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Economic Prospects for Central, East and Southeast Europe

Leon Podkaminer, Josef Pöschl et al.

The Big Boom is Over, but Growth Remains Strong and Inflation Calms Down



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Executive summary

The countries of Central, East and Southeast Europe were hit by the external price shock that swiftly resulted in a rapid surge in domestic prices for food and energy. This initial impulse was then followed by further price adjustments that have pushed up inflation levels overall in 2008. The Special section of the report argues that the worldwide hike in energy and food prices in the period 2007-2008 has been primarily a supply-side shock caused by production shortfalls that can be traced back to weather conditions or specific factors restricting production. These shortfalls might well have triggered intense speculation, thus compounding market turbulence. Rising demand in the fast-growing emerging markets and the expanding biofuel sector, however, has played a marginal role in inducing global price hikes. Another round of negative global price shocks is unlikely in the near future. On the contrary, there are good grounds for expecting a return to tranquillity or even some measure of decline in major commodity prices. Authorities in the countries of Central, East and Southeast Europe seem to be taking the current acceleration of inflation in an unusually light manner. Some of the countries in the region (those on fixed-exchange regimes) lack the means to respond. Others respond weakly (if at all) because they expect a growth slowdown and harbour concerns over the continuing appreciation of local currencies. In the longer term, inflation and unit labour costs are shown to be moving in tandem, at least in the new EU member states (NMS). Rising real wages in those countries will not incur much of an inflationary risk as long as roughly matched by gains in labour productivity. As this holds true on the whole for the NMS, their longer-term inflation prospects are pretty good. Price-wage spirals are not expected to spin out of control. In the absence of another round of worldmarket price shocks, inflation in the NMS will subside fairly quickly. In the West Balkans, the inflationary spike will also be overcome relatively swiftly. Disinflation, however, will be slower in Russia, Kazakhstan and Ukraine, given that it will be starting from much higher levels than elsewhere.

GDP growth in the **NMS** has been slowing down somewhat, with more pronounced (and long overdue) adjustments in the Baltic countries (in particular **Estonia** and **Latvia** – Table I). The slowdown is generally more moderate than commonly expected and cannot be directly linked to

storms on the global financial or commodity markets. Growth in the NMS appears to be largely decoupled from negative global impacts although, of course, they feel the (transient) effects of global price or supply shocks. The resilience of the NMS derives from growing labour productivity partly offsetting the combined effects of appreciating currencies and rising wage costs. The semi-sovereign monetary policies pursued in the major NMS (excluding the Baltic countries, Bulgaria, Slovenia and – soon – Slovakia) bear many risks, yet on the whole they have proven effective in preventing the rise of both excessive credit booms and real appreciation.

In **Bulgaria**, sound GDP growth is likely to continue in the next two years, driven by solid domestic demand and improving export performance. Fixed investment is set to remain robust, boosted by massive FDI. Labour shortages will pose constraints to higher growth and feed inflationary pressures. The growth slowdown in the **Czech Republic** has domestic roots – among them the shock due to fiscal reform. In 2009 and 2010 some effects of the shock will wear off. But a renewed acceleration of growth is not guaranteed. If the cuts in corporate taxes prove effective in speeding up the pace of fixed capital formation, the overall growth may become impressive again. With the hardest part of the fiscal consolidation in **Hungary** behind, economic growth will pick up modestly in the second half of the year. While net exports will remain the driving force of growth, household consumption will already recover this year. Investment will expand as major EU co-financed projects will be launched over the year. A good harvest will help attain 2.5% annual GDP growth. The current political stalemate blocks public finance reforms which are necessary to secure a sustainable fiscal stance for the medium and long run.

In Poland, the growth slowdown is due to less vigorous growth in investments. Foreign trade has been performing better than expected. This trend will continue for some time. The strong rise in wages expected under fairly tight labour markets will be conducive to continuing fast growth but fiscal and social policies will not support the return of growth as high as before. The Romanian economy registered record GDP growth in the first quarter of 2008, and continues to be somewhat overheated. Depreciating the currency and increasing interest rates proved unable to cool matters down. Wage surges, remittances and credit booms are fuelling aggregate demand and increasing inflation. There is no abrupt turnaround in sight. The next government to come to power after the elections later this year will have to introduce stabilization measures and cut back on the consumption race next year. Ongoing improvements in economic fundamentals characterize the recent developments in Slovakia. The central parity of the domestic currency appreciated by 28% during the past two and a half years and Slovakia will adopt the euro at the beginning of 2009. Foreign investment enterprises are the major driving force behind the high first-quarter GDP growth. The competitiveness of Slovak exports continues to rely on low wages. However, the real appreciation is stronger than in the neighbour countries. The country's external position will deteriorate and economic growth will slow down in the years to come. In Slovenia, fighting inflation remains the major economic policy issue. So far external factors have affected the price dynamics most, while wages rose only moderately. After the record high GDP growth in 2007, growth will return to a more standard rate of about 4% in the years to come. Growth in private consumption is likely to remain stable, while government expenditures are expected to decline after the election year. The outcome of the parliamentary elections in September will only have a minor impact on the country's future economic policy.

Estonia and **Latvia**, equally hit by a slump in the real estate market, face not only a fall of investments but also a dramatic deterioration of household consumption in 2008. The burden of overvalued currencies furthermore puts pressure on exports and industrial production. Both countries will experience slow economic growth close to stagnation in 2008 and 2009, while a pick-up is expected to take place in 2010, driven by revived consumer sentiments. In **Lithuania** the situation is still more favourable. The housing market, as well as exports, foster overall economic growth in 2008. Thereafter, internal demand is likely to slow down, due to a reduction in the growth rate of mortgage loans. Though domestic demand is cooling down, high inflation will remain a persistent problem for the Baltic countries in the medium term.

The economies of the candidate and potential candidate countries in Southeast Europe continue to catch up vis-à-vis the EU. **Southeast Europe** (SEE-7: Albania, Bosnia and Herzegovina, Croatia, Macedonia, Montenegro, Serbia and Turkey) has turned into a high-growth region in recent years, but some deceleration of growth has become visible there too. The slowdown was most pronounced in **Turkey** after several year of very high growth. We reckon with an improving international business climate and expect the SEE-7 to return to higher growth by the year 2010. The inflationary process has calmed down, but is still a matter of concern especially in **Serbia** and **Turkey**, the two countries where that process was accompanied by currency depreciation against the euro. The countries are faced with higher bills for imports of energy and food, so that the gap in the current account has widened. Unemployment is high, a fact that will not change substantially during the next few years.

In Albania, the inflation rate has been accelerating recently, albeit at a slower pace compared to other countries in the region. The government plans to increase public sector wages and pensions in order to offset the increase in food prices. A recent IMF mission to Albania was strictly opposed to these plans. Rising inflation and decelerating growth in the construction sector as well as in loans to the economy pose certain risks to continued high growth. That notwithstanding, we forecast GDP growth in 2008 - 2010 of the order of 6.0% per year. For **Bosnia and Herzegovina**, signing the SAA on 16 June 2008 opened the gateway to EU membership. It offers opportunities for faster economic development with more external assistance. Making the best of these opportunities will call for major efforts, since adequate preparations have been lacking to date. As for the current economic situation, we can observe a slight slowdown in growth in tandem with higher prices. However, growth is likely to pick up speed again, while inflation has already started slowing down. Croatia's GDP growth will decelerate from a high level to an average 4-5% in the period 2008-2010. Inflation will moderate only gradually; real wage growth has come almost to a halt in 2008 and is expected to remain moderate. EU entry talks are envisaged to be completed by the end of 2009, accession is expected for 2011. The current account deficits will widen in the coming years, since the surplus in services trade (tourism) will not suffice to offset growing deficits in goods trade. Macedonia's GDP growth looks sustainable now after years of underperformance. In the short run, the key will be the inflow of foreign investments. In the medium run, growth should accelerate due to improved regional prospects. In Montenegro, growth acceleration has brought some macroeconomic imbalances, which should not prove to be a problem in the short run. In the medium run further structural and macroeconomic adjustments will be necessary. Political instability in Serbia has negatively impacted macroeconomic balances. In the short run, fiscal adjustment will be necessary to bring inflation down. In the medium run, further structural reforms will be conducive to high growth.

In **Turkey**, inflation climbed to over 10% and real GDP growth fell to 4%. Dependence on all kinds of capital inflow is high, given the need to cover the current account deficit. Unfortunately, political tensions make it difficult to secure the trust of financial markets. In the past, Turkey's economy has frequently demonstrated an ability to recover rapidly; it should be able to display that skill this time round as well. Economic fundamentals have improved and the country will remain an attractive address for all kinds of investors.

The key early 2008 news from **Russia** were the oil price nearing USD 150 per barrel, the new President Dmitry Medvedev and the new Prime Minister Vladimir Putin. The economy has been booming largely owing to surging energy prices and export revenues. The wiw forecast for Russian GDP growth in the coming years is closer to the official 'intermediate' scenario which reckons with ongoing reliance on the (modernized) energy sector, possibly with a few high-tech niches, and an average annual GDP growth setting down at around 6% in 2010. The expected growth slowdown appears inevitable, at least until the end of the decade, before any (uncertain) modernization efforts start to bear fruit.

Ukraine's economy keeps performing well, largely on account of the booming household consumption backed by expanding credit and generous social transfers. The dramatic surge in food prices has driven consumer inflation to above 31% in May; however, inflationary pressures should subside in the second half of 2008, not least thanks to the expected good grain harvest. The immediate growth prospects are good; although economic growth is increasingly home-driven, the widening external imbalances are generally covered by strong inflows of FDI, which are likely to pick up further following the country's recent WTO accession.

Banking sector problems remain central to the economic development of **Kazakhstan**. Kazakh banks have to repay sizeable external debts in 2008, while they still face difficulties with access to external financing; at the same time the banks have seen a deterioration in their assets' quality. On the positive side, the government has sufficient financial resources to withstand the crisis. More severe problems resulting from the banking crisis forced us to reduce our GDP growth forecast: in 2008 GDP will increase by 5.5% only, in 2009 and 2010 growth will speed up to 6.5% and 7% respectively. We revised our inflation forecast downwards primarily due to higher efficiency of the government anti-inflationary policy, which has included a broad spectrum of measures.

In **China**, the fast economic growth has cooled down just moderately and probably the slowing down of the global economy will have a significant impact only in the months to come. But because of rapidly rising prices, China's policy makers will have to balance measures to fight inflation against the weakening economic outlook.

Keywords: Central and East European new EU member states, Southeast Europe, Balkans, former Soviet Union, China, Turkey, economic forecasts, GDP growth, labour productivity, exchange rates, inflation, EU integration

JEL classification: O52, O57, P24, P27, P33, P52

Overview developments 2006-2007 and outlook 2008-2010

	GDP real change in % against previous year			chan	Consumer prices change in % against previous year				Unem	Unemployment, based on LFS ¹⁾ rate in %, annual average					Current account in % of GDP					
	2006	2007	2008	2009 Forecas	2010 st	2006	2007	2008 I	2009 Forecas	2010 t	2006	2007	2008	2009 Forecas	2010 st	2006	2007	2008	2009 Forecas	2010 st
Czech Republic Hungary Poland Slovak Republic Slovenia <i>NMS-5</i> ²⁾³⁾	6.8 3.9 6.2 8.5 5.7 6.1	6.6 1.3 6.6 10.4 6.1 6.0	4.7 2.5 5.5 7.5 4.3 5.0	5 3.4 5.3 6 4.3 5.0	5 4.3 5 4.8 5.0	2.5 3.9 1.0 4.5 2.5 2.1	2.8 8.0 2.5 2.8 3.6 3.5	6 6.6 4 3.8 6 4.9	2.8 3.8 3.5 5 3.2	2.5 3.0 2.6 3.5 3.5 2.8	7.1 7.5 13.8 13.3 6.0 <i>11.4</i>	5.3 7.4 9.6 11.0 4.9 8.5	5.0 7.8 9 10 5 8.1	5 7.8 10 4.7 7.6	4.5 7.5 8 9 4.6 7.3	-3.2 -6.0 -2.7 -7.0 -2.8 -3.7	-2.5 -5.0 -3.7 -5.3 -4.9 -3.9	-3.0 -4.5 -4.7 -5.4 -4.3 -4.4	-2.5 -4.2 -5.4 -6.0 -3.7 -4.6	-2.5 -4.0 -4.9 -7.0 -3.4 -4.4
Bulgaria	6.3	6.2	6	6	6.2	7.3	8.4	12	8	5	9.0	6.9	6.0	5.6	5.2	-17.8	-21.5	-20.0	-18.5	-16.6
Romania	7.9	6.0	6.5	5	6	6.6	4.8	8	7	5	7.3	6.4	6.0	6	6	-10.4	-14.0	-14.6	-14.3	-13.0
Estonia	11.2	7.1	0.5	2	4	4.4	6.6	11	8	7	5.9	4.7	5.5	6.5	8	-15.5	-17.4	-9.9	-9.9	-10.2
Latvia	12.2	10.3	2.5	1	4	6.5	10.1	17	14	10	6.8	6.1	6.5	7	8	-22.5	-22.9	-16.9	-14.5	-14.6
Lithuania	7.7	8.8	6	5.5	5	3.7	5.7	11	9	10	5.6	4.3	4.5	4.5	5	-10.8	-13.7	-14.1	-12.9	-14.8
<i>NMS-10</i> ²⁾³⁾	6.6	6.2	5.2	<i>4</i> .9	5.2	3.2	<i>4</i> .3	6.3	<i>4</i> .6	3.7	10.0	7.7	7.3	7.0	6.8	<i>-</i> 5.9	-7.0	<i>-7.1</i>	<i>-7.1</i>	-6.9
EU-15 ³⁾⁴⁾ EU-25 ²⁾³⁾ EU-27 ²⁾³⁾	2.9 3.2 3.3	2.7 3.0 3.1	1.7 2.0 2.1	1.5 1.8 1.9		2.2 2.2 2.3	2.1 2.3 2.2	3.2 3.4 3.6	2.2 2.4 2.5		7.7 8.2 8.2	7.0 7.2 7.1	6.8 7.0 6.9	7.0 7.1 7.0	7.0 7.0 7.0	-0.14 -0.40 -0.52	-0.10 -0.41 -0.59			-
Croatia	4.8	5.6	4.2	4.5	5	3.2	2.9	5.5	4	3.5	11.1	10.0	9.8	9.4	9	-7.9	-8.6	-8.0	-8.0	-7.4
Macedonia	4.0	5.1	5	6	6	3.2	2.3	6	3	3	36.0	34.9	35	34	33	-0.9	-3.1	-3.2	-3.0	-2.7
Turkey	6.9	4.5	4.0	5	6	9.6	8.8	10.5	9	7	9.9	9.9	12	11	9	-6.1	-5.8	-6.3	-5.6	-5.2
Albania ⁵⁾	5.5	6.0	5.8	6.0	6.1	2.4	2.9	4.1	3.1	3.0	13.6	14.0	13	12	11	-6.5	-10.5	-9.8	-10.1	-10.8
Bosnia & Herzegovina	6.7	6.0	4.5	5	6	6.2	1.5	6.5	2.5	2	31.1	29.0	29	28	27	-8.4	-13.1	-13.4	-12.1	-10.8
Montenegro	8.6	8.2	6	6	6	3.0	4.2	5	3	3	29.6	19.0	18	18	19	-24.7	-41.6	-29.6	-22.4	-21.9
Serbia	5.7	7.5	5	5	5	11.7	7.0	12	10	8	20.9	18.8	21	23	23	-12.0	-16.9	-13.5	-12.3	-11.1
Kazakhstan	10.6	8.7	5.5	6.5	7.5	8.6	10.8	11	9.5	9	7.8	7.0	7.5	7	6	-2.4	-6.9	-4.1	-3.8	-3.0
Russia	7.4	8.1	7.3	6.8	6.0	9.7	9.1	15	13	9	7.2	6.1	5.8	5.5	5.5	9.6	6.1	4.5	0.4	-1.1
Ukraine	7.3	7.6	6.5	6	6	9.1	12.8	18	14	10	6.8	6.4	6.4	6.6	6.8	-1.5	-4.2	-6.3	-5.8	-5.3
China ⁶⁾	11.1	11.9	10	9.7	10	1.5	4.8	7	6	5	4.1	4.0	4.3	4.3	4.2	9.4	10.7	8.7	7.7	6.9

Note: NMS: The New EU Member States.

1) LFS - Labour Force Survey. - 2) wiw estimate. - 3) Current account data include flows within the region. - 4) Consumer prices refer to Euro area (15 countries) from 2007. - 5) Registered unemployment rate, end of period. - 6) Registered urban unemployment rate, end of period.

Source: wiiw (June 2008), Eurostat; forecasts: wiiw, European Commission (Spring 2008) for EU-15 and Euro area (15 countries).

