends observed in recent years in all the above-mentioned vectors give rise to the hope that in the long term an international monetary union could be created in the region among a few of its states.

When determining the priorities and sequence of steps to be taken in achieving monetary and financial integration we should proceed from the region's geo-economic and geopolitical function in the international financial and economic system. At the turn of the new century, the CEA countries acquired the opportunity, geopolitically, to establish their financial and economic relations along the main West-East and North-South axes at the same time.

An analysis has shown that the strongest magnetism for the Central Eurasian region comes from the currency area formed by the countries in the latitudinal direction: the main financial and investment flows in the CEA region are passing along the main West-East axis. It is precisely this axis that is the most promising from the viewpoint of monetary integration of the CEA countries into the global financial system. We know that the freely usable currencies in the Western area (the dollar and the euro) and the freely usable (the yen) and strong local currency (the yuan) in the Eastern area have competitive relations both between themselves and between their regional pairs—the dollar-euro[51] and yuan-yen[52]—which determine the main development trends of the current global monetary and financial system.

Along with its circulation in its own monetary and financial space, the dollar-euro currency tandem functions rather efficiently in all the other regions of the planet, while the yuan-yen tandem mainly functions in the East (APR). It should be noted that the financial and investment potential of the Eastern area is currently no less significant than the Western, and the growth rate of the Asian currency tandem in the world financial markets is higher than that of the Euro-Atlantic tandem. While the dollar and the euro were fortifying their position in the post-ruble zone, the yuan and yen were consistently squeezing them out of the APR, and today Japan and China have all the levers of influence on the region's financial flows and have created a financial and investment base for their subsequent advance into other regions, including into CEA. The leading countries of the Eastern area have already begun to act dynamically in CEA's economic space, but their currencies are still only indirectly related to the financial and investment activity of the region's countries. They are also jointly initiating the creation of a common collective Asian currency—the ACU.[53]

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[50] See: *CIA-2008 World Factbook*.

[51] See: M. Chinn, J. Frankel, "The Euro May Over the Next 15 Years Surpass the Dollar as Leading International Currency," available at [http://ksghome.harvard.edu/~jfrankel/EuroVs$-IFdebateFeb2008.pdf], 13 February, 2008; J. Frankel, "The Euro Could Surpass the Dollar within Ten Years," available at [http://www.voxeu.org/index.php?q=node/989], 18 March, 2008; V.Ya. Pishchik, *Evro i dollar SShA. Konkurentsiia i partnerstvo v usloviiakh globalizatsii*, Konsaltbankir, Moscow, 2002; R. Mundell, *The Euro and the Stability of the International Monetary System*, Columbia University, January 1999, § 6.

[52] See: *Debating China's Exchange Rate Policy*, ed. by M. Goldstein, N.R. Lardy, Peterson Institute, Washington, 2008, 399 pp.; D. Burton, A. Zanello, "Asia Ten Years Later," *Finance&Development*, Vol. 44, No. 2, June 2007, pp. 22-25; *N.G. Shchegoleva, R.G. Malsagova*, *Kollektivnye valiuty: sovermennaia arkhitektura i tendentsii razvitiia*, Market DC, Moscow, 2006, 288 pp.; A. Prakash, "Envisioning a Single Asian Currency," *International Herald Tribune*, 28 March, 2006; H. Kuroda, *The Rises and Falls of Currencies*, Tokyo, 2005 (in Japanese); *Japan and China: Cooperation, Competition and Conflict*, ed. by G.H. Hilpert, M. Gurian, Palgrave Macmillan, Hampshire, 2002, 233 pp.; R. Taylor, *Greater China and Japan: Prospects for Economic Partnership in East Asia*, Sheffield Centre for Japanese Studies/Routledge Series, London, 1996, 228 pp.

[53] The possibility of creating an Asian currency unit was expressed by President of the Asia Development Bank H. Kuroda (see: H. Kuroda, op. cit). In his opinion, efforts should be made in this direction as the region moves toward eco-

The situation that has developed on the latitudinal axis of the foreign exchange markets is characterized by close interaction between the above-mentioned currency tandems, which, in turn, are regulating and controlling the integration processes in the foreign exchange markets of the West and East. Based on these fundamental trends of monetary integration, R. Mundell justified the need for creating a new international monetary system which should be based on an international monetary union in the West—the U.S. and EU—and in the East—Japan. Consequently, he offered a specific action plan for introducing a new Eurasian currency—INTOR—consisting of the dollar, euro, and yen,[54] which would give the world a new universal means of international price comparison and a world area of price and currency stability. In our opinion, taking into account China's current financial and economic potential, as well as its role in the Asia Pacific Region, the possibility of including the Chinese yuan in INTOR on a par with the Japanese yen should be considered.