Table I

Central and East European new EU member states (NMS-10): an overview of economic fundamentals, 2007

	Bulgaria	Czech Republic	Estonia	Hungary	Latvia	Lithuania	Poland	Romania	Slovak Republic	Slovenia	NMS-10 ¹⁾	EU-15	EU-27 ²⁾
GDP in EUR at exchange rates, EUR bn	28.90	127.92	15.55	101.09	19.86	28.02	308.70	121.27	54.84	33.54	839.7	11439.9	12300.5
GDP in EUR at PPP, EUR bn	72.70	207.73	23.85	160.71	32.81	50.21	517.78	215.32	91.80	45.29	1418.2	10901.1	12300.5
GDP in EUR at PPP, EU-27=100	0.6	1.7	0.2	1.3	0.3	0.4	4.2	1.8	0.7	0.4	11.5	88.6	100.0
GDP in EUR at PPP, per capita	9490	20120	17770	15980	14420	14880	13580	10000	17000	22430	13889	27765	24893
GDP in EUR at PPP per capita, EU-27=100	38	81	71	64	58	60	55	40	68	90	56	112	100
GDP at constant prices, 1990=100	118.3	140.3	165.1	140.3	128.7	124.3	169.0	127.2 ³⁾	157.1	160.8	152.8	142.5	144.1
GDP at constant prices, 2000=100	146.0	136.8	177.1	130.0	183.5	170.6	131.7	151.2	152.5	134.0	139.4	114.6	117.0
Industrial production real, 1990=100	98.3	131.1	122.7	233.9	66.7	70.9	204.0	82.1 ³⁾	149.9	117.2	161.8	129.5	130.7
Industrial production real, 2000=100	185.4	161.4	187.9	154.6	142.0	183.9	157.4	141.3	160.1	130.7	156.4	113.0	113.0
Population - thousands, average	7660	10326	1342	10056	2276	3376	38121	21538	5399	2019	102111	392625	495933
Employed persons - LFS, thousands, average	3253	4922	655	3926	1119	1534	15240	9353	2357	985	43345	174563	218648
Unemployment rate - LFS, in %	6.9	5.3	4.7	7.4	6.1	4.3	9.6	6.4	11.0	4.9	7.7	7.0	7.1
General gov. expenditures, EU-def., in % of GDP	37.8	42.4	33.7	50.1	38.0	35.6	42.4	36.9	36.9	43.3	41.6	46.1	45.8
General gov. revenues, EU-def., in % of GDP	41.2	40.8	36.9	44.6	38.0	34.3	40.4	34.4	34.7	43.2	39.6	45.3	44.9
Price level, EU-27=100 (PPP/exch. rate)	40	62	65	63	61	56	60	56	60	74	59	105	100
Compensation per employee ⁴⁾ , monthly, in EUR	299	1069	1037	1129	797	773	794	764	856	1793	839	3304	2821
Compensation per employee, monthly, EU-27=100	10.6	37.9	36.8	40.0	28.2	27.4	28.1	27.1	30.3	63.6	29.7	117.1	100.0
Exports of goods in % of GDP	46.6	69.7	52.0	67.9	29.9	44.7	34.1	24.2	76.7	59.0	47.0 ⁵⁾	29 .5 ⁵⁾	31 .1 ⁵⁾
Imports of goods in % of GDP	72.1	66.4	69.0	66.5	54.4	59.3	37.8	38.8	77.8	63.9	52.3 ⁵⁾	29.7 ⁵⁾	31 .7 ⁵⁾
Exports of services in % of GDP	16.0	9.6	20.5	12.1	13.5	10.6	6.8	6.3	9.4	12.3	9.0 ⁵⁾	9.3 ⁵⁾	9 .4 ⁵⁾
Imports of services in % of GDP	12.1	8.1	14.3	10.9	9.9	8.4	5.8	6.1	8.6	9.2	7.7 ⁵⁾	8.2 ⁵⁾	8.3 ⁵⁾
Current account in % of GDP	-21.5	-2.5	-17.4	-5.0	-22.9	-13.7	-3.7	-14.0	-5.3	-4.9	-7.0 ⁵⁾	-0.1 ⁵⁾	-0.6 ⁵⁾
FDI stock per capita in EUR	3252	6612	8414	6606	3182	2977	2900	1914	5900	4000	3700		

NMS-10: Bulgaria, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Slovak Republic, Slovenia. PPP: Purchasing power parity.

1) wiw estimates. - 2) wiw estimates, except: budget and compensation per employee. - 3) 1989=100, which in the Polish case is the appropriate reference year. - 4) Gross wages plus indirect labour costs, whole economy, national account concept. - 5) Data for NMS-10, EU-15 and EU-27 include flows within the region. *Source:* wiw, AMECO, Eurostat.

Table II

Southeast Europe: an overview of economic fundamentals, 2007

	Croatia	Macedonia	Turkey	Albania	Bosnia and Herzegovina	Montenegro	Serbia	NMS-10 ¹⁾	EU-15	EU-27 ²⁾
GDP in EUR at exchange rates, EUR bn	37.50	5.55	478.67	7.95	10.71	2.42	29.67	839.7	11439.9	12300.5
GDP in EUR at PPP, EUR bn	58.57	14.88	760.67	16.96	23.39	5.65	64.06	1418.2	10901.1	12300.5
GDP in EUR at PPP, EU-27=100	0.5	0.1	6.2	0.1	0.2	0.05	0.5	11.5	88.6	100.0
GDP in EUR at PPP, per capita	13190	7280	10290	5390	6080	9040	8660	13889	27765	24893
GDP in EUR at PPP per capita, EU-27=100	53	29	41	22	24	36	35	56	112	100
GDP at constant prices, 1990=100	119.7	106.9	265.2	171.7	485.0 ³⁾			152.8	142.5	144.1
GDP at constant prices, 2000=100	139.8	117.3	139.7	148.9	141.9	134.9	146.6	139.4	114.6	117.0
Industrial production real, 1990=100	89.9	57.2	214.8			<u>.</u>		161.8	129.5	130.7
Industrial production real, 2000=100	140.0	108.3	140.1	176.1	172.0	115.5	115.9	156.4	113.0	113.0
Population - thousands, average	4440	2045	73894	3150	3846	625	7400	102111	392625	495933
Employed persons - LFS, thousands, average	1600	590	21253	935 ⁴⁾	850	217	2656	43345	174563	218648
Unemployment rate - LFS, in %	10.0	34.9	9.9	14.0 ⁴⁾	29.0	19.0	18.8	7.7	7.0	7.1
General gov. expenditures, nat. def., in % of GDP	48.6	34.6	20.9 5)	29.0	42	27.2	42.6 ⁶⁾	41.6 ⁵⁾	46.1 ⁵⁾	45.8 ⁵⁾
General gov. revenues, nat. def., in % of GDP	46.3	35.3	19.6 ⁵⁾	25.6	44	31.8	41.2 ⁶⁾	39 .6 ⁵⁾	45.3 ⁵⁾	44.9 ⁵⁾
Price level, EU-27=100 (PPP/exch. rate)	64	37	63	47	46	43	46	59	105	100
Average gross monthly wages, EUR at exchange rate	961	395	739 ⁷⁾	277 ⁸⁾	480	497	484 ⁹⁾	839 ⁷⁾	3304 ⁷⁾	2821 ⁷⁾
Average gross monthly wages, EUR at PPP	1500	1059	1175 ⁷⁾	591 ⁸⁾	1048	1159	1044 ⁹⁾	29.7 ⁷⁾	117.1 ⁷⁾	100.0 7)
Exports of goods in % of GDP	24.5	44.0	17.2	9.9	28.9	25.9	21.7	47.0 ¹⁰⁾	29.5 ¹⁰⁾	31.1 ¹⁰⁾
Imports of goods in % of GDP	49.7	65.2	24.4	36.4	67.5	88.8	43.3	52.3 ¹⁰⁾	29.7 ¹⁰⁾	31.7 ¹⁰⁾
Exports of services in % of GDP	24.5	10.5	4.4	17.8	9.1	27.8	7.2	9.0 ¹⁰⁾	9.3 ¹⁰⁾	9 .4 ¹⁰⁾
Imports of services in % of GDP	7.6	9.9	2.2	17.6	3.9	9.7	7.2	7.7 ¹⁰⁾	8.2 ¹⁰⁾	8.3 ¹⁰⁾
Current account in % of GDP	-8.6	-3.1	-5.8	-10.5	-13.1	-41.6	-16.9	-7.0 ¹⁰⁾	-0.1 ¹⁰⁾	-0.6 ¹⁰⁾
FDI stock per capita in EUR	6841	1200	1338	727	1200	3556	1338	3700		

NMS-10: Bulgaria, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania, Slovak Republic, Slovenia. PPP: Purchasing power parity - wiw estimates for Albania, Bosnia and Herzegovina, Montenegro, Serbia.

1) wiw estimates. - 2) wiw estimates, except: budget and compensation per employee. - 3) 1995=100. - 4) Employment and unemployment by registration. - 5) EU definition: expenditures and revenues according to ESA'95, excessive deficit procedure. - 6) Serbia: year 2004. - 7) Gross wages plus indirect labour costs, whole economy, national account concept. - 8) Public sector. - 9) Including various allowances. - 10) Data for NMS-10, EU-15 and EU-27 include flows within the region.

Source: wiiw, AMECO, Eurostat.

Leon Podkaminer*

Inflation speed-up: moderate and short-lived in the NMS, more pronounced and protracted elsewhere

Is inflation raising its ugly head again?

The initial years of the transition to a market economy, which in certain former 'socialist' countries in Central and Eastern Europe started back in 1989-1990 (only to be followed by 'late reformers' in the former Soviet Union and the Balkans some years later) were marked by mega-inflation (verging on hyperinflation in some cases) in the wake of prices being liberalized and national currencies devalued. Within a couple of years, initial ('transitional') inflation was overcome, essentially everywhere. The methods adopted by individual countries to combat (and then check) inflation were different - and the methods applied evolved as well. The early 'home-made' methods took on such forms as imposing administrative restrictions on wage and price increases, withholding or delaying the payment of pensions and salaries, for example, to public-sector employees or engineering shortages of liquidity in the banking sector. They were eventually replaced by less crude (and more effective) methods that relied basically on manipulating interest rates or exchange rates, including fixing them against 'hard currencies' (US dollars or German marks). Pegging domestic currencies to the 'hard currencies' proved particularly effective in reducing excessive inflation, but less so once inflation had fallen to more moderate, single-digit, levels. In any event, until very recently the war on inflation (which in most cases was quite costly despite being conducted with less crude methods¹) seemed to have been won everywhere (or at least was on the verge of being won). Doubts, however, had already begun to surface a few years earlier in the light of the experience in a number of countries (Bulgaria and the three Baltic countries) where protracted acceleration of real growth had been accompanied by accelerating inflation.² Given the fact that those countries lack the power to pursue an independent full-fledged monetary policy, their inability to manage inflation has been of rather limited relevance to most other transition countries. (Of course, that experience is still of relevance to other countries in the West Balkans which have adopted a currency board, or fixed exchange rate regime). Other transition countries - especially those that adhere to inflation targeting (notably the Czech Republic and Poland) - could, until recently, boast of simultaneity: rapid GDP growth (and wage growth as well) in tandem with very low inflation. That is no longer the case. Inflation in those two countries (and all remaining countries in Central and Eastern Europe) flared up

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¹ The interest rate policy can be cruel too – e.g. as when a 22% interest rate is set to counter inflation rising from 7 to 10%. (This is not a hypothetical case, but one example of Poland's monetary policy in 2000).

² A large theoretical and empirical literature has developed claiming that inflation (in excess of the levels observed in the EU) is a natural 'equilibrium' phenomenon to be expected in the fast-growing new EU member states. The core principle of that literature is the so-called Balassa-Samuelson Effect (BSE). However, in conceptual terms, the BSE is rather weak. Moreover, the recent econometric studies claim to have handed in a 'final obituary notice' to the BSE. Currently another defence of high inflation in the catch-up countries is advanced. Such inflation is seen to reflect major improvements (otherwise not measurable) in the 'quality' of goods produced.

in 2007. The question is whether we are witnessing a return to permanently high inflation or suffering a transitory shock that will be soon overcome. To our mind, the issue has largely to do with an external inflationary shock that is unlikely to be repeated in the near future. Moreover, it is claimed that that the effects of the shock – both inflationary and real – will fade away relatively soon, without necessarily doing much harm to the countries of Central and Eastern Europe.

Inflationary acceleration since mid-2007: the nasty side of globalization?

Since the beginning of the 1980s, inflation across the globe (and definitely in the OECD countries) has followed a generally declining trend. (For instance, in 1981 average inflation in the EU [at that time roughly equivalent to the present euro area] was more than 12% as against 1% in the euro area in 1999). This successful global disinflation can be attributed to many diverse (although sometimes interdependent) developments. One can perhaps mention a change in central bank policies (shifting away from targeting monetary aggregates to making aggressive use of high interest rates³) or the tendency to beat the trade unions into submission. With supplies of cheap manufactured goods produced in low-wage countries (primarily China) rising worldwide, globalization has often been considered one of factors behind the global disinflation⁴. Ironically, it now looks as though the current rise in global inflation is also a side-effect of globalization (see Figure 1).

However, we should first take a look at the facts. In mid-2007, consumer price inflation started to accelerate sharply – not only in the majority of transition countries, but also in the 'old' EU, the United States, other OECD countries and elsewhere. Quite generally, acceleration has been associated with the rapidly rising prices of energy consumed by households (including motor fuel) and foodstuffs (processed and unprocessed combined, see Figure 2). The phenomenon is commonly considered to be global in character not only on account of its geographical extent, but also because its root causes are often believed to have much to do with deepening economic globalization (i.e. worldwide liberalization of international trade and cross-border capital movements). Specifically, the continuing strong growth of major emerging markets (China and India among others) and their unassuaged appetite for energy (among other commodities) was seen to be responsible for upsetting the long-established and relatively stable global equilibrium between demand for and supply of major globally traded energy carriers.⁵

Eventually, the emerging disequilibrium was to unleash an upward surge in world market prices of crude oil, followed by those of other energy carriers, including natural gas. The prospect of fuels

³ The average nominal short-term interest rates in the euro area stood at 17% in 1981 – and less than 3% in 1999.

⁴ The role of globalization in supporting worldwide disinflation has been challenged (see e.g. the memo 'Globalization and inflation: impacts unlikely to be large and permanent', written for the European Parliament: (www.europarl.europa.eu/activities/committees/editoDisplay.do?menuId=2037&id=1&body=ECON&language=EN). See also *wiiw Monthly Report* 2008/3.

⁵ Inflation in NMS has, on average, been always higher than in EU-15 (see Figure 1). The inflation differential has increased though recently. This is understandable because NMS, being much poorer than EU-15, have much higher shares of food in their consumption baskets. This translates directly into higher inflation rate under present circumstances. Besides, higher inflation in NMS happens to be strongly affected by strong increases in VAT rates (and regulated prices) enacted in, e.g., Hungary and the Czech Republic.

becoming permanently expensive has undoubtedly strengthened the drive to develop alternative renewable energy sources and boosted the rapid rise in the production of biofuels. This may have reduced the potential supply of major crops that could otherwise be used for traditional human consumption and/or as fodder in animal husbandry; it may have also increased the cultivation of crops to be specifically used for biofuel production. It is, none the less, believed that growth in biofuel production has pushed up prices for many agricultural commodities, as well as those of foodstuffs (unprocessed and processed) in general. The fast-growing emerging markets would thus seem to be bolstering that development as well, since the perceptible rise in people's real disposable incomes in those countries translates of necessity into greater demand for food (especially for meat).



Figure 1

Source: wiiw Monthly Database incorporating national statistics, Eurostat, IFS.

The importance of the global supply-side disruption needs to be acknowledged

The arguments for linking the current global inflationary acceleration to ongoing globalization via the demand effects sound quite convincing. However, some facts fail to support those arguments fully. First, the role of the fast-growing emerging markets in upsetting the energy market equilibrium seems to have been exaggerated. For example, the share of China in world demand for crude oil rose from 8.5% in 2006 to 8.9% in 2007. The overall increase (2007 over 2006) in the combined demand for crude oil in China and other developing countries (1.3 million barrels per day) was partly matched by: (a) the non-OPEC supply of crude oil rising by 0.8 million barrels per day; and (b) demand in the OECD countries dropping by 0.2 million barrels per day. If OPEC had not cut back its





* Please note different commodity coverage for Russia.

Source: Eurostat, national statistical offices, Central Bank of Russia.

crude oil production in 2007 by some 0.5 million barrels per day, the rising global demand (including developing countries) for crude oil would have been met without forcing a reduction in the worldwide stocks of crude oil.⁶ In conclusion, while the demand for crude oil in the fast-growing emerging economies is still increasing (albeit rather moderately), the decisive factor behind the recent energy price explosion seems to be very much supply-side in character. More precisely, one must recognize the role of the OPEC strategy or policy in triggering the recent upward trend in energy prices worldwide. Of course, the price impulse brought about by the temporary supply-demand imbalance could well have set off purely speculative tendencies, thus inflating energy prices to unreasonable levels. A final remark would seem pertinent. Even if the recent developments have been brought about by shortfalls in oil supplies, in the long term the rapidly rising demand in China and other fast-growth regions could well push energy prices upwards.

The demand for major agricultural and food commodities in the fast-growing emerging markets and the role it played in upsetting equilibria in the global markets seems even more problematic than in the case of crude oil. This is clearly reflected in the data on demand for, and supply/ use of, wheat and coarse grains in 2007 and 2005, for example⁷. The average nominal wheat and maize prices in USD rose (2007 over 2005) by 89% and 71%, respectively⁸. Global direct human consumption of (i.e. demand for) wheat and coarse grains rose by 3%, while human consumption in the non-OECD countries rose less: 2%. Consumption in China and Brazil actually declined over that period. The emerging markets' demand for wheat and coarse grains for use as feed in stockbreeding rose more significantly than in the OECD countries (3% and 0% respectively). All in all, the facts do not support the thesis about an extraordinary rise in demand for wheat and coarse grains in the rapidly growing emerging markets. That same conclusion is borne out by facts about global developments relating to other farm/food products, such as soybeans and sugar. It is also difficult to attribute the rapid rise in world market prices of other commodities (e.g. metals) to a rise in demand in emerging markets.

The ever growing use of agricultural commodities for biofuel production may well be a different matter. For example, the share of wheat and coarse grains used for biofuel production (primarily in the USA) accounted for 5.4% of the total global use in 2007 – up from 2.8% in 2005. (As a result total demand (all uses combined) for wheat and coarse grains rose faster in the OECD countries than in the emerging markets: 7% as against 3%, respectively). It is debatable, however, whether the growing use of crops for biofuel production has reduced the amounts available for human or animal consumption and so contributed to rising prices. Without the biofuel producers' demand for grains, the total grain output (supply) could have been correspondingly less, ultimately resulting in a total supply-demand imbalance of the same magnitude. (It is unlikely that the industrial producers of biofuels would rely on uncertain supplies of wheat or other agricultural raw materials. Instead, they may well have been developing their own supply or production networks, often taking advantage of various subsidy schemes).

⁶ The data on the crude oil demand/supply quoted above come from the OPEC Bulletin No. 5/2008.

⁷ The data on supply/use of wheat and coarse grains come from OECD-FAO Outlook 2008-2017, June 2008.

⁸ Essentially, the external price shocks to the euro area have been much less pronounced than to the US: the euro has strengthened vs. the USD. External price shocks have been even less painful to the NMS (particularly Slovakia, Poland and the Czech Republic) whose currencies have strengthened even against the euro.

The debate on the issue can be rounded off with some summary information on the nature of the imbalance between total demand for, and supply of, wheat and coarse grains in 2007. Over the period 2005-2007 demand in the emerging markets for wheat and coarse grains rose by 27 million tons, while demand in the OECD countries rose much more: 53 million tons (with inputs into biofuel production accounting for at least 45 million tons). The problem that ultimately led to the explosive prices for wheat and maize is that total global production only increased by 46 million tons. The demand-production imbalance of -41 million tons (reflected in reduced stocks) was precisely matched by production *shortfalls* in three major wheat growing regions: the EU, Australia and Canada. Insofar as these shortfalls were related to weather (a 20%-plus decline in average yield per hectare in the case of Australia) or to policies designed to discourage production (for example, in the European Union where the area harvested contracted by 6% between 2005 and 2007, thus reducing EU wheat production by 21 million tons) the global wheat market imbalance – and associated price hikes – was also clearly supply-side in character. It may be worth adding that – with some qualification – a similar finding applies to other major crops traded internationally.

The world market prices of energy and food likely to stabilize or even drop

Our ability to read the minds of the strategic energy market players (e.g. at OPEC) is somewhat limited. However, as the countries covered by this report appear to be vulnerable to global events⁹, it is important that we hazard reasonable guesses as to trends in energy prices. Our guess is that the trend towards higher energy prices on world markets is coming to an end: at least for the time being. One could perhaps even go so far and anticipate some measure of decline in those prices. A number of factors are likely to contribute to that trend.

- 1) Although energy prices started to rise as far back as the beginning of 2004, they only began to accelerate frantically at the beginning of 2007. Given that the turbulence on global financial markets which broke out in mid-2007 (extending into 2008) unleashed a flight from 'virtual' (including 'sub-prime') investments into more solid commodity investments (such as gold), the rise in the energy prices might be interpreted as a reflection of prevailing 'investment sentiments' (with OPEC producers holding back on production). If this continues, a gradual return to normalcy on the global financial markets might reduce the attractiveness of such solid investments. This, in turn, ought to redirect the energy price trends.
- 2) To a certain degree, that development already seems to have got under way. Since about mid-May 2008, interest in crude oil futures has shown a fairly definite trend towards decline which together with higher price volatility might herald a shift in price trends¹⁰.

⁹ The fact that the world-market prices of energy and of major commodities turn out to be quickly transmitted into domestic prices in the countries covered by this Report is in itself proof of an advanced stage of globalization. Domestic markets are indeed well integrated into global markets – at least as far as homogeneous and bulky commodities are concerned. 20-30 years ago this was not the case as even the market economies were often insulated, administratively or with subsidies/taxes against 'unwelcome' foreign impacts. Such instincts still survive in less advanced countries (e.g. in Kazakhstan, other CIS countries and most of the Western Balkan countries.

¹⁰ For example, see. the review of trends in the commodity futures prices at <u>http://tfc-charts.w2d.com</u>. Of course, there is no shortage of 'bullish' oil price prophesies. One can sense disingenuous bubble engineering behind some of them, not serious research.

3) Since the third quarter of 2007, OPEC crude oil production has reverted to high levels. In the first quarter of 2008, production was 5.2% higher than the year previous. Having made huge gains in 2007, OPEC might now want to avoid recessionary developments in the OECD countries that would probably come to the fore, were crude oil to remain in short supply globally. At the same time, total world demand for crude oil is expected to rise only moderately (even stabilizing in the OECD countries). Thus, in all probability the current cycle of diminishing stocks/exploding prices of crude oil (which started in 2004) may be coming to an end¹¹. The starting date of the next such cycle is open to question.

Prices of major internationally traded agricultural commodities are also likely to stabilize - or even decline - in the near future. That the tendency for these prices to rise (which became clearly visible by the summer of 2007) has already come to an end can be deduced from the trading reports of futures markets. Those reports show a gradual, but consistent decline in futures prices starting in early 2008. Overcoming the effects of the temporary weather- (or policy-) induced shocks to the supply of major crops is likely to suppress those prices still further. This is very much the conclusion drawn by leading experts in the field. In particular, the most recent issue of the joint OECD-FAO Agricultural Outlook 2008-2017 envisages a relatively imminent plummeting of world market prices in the case of some agricultural commodities (including wheat and milk powder). Prices of most other commodities (excluding rice) are expected to remain largely stable over more or less prolonged periods of time (with some of them starting to decline in two to three years). These expectations are based on more specific assumptions pertaining to such factors as a rise in incomes and demand for food in the fast-growing emerging markets, as well as a rise in levels of biofuel production. On the whole, the pattern of future food price developments emerging from the recent OECD-FAO studies appears to be consistent with historical trends pointing to a secular weakening of food prices in the course of economic development.

Official responses to accelerating inflation remain largely restrained

On the whole the official response to inflationary acceleration has been rather unusually restrained. Of course, this is not surprising in the case of countries (such as Bulgaria and the Baltic States) which, having adopted currency-board arrangements, can do little to influence inflation via active (interest rate) monetary policy. Those countries can try to adjust the volume of domestic bank loans via administrative regulations (for example, by changing the banks' obligatory reserve requirements). Having done just that, the reserve requirement ratios have now reached double-digit levels (viz. Bulgaria). Ultimately, this does not necessarily help much, if only because curbs on lending (and money supply) do not seem to be directly related to the pace of (still moderate) inflation (as was customarily claimed only two decades ago). Moreover, with the current degree of liberalization of cross-border financial flows and innovation in the domestic (usually foreign-owned) financial institutions, any attempt to control credit and domestic money aggregates is particularly difficult; it is often likely to yield unexpected outcomes. The alternative policy route for the currency-board (and hard exchange-rate fix) countries would be to opt for fiscal tightening. However, since the latter countries even now tend to run fiscal surpluses (often quite large, see Table 1), any effective (as far

¹¹ See the OPEC Bulletin 5/2008.

as controlling inflation is concerned) tightening would have to be of truly massive proportions; this does not seem politically acceptable nor is it economically justifiable.

Fiscal balance as % of GDP												
	2004	2005	2006	2007 ¹⁾		2004	2005	2006	2007 ¹⁾			
Czech Republic	-2.9	-3.6	-2.6	-1.6	Croatia	-4.8	-4.0	-3.0	-2.3			
Hungary	-6.4	-7.8	-9.3	-5.5	Macedonia	0.0	0.3	-0.6	0.6			
Poland	-5.7	-4.3	-3.8	-2.0	Turkey	-4.5	-0.6	-0.1	-1.2			
Slovak Republic	-2.4	-2.8	-3.6	-2.2	Albania	-5.1	-3.5	-3.2	-3.4			
Slovenia	-2.3	-1.5	-1.2	-0.1	Bosnia and Herzegovina	1.6	2.4	2.9	2			
Bulgaria	1.4	1.8	3.0	3.4	Montenegro ²⁾	-2.0	-1.7	1.6	4.5			
Romania	-1.2	-1.2	-2.2	-2.5	Serbia	-1.4	1.4	-0.6	-0.5			
Estonia	1.7	1.8	3.6	3.2	Kazakhstan	2.5	5.8	7.5	-1.7			
Latvia	-1.0	-0.4	-0.2	0.0	Russia	4.5	8.1	8.4	6.0			
Lithuania	-1.5	-0.5	-0.5	-1.2	Ukraine	-3.2	-1.8	-0.7	-1.1			

Note: For NMS-10 and Turkey: EU definition: net lending (+) or net borrowing (-) according to ESA'95, excessive deficit procedure; for the other countries: national definition.

1) Preliminary. - 2) Central government budget.

Table 1

Source: Eurostat; wiiw forecasts, wiiw Database incorporating national statistics.

A number of other inflation-related structural issues pertain to fiscal policies as currently pursued in most countries (even in those which have retained the freedom to pursue semi-sovereign monetary policies). Suffice it to mention just three of them. Interestingly, all of them actually support the current cycle of inflationary acceleration. First, there is a general tendency to keep raising indirect consumption tax rates and collect additional revenue via hikes in regulated tariffs and prices (e.g. public utility services). Higher consumption taxes (VAT) and regulated prices/charges tend to be passed on to consumer prices, thus temporarily adding to the recorded inflation¹². At present, the resultant tax-driven inflation happens to be quite high in a number of countries - especially in the Czech Republic (which entered the current year with a radically overhauled public finance system) and Hungary (where higher official prices/consumption taxes are part of the fiscal consolidation package started in 2006). Secondly, there is a tendency to compensate the consumers for the losses of higher indirect taxes by gradually reducing the 'burden' of income taxes and/or reducing social security contributions. This keeps adding to the consumers' purchasing power and thus helps to support hikes in prices via enhanced demand. (This factor seems to be playing a prominent role in Poland and the Czech Republic). Thirdly, it is hard at present to implement cuts in spending which could have helped to moderate aggregate demand (and thus possibly inflation), if only because

¹² The 'indirect tax contents' of the price of fuel and other energy products are very high. These products are the finance ministers' best friends (followed by cigarettes and alcohol). A rapid rise in fuel prices provokes calls (e.g. from the opposition parties often responsible for the introduction of higher tax rates only a couple of years previous) for lower tax rates and/or the introduction of subsidies to low-income households (to offset higher electricity or heating bills). The tendency so far has been to ignore those calls, at least in the NMS. In Russia and several Western Balkan countries the authorities try to discourage exports of 'sensitive' commodities (e.g. food) while lowering duties charged on their imports.

relatively large transfers from the EU budget call for proportionately large domestic budgetary spending to co-finance EU-supported projects.

Figure 3



Source: wiiw Monthly Database incorporating national statistics.

Coming back to the issue of official responses to inflationary acceleration in the countries which have retained the power to move interest rates, a rather unusual degree of restraint on the part of their national banks is to be observed. So far the leading interest rates of most central banks in the region have been lagging behind inflation: in real terms, interest rates have been allowed to fall. This tendency is less pronounced in countries where growth is accelerating (Romania and Hungary). In Russia and Ukraine, however, the real interest rates are in fact markedly negative (see Figure 3).

Official communiqués issued by most central banks in the region and the current analyses available from their research departments are replete with the usual phrases stressing the need for 'vigilance' and pointing out to the 'upside risks' to price stability. Monetary policy, however, still does not seem ready to respond decisively to recent inflationary developments. Reference is made to a number of factors; in effect, this suggests that at present more determined action may not yet be necessary. Inflation is generally expected to subside gradually more or less on its own; there is a tendency to discern some signs of stabilization in the most recent monthly inflation data. In their own inflation forecasts the central banks are clearly suggesting a general slowdown in inflation. Perhaps by so doing, they intend to manage the general public's expectations about inflation (which recent monetary policy orthodoxy considers the major productive occupation of a 'modern' central bank¹³). There may, however, be more material reasons for the central banks' current indecisiveness.

First, it seems to be generally realized that the present acceleration of inflation is external in origin. Moreover, people must generally believe that no further major 'imported' negative energy and food price shocks are due. Certainly, those judgements are not inconsistent with the conclusions of our previous discussion. What is perhaps quite novel about the current situation is that under similar (in fact much less severe) external price shocks, central bank responses in the past were invariably swift and decisive - and on occasion even excessively restrictive. It would be interesting to establish, this time round, the reasons for the less strident tone on the inevitability and dangers of secondround price effects and price-wage spirals getting out of control. This is all the more surprising as labour markets continue to be fairly tight and wage hikes are still guite pronounced. Apparently, the central banks are convinced that wages will not respond strongly to rising prices. Such a belief may be justified given the weakness of the trade unions. It may also be assumed that the marked rise in wages (because of rising productivity) might generally blunt the labour force to rising prices. This might prove to be a quite reasonable assumption. After all, in real terms, wages continue to rise. The current inflationary impulse is not strong enough to eat into real wages or living standards. (The inflationary impulse following the oil price shock in 1973 cut into workers' living standards, triggering the price-wage spiral that ultimately led to 'stagflation').

¹³ The conviction that a (moderate) inflation disturbed by an external (or supply-side) shock should return, on its own, to a sort of a natural level is another feature characteristic of the recent monetary-policy theorizing. This derives from the central role that this theorizing accords to the mechanical inflationary adjustments. Not only are prices of concrete goods assumed to be 'sticky', but overall inflation rate is 'sticky' as well. The current level of inflation is made a function of (among other factors) the past inflation level, the summary adjustment parameter being less than unity.



* Ascending line indicates appreciation.

Source: wiiw Monthly Database incorporating national statistics.

Secondly, it is generally believed that the recent rapid economic growth is either slowing down (or is about to slow down) so that the inflationary demand-pull and cost-push forces are thought to be abating anyway.

Thirdly, the exchange rates have been appreciating recently: for the most part, quite strongly even in nominal terms (see Figure 4). Although exchange rate movements are formally free to float in countries that have adopted inflationary targeting, in practice the monetary authorities in those countries appear to be watching the marked appreciation with a growing sense of unease. On the one hand, marked appreciation is considered a brake on domestic inflation (e.g. via competitively priced imports) – and hence it may pre-empt the central banks' interest rate hikes¹⁴. All this, however, may also be an expression of commendable concern over the impact of currencies that are too strong for external competitiveness – and hence overall growth. By raising their interest rates, the central banks in the region would, at present,¹⁵ increase the spreads as against the rates prevailing in the euro area (and the USA). This would invite still more appreciation supported by short-term capital inflows (for example, in the form of credits drawn abroad by banks operating domestically).

Longer-term inflation prospects: the special role of unit labour cost developments

It would seem that the old monetarist maxim that *'inflation is always and everywhere a monetary phenomenon'* (Milton Friedman) is not being taken seriously anymore. Central banks around the world have parted with the monetarist recipe for managing inflation through the control of monetary aggregates long ago. As the (present) FED Governor F. Mishkin remarked some 15 years ago, '*We have not abandoned the monetary targets – the targets abandoned us'*. Even at the ECB, the so-called 'monetary pillar' of the policy (inherited from the old German Bundesbank) was formally relegated to auxiliary status (in 2003). The reason for this was a persistent discrepancy between the ECB target for money (M3) growth of 4.5% per year (which is believed to be consistent with inflation of less than 2%) and actual growth in M3 (running at well over 10% despite inflation hovering around 2%). A simple alternative to the monetarist maxim, which emerges on inspection of the data for the new EU member states, is that over longer periods of time inflation tends to correspond quite closely to the pace of growth of nationwide unit labour costs. This is illustrated by Table 2.

¹⁴ The impact of strengthening exchange rates (and generally of 'competitively' priced imports) on the *overall* domestic inflation seems to be much weaker than is popularly believed. This is argued in a number of studies on the so-called pass-through, available also from the ECB and the IMF. The popular belief in strong effects on global disinflation of globalization (via e.g. rising exports of cheap goods from low-cost countries) is also questionable.

¹⁵ At present the policy interest rates in the euro area and in the USA are pretty low (relative to current inflation), even by recent standards. Inaction on the part of the ECB, which has decided to ignore the rising inflation in the euro area, and the hyperactivity of the FED, which has eased its policy quite radically, are both rational. They are motivated (implicitly in the case of ECB and explicitly in the case of FED) by the desire to minimize the risks to overall financial stability (in the wake of the 'sub-prime' crisis). The implied sensitivity of inflation-targeting central banks to the exchange rates and to the monetary policy of the FED or ECB shows that inflation-targeting itself does not make national monetary policy as sovereign or independent as is often claimed.

Table 2

CPI/ULC and CPI/AW	indices: averages and	standard deviations for	1995-2007	and 2000-2007
	maloool aforageo and		1000 2001	

		1995- 2007		2000 -2007	
		CPI/ULC	CPI/AW	CPI/ULC	CPI/AW
Czech Rep	Average	96.7	94.8	96.9	85.9
	St. Deviation	2.0	14.2	2.1	9.4
Hungary	Average	94.8	91.7	95.3	80.5
	St. Deviation	3.3	16.9	2.4	10.6
Poland	Average	102.0	108.1	107.5	93.2
	St. Deviation	8.4	22.7	5.6	5.4
Slovakia	Average	104.2	94.0	111.8	91.8
	St. Deviation	11.9	7.0	8.2	6.9
Slovenia	Average	98.5	98.4	101.0	92.7
	St. Deviation	4.1	8.8	1.5	4.4
Bulgaria	Average	98.8	98.8	105.0	93.6
	St. Deviation	10.6	12.6	4.3	6.7
Romania	Average		83.2	93.3	76.8
	St. Deviation		16.1	9.2	16.1
Estonia	Average	97.7	94.5	99.0	79.6
	St. Deviation	4.6	23.2	4.7	14.0
Latvia	Average	99.4	91.5	105.6	74.0
	St. Deviation	11.0	27.6	9.5	18.5
Lithuania	Average	96.6	98.1	96.9	85.7
	St. Deviation	6.4	22.5	7.7	14.3

Note: CPI is consumer price inflation index, ULC is the index of unit labour costs, AW is the index of average nominal wage (see the text below).

Source: Own calculations. Data for Romania (years 1995-1997) are incomplete.

Table 2 shows the average values of two indices, CPI/ULC and CPI/AW, over two periods: 1995-2007 and 2000-2007. CPI is the consumer price index (with the base year 2000) and the ULC is the index of aggregate unit labour costs (likewise against the base year 2000). The ULC index measures wage costs (total economy-wide nominal compensation of the wage-earners as understood in the national account statistics) in relation to real GDP. AW is the index (against the base year 2000) of the average gross nominal wage. Thus CPI/AW is the reciprocal of the index of average real gross wage. (A drop in CPI/AW indicates a rise in real wages).

As can be seen, the average CPI/ULC indices for all these countries over the longer period (1995-2007) are pretty close to 100 (the base year value at mid-period). At the same time, the standard deviations for CPI/ULC are generally quite low. All in all, this proves the existence of a pretty tight (if not exactly one-to-one) longer-term correspondence between the developments of prices and unit labour costs. The average CPI/AW values turn out to be generally much further removed from 100. Moreover, in most cases those values are much more dispersed (as reflected by much larger standard deviations). Thus, in the long run, the dynamics of average real wage is shown to be less

tightly co-integrated with the CPI. This is consistent with the view that unit costs tend to be the ultimate determinants of prices, at least over the long term.

In several countries (including Poland, Slovakia and Bulgaria) the average CPI/ULC indices for the shorter period (2000-2007) rose quite significantly above 100; this means that in recent times ULC have lagged behind inflation in those countries. This development is relatively easy to interpret. The levels of unemployment were particularly high in those very three countries during that period. Recently observed hikes in wages and unit labour costs – in the context of a drop in unemployment levels – may be understood as parts of the adjustments bringing the CPI/ULC indices back to their 'natural' longer-term positions. As such, they do not necessarily herald a return to a higher inflation – at least over the longer time horizon, even though average real wages have increased overall).

Short-term inflation prospects: inertial adjustments take over

In the short term (up to two years), the recent inflation will not decrease automatically, even if caused primarily by external shocks. Inflation in 2008 will be higher than in 2007, if only because of the base-level effects. More importantly, the initial months of the energy and food price 'shock' (the third quarter of 2007) suppressed the size of the ongoing moderate ('regular') increases in prices of other goods and services. Although consistent with the elementary general equilibrium (microeconomic) analysis (i.e. on the principle that rising prices of some goods ought to – ceteris paribus – depress prices of other goods), such a development cannot be expected to persist. Rather, one should expect the temporarily depressed relative prices of services and manufactured consumer goods to regain much of their strength relative to the prices of foodstuffs. The process of returning to a proper balance between prices of various types of goods, which seems to have already started, will no doubt imply some additional rise in overall inflation in 2008.

Of course, inflation over a few quarters to come will be affected – albeit in ways that are still poorly understood – by many factors: some easily measurable and others hardly so. The latter include expectations, consumer/producer sentiments, shifts in intensity of competition or even somewhat metaphysical (unobservable) variables, such as 'output gaps' and 'natural levels' of interest rates and/or unemployment¹⁶. The difficulties inherent in forecasting inflation in the short and medium term are amply documented in the kinds of pronouncements usually issued by the central banks' monetary policy councils (or their research departments). For all their superior information (including the best possible knowledge concerning *their own* intentions with respect to the course to be followed by their own policy on interest rates), the central banks' inflation forecasts (in the form of the so-called 'fan charts') are surprisingly imprecise. Thus, for example, the inflation forecast announced by the Czech National Bank on 7 May 2008, Estimates for the NMS envisage an end-year (monetary-policy relevant) inflation rate ranging between 1.6 and 2.4 %. The probability of actual inflation remaining in that range is assessed (by the CNB itself) as rather low (30%) though. The

¹⁶ The impacts of changes in monetary policy actions are not added to this list. It is commonly accepted that such actions may affect inflation only after a considerable time-lag (at least one year).