Based on current monetary and financial relations, the countries of Central Europe and Central Caucasus are strongly drawn to the Western currency area, while Central Asia is under the influence of the Eastern. But since there is a tendency toward equalizing the gravitational pull of these currency areas and toward possibly creating an international monetary union between them with a common Eurasian currency—INTOR, integration of the CEA countries into the global financial space may be balanced in both directions.

The financial and investment potential of the areas located on the main North-South axis, although they are much smaller in size than the areas on the West-East axis, is nevertheless sufficiently high for the CEA countries. This is because for many centuries, right up until the end of the 20th century, they had direct developed commodity-money relations with the regional states in the south—Iran, Turkey, and India—and with Russia in the north.

Despite the fact that the financial and investment potential of the southern area is much higher than that of the northern, the integration impulses coming from the north are quite strong at present. Most of the CEA countries (apart from Georgia and Afghanistan) belong to the CIS, while Russia, after announcing its desire to achieve full convertibility of the ruble, is striving to recreate a national monetary union with the CEA countries. However, keeping in mind the active involvement of the CEA countries in the main West-East axis, the chances of recreating the ruble zone in the near future are very low, since the Russian ruble, which current reality shows, is under strong pressure from the currencies of the indicated areas.

The formation of three international currency areas can be seen in the south:

1) the Arab countries of the Persian Gulf[55];

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nomic integration, including the establishment of a free trade area. This currency unit will be a currency index of 13 countries of the ASEAN+3 countries (member states of the ASEAN plus Japan, China, and South Korea). In addition to quotings, according to H. Kuroda, the index will express the GDP level, foreign trade volume, and level of participation in international settlements. As the countries of this group integrate (in the future Hong Kong and Taiwan may also join), the ACU will become a single Asian currency which could eventually become as strong as the euro (see: A. Prakash, op. cit.).

[54] See: R.A. Mundell, "The Case for a World Currency," *Journal of Policy Modeling*, Vol. 27, Issue 4 (June), 2005, pp. 465-475. This plan comprises three stages: 1) stabilization of the dollar, euro, and yen exchange rates (establishment of ceilings and floors on the exchange rates of these currencies in relation to each other); 2) strict fixation of the dollar, euro, and yen exchange rates, creation of a currency unit DEY (Dollar, Euro, Yen) and of a common central bank based on a basket of these currencies (with specified weights) in order to carry out a single monetary policy in the region aimed at achieving price stability, preliminarily coordinated with the FRS, European Central Bank, and Bank of Japan with respect to a common index for measuring inflation and a mechanism for distributing seigniorage; 3) introduction of a global currency (R. Mundell called it INTOR) that could be calculated on the basis of a world basket including several (but no more than five) of the world's leading and most stable currencies, in particular on the basis of the DEY unit, with the possibility of adjusting the composition of the currencies in it.

[55] See: M. Josh, "Gulf States to Adopt a Single Currency? Casting a Wary Eye at Europe, Members of the Gulf Cooperation Council are Moving forward Plans to Adopt a Common Currency," *Business & Finance*, May 2002, available at [http://goliath.ecnext.com/coms2/summary_0199-1685468_ITM]; *Ekspert Kazakhstan*, No. 16 (164), 21 April, 2008; *The Georgian Times*, 19 June, 2008.

2) the Economic Cooperation Organization (ECO)[56]; and

3) based on the Indian rupee.

The most attractive option for CEA is the ECO international monetary union where some progress, although very insignificant, has been made. In particular, questions of monetary cooperation between the CEA countries and Turkey, Iran, and Pakistan are being actively discussed. However, participation of the CEA countries in this monetary union looks even less likely than restoration of the ruble zone.

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So this analysis shows that during the CEA countries' sovereign development, stable national monetary and banking systems have formed that are actively interacting with the main monetary poles of the world economy located along the main West-East and North-South axes. Further study of the trends in monetary integration within this region will make it possible for the monetary authorities to choose an optimal development trajectory for their national monetary and banking systems in the context of world financial and economic crises.

[56] All the CEA countries, apart from Georgia and Armenia, belong to the ECO.