CNB is, however, almost entirely (i.e. with 90 % probability) sure that at end-2008 inflation will not be lower than 0.4% – and not higher than $3.6\%^{17}$.

Table 3

Yearly inflation rate as a function of the lagged values of: (a) the rate of change in the average wage g(W-1); (b) the rate of change in the unit labour cost g(ULC-1); and (c) inflation g(CPI-1)

		g(W ₋₁)	g(ULC ₋₁)	g(CPI ₋₁)
Czech Rep	parameter	0.44*** ^{/a}	0.73***	0.48*
	Std. Error	0.066	0.146	0.256
	R sq. Adj.	0.551	0.218	0.200
Hungary	parameter	0.61***	0.88***	0.66***
	Std. Error	0.070	0.098	0.111
	R sq. Adj.	0.397	0.375	0.772
Poland	parameter	0.47***	0.74***	0.71***
	Std. Error	0.041	0.113	0.118
	R sq. Adj.	0.812	0.500	0.778
Slovakia	parameter	0.55 ^{′a}	0.08	0.38
	Std. Error	0.432	0.360	0.430
	R sq. Adj.	0.070	-0.134	0.022
Slovenia	parameter	0.67***	1.05***	0.80***
	Std. Error	0.038	0.107	0.170
	R sq. Adj.	0.752	0.267	0.678
Bulgaria	parameter	0.77***	0.53*	0.47
	Std. Error	0.076	0.223	0.260
	R sq. Adj.	0.335	0.136	0.185
Romania ^{/b}	parameter	0.73***	0.72***	0.72*
	Std. Error	0.058	0.105	0.263
	R sq. Adj.	0.800	0.522	0.392
Estonia	parameter	0.41***	0.77***	0.40***
	Std. Error	0.037	0.088	0.096
	R sq. Adj.	0.614	0.400	0.621
Latvia	parameter	0.39***	0.24**	0.42*
	Std. Error	0.031	0.081	0.160
	R sq. Adj.	0.700	0.462	0.367
Lithuania	parameter	0.27***	0.35***	0.38**
	Std. Error	0.042	0.072	0.087
	R sq. Adj.	0.610	0.421	0.644

a) explanatory variable lagged 2 years. - b) sample covers the years 1998-2007.

*** significant at 0.001 level; ** significant at 0.05 level.

Source: wiiw calculations.

¹⁷ See <u>http://www.cnb.cz/en/monetary_policy/forecast/index.html</u>.

Given the levels of uncertainty attached to the best available inflationary forecasts, one is justified in seeking one's own ways of quantifying the relationships likely to be of some importance in determining the short-term inflation trends. Table 3 above summarizes the results of simple econometric exercises concerned with 'explaining' inflation (CPI) rates in individual new EU member states with yearly data for the period 1995-2007. Three independent equations were run for each country, relating the inflation rate separately to the lagged values of: (1) the rate of growth of unit labour costs; (2) the rate of growth of average nominal wages; and (3) the lagged value of inflation itself. It may be added that similar regressions, with changes in exchange rates, interest rates and real output as explanatory variables, performed – in most cases – too badly (in statistical terms) to merit review here.¹⁸

The equations proposed are of the 'reduced form'. That is, they do not allow explicitly for various factors (such as changes in interest rates, the dynamics of real GDP, changes in unemployment rates and levels of oligopoly in various consumer markets) which are considered important to the course of inflation. Instead, these equations are meant to capture the combined eventual inflationary impact of all of those omitted factors, insofar as they are affected by our explanatory variables. Of course, it must be remembered that the time-series underlying the estimates are rather short. The validity of the estimates is certainly quite limited. It should be noted that two different estimation procedures were applied. The equations with unit labour costs and wage rates as explanatory variables were estimated using the Ordinary Least Squares (OLS), while the equations with the inflation rate being related to its own lagged value were estimated via a First-Order Autoregressive (AR(1)) algorithm.

Table 3 reports the parameters (indicating their significance), the standard errors in the estimated parameters and the adjusted R. squared indicator (measuring the respective equations' goodness-of-fit). All AR(1) – and a few of the OLS – equations allowed additionally for a constant (i.e. the potential presence of some 'background' inflation or deflation). These constants are not reported. In two cases (the equation with the wage rate increase for the Czech Republic and Slovakia), the explanatory variable is lagged two years instead of one.¹⁹

As can be seen, the parameters/equations are on the whole quite sensible. Only the parameters for Slovakia cannot be accepted. Thus inflation in Slovakia does not seem to be systematically related to any of the individual 'causal' factors considered.

With all due qualifications, Table 3 suggests some interesting regularities. Generally, the parameters relating inflation to its own previous-year values (i.e. reflecting wage stickiness) are the least reliable. Statistically, these parameter estimates are the least significant (their standard errors are rather large and the relatively unimpressive adjusted R squared values for those equations indicate that the omission of some other explanatory variables has borne some consequences. Moreover, it transpired

¹⁸ The apparently absurd econometric findings on the impact of monetary tightening on inflation – with tightening apparently 'causing' higher inflation – are well documented in the literature and are also fairly well understood.

¹⁹ This did not substantially improve on the statistical quality of the estimate for Slovakia.

that the estimates are unstable. The AR(1) estimations based on data for the 2000s yield radically different values in some cases. For example, the parameter estimates for the Baltic countries turn out to be in excess of unity (suggesting that inflation has become explosive in character).

The parameters measuring the impact of nominal wage growth rate appear rather low; this means that wage hikes tend to have a weak impact on inflation. At the same time, they turn out to be the most reliable (as evidenced by the relatively low standard errors of their parameter estimates and usually quite high adj. R sq. indicators). Thus, the nominal wage growth rates offer a better explanation for inflation than the values of lagged inflation itself. Interestingly, the ULC, which were found to be essential to understanding long-term inflation trends, seem inferior (as far as their standard errors are concerned) to the wage-rate growth rates as the likely determinants of short-term inflation. This suggests that the short-term adjustments eventually resulting in the long-run price levels running close to the long-run ULC levels involve short-term – possibly unsynchronized – adjustments in both current inflation and current nominal wages.

Inflation in the West Balkans and major CIS countries also expected to subside

Given their recent turbulent past, the West Balkans have enjoyed admirably low rates of inflation over quite protracted periods of time. Serbia is something of an exception: its largely unreformed economy has been the victim of politically-induced economic cycles yielding periodic bouts of severe macroeconomic instability, including recurrent high inflation. The specificity of the region is its high level of informal euroization (or even formal in the case of Montenegro and Kosovo), the heavy reliance on remittances combined with very high levels of professional inactivity of the domestic labour force and the rather high level of unemployment. Moreover, the share of self-employed (in agriculture and services) in total employment is larger than elsewhere. All these factors may bear on inflation: one can expect the costs of hired labour or its wages to play a weaker role in affecting inflation than in a 'normal' industrial economy cut off from huge remittances from the outside world. One would expect exchange rates and domestic demand supported by remittances to be potentially more prominent factors determining inflation in the region. It is perhaps for this reason that the exchange rates in those countries are mostly fixed (or tend to be changed – in emergency situations – as little as possible). Experience has taught the authorities in the region that inflation follows quickly on the heels of devaluation and eats up any 'competitive gains' due to devaluation.

Of course, being effectively on a fixed exchange rate regime bears a cost. As in the Baltic countries and Bulgaria, very fast growth in these countries (should it eventually visit the West Balkan region) will probably lead to accelerating inflation that will be hard to control – only to be followed by very high current account deficits. Symptoms of such developments were already looming large in Bosnia and Herzegovina (BiH), for example, even before the global price shocks came into play.

Similarly as in the NMS, inflation in the West Balkans (and Turkey) will be higher in 2008 on account of higher world-market prices for farm/food products and energy. However, inflation is expected to calm down in 2009, dropping still further in 2010 to relatively low levels, generally on a par with those that prevailed prior to 2007 (see Table 5)
	sample	g(W . ₁) parameter	standard error	Adj. R sq.	g(CPI ₋₁) parameter	standard error	Adj. R sq.
Albania	1996-2007	0.5*	0.125	0.35	0.54*	0.27	0.211
B&H	2000-2007	-0.26	0.359	-0.081	0.26	0.36	-0.076
Croatia	1997-2007	0.34***	0.041	0.398	0.43	0.27	0.124
Macedonia	1996-2007	0.33*	0.113	-0.101	0.06	0.15	-0.080
Montenegro	2004-2007	0.27**	0.033	0.291	0.57*	0.14	0.760
Russia	2001-2007	0.41***	0.024	0.748	0.13*	0.06	0.345
Serbia	2001-2007	0.40*	0.161	0.186	0.52	0.30	0.240
Ukraine	1996-2007	0.16***	0.023	0.823	0.18***	0.022	0.867
*: significant estimates for	at 0.1 level, ** Equation (2).	significant at (0.05 level, *** sig	nificant at 0.01	level. OLS estima	tes for Equation	(1) and AR(1)
Source: Own	calculations.						

Yearly inflation rate as a function of the lagged values of: (1) the rate of change in the average wage g(W-1); and (2) inflation g(CPI-1). Estimates for the West Balkans, Russia and Ukraine

Table 4

estimates for Equation (2). *Source:* Own calculations. The expectation of disinflation following the 2008 inflationary spike is of course predicated on the absence of further major shocks to world market prices for energy carriers and food/farm commodities. Moreover, it seems to be based on the absence of any major wage hikes in the countries concerned. It is very likely that this condition will be met. Given the high levels of

countries concerned. It is very likely that this condition will be met. Given the high levels of unemployment prevailing in the countries considered, the nominal wage increases granted need not be very large.

Table 5

Inflation rates

change in % against preceding year

	2006	2007 ¹⁾	2008 Fo	2009 precas	2010 t		2006	2007 ¹⁾	2008 Fo	2009 : precas	2010 t
Czech Republic	2.5	2.8	6	2.8	2.5	Croatia	3	2.9	6	4	3.5
Hungary	3.9	8.0	6.6	3.8	3.0	Macedonia	3.2	2.3	6	3	3
Poland	1.0	2.5	4	3	2.6	Turkey	9.6	8.8	10.5	9	7
Slovak Republic	4.5	2.8	3.8	3.5	3.5	Albania	2.4	2.9	4.1	3.1	3
Slovenia	2.5	3.6	6	5	3.5	Bosnia and Herzegovina	6	1.5	7	3	2
Bulgaria	7.3	8.4	12	8	5	Montenegro	3	4.2	5	3	3
Romania	6.6	4.8	8	7	5	Serbia	12	7.0	12	10	8
Estonia	4.4	6.6	11	8	7	Kazakhstan	9	10.8	11	10	9
Latvia	6.5	10.1	17	14	10	Russia	10	9.1	15	13	9
Lithuania	3.7	5.7	11	9	10	Ukraine	9	12.8	18	14	10
1) Preliminary											

Source: wiiw Database incorporating national statistics, forecast: wiiw.

It may be of some interest to check the content of Table 4 (see above) reporting the results of estimations relating the yearly inflation (CPI) rates to its own lagged values and, alternatively, to the lagged value of rate of growth of the average nominal wage for the countries in the West Balkans, Russia and Ukraine²⁰.

The first thing to be noticed is that the samples are usually shorter than is the case with the estimations for the NMS. Earlier data for some countries are missing (which is not surprising given the fact that some of them only recently launched out on an independent existence of their own). For Russia and Croatia, it was expedient to shorten the time- series in order to avoid taking into account the effects of abnormally high inflation (and the financial crisis in Russia) in the early years. It also appears that nothing can really be said about inflation in Bosnia and Herzegovina. The estimate for the 'price stickiness' parameter is of a reasonable size; its standard error, however, is unacceptably large. The estimate for the BiH parameter measuring the impact of rising wages on inflation is equally poor in terms of the testing statistics - and it is wrongly signed (negative) at that. Quite likely, the inability to detect any regularity here is due to a single exogenous price shock experienced by Bosnia and Herzegovina in 2006 when the introduction of VAT brought about a short-lived jump in inflation. By way of contrast, in the case of Albania and Montenegro, both estimates are correctly signed, show roughly correct magnitudes and are statistically significant (though much less so than in most NMS). Finally, inflation in Croatia, Macedonia and Serbia appears to be responding to the wage hikes, yet does not appear 'sticky'. This would underscore the importance of keeping wages moderate these countries.²¹

Finally, Table 4 (above) contains also the estimates for Russia and Ukraine. These merit some comment. First, the statistical quality of the estimates for the 'wage regression' in both cases is very high. The parameters for Russia are even of the same order of magnitude as the parameters for most NMS. The 'price stickiness' parameters, however, are pretty low for both Russia and Ukraine. Moreover, the estimates of the constants in the 'price equations' for both countries are unusually large: 12.9% and 11.5%, respectively. In the same vein, the estimate for the 'wage equation' for Ukraine is rather low; the equation, however, also contains a large (and highly significant) constant of about 9.1%. Overall, inflation in Ukraine appears to possess an 'endemic element', which adds to inflation independent of the effects of rising wages or the recent inflation itself. Of course, this 'endemic inflation element' in Ukraine may represent some well defined and economically sensitive variables. The problem is that the identity of those variables has not yet been determined.

²⁰ The reliable national accounts data on total compensation of the wage earners, used for the calculation of ULC in the NMS, are not readily accessible for these countries.

²¹ As already mentioned, the requisite moderation is normally ensured by high levels of unemployment. Occasionally, however, wage hikes generously awarded by governments seeking re-election may well fuel bubbles of inflation.

Box 1

Vasily Astrov

A note on inflation in the CIS

In line with the developments observed in the NMS and elsewhere in Central and Eastern Europe, inflation in the CIS countries has picked up as well. However, the acceleration has been generally stronger, and started from a higher level. One reason behind the strong inflationary pressures in the CIS may have been the dynamics of unit labour costs over the recent years. As illustrated in Table 6, in Russia, Ukraine and Kazakhstan, nominal wages have been rising far ahead of labour productivity, reflecting both the tightening labour markets (particularly in certain segments, such as for skilled labour) and the increased government generosity in the area of public wages (be it for political reasons, as in Ukraine, where the increased competition between the main parties in the aftermath of the 'orange revolution' has made public policy more populist, or thanks to the rapid accumulation of oil-related wealth, as in Russia). As a result, unit labour costs have risen dramatically: in 2007 alone, they jumped on average by over 20%.

Table	96
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Labour productivity, unit labour costs and inflation in the CIS

% change per year

	2004	2005	2006	2007	2008 1st quarter
Russia					
GDP	7.2	6.4	7.4	8.1	8.5
Employment	1.3	1.3	1.0	2.5	1.3
Labour productivity	5.9	5.0	6.3	5.5	7.1
Nominal wages	22.6	26.9	24.3	27.2	28.7
ULC	15.8	20.9	16.9	20.6	20.2
CPI	11.0	12.5	9.7	9.1	12.9
Ukraine					
GDP	12.1	2.7	7.3	7.6	6.0
Employment	0.7	1.9	0.2	0.8	
Labour productivity	11.4	0.8	7.0	6.7	
Nominal wages	27.6	36.7	29.2	29.7	39.4
ULC	14.6	35.6	20.7	21.6	•
CPI	9.0	13.5	9.1	12.8	22.5
Kazakhstan					
GDP	9.6	9.7	10.6	8.7	6.0
Employment	2.8	1.1	2.0	3.1	2.9
Labour productivity	6.6	8.5	8.5	5.4	3.0
Nominal wages	22.5	20.2	19.8	30.5	15.1
ULC	14.9	10.8	10.4	23.8	11.7
CPI	6.9	7.6	8.6	10.8	13.4
Source: wiiw, central banks of t	he respective countries	s, own calculations	(see also Annex).		

Rising unit labour costs increase ceteris paribus the overall production costs and trigger 'cost-push' inflation. At the same time, the fast growth of wages ahead of labour productivity is to some extent a welcome development, which is to be seen against the background of the relatively low share of labour income in GDP observed in these countries. Thus, in 2007 49.8% of GDP was appropriated by wage earners in Ukraine and 45.6% in Russia (in Kazakhstan, the respective share stood in 2005 at just 33%). This means that the rising unit labour costs need not necessarily translate into rising prices, as long as profits appear to be large enough to have a potential for absorbing the 'cost shock'. Besides, the extent of wage hikes suggested by official statistics may well be exaggerated: part of the increase may be a mere reflection of the low statistical base reflecting the wide incidence of various 'grey schemes' of labour remuneration (wages paid in 'envelopes', etc.). Finally, the unit labour costs hardly explain the observed pattern of inflation, which has been recently increasingly attributed to the surging food prices. In May 2008, food products were 22.1% more expensive yearon-year in Russia and 48.5% more expensive in Ukraine (overall CPI went up by 15.1% and 31.1%, respectively). It is little surprise that the hikes in food prices affect these countries more than e.g. the NMS: the former are poorer so that the weight of food in their consumption basket is accordingly higher (40% in Russia and 55% in Ukraine – although the latter might be overly high) – see Figure 2.

Summary

The main points argued above are as follows:

- 1) The countries of Central and Eastern Europe were hit by the external price shock that swiftly resulted in a rapid surge in domestic prices for food and energy. This initial impulse was then followed by further price adjustments that have pushed up inflation levels overall in 2008.
- 2) The worldwide hike in energy and food prices in the period 2007-2008 is primarily a supplyside shock caused by production shortfalls that can be traced back to weather conditions or specific policies restricting production. These shortfalls might well have triggered intense speculation, thus compounding market turbulence. Rising demand in the fast-growing emerging markets and the expanding biofuel sector, however, has played a marginal role in inducing global price hikes.
- Another round of negative global price shocks is unlikely in the near future. On the contrary, there are good grounds for expecting a return to tranquillity or even some measure of decline in major commodity prices.
- 4) Authorities in the countries of Central and Eastern Europe seem to be taking the current inflationary acceleration in an unusually light manner. Some of the countries in the region (those on fixed-exchange regimes) lack the means to respond. Others respond weakly (if at all) because they expect a growth slowdown and harbour concerns over the continuing appreciation of local currencies.
- 5) In the long term, inflation and unit labour costs are shown to be moving in tandem, at least in the NMS. Rising real wages in those countries will not incur much of an inflationary risk as long as gains in labour productivity are roughly matched by rising wages. As this holds true

on the whole for the NMS, long-term inflation prospects are pretty good. Price-wage spirals are not expected to spin out of control.

6) In the short term, the dynamics of inflation is determined by numerous factors. The movements in nominal wages and unit labour costs are of some importance. On the whole, normal inertial adjustments are expected to take over in the short term. In the absence of another round of world-market price shocks, inflation in the NMS will subside fairly quickly. In the West Balkans, the inflationary spike will also be overcome relatively swiftly. Disinflation, however, will be slower in Russia and Ukraine, given that it will be starting from much higher levels than elsewhere.



Leon Podkaminer*

The post-accession boom is over: moderate growth slowdown defusing built-up tensions and imbalances

The external environment: the dust seems to have settled, but conditions remain unfavourable

The financial crisis triggered by the 'sub-prime' debacle in the USA may be far from over. However, the crisis now seems to have been localized; that, of course, does not exclude the possibility of it spilling over into countries outside the USA. Although a number of European (including Swiss) financial institutions and their wealthy clients (including pension funds) have had to absorb huge losses, at no juncture – at least officially – was the overall financial stability of the mainland European Union seriously endangered. ECB interest rates have remained unchanged since June 2007, despite inflation having risen to record heights (by euro area standards). This unusual inactivity on the part of the ECB supported actions of the leading central banks of the eurosystem which provided those European financial institutions in need with hundreds of billions of euros, thus preserving financial stability in Europe. The US FED has gone still farther – radically cutting the interest rate and even expanding lending to some non-bank financial institutions (what is more against collaterals that were far from the highest quality). Although the FED's actions were supported by the US Treasury, which doled out large amounts of money to the taxpayers, the ultimate effects of a decade of the US financial 'innovation' and its impact on the real economy will long be felt in the United States.

US private consumption is unlikely to return in the near future to the level of exuberance that marked the recent decade. This will have some bearing, for example, on US net foreign demand and thus raise prospects of the ongoing battle over market shares intensifying internationally. This can directly affect growth in the world's leading net exporters of manufactured goods (among others, Germany, Japan and possibly China, as well). A weak USD (possibly a consequence of highly negative interest rate spreads vs. the euro area) will probably spell extra trouble – primarily for Germany and other major European net exporters. The pressure so exerted will then be passed on to the entire euro area, and ultimately to the European Union as a whole, including its new member states (NMS). Admittedly, the direct significance of a drop in the US propensity to import will be of secondary importance to the NMS. None the less, it will affect growth in the euro area, their principal trading partners. It will thus indirectly contribute to a more muted outlook for this group of countries. This assessment is broadly in line with our earlier evaluation of the impact of the turbulence on global financial markets²².

The research on this overview was completed on 25 June 2008. Peter Havlik, Kazimierz Laski, Michael Landesmann and the authors of individual country reports provided useful comments on the earlier draft.

²² See P. Havlik, M. Holzner et al., 'Weathering the Global Storm, yet Rising Costs and Labour Shortages Dampen Domestic Growth', *wiiw Current Analyses and Forecasts*, No. 1, February 2008.



Figure 1

Source: wiiw Annual Database incorporating national statistics, Eurostat.

Optimism about growth in the euro area waning

Recent analyses undertaken by the OECD, IMF, the EU Commission and the ECB have one trait in common: a downward revision of the GDP growth forecasts for all OECD countries, including the euro area, over the period 2008-2009. These revisions must allow (one would hope) for various factors that extend beyond the weak USD and a drop in US import demand. One of the factors likely to depress growth is the additional inflation shock over marked increases in energy/food prices. This general revisionist trend is clearly reflected in the evolution of the recent ECB macroeconomic projections for the euro area (see Table 1)

All in all, depressed growth in the euro area cannot be considered conducive to accelerating growth in the NMS. Eventually some fractions of a percentage point (or even a whole p.p.) will have to be sliced off the GDP growth rates in the NMS simply on account of the growth slowdown in the euro area.

Other unfavourable external developments that have a bearing on growth in the NMS include higher 'imported' inflation (discussed at some length in the chapter on inflation in this report). The negative consequences of external price shocks in terms of GDP growth are rather obvious. As far as domestic demand is concerned, at the outset these shocks scarcely differ from additional indirect taxation that reduces the purchasing power available for domestic consumption or investment. (The difference is that the 'tax' so collected tends to 'leak' abroad rather than being spent at home on

public consumption/investment). At the very initial stage, the external price shock not only depresses spending (and output), but should, paradoxically, also depress the inflationary effect of demand-pull (should there be any). Of course, the moderating 'tax' effect of major external price shocks is rather short-lived because it normally tends to be followed by upward adjustments in costs, prices and wages (and ultimately by some demand substitution effects as well). This tends to restore pre-shock price relations and higher nominal incomes at an elevated overall price level.

Table	1
-------	---

	GDP	GDP	HICP	HICP
Date of projection	2008	2009	2008	2009
Aug. 2007*	1.8-2.8	-	1.4-2.6	-
Dec. 2007	1.5-2.5	1.6-2.6	2.0-3.0	1.2-2.4
March 2008	1.3-2.1	1.3-2.3	2.6-3.2	1.5-2.7
Source: ECB Monthly Bulletins	05/2008, p. 79 and 08/2007, p	o. 43. */ Eurosystem St	aff Projections.	

Evolution of the ECB staff projections of GDP growth rates and HICP in the euro area

In theory, post-shock inflation need not be a source of significant slowdown in GDP growth deceleration. In practice, however, things are usually different. Wage adjustments tend to be slower than domestic price adjustments. The implication is that the burden of the 'external price tax' falls primarily on employees, not on employers who have some command over the prices charged for their products²³. Insofar as the employees' propensity to save is lower, the resulting reallocation of income weakens overall consumer demand – and hence overall GDP growth.

Undue strengthening of domestic currencies not conducive to rapid growth

Further complications arise when the inflation so induced undercuts external competitiveness and/or when it leads to higher interest rate hikes that need not be all that conducive to domestic production and/or investment. It can be seen that external competitiveness is also likely to suffer on account of the ongoing nominal (and, of course, real) appreciation of the NMS currencies. The latter appreciation also has something to do with what is happening externally. As already mentioned, the ECB has dragged its feet in terms of raising its interest rates (and the FED has been hyperactive in reducing its interest rates). Those NMS wishing to combat domestic inflation by means of higher policy interest rates thus bolster nominal appreciation tendencies. (If they fail to raise their interest rates, they must reckon with the possibility of higher inflation at some future date, with real appreciation slipping in through the 'back door' as it were).

Last, but not least, the continuing weakness of the USD melds with the growing strength of the NMS currencies (and their relatively high interest rate spreads). This melding fuels appreciation still more.

²³ There was practically full employment and the trade unions held sway when the first oil price shocks hit the West in the early 1970s. The fight over who should pay the cost of quadrupling oil prices was long and fierce (fought during a period of protracted and severe 'stagflation'). Eventually the trade unions were beaten into submission and the rising oil import bills were passed onto labour.

In brief, ample opportunities emerge for securing large gains at a relatively low risk (as well as opportunities for avoiding capital losses on depreciating USD-denominated assets). The NMS are likely to become – or have already become as some analyses claim²⁴ – increasingly popular targets for 'idle' money, including money held in huge stocks of foreign exchange reserves that are accumulating in various sovereign funds in major energy-exporting countries. By no stretch of the imagination will either the Polish or Czech currency replace the USD as the lead international reserve currency. Unlike the USA which enjoys the 'exorbitant privilege' of being able to pay for real goods and assets with liabilities denominated in its own currency, neither Poland nor the Czech Republic stand to gain – over the long term – from the transient popularity of their currencies.

Figure 2



* Ascending line indicates appreciation.

Source: wiiw Monthly Database incorporating national statistics.

GDP growth largely uncoupled from external developments – at least thus far

Economic growth in the NMS has been slowing down (see Figures 1 and 3), while inflation has been accelerating (see Figure 4).

As discussed above, there are good grounds for interpreting these developments as being reflective of external or global impacts. However, only the acceleration of inflation can be safely attributed to external developments. It is also worth recalling that June 2007 marked the turning point as far as projections of inflation were concerned. Since then wiiw (in common with the OECD and IMF) has been successively revising upwards its 2007 and 2008 inflation forecasts for the NMS – in parallel with the ongoing inflationary impact that global price developments have had on the NMS. The most recent CPI forecast revisions for 2008 have proven to be the largest to date (see Table 2, below).

²⁴ The IMF World Economic Outlook, April 2008 (pp.88-92) suggests that gigantic sums of petrodollars are placed – primarily as bank loans – in the 'emerging Europe' (i.e. in the European transition economies).



Quarterly GDP, 2004-2008

real change in % against preceding year



Source: wiiw Annual Database incorporating national statistics, Eurostat,

Figure 4

Consumer price inflation, 2005-2008

year-on-year growth in %



Source: wiiw Monthly Database incorporating national statistics.

In contrast to rising inflation, the GDP growth deceleration in the NMS-7 does not seem to be attributable, at least so far, to the ongoing global (and euro area) growth slowdown. As can be seen from Table 2, the average wiiw growth forecast for the NMS-7 (i.e. the countries on which our attention has always been focused) for 2007 was continually revised *upwards* in the course of 2007. In other words, as global conditions worsened, our assessment of those countries' short-term prospects kept improving. This, of course, reflected their performance and prospects: constantly improving despite worsening external conditions. The forecasts for 2008 and 2009 do not show the same tendency as they are not changing much over time, nor are they getting substantially worse

either. In fact only one country (Hungary, whose recovery is now expected to be slower than previously thought) bucks the trend towards upward revisions for 2008 and 2009. In February 2008 Hungary's GDP growth rates for 2008 and 2009 were projected at 3.0% and 4.1%, respectively. At present, the respective growth rates stand at 2.5% and 3.4%. Of course, the relatively weak growth in Hungary is more specifically related to the manner in which economic policies are conducted domestically - not to any global events.

Evolution of the averages of the wilw projections for GDP growth rates and CPI in NMS-7,

Table 2

2007-2010												
GDP CPI												
	2007	2008	2009	2010	2007	2008	2009	2010				
Date of publication												
Feb. 2007	5.2	5.2	-	-	3.6	3.2	-	-				
Jul. 2007	5.5	5.3	-	-	3.5	3.1	-	-				
Feb. 2008	5.9	5.2	5.2	5.2	4.0	4.7	4.0	3.2				
Jul. 2008	6.0 ¹	5.3	5.0	5.2	4.0 ¹	5.8	4.1	3.3				
NMS-7 comprises the Cz	ech Republ	lic, Hungary	, Poland, Sl	ovakia, Sloveni	a, Bulgaria and Rom	nania.						
1) Actual realization, base	ed on officia	I national st	atistics (as o	of June 2008).								

Source: wiiw Research Reports (special issues) No. 335 and 341, wiiw Current Analyses and Forecasts, No. 1 and 2.

It may also be observed that in general the GDP growth rates for the Baltic countries have been revised downwards. For example, the EU Commission forecast in autumn 2007 envisaged rather high growth for 2008 (6.4% in Estonia, 7.2% in Latvia and 7.5% in Lithuania). In its forecast in spring 2008 (published at the end of May 2008) the respective figures were 2.7%, 3.8% and 6.1%. This, however, is not the end of the road. In all likelihood, actual growth rates will be even lower (at least in Estonia and Latvia).

The following statements can be made at this juncture:

- 1) A fairly moderate slowdown has been making itself felt throughout the NMS, except for Estonia and Latvia which are suffering something of a hard landing;
- Moderate slowdown in the NMS-7 (i.e. all NMS except the Baltic countries) had, however, been anticipated well before the turbulence broke out on the US and international financial and commodity markets. That anticipation, however, did not take account of the negative global shocks (which in any event had not been precisely predicted). Instead, the projections reflected an assessment of the imbalances and tensions that were developing endogenously in individual NMS. It is also worth adding that the prospects of a pretty hard landing for the Baltic countries had been on the cards for guite some time.
- The turbulence on the international financial and commodity markets cannot be blamed for the slowdowns/hard landing in the NMS. Of course, it is guite conceivable that if the

turbulence had not occurred, the slowdown observed might have been more moderate or delayed for a longer period.

4) In actual fact the NMS-7 (except Hungary) have performed better than originally expected despite the turbulence on the financial and commodity markets. Certainly, it would be unreasonable to claim that those countries have performed better than expected just because of these turbulences. The very fact that the NMS are performing quite well under such generally unfavourable external conditions suggests, however, that to a certain degree they are decoupled from negative global developments.

Hard landing in the Baltic countries

The hard landing in Estonia and Latvia comes as no surprise. The surprising thing, however, is that it has occurred at this late stage and has been really hard. Developments in both countries (and in Lithuania, as well) have long appeared unsustainable. That these countries' economies had managed to sustain themselves for such a long period is perhaps attributable to their otherwise good reputation. They had been the darlings of the IMF and the EU Commission on account of the liberal economic and social policies they pursued and their tendency to run up fiscal surpluses. Moreover, for quite some time they were held in high esteem for their low inflation which, however, was achieved by means of currency-board arrangements. All in all, this good reputation combined with macroeconomic stability attracted massive FDI inflows and proved conducive to hyper-rapid (and overall healthy) growth. Since 2000, the quality of growth has been imperceptibly worsening as the huge capital inflows morphed into rising consumer credit and housing mortgages that, in turn, nurtured rising imports (and current account deficits) and fuelled inflation. The process has been accelerating; it has not only led to very high GDP growth rates, but it has also undermined the competitiveness of domestic production (via rising prices and wage inflation) and has pushed private debt levels (domestic and foreign) to inordinately high levels. The important thing to notice is that under the currency-board regimes of the three Baltic countries, the customary self-correcting (at least partly so) mechanisms for adjusting interest and exchange rates have not really functioned. The only real policy tool at the authorities' disposal is fiscal policy. Although fiscal policy in the Baltic countries tends to run up some surpluses, it cannot do much to reduce the current account deficits which hover persistently around some 15% of GDP. Essentially, the only self-correcting mechanism available to these countries is via the rising debt burden and the loss of external competitiveness, both culminating in a slowdown of growth (primarily in private consumption combined with extravagant investment in housing). It goes without saying that this slowdown may not always suffice to eradicate on a more permanent basis tensions that build up over excessive internal and external debt/low competitiveness. Those tensions may become more or less endemic, even if the growth slowdown eventually transmutes into recession.

The plight of the Baltic countries bears obvious relevance to Bulgaria which, having been on the currency-board regime for a sufficiently long time seems to have traversed the path previously taken by the Baltic countries. However, the wiiw outlook for Bulgaria for the coming three years is still cautiously optimistic, despite looming risks. Bulgaria's situation seems still better because, unlike the Baltic countries, much of the huge current account deficit in Bulgaria still represents a rapid rise in

fixed capital formation in the productive sectors and continues to be largely funded by FDI inflows (see Table 3) Moreover, certain policy measures, such as increased reserve requirements and more restrictive bank supervision may well contribute to a temporary moderation of credit growth.

Table 3

			FDI ir	flow to N	IMS							
EUR million												
	2005	2006	2007 ¹⁾	2008 forecast	2005	2006 FDI net	2007 fr , % of CA	2008 orecast	2007 stock EUR mn			
Czech Republic	9354	4804	6711	6000	572	102	178	109	68641			
Hungary	6172	5428	4049	4000	73	46	21	41	66357			
Poland	8317	15198	12834	16900	185	111	91	64	110000 ¹⁾			
Slovakia	1952	3324	2387	2000	56	97	72	51	32000 ¹⁾			
Slovenia	473	512	1073	1200	-8	-24	-5	-31	8000 ¹⁾			
NMS-5	26268	29266	27054	30100	146	84	79	61	284998			
Bulgaria	3152	5961	6109	6000	119	130	95	61	24848			
Romania	5213	9060	7141	8000	76	86	42	42	41260			
Estonia	2255	1341	1815	1600	156	23	26	29	11282			
Latvia	568	1326	1589	1600	29	33	31	26	7226			
Lithuania	826	1448	1412	1600	37	48	26	21	10021			
NMS-10	38281	48402	45120	48900	114	80	60	50	379636			

1) wiiw estimate.

Note: CA means current account deficit. FDI net is defined as inflow minus outflow.

Source: wiiw FDI Database incorporating national bank statistics; wiiw forecasts.

Internally conditioned tensions and imbalances at the core of the current growth slowdown

Internally conditioned imbalances and tensions that built up during the recent period of rapid expansion are central to the gentle deceleration of growth in the Czech Republic, Poland, Slovakia and Slovenia foreseen for 2008. This will be followed by a general stabilization of growth rates in 2009 and beyond. (It should be recalled, however, that in Romania growth will continue to accelerate in 2008, only to be followed by some measure of deceleration at a later stage. In Hungary, growth is also expected to accelerate gradually in 2008 and beyond, albeit following hard on the heels of virtual stagnation in 2007). First, one can see an almost universal intensification of tensions and imbalances on the labour markets, with clear signs of shortages of adequately skilled workers in many sectors and/or regions²⁵. Secondly, despite generally good domestic demand prospects coupled with high levels of capacity utilization and more or less satisfactory financial conditions (such

²⁵ This issue was addressed in more detail in our previous analysis: Havlik, Holzner et al., 'Weathering the Global Storm, yet Rising Costs and Labour Shortages Dampen Domestic Growth', *wiiw Current Analyses and Forecasts*, No. 1, February 2008.

as relatively adequate profitability in the corporate sector and maintenance of fairly low market interest rates), gross fixed investment seems to be slowly running out of steam (see Table 4 and Figure 4 in the chapter on inflation in this report).

Table 4

Gross fixed capital formation

real change in % against preceding year

										Index 1995=100	in % of GDP
	2004	2005	2006	2007 ¹⁾	2007	2008	2008	2009	2010	2007	2007
					1st quarter		F	orecas	st		
Czech Republic	3.9	1.8	6.5	5.8	5.1	2.0	2	4	5	140.1	24.1
Hungary	7.6	5.3	-2.5	0.1	0.5	-5.4	4.5	6.5	10	197.1	20.9
Poland	6.4	6.5	14.9	17.6	23.8	15.7	16	12	6	235.4	21.7
Slovak Republic	4.8	17.6	8.4	7.9	11.0	2.4	6	6	5	196.3	25.7
Slovenia	7.3	2.5	8.4	17.2	21.2	17.1	8	4	5	242.8	28.7
Bulgaria	13.5	23.3	14.7	21.7	35.9	15.5	15	14	14	349.7	29.8
Romania	11.1	12.7	19.3	28.9	23.5	33.2	25	10	15	253.4	30.5
Estonia	4.4	9.9	22.4	7.8	15.0	5.2	3	4	6	416.2	31.9
Latvia	23.8	23.6	16.3	8.4	16.4	5.1	4	2	4	668.5	32.5
Lithuania	15.5	10.9	17.4	15.8	24.4	10.7	9	8	8	393.2	26.6
1) Preliminary.											
Source: wiiw Databas	se incorpor	ating na	tional st	atistics, for	ecast: wii	w.					

The reasons for this would appear to be largely cyclical: a period of brisk investment activity is invariably followed by a period of a relative calm essential to consolidating gains (and eventual losses). Of course, the heightened levels of uncertainty over the course of the exchange rates, prices and wages may also make firms more cautious in terms of their investment decisions. The uncertainty over energy price developments, for example, may prove to be a decisive factor when it comes to choosing the technologies to be used on newly installed machinery and equipment. The choice may be between energy-efficient technologies and more traditional less energy-efficient techniques. Once taken, however, the decisions are often irreversible. The potential costs of backing the wrong horse may be enormous. Under these circumstances, the optimal business tactics may simply be 'wait and see' – until a general consensus on energy price trends emerges²⁶. Certainly, increasing transfers of EU funds (co-financing infrastructural and environmental investment projects) will help stabilize overall investment in the NMS, yet they will not dispel fundamental uncertainties facing the business sector.

²⁶ The wait-and-see approach adopted by companies partly explains why the active 'Keynesian' policies failed to produce the desired results in the wake of the energy price shocks of the early 1970s. The impulses due to 'deficit spending' could not induce much additional business investment as long as it was rational to defer irrevocable decisions on the kinds of technologies to be put in place. Furthermore, with private investment insensitive to the policy-induced aggregate demand impulses, the policy itself was largely ineffective.

Contributions (percentage points) to the GDP growth rates												
	2002	2003	2004	2005	2006	2007	2007	2008				
Czech Republic												
GDP growth rate (%)	1.9	3.6	4.5	6.3	6.8	6.6	6.6	5.2				
Consumption	2.6	4.7	0.7	1.9	2.4	2.9	3.2	1.3				
Gross fixed investment	1.5	0.1	1.0	0.5	1.6	1.4	1.2	0.5				
Trade balance	-2.2	-0.9	1.3	4.7	1.8	1.2	1.2	2.1				
Other items*	0.0	-0.3	1.5	-0.8	1.0	1.1	1.0	1.3				
Hungary												
GDP growth rate (%)	4.4	4.2	4.8	4.1	3.9	1.3	2.7	1.7				
Consumption	6.8	5.8	1.9	2.4	1.8	-1.6	-2.9	-1.3				
Gross fixed investment	2.4	0.5	1.7	1.2	-0.6	0.0	0.1	-0.9				
Trade balance	-2.3	-2.5	0.9	2.9	2.9	1.9	3.6	3.5				
Other items*	-2.5	0.4	0.3	-2.4	-0.2	1.0	1.9	0.4				
Poland												
GDP growth rate (%)	1.4	3.9	5.3	3.6	6.2	6.6	7.3	6.1				
Consumption	2.5	2.2	3.3	2.2	4.2	4.3	5.8	3.6				
Gross fixed investment	-1.3	0.0	1.2	1.2	2.7	3.4	3.0	2.2				
Trade balance	0.5	1.1	-0.7	1.1	-1.1	-1.8	-2.2	-0.4				
Other items*	-0.3	0.6	1.5	-0.9	0.4	0.7	0.7	0.7				
Slovenia												
GDP growth rate (%)	37	2.8	4 4	41	52	61	7 2	54				
Consumption	17	2.0	22	21	3.0	2.0	14	24				
Gross fixed investment	0.3	1.8	1.8	0.6	21	4.5	5.1	4.6				
Trade balance	1.0	-2.1	-0.5	2.0	0.1	-0.8	0.3	-0.1				
Other items*	0.7	0.9	0.9	-0.6	0.0	0.4	0.4	-1.5				
Olassala Dansala II.a												
Slovak Republic	4 0	4 0	E 0	6.6	0 E	10.4	0.2	0 7				
Consumption	4.0	4.0	3.2	0.0 4 3	0.0 5 1	10.4	0.3 4 3	6. 7				
Gross fixed investment	4.0 0.1	-0.7	1.1	4.5	22	7.1	7.5	0.6				
Trade balance	0.1	-0.7	-0.8	-21	1.8	45	5.9	-0.6				
Other items*	0.4	-2.1	27	0.0	-0.6	-0.4	-4.5	37				
	0.0			0.0	0.0	0.1	1.0	0.1				
Bulgaria												
GDP growth rate (%)	4.5	5.0	6.6	6.2	6.3	6.2	5.5	7.0				
	5.8	5.2	4.9	4.7	0.3 0.5	4.4	5.7	4.5				
	1.0	2.0	2.7	4.8	3.5 E 1	5.7	1.1	4.5				
Other items*	-0.0	-4.4	-2.7	-4.5	-5.1	-4.9	-10.0	0.3				
Other items	-2.1	1.0	1.7	1.0	1.0	1.0	2.1	-2.5				
Romania												
GDP growth rate (%)	5.1	5.2	8.5	4.2	7.9	6.0	6.1	8.2				
Consumption	4.2	7.1	8.8	8.4	8.3	9.1	10.6	11.1				
Gross fixed investment	1.6	1.8	2.4	2.8	4.6	7.4	3.7	5.4				
Trade balance	0.9	-3.9	-4.9	-4.8	-7.3	-9.8	-10.8	-9.1				
Other items*	-1.6	0.2	2.2	-2.2	2.3	-0.7	2.6	0.8				
Estonia												
GDP growth rate (%)	8.0	7.2	8.3	10.2	11.2	7.1	10.1	0.1				
Consumption	6.6	5.5	4.3	6.4	8.9	6.1	10.3	0.1				
Gross fixed investment	6.5	5.8	1.4	3.0	7.0	2.7	4.8	1.7				
Trade balance	-3.8	-2.4	-0.6	2.0	-8.0	-1.4	-3.9	-0.7				
Other items*	-1.3	-1.7	3.2	-1.2	3.3	-0.3	-1.1	-1.0				
							ſ	Table 5 ctd.)				

Table 5

	2002	2003	2004	2005	2006	2007	2007	2008
							IQ	IQ
Latvia								
GDP growth rate (%)	6.5	7.2	8.7	10.6	12.2	10.3	11.3	3.3
Consumption	5	5.5	6.7	7.9	14.7	10.4	20.3	2.4
Gross fixed investment	3.2	3.2	5.9	6.6	5.0	2.7	4.5	1.6
Trade balance	-0.2	-4.4	-5.1	-0.1	-8.8	-4.9	-13.2	4.4
Other items*	-1.5	2.9	1.2	-3.8	1.3	2.1	-0.3	-5.1
Lithuania								
GDP growth rate (%)	6.9	10.3	7.3	7.9	7.7	8.8	8.1	6.9
Consumption	4.2	7.3	9.2	8.6	8.9	8.4	13.3	9.4
Gross fixed investment	2.2	2.9	3.3	2.5	4	3.9	4.8	2.4
Trade balance	-0 1	-2.5	-6.5	-17	-19	-34	-5.2	-5.8
Other items*	0.6	2.6	1.3	-1.5	-3.3	-0.1	-4.8	0.9
Eurozone								
GDP growth rate (%)	0.9	0.8	2.1	1.6	2.8	2.6	3.1	1.9
Consumption	1.0	1.1	1.2	1.2	1.5	1.4	1.4	0.8
Gross fixed investment	-0.3	03	0.5	0.6	11	0.9	14	0.5
Trade balance	0.5	-0.7	0.2	-0.2	0.2	0.4	03	0.7
Other items*	_0.3	0.1	0.2	0.0	0.0	_0 1	0.0	_0.1

Source: wiiw estimates incorporating national sources and Eurostat.

Finally, it is useful to take a look at Table 5. As can be seen, in almost all of the NMS where growth is expected to slow down (be it gently or abruptly), the foreign trade balance has not materially reduced the growth recorded in the first quarter of 2008. In actual fact, compared to the first quarter of 2007 the foreign trade balance has contributed positively more to GDP growth in the Czech Republic, Poland, Estonia and Latvia. The improvement in the contribution of the latter country's trade-balance to GDP growth has been truly spectacular. Whereas in the first quarter of 2007 the contribution of the trade-balances was dramatically negative (-13.2 percentage points), it has since become large positive (+4.4 p.p.). Of course, an improvement on this scale has to be attributed primarily to a dramatic reduction in the growth of domestic absorption. However, this supports our earlier contention that the hypothesis relating to the negative impact of external conditions on overall growth has not been convincingly substantiated in guantitative terms - at least as far as the countries listed above are concerned. Our point is further supported by the evidence garnered in Romania and Hungary, further to which it has not been contradicted by evidence from Slovenia (where the contribution of the country's trade-balance has been traditionally close to zero). In Romania, the (negative) contribution of net exports has diminished, despite continuing acceleration of the domestic absorption (and overall growth). In Hungary, the large positive contribution of the trade balance has also remained unchanged.

Only in Slovakia has there recently been a marked worsening in the contribution of the trade balance (from +5.9 p.p. in the first quarter of 2007 to -0.6 p.p. in the first quarter of 2008). It is highly improbable that this deterioration merely reflects the particularly high growth in domestic absorption that continued in the first quarter of 2008. Thus, Slovakia (and Lithuania, as well) appear to be the only countries where perhaps some signs can be discerned of external developments having had an

unfavourable impact on current developments. Of course, given the fact that the stock-building (plus the item called 'statistical discrepancy') have been recently playing a surprisingly important role in accounting for sources of growth in Slovakia, one cannot be all that definitive in this particular instance. It is possible that the massive rise in stocks (and discrepancies) represent output that will eventually be exported. In Lithuania, the rising (albeit negative) contribution may reflect the fact that in the first guarter of 2008 growth had still not slowed down all that much.

In summary, a strong case may be made for foreign trade developments *not* being responsible for the current slowdown in GDP growth in the NMS, even where the Baltic countries are concerned. Thus, although certainly not favourable to growth in the NMS, external conditions cannot be blamed for the slowdown. The reasons for the slowdown are still domestic in origin.

Foreign trade approaching the one trillion euro mark, while large FDI inflows and current account deficits continue

In terms of volume, the NMS annual turnover of foreign trade in goods will exceed the one thousand billion euro mark in 2008: double that of 2004. Foreign trade in services is also rising at an impressive rate. Rapid growth in both exports and imports will generally continue.

It is particularly significant that a new trend seems to be setting in. The tendency for export growth rates to be lower than import growth rates (both measured in current euros) is being generally reversed. Exports have started to rise more rapidly than imports, despite import bills being recently inflated by the high prices of imported energy carriers (see Table 6). It is especially encouraging to observe the same tendency in Bulgaria and Romania (both still enjoying rapid GDP growth). On the other hand, this tendency is only expected to devolve on Slovenia after some delay. (One may be witnessing the first signs of erosion in Slovenia's competitiveness owing to the euro having replaced the country's regularly devalued currency – and the ensuing real appreciation).

So far only the Czech Republic has consistently recorded a foreign trade surplus since 2005. From time to time Hungary also manages to reduce its trade deficit. However, this happens only when the authorities have no choice but to impose 'austerity' programmes designed to check run-away budget or current account deficits. Those programmes (viz. the current programme) invariably suppress consumption and imports, but they do not prevent the re-emergence of large trade deficits as soon as the crisis seems to be over). Slovakia may soon become the second country with a more or less permanent trade-surplus (as new capacities in the automotive industry come on stream).

The tendency for a gradual transformation of the NMS into net exporters (as distinct from having been net importers for many years) seems to be a natural consequence of those countries having become recipients of large inflows of foreign direct investment in the manufacturing sector. FDI has brought about qualitative improvements in manufacturing, while by and large keeping costs at bay. More importantly, large-scale foreign-owned manufacturing firms in the NMS no longer concentrate on conquering the domestic markets in the target countries. Instead, they use local resources (still

Table 6

		Foreign tra	de of the n	ew EU mem	nber states	5		
			(based on cus	toms statistics)				
		2005	2006	2007 ¹⁾	2008 1Q	2006	2007 ¹⁾	<u>1 Q 08</u> 1 Q 07
			EUR millio	n			change in 🤋	%
Czech	Exports	62738	75665	89055	24733	20.6	17.7	15.4
Republic	Imports	61441	74262	85995	23378	20.9	15.8	16.4
	Balance	1297	1403	3060	1354			
Hungary	Exports	50093	58997	68472	18343	17.8	16.1	12.8
	Imports	52996	61394	68781	18058	15.8	12.0	10.0
	Balance	-2903	-2398	-309	286			
Poland	Exports	71740	88259	101482	28722	23.0	15.0	20.8
	Imports	81530	101160	119143	33591	24.1	17.8	22.8
	Balance	-9791	-12901	-17661	-4869			
Slovakia ²⁾	Exports	25654	33120	42071	11556	29.1	27.0	18.6
	Imports	27571	35292	42704	11241	28.0	21.0	17.0
	Balance	-1917	-2172	-633	315			
Slovenia	Exports	14397	16757	19385	4992	16.4	15.7	6.0
	Imports	15804	18341	21487	5577	16.1	17.1	10.4
	Balance	-1408	-1584	-2102	-585			-
NMS-5	Exports	224621	272798	320466	88346	21.4	17.5	16.4
	Imports	239343	290450	338110	91845	21.4	16.4	17.0
	Balance	-14722	-17652	-17644	-3498			
Bulgaria	Exports	9466	12012	13474	3643	26.9	12.2	25.7
	Imports	14668	18479	21877	5711	26.0	18.4	21.6
	Balance	-5201	-6467	-8403	-2068			
Romania	Exports	22255	25850	29402	7965	16.2	13.7	13.5
	Imports	32568	40746	50993	12815	25.1	25.1	12.3
	Balance	-10313	-14895	-21591	-4850			
Estonia	Exports	6202	7720	8023	1997	24.5	3.9	4.6
	Imports	8230	10703	11321	2610	30.1	5.8	-3.9
	Balance	-2028	-2983	-3298	-613			
Latvia	Exports	4110	4686	5771	1528	14.0	23.2	17.4
	Imports	6925	9076	11101	2635	31.1	22.3	3.1
	Balance	-2816	-4390	-5330	-1107			
Lithuania	Exports	9490	11263	12522	3653	18.7	11.2	30.8
	Imports	12498	15429	17663	5125	23.5	14.5	29.9
	Balance	-3008	-4167	-5142	-1472			•
NMS-10	Exports	276144	334329	389657	107134	21.1	16.5	16.6
	Imports	314231	384884	451065	120741	22.5	17.2	16.3
	Balance	-38087	-50555	-61408	-13608			·

1) Preliminary. - 2) Excluding value of goods for repair.

Source: wiiw Database incorporating national statistics.

relatively cheap) such as labour, skills, energy and environment to produce competitively goods that are sold internationally. Rapid export growth is therefore a central characteristic of FDI at the current stage of development in the NMS. Other characteristics inherent in this current stage include: (1) persistence of large current account deficits; and (2) a certain level of overall insensitivity on the part of exports and trade balances to nominal appreciation of exchange rates²⁷.

			_									
Foreign financial position												
				in %	of GDP							
	e	Gross external debt ¹⁾		Res Nati (exclue	Current account							
	2005	2006	2007	2005	2006	2007	2005	2006	2007	2008 F	2009 orecas	2010 t
Czech Republic	38.3	37.1	38.0	24.4	20.4	17.8	-1.6	-3.2	-2.5	-3.0	-2.5	-2.5
Hungary	76.4	86.4	97.2	18.0	17.3	16.3	-6.8	-6.0	-5.0	-4.5	-4.2	-4.0
Poland	44.1	46.6	47.9	13.6	12.7	13.1	-1.2	-2.7	-3.7	-4.7	-5.4	-4.9
Slovak Republic	57.9	50.9	54.7	33.3	21.1	23.4	-8.5	-7.0	-5.3	-5.4	-6.0	-7.0
Slovenia	72.6	78.9	102.4	24.2	17.5	2.0	-2.0	-2.8	-4.9	-4.3	-3.7	-3.4
Bulgaria	69.8	80.7	97.3	31.1	32.9	38.8	-12.4	-17.8	-21.5	-20.0	-18.5	-16.6
Romania	39.4	40.5	52.4	21.4	20.9	22.6	-8.7	-10.4	-14.0	-14.6	-14.3	-13.0
Estonia	85.3	96.4	110.3	14.6	16.0	14.3	-10.0	-15.5	-17.4	-9.9	-9.9	-10.2
Latvia	99.4	114.0	134.2	14.6	20.9	19.3	-12.5	-22.5	-22.9	-16.9	-14.5	-14.6
Lithuania	51.2	60.9	73.3	15.2	18.2	18.4	-7.2	-10.8	-13.7	-14.1	-12.9	-14.8

1) End of period. - 2) Forex reserves, SDR and reserve position with the IMF. Including gold for the Czech Republic and Slovakia. Hungary: total reserves of the country. Slovenia: from 2007 (Euro introduction) only the foreign currency reserves nominated in non-euro currency are included.

Source: wiiw Database incorporating national statistics, forecast: wiiw.

Table 7

Large current account deficits (see Table 7) still persist and are even increasing, despite improvements in trade balances. This is clearly evidenced by trends in Slovakia, for example. The two trends are not mutually contradictory. Indeed, they are closely linked. Rising trade surpluses act to some degree as proxies for the rising profits of exporting companies. However, since those profits (whether actually repatriated or not) constitute a large segment of the official current account deficit, some form of association must obtain between persistent current account deficits and trade balance improvements.

²⁷ Exporting firms' export revenues expressed in domestic NMS currencies may shrink, *ceteris paribus*, owing to nominal appreciation: For an FDI firm this may be inconsequential because the profits to be repatriated – in euros – are not really affected by the local currency appreciating (or depreciating). Moreover, the loss of export revenue even in terms of the local appreciating currency may be reduced, if the exporting firm (whether domestic or foreign-owned) relies on imports of components used in the production of goods to be exported. (*Ceteris paribus*, appreciation makes such imports cheaper in local currency terms.)

The bottom line: supply-side remains strong despite appreciating currencies, rising wages and tightening labour markets

Currently, the NMS (including the Baltic three) have proved resistant to unfavourable external developments. GDP growth in the NMS-7 (except the Baltic three) has not slowed down much and the countries are proving increasingly successful in their role as exporters on international markets. Industrial production continues to rise at a generally high speed (Figure 5). Moreover, these developments have been accompanied by internal trends that are invariably considered unfavourable: appreciating currencies, rising wages and unit labour costs (see Figure 6) and tightening labour markets (as discussed at length in our previous analysis²⁸ – see also Table 8).

Figure 5 Gross industrial production, 2005-2008 cumulated, previous year = 100 HU - - SI C7 SK -PI BG = RO 120 120 115 115 110 110 105 105 100 100 Jan-05 Jan-08 Jul-05 Jan-06 Jul-06 Jul-07 Jul-08 Jan-05 Jan-06 Jul-08 92 Jul-06 Jul-07 Jan-08 lan-07 lan-07 h

Source: wiiw Monthly Database incorporating national statistics.

The resilience of the NMS-7 is founded on two pillars. On the one hand, the demand for domestically produced output has been sufficiently strong. On the other hand, however, the production sectors have been robust and flexible enough to match demand with rising output. In no small measure, strength on the supply side derives from recent intensified fixed capital formation (including FDI). Gains in overall efficiency (also due to structural changes) continue to generate labour productivity gains that, to a large extent, still offset the supply-side disadvantages of appreciating currencies and rising labour costs²⁹. In addition, the current alleviation of the corporate tax burden (though incurring a loss of budget revenue) lends firms (including local companies) financial support.

²⁸ P. Havlik, M. Holzner et al., 'Weathering the Global Storm, yet Rising Costs and Labour Shortages Dampen Domestic Growth', wiiw Current Analyses and Forecasts, No. 1, February 2008.

It is perhaps worth adding that rising wages have two aspects: a positive demand-side one, and a negative cost (or supply-side) one. It is essential that wages somehow strike a proper balance between the two aspects. Wages rising too weakly (relative to improving labour productivity) can be as harmful for the overall GDP growth (because of adverse effects on the domestic demand) as wages rising too strongly (because of adverse effects on external competitiveness).



Figure 6

Unit labour costs in industry, 2005-2008

EUR-adjusted, year-on-year, growth in %

Source: wiiw Monthly Database incorporating national statistics.

Table 8

Unemployment

	in 1000 persons					unemployment rate in %								
	2006	2007 ¹⁾	2007 1st q	2008 uarter	2004	2005	2006	2007 ¹⁾	2007 1st qu	2008 Iarter	2008 Fo	2009 precas	2010 st	
Czech Republic	371	276	311	244	8.3	7.9	7.1	5.3	6.0	4.7	5.0	5	4.5	
Hungary	317	312	316	333	6.1	7.2	7.5	7.4	7.5	8.0	7.8	7.8	7.5	
Poland	2344	1619	1894	1361	19.0	17.8	13.8	9.6	11.3	8.1	9	8	8	
Slovak Republic	353	292	303	281	18.1	16.2	13.3	11.0	11.5	10.5	10	10	9	
Slovenia	61	51	58	52	6.3	6.6	6.0	4.9	5.7	5.1	5	4.7	4.6	
NMS-5 ²⁾	3447	2550	2883	2271	14.9	14.1	11.4	8.5	9.7	7.6	8.1	7.6	7.3	
Bulgaria	306	240	273	229	12.0	10.1	9.0	6.9	8.0	6.5	6.0	5.6	5.2	
Romania	728	641	690	•	8.0	7.2	7.3	6.4	7.0	•	6.0	6	6	
Estonia	41	32	36	29	9.6	7.9	5.9	4.7	5.3	4.2	5.5	6.5	8	
Latvia	80	72	80	80	10.4	8.7	6.8	6.1	6.9	6.5	6.5	7	8	
Lithuania	89	69	80	78	11.4	8.3	5.6	4.3	5.0	4.9	4.5	4.5	5	
NMS-10 ²⁾	4691	3604	4041		12.9	11.9	10.0	7.7	8.7	-	7.3	7.0	6.8	
1) Preliminary 2) v	viiw estir	nate.												
Source: wiiw Database incorporating national statistics, forecast: wiiw.														

LFS definition, annual averages

Certainly, strong fixed capital formation is not only a matter of proper institutional conditions being satisfied. Such conditions have long been in place in the Baltic countries (where the pace of fixed capital formation has generally been quite high). It is also important that macroeconomic policy has

the ability (and will) to prevent (or at least reduce) the tendency of fixed capital formation to take the form of excessive investment in residential construction (such as speculative housing booms). Furthermore, it should be recalled that there are always some limits to the levels of currency appreciation and wage hikes that an economy can absorb without incurring risks to long-term growth. This is the lesson to be drawn from the Baltic countries' recent experience (as well as that of Italy, among others). That lesson will gain in validity for other NMS – especially as they come closer to joining the euro area.

The risks of adopting the euro prematurely

From time to time (but generally rather infrequently) one NMS country or another suffers a fit of fiscal or monetary policy folly which precipitates a slowdown in growth. Usually it is a question of excessive 'reform zeal' (such as that recently shown by the Czech government introducing – for no obvious economic reasons – a flat tax on personal incomes). Alternatively, the fiscal (or social) policy follows stop-go cycles closely synchronized with the election calendar (which is typical for Hungary, for instance).

While the fiscal and 'systemic' policies (be they good or bad) remain in principle the responsibility of individual NMS, the policy governing adoption of the euro (and prior to that, participation in the so-called Exchange Rate Mechanism-II) was imposed on the NMS during the EU accession negotiations. To date only one NMS has adopted the euro: Slovenia³⁰; Slovakia will follow next at the beginning of 2009. The three Baltic countries, which first seemed the most likely candidates to join the euro area at an early stage, failed at the gate since their rapid debt-driven growth had already pushed their inflation rates above the relevant Maastricht criterion two years previous.

The advantages of switching to the euro are legion. They include lower transaction costs and greater transparency of prices, as well as insensitivity to exchange rate and currency risks. In the short run, most of the NMS that adopt the euro can also look forward to a drop in interest rates (and consequently a lower public debt servicing burden). Moreover, the countries currently suffering from the impact of nominal appreciation pressures would enjoy appreciable relief. These advantages would come at a potentially excessive cost. Should, at some time in the future, an NMS start losing external competitiveness vis-à-vis other euro area countries, it may be condemned to more or less permanent stagnation - without being able to adjust by devaluing its national currency against the euro. This is not a hypothetical situation; it is reality. For almost ten years Portugal and Italy have been unable to withstand the pace of productivity growth and wage deflation in the more dynamic segments of the euro area. Both countries (likely to be joined soon by Spain) have thus been stagnating. Moreover, relatively little can be done to break out of that stagnation. The situation can even worsen, if adoption of the euro happens to be combined with a pronounced (and abrupt) drop in domestic interest rates on commercial loans. Such a drop is likely to generate an artificial consumption boom accompanied by a rise in inflation and foreign borrowing, as well as burgeoning asset bubbles (including housing). A swift rise in fixed capital formation in productive export activities may well follow, but of course it need not. This, however, is an exact description of the events that

³⁰ Of course not counting Malta and Cyprus, which are of limited interest to us.

have led up to the present 'adjustments' in the Baltic countries. Furthermore, those countries had also abrogated their sovereignty over monetary policy. Having fixed the exchange rates, they could initially reduce inflation and the interest rates. However, those countries found themselves defenceless in face of asset-price booms, rocketing debts, inflation and – worst of all -evaporating external competitiveness. None the less, their situation is not as bad as it could have been, had they already adopted the euro as legal tender. In principle, they could – if they so wished – still opt out of the self-imposed currency-board arrangements. (Or at least they could change the fixed parities of their currencies). Slovenia (and soon Slovakia) does not have even that option. It is still an open question whether over the long term those two countries will remain as successful as they have been to date³¹. Of course, they can remain successful – provided they keep up with Germany, for example, insofar as progress on labour productivity and unit labour costs is concerned.

Conclusions: the NMS weathering the global storms quite well

Growth in the NMS has been slowing down somewhat, with more pronounced (and long overdue) adjustments in the Baltic countries (especially Estonia and Latvia). The slowdown is generally more moderate than commonly expected and cannot be linked to storms on the global financial or commodity markets. Growth in the NMS appears to be largely decoupled from negative global impacts although, of course, the NMS feel the (transient) effects of global price or supply shocks. The resilience of the NMS derives from growing labour productivity partly offsetting the combined effects of appreciating currencies and rising wage costs. The semi-sovereign monetary policies pursued in the major NMS (excluding the Baltic countries, Bulgaria, Slovenia and – soon – Slovakia) bear many risks, yet on the whole they have proven effective in preventing the rise of excessive credit booms and excessive real appreciation.

³¹ The recent massive revaluation of the Slovak currency will certainly help to limit domestic inflation. However, its impact on the external competitiveness of smaller domestically-owned firms should not be underestimated.



Anton Mihailov

Bulgaria: weathering the global turmoil

In the first quarter of 2008, Bulgaria's economy performed better than earlier expected with GDP increasing by 7% year-on-year. On the supply side, both manufacturing and services contributed to this positive outcome, while agriculture has still not recovered from the slump experienced in the second half of 2007. Notably, there have been some important recent shifts in the composition of final demand. Since the second quarter of 2007, the growth contribution of net exports has been improving and in the first quarter of 2008, net exports made a positive contribution to quarterly GDP growth, which has happened for the first time since the third quarter of 2004. These shifts mostly resulted from improving export performance while both private consumption and fixed investment remained buoyant in this period.

Consumer boom continues

The direct effects of the global financial crisis on Bulgaria's economic performance have so far been insignificant. The most visible negative consequence has been a deterioration in the external borrowing conditions for Bulgarian banks which, in turn, has been passed on to the domestic credit market. It is estimated that this has resulted in a rise in the cost of domestic borrowing by some 1-2 percentage points. Despite the rising borrowing costs, the credit boom in Bulgaria is far from over: in April, the stock of outstanding claims on the corporate sector was still growing at close to 60% year-on-year while the rate of growth of household credit was around 50%. There was no rise in the share of substandard and dubious loans. Financial leasing is also booming: the total amount of leasing companies' claims at the end of March 2008 increased by 85% compared to a year earlier.

During the first months of 2008, the pace of inflation remained high. In May, the 12-month rolling average rate of CPI growth reached 12.2%, up from 8.4% in December 2007. Both the government and independent analysts consider that the inflation rate will slow down in summer (in part, in view of the expected good harvest). Nevertheless, due to carryover effects, the average annual CPI figure for 2008 as a whole is likely to be much higher than previously envisaged. The main factors for the surge in inflation have been similar to those in other Central and East European countries (high food and energy prices, strong domestic demand, pro-inflationary pressures emanating from the tight labour market as well as ongoing price convergence at par with real convergence). However, some of these effects were more pronounced in Bulgaria as compared to other countries. Thus in April 2008, the annual increase in food prices in Bulgaria (25.4% year-on-year) was by far the highest in the EU.

In view of the currency board arrangement, policy has limited options in countering this inflationary surge. The fiscal response has been inconsistent and somewhat controversial. On the one hand, when drafting the 2009 budget, the government announced that it would continue to stick to its 3% surplus target in 2009 as well (which was a change from earlier intentions of a lower surplus). On the other hand, income policies have succumbed to populist pressures with several subsequent wage increases for different categories of public servants. The latest in this series was the tripartite agreement covering the healthcare sector signed in early June, which envisages doubling of the minimum wages in the sector and significant rises in other wage categories. The government also plans to raise average pensions by 10% in July 2008 and by a further 20% in October, while the draft budget for 2009 envisages increasing the economy-wide minimum wage by 9% to 240 BGN.

With persistently high labour demand, the labour market remains very tight. Employment in the first quarter of 2008 grew by more than 5% year-on-year (LFS data) partly thanks to increasing re-entries from inactivity. In an attempt to address the growing labour shortages, the authorities adopted a labour migration strategy for 2008-2015 seeking to attract workers from abroad based on a 'green card' system and bilateral agreements with other countries. The government is also considering dismantling the remnants of its active labour market policies and discontinuing subsidized employment as well as further reducing the maximum duration of the unemployment benefit.

Widening of current account deficits slowed down

With exports outpacing imports, the pace of widening of the current account deficit slowed down somewhat in the first quarter but there are no indications of a possible major reversal in the short run. Private foreign debt also continued to rise and total external debt is likely to top 90% of GDP in 2008. Inward FDI was below expectations in the first months of 2008 but the factors behind this are not yet clear.

By contrast, fiscal outturns continued to outperform expectations: the consolidated budget surplus in the first four months of the year (BGN 2.70 billion) was more than double that in the same period of 2007. In this period, the government executed early repayment of some EUR 300 million of official external obligations (to the World Bank and the Japan Bank for International Cooperation) which resulted in further reduction in the level of public debt in both absolute and relative terms. While part of the current surplus is attributable to delays in some spending plans (in particular, for co-financing of EU-backed projects), the surplus for the year as a whole is likely to exceed the 3% budget target.

Following a series of political and corruption-related scandals, there was a major government reshuffle in April resulting in the replacement of the interior, defence, agriculture, and health ministers. A new deputy prime minister without portfolio was appointed, responsible for monitoring the implementation of EU-funded projects. Bulgaria still faces the threat of freezing of EU funds due to failure to deliver on its commitments to reform the justice system and combat corruption and organized crime. Nevertheless, the three-party coalition appears to be stable and likely to complete its term in office (the next parliamentary elections are due in mid-2009).

Upbeat outlook despite external uncertainties

The government remains upbeat about the economic outlook for 2009-2010 with official annual GDP growth forecasts in the range of 6.5% to 7.0%. However, given the lingering uncertainties in the external environment, these forecasts may be somewhat optimistic. Nevertheless, on balance, sound GDP growth is likely to continue in the next two years, driven by solid domestic demand and improving export performance. Fixed investment – a key driver of both GDP growth and of the current account deficit – is set to remain robust, boosted by massive FDI, public investment in infrastructure and vigorous private construction activity. On the supply side, labour shortages will pose some constraints on higher growth and will at the same time continue to feed inflationary pressures. Despite that, unemployment rates will remain relatively high due to persistent structural problems. Inflation is likely to remain high, at par with dynamic economic activity.

Table BG

Bulgaria: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 2008 1st quarter		2008 2009 Forecas		2010 st
Population, th pers., end of period	7761.0	7718.8	7679.3	7640.2					
Gross domestic product, BGN mn, nom. 2)	38822.6	42797.4	49361.0	56519.8	11287.5	13483.5	66500	76000	85000
annual change in % (real) ²⁾	6.6	6.2	6.3	6.2	5.5	7.0	6	6	6.2
GDP/capita (EUR at exchange rate)	2551	2827	3278	3773					
GDP/capita (EUR at PPP - wiiw)	7290	7890	8640	9490					
Gross industrial production									
annual change in % (real) ³⁾	13.9	10.0	9.7	9.3	9.4	3.7	6	8	9
annual change in % (real)	6.6	-6.0	-0.1	-21.9			-		
Construction output total	35.2	31.9	23.0	15 5			-		•
	55.2	31.0	23.9	15.5	•	•	-	•	•
Actual final consump.of househ.,BGN mn,nom.	30155.5	33556.4	38558.9	43152.3	9495.3	11389.7			
Cross fixed capital form BCN mp. nom	7060 4	10246 5	12005 2	16922 5	2106.0	4100.9	5	5.5	0.0
choss like capital lottil, BGN IIII, Iotti.	1909.4	10340.5	12005.2	10032.5	3190.0	4100.0	. 15	. 14	. 14
annual change in % (real)	13.5	23.3	14.7	21.7	30.9	15.5	15	14	14
LFS - employed persons, th, avg.	2922.5	2980.0	3110.0	3252.6	3135.4	3289.9	3420		
annual change in %	3.1	2.0	4.4	4.6	6.6	4.9	5.1		
Reg. employees in industry, th pers., avg.	695.8	693.0	711.6	710.0	705.3	712.6			
annual change in %	0.9	-0.4	2.7	-0.2	0.7	1.0			
LFS - unemployed, th pers., average	399.7	334.2	305.7	240.2	272.7	228.8	210		
LFS - unemployment rate in %, average	12.0	10.1	9.0	6.9	8.0	6.5	6.0	5.6	5.2
Reg. unemployment rate in %, end of period	12.2	10.7	9.1	6.9	8.9	6.8	6.2		
Average gross monthly wages, BGN	292.4	323.7	360.3	431.2	384.3	484.3	540		
annual change in % (real, gross)	0.8	5.4	3.7	10.4	11.1	11.2	11.8		•
Consumer prices, % p.a.	6.1	5.0	7.3	8.4	5.2	13.3	12	8	5
Producer prices in industry, % p.a.	6.0	6.9	9.2	8.6	7.4	14.3	10		
General governm.budget, EU-def., % GDP 4)									
Revenues	41.2	41.0	39.4	41.2				-	
Expenditures	39.7	39.2	36.4	37.8					
Net lending (+) / net borrowing (-)	1.4	1.8	3.0	3.4					
Public debt, EU-def., in % of GDP 4)	37.9	29.2	22.7	18.2			15		
Base rate of NB % p.a., end of period	2.4	2.1	3.3	4.6	3.5	4.8			
Current account, EUR mn	-1306.9	-2705.7	-4490.5	-6219.9	-1574.0	-1670.8	-6800	-7200	-7200
Current account in % of GDP	-6.6	-12.4	-17.8	-21.5	-27.3	-24.2	-20.0	-18.5	-16.6
Gross reserves of NB excl. gold, EUR mn	6443.0	6815.7	8309.0	11215.5	8343.4	11355.5			
Gross external debt, EUR mn	12658.5	15268.2	20369.9	28123.7	21048.2	29212.0			
Gross external debt in % of GDP	63.8	69.8	80.7	97.3					
FDI inflow, EUR mn	2735.9	3152.1	5961.0	6108.9	897.2	740.0	6000	6000	6000
FDI outflow, EUR mn	-165.6	249.1	136.8	190.8	-7.6	391.3	360	•	
Exports of goods, BOP, EUR mn	7984.9	9466.3	12011.9	13473.6	2899.1	3643.3	16500	19000	21500
annual growth rate in %	19.7	18.6	26.9	12.2	8.5	25.7	22.5	15.2	13.2
Imports of goods, BOP, EUR mn	10938.4	13876.1	17574.1	20830.6	4474.1	5428.1	24500	27500	30000
annual growth rate in %	20.3	26.9	26.7	18.5	19.5	21.3	17.6	12.2	9.1
Exports of services, BOP, EUR mn	3262.1	3564.1	4186.4	4619.4	719.1	801.2	5100	5600	6100
annual growth rate in %	19.5	9.3	17.5	10.3	16.7	11.4	10.4	9.8	8.9
Imports of services, BOP, EUR mn	2605.8	2745.2	3259.6	3507.6	779.1	946.2	4000	4500	5000
annual growth rate in %	19.8	5.3	18.7	7.6	8.9	21.4	14.0	12.5	11.1
Average exchange rate BGN/USD	1.575	1.574	1.559	1.429	1.493	1.305			
Average exchange rate BGN/EUR (ECU)	1.956	1.956	1.956	1.956	1.956	1.956	1.956	1.956	1.956
Purchasing power parity BGN/USD	0.576	0.593	0.624	0.655	· .		.	-	
Purchasing power parity BGN/EUR	0.685	0.701	0.742	0.777					

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) Quarterly data refer to enterprises with more than 10 employees. - 4) According to ESA'95, excessive deficit procedure.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Leon Podkaminer

The Czech Republic: slowdown underway

Weak consumption growth and stagnant investments

After 11 quarters witnessing the GDP rising by more than 6% (year-on-year), growth has slowed down perceptibly, to 5.3%, in the first quarter of 2008. The rate of growth of gross industrial production even halved (to 5.7%). Despite favourable weather conditions the construction sector came close to stagnation (after experiencing real growth of nearly 30% a year earlier). The value of orders placed with the industry remained virtually stagnant (and the total value of export orders declined). Yet strong growth in production volumes and in values of new orders placed has been continuing in the major (foreign-controlled) exporting branches which have been boosting the economy (e.g. manufacture of medical, precision and optical instruments; transport equipment; electrical machinery and apparatus, etc.). Production and sales of domestic manufacturing products (such as food products) have declined in real terms, suggesting that the food price hikes are having significant negative effects on consumer demand. While information on the commodity composition of consumer demand is available upon a long delay, the current data on the volume of aggregate consumer demand suggest that its growth has slowed down considerably - from 7% in the first quarter of 2007 to 2.7% in the first quarter of 2008. Also capital formation performed very weakly, while rising inventories have had inordinately high contributions to GDP growth.³² Foreign trade, with exports of goods and services rising by 12.5% and imports by 10.8% (both in real terms), remains a bright spot presently contributing 2.1 percentage points to the overall GDP growth.

Fiscal reform taking its toll

Inflation, still very low in the first half of 2007, became significantly higher in the closing months of the year, with the externally-conditioned increases in prices of food peaking in October and November 2007. In December inflation was calming down – only to be given a strong push by some provisions of the fiscal reform which was inaugurated on 1 January 2008. The reform introduced a higher VAT tax rate on food (9% instead of 5%) and raised regulated prices/tariffs in transportation, energy (including electricity), public utilities, housing rents and also some fees in public health services. The consumer price index jumped by 3% (month-on-month) in January (up from 0.5% in December

³² According to the recently revised official statistics, in 2006 and 2007 the rising inventories contributed 1 and 1.1 percentage points respectively to the overall GDP growth. In the first quarter of 2008 that contribution was 1.3 percentage points.

2007), with food prices rising $2.3\%^{33}$ and the price index of housing, water, energy and fuels by 5.2%. A record hike was registered for the price index for the aggregate encompassing health services which at one stroke moved up by no less than 30%. All in all, out of the 7.4% (year-on-year) inflation in the first quarter of 2008, some 4.2 percentage points are attributed to changes in indirect taxes and the regulated prices (the latter alone rising by an estimated 15%).

Rising indirect tax rates and regulated prices had one-off effects on inflation at the beginning of 2008. The second-round effects will follow but – unless associated with strong compensatory hikes in wages and other incomes (such as pensions) – will be dying down relatively quickly. This is acknowledged by the Czech National Bank which, though likely to remain watchful, does not seem to realize any urgent need to tighten its policy. Consistent – and much stronger than generally believed even recently – nominal appreciation of the Czech currency will be acting as a quite powerful brake on inflation, which in 2009 is likely to fall below the 3% mark.

The fiscal reform's consequences for real growth do not seem to be as benign, or short-lived, as is the case with inflation. The short-term effects are already having a negative impact on aggregate private consumption: the latter's dynamics has become rather anaemic recently. Of course, it may be argued that the effects of the administered price shock on consumer demand are transient and due to temporarily enhanced uncertainties because aggregate disposable household incomes (and even average wages) have been rising in real terms. In actual fact, a part of that rise in aggregate disposable income is a by-product of the fiscal reform itself (lower personal income tax with a single rate of 15%, gradually lowered corporate income tax rate). However, even if the average household realizes the facts (improving disposable incomes and falling inflation), its propensity to consume out of the disposable income may have been permanently lowered. This is so because on balance the whole reform stipulates a definite redistribution of the total available disposable income among household classes distinguished by the levels of affluence. The reform is clearly anti-egalitarian in character, with the affluent classes gaining (via lower personal tax rates and lower social security contributions) most and the poor ones losing (via higher VAT on food and higher regulated prices of necessities, but also because of reduced levels of potential publicly financed benefits) most. Given the fact that low-income households tend to spend proportionately more out of their incomes than the rich ones, the redistribution implicit in the fiscal reform is no doubt reducing the average private consumption propensity (and will have important additional structural effects as well)³⁴. Alternatively, the fiscal reform is increasing the household sector's propensity to save. Indeed, this is an important motivation of the reform. (However, it is hard to see what is so positive about having a higher private saving propensity - perhaps except mitigating dangers of a credit-financed spending boom.) Unless rising saving propensity happens to be associated with higher private propensity to invest (in fixed

³³ In one of the reports of the Czech National Bank it has been suggested that the actual inflationary impact of the increased VAT on food may have been higher, as the retail food price increases in the fourth quarter of 2007 already factored-in higher VAT rates.

³⁴ For example, consumer demand for basic necessities (important for the poor households) may become especially depressed. The decline in sales of the products of the food industry recorded in the first quarter of 2008 may be a reflection of such a structural change.

assets), the higher saving propensity is likely to act as a permanent impediment to overall GDP growth.

Anaemic fixed investment and vigorous foreign trade

As expected, gross fixed investment remains anaemic – and that despite domestic conditions that are generally considered conducive (high levels of productive capacity utilization, adequate average profitability of the non-financial corporate sector and still relatively low real interest rates). Apart from enhanced uncertainties over e.g. exchange rates or global demand or price developments, there seem to be some secular reasons for the weakness of gross fixed investment in the Czech Republic. Given the fairly high levels of fixed capital installed, the return on rising fixed assets may be judged rather unsatisfactory (for instance as compared with the returns to be achieved elsewhere). Of course, the returns to investments in selected branches are still very high, which is evidenced by the size (and concentration) of the recent FDI inflows. Besides, investments are and will be supported by increased EU transfers.

Investments apart, increased EU transfers and high inflows of FDI help to support the strong appreciation of the Czech koruna. Neither the strengthening currency, nor the ongoing growth slowdown in the 'old' EU, are affecting the performance of foreign trade too much – at least for the time being. In euro terms, exports of both goods and services continue to rise strongly. Growth of imports was slightly faster – which is justified e.g. by higher world market prices of energy carriers. In the first quarter of 2008 the positive balance of trade in goods has remained unchanged though, while the positive balance of trade in goods and services rose by close to 25% (to over EUR 2.5 billion).

The positive trends in foreign trade will persist in 2008 as well as in 2009-2010. Trade will continue to contribute positively to GDP growth, especially as the moderated household spending is likely to reduce imports of consumer goods. Gains in exports will be made possible by the ongoing expansion of production capacities in the key export-oriented branches (such as the automotive and related industries). Given the still comparatively low levels of unit labour (and other) costs in manufacturing and the ongoing productivity and quality improvements, the rising nominal wages (and even some additional nominal appreciation) need not be a problem for the large foreign-controlled firms.

The growth slowdown in 2008 has clearly domestic roots – the shock generated by the fiscal reform being the major one. In 2009 and 2010 some effects of the shock will most probably wear off. But a renewed pronounced acceleration of overall growth is not guaranteed. Much will depend on the evolution of the business sector's investment sentiments. If the cuts in the corporate income tax rates prove effective enough in promoting a much faster pace of fixed capital formation, the overall growth may become impressive again. Otherwise, growth rates may hover at about 5% per year – still not a bad result for a country that is relatively well off in per capita income terms (more than 80% of the EU average) and blessed with low levels of unemployment.

Table CZ

Czech Republic: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st q	2008 uarter	2008	2009 Forecas	2010 st
Population, th pers., mid-year	10206.9	10234.1	10266.6	10325.9			10350	10380	10410
Gross domestic product, CZK bn, nom. $^{2)}$	2814.8	2983.9 6.3	3215.6 6.8	3551.4	821.9 6.6	893.2 5.2	3940 4 7	4250 5	4570 5
GDP/capita (FUR at exchange rate)	8644	9789	11051	12388	0.0	0.2		Ŭ	Ũ
GDP/capita (EUR at PPP - wiiw)	16260	17130	18410	20120	•				
Gross industrial production									
annual change in % (real) ³ Gross agricultural production	9.6	6.7	11.2	8.2	11.3	5.7	6.5	8	8
annual change in % (real) Construction industry	14.9	-4.8	-4.2						
annual change in % (real)	9.7	4.2	6.6	6.7	28.8	4.2			
Consumption of households, CZK bn, nom. ²⁾	1399.2	1442.7	1543.0	1680.3	386.6	424.6	:	2	2
annual change in % (real) ² /	2.9	2.5	5.4	5.9	7.0	2.7	4	5	5
Gross fixed capital form., CZK bn, nom. ²⁷	727.2	741.9	792.4	857.0	187.3	199.1		:	-
annual change in % (real) -/	3.9	1.8	6.5	5.8	5.1	2.0	2	4	5
LFS - employed persons, th, avg.	4706.6	4764.0	4828.1	4922.0	4865.0	4958.3			
annual change in %	-0.6	1.2	1.3	1.9	1.7	1.9	1.5	1	0
LFS - employed pers. in industry, th, avg.	1409.0	1422.0	1493.3	1532.5	1515.7	1553.9			
annual change in %	-1.1	0.9	5.0	2.6	2.7	2.5			
LFS - unemployed, th pers., average	425.9	410.2	371.3	276.3	311.2	243.8			
LFS - unemployment rate in %, average	8.3	7.9	7.1	5.3	6.0	4.7	5.0	5	4.5
Reg. unemployment rate in %, end of period	9.5	8.9	7.7	6.0	7.3	5.6	5.5		
Average gross monthly wages, CZK ⁴⁾	18041	18992	20219	21694	20411	22531			
annual change in % (real, gross)	3.7	3.3	3.9	4.4	6.2	2.8	3	4	4
Consumer prices, % p.a.	2.8	1.9	2.5	2.8	1.6	7.4	6	2.8	2.5
Producer prices in industry, % p.a.	5.7	3.0	1.6	4.1	3.2	5.7	4	3	2
General governm. budget, EU-def., % GDP 5)									
Revenues	42.2	41.4	41	40.8			40.7	40.7	•
Expenditures	45.1	44.9	43.6	42.4			42.2	41.8	
Net lending (+) / net borrowing (-)	-2.9	-3.6	-2.6	-1.6			-1.4	-1.1	
Public debt, EU-def., in % of GDP ³	30.4	29.7	29.4	28.7			28.1	27.2	
Discount rate, % p.a., end of period	1.5	1.0	1.5	2.5	1.5	2.8	3	2.5	1.5
Current account, EUR mn	-4650	-1638	-3575	-3222	806	1058	-4600	-4300	-4700
Current account in % of GDP	-5.3	-1.6	-3.2	-2.5	2.7	3.0	-3.0	-2.5	-2.5
Gross reserves of NB Incl. gold, EUR mn	20884	25054	23882	23705	23826	24016		•	•
Gross external debt, EUR mn	33212	39379	43415	50669	43467		-	•	•
Gross external debt in % of GDP	35.9	38.3	37.1	38.0				•	•
FDI inflow, EUR mn	4009	9354	4804	6711	1327	1125	6000		
FDI outflow, EUR mn	824	-12	1172	979	108	309	1000		
Exports of goods, BOP, EUR mn	54091	62781	75706	89142	21444	24895	103000	117000	131000
annual growth rate in %	25.6	16.1	20.6	17.7	19.9	16.1	16	14	12
Imports of goods, BOP, EUR mn	54517	60797	73414	84914	19815	23263	99000	113000	127000
annual growth rate in %	20.5	11.5	20.8	15.7	17.6	17.4	16	14	12
Exports of services, BOP, EUR mn	7761	9478	10936	12307	2649	3427	13000		
annual growth rate in %	12.8	22.1	15.4	12.5	8.5	29.4	15		
Imports of services, BOP, EUR mn	7245	8254	9449	10318	2219	2502	11000		
annual growth rate in %	12.1	13.9	14.5	9.2	4.8	12.8	10		
Average exchange rate CZK/USD	25.70	23.95	22.61	20.31	21.40	17.05			
Average exchange rate CZK/EUR (ECU)	31.90	29.78	28.34	27.76	28.04	25.55	25.4	25.0	24.5
Purchasing power parity CZK/USD	14.27	14.40	14.19	14.42					
Purchasing power parity CZK/EUR	16.96	17.02	17.01	17.10			-		

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) According to new calculation. -

4) Enterprises with more than 20 employees, including part of the Ministry of Defence and the Ministry of the Interior. - 5) According to ESA'95, excessive deficit procedure.

Source: wiiw Database incorporating national statistics; Eurostat; wiiw forecasts.



Sándor Richter

Hungary: improving domestic and foreign balances versus sluggish growth and failed reforms

Political stalemate blocks reforms

In summer 2006 the re-elected socialist-liberal government launched a comprehensive stability package meant to confront the mounting fiscal and external imbalances. The package had two main components. First, immediate measures to cut the budget deficit and diminish the current account deficit, and second, to prepare and introduce a series of reforms (health care, education, pension, public administration, local governments) in order to guarantee the sustainability of the fiscal balance also beyond 2010. The first part of the package has been a clear success: the general government deficit came down from 9.3% at the end of 2006 to 5.5% by the end of 2007, and in the light of the figures of the first four months of 2008 the deficit may drop below 4% of the GDP this year. The external equilibrium has been improving to a considerable extent as well. Important elements of the second part of the stability package, however, failed disgracefully. The flagship of the reforms, the re-designed health insurance system based on a kind of public-private partnership, was first approved by the parliament. However, the referendum of 9 March annihilated two already introduced symbolic elements of the health care reform. In response, the government withdrew the whole health insurance reform package. Prime Minister Gyurcsany, who only two years ago had put his whole political future at stake in order to convince his fellow socialist MPs of the case for radical reforms, now announced the dawn of a new era, that of the 'velvet' reforms. As a consequence, the radical reform-minded liberals withdrew from the coalition.

The future of the indeed badly needed reforms is now completely open. Liberals are likely to tolerate the new minority socialist government, as early elections would probably result in Viktor Orbán's return to power, with a two-third majority and a mandate to change the constitution. But they will not be ready to support half-hearted reforms. The socialists' wish to gain popularity, however, may necessitate the revival of the policy of budgetary spending, and/or half-hearted reforms. Should this stalemate lead to early elections, the incoming FIDESZ (Orbán) government may easily fall hostage to its own rhetoric in the years past, promising a painless restoration of fiscal balances without reforms.

Recovery slower than expected

The first-quarter GDP growth rate of 1.7% still fits the trends of last year. Areas hit immediately by the stabilization measures suffer, others expand. Public consumption declined by 5.2%. Household consumption expenditure increased marginally, but due to the fall in social transfers in kind overall household consumption decreased slightly. Bad news is coming in about investment: here a decline by more than 5% was registered in the first quarter, though partly due to the high 2007 basis. Some

areas, however, recorded a considerable expansion of investment, such as agriculture, up by close to 44%. Net exports have been the engine of growth. The gap between growth rates of commodity exports and imports exceeded 5 percentage points in the first quarter, and the trade balance (customs statistics) turned positive for the first time since 1990.

Commodity producing branches managed to increase their value added by 3.7% in the first quarter. Within this group, industry expanded by nearly 7%, mainly via exports of manufactures, as usual. GDP in agriculture increased as well. By contrast, there was a deep fall in the performance of the construction sector, mainly due to a drop in orders placed by the government.

The services sector expanded modestly. Growth was well above the sector average in transport, storage, post and telecommunications, real estate, financial and business-related services. The segments most affected by the austerity package, such as various public services and trade, hotels and restaurants, stagnated.

Rises in base rate to curb inflation

The consolidation package included measures that raised taxes and regulated prices (primarily energy and pharmaceutical drugs). This triggered an increase of inflation. Year-on-year inflation reached its peak in March 2007 at 9%. Then, as one-off effects began to phase out, inflation started to decline, dropping to 6.4% in September 2007. This decline was interrupted by mounting external (energy prices) and partly internal (unprocessed food prices) pressures. From October 2007, monthly inflation started to grow again, attaining 7.4% by the end of the year. From the beginning of 2008 until April inflation declined from month to month but hiked again to 7% in May.

The central bank, in response to the rising inflation triggered by the stabilization measures, raised the prime rate in several steps: from 6.25% at the beginning of the stabilization package to 8% by October 2006, a rate that remained in place until June 2007. Then, following the declining inflation, the central bank started with cautious cuts in the base rate, which then remained at 7.5% between September 2007 and March 2008. From April 2008 a new cycle of base rate rises began, up to 8.50% by the end of June, reflecting the central bank's increased concerns.

Contradictory tendencies affect inflation at present. On the one hand, it is clear that the budget consolidation measures rendered economic growth well below its potential. This ought to restrain prices and wages. In addition, the expected good harvest may curb food price rises. On the other hand, the upward risks of inflation are significant as well. Prices of imported energy have caused a considerable cost push; the secondary impacts of the latter have not all appeared yet. Weak growth coupled with political instability, and the capriciously changing risk taking propensity of foreign investors, are important factors of uncertainty. All these considerations must have played a role in the central bank's upward correction of its own inflation forecast to 6.3% in 2008 and 4.2% in 2009 (from the earlier 5.9% and 3.6%, respectively) in May, postponing the attainment of the medium-term inflation target (3%) by one year.

On 26 February 2008 the central bank abolished the 15% intervention band around the exchange rate of the forint. This had no immediate impact on the exchange rate, which remained in the range of 255-265 forint per euro. From April on a gradual appreciation could be observed, bringing the exchange rate below the earlier lower edge of the intervention band, 240 forint per euro, by late June. The high central bank base rate and the strong forint may help to lower inflation but certainly do not facilitate the revival of the economy.

Upturn in the second half of the year

With the hardest part of the fiscal consolidation left behind, economic growth will pick up modestly in the second half of the year. The announcement, on 18 June, of a EUR 800 million investment by car manufacturer Daimler AG (for a new Mercedes car plant in Kecskemét) as well as the EU decision that Budapest will be the host of the European Institute for Innovation and Technology may be seen as symbolic signs of a turn to the better. While net exports will remain the driving force of growth, household consumption will already marginally grow this year. Despite the weak first quarter, investment will expand as major EU co-financed projects will be launched over the year. The expected bumper harvest will help to attain a 2.5% annual GDP growth rate. Political uncertainties pose a downward risk for growth through a possible breach in investor confidence.

In a baseline scenario the fiscal targets of the convergence programme will be met this year, and the external equilibrium (current account/GDP ratio) will slightly improve. For the completion of the fiscal consolidation process the approval of the budget for 2009 this autumn will be of crucial significance. That decision will also determine the future of the minority government – whether it will remain in office for at least another year or whether early elections will follow. If no major shocks, either external or internal, afflict the economy, consumption and investment will gradually pick up in 2009 and 2010. Nevertheless, the GDP growth rate may attain its pre-consolidation level only in 2010. An alternative to the baseline scenario reckons with a departure from the convergence programme resulting from the unpredictable dynamics of the political developments. In this case, uncertainties would be magnified to new dimensions, increasing the risk of postponement of the return to the potential growth rate.

Table HU

Hungary: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st o	2007 2008 1st quarter		2009 Forecas	009 2010 ecast	
Population, th pers., end of period	10097.5	10076.6	10066.2	10045.0	10058	10038				
Gross domestic product, HUF bn, nom. ²⁾ annual change in % (real) ²⁾ GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wijw) ²⁾	20718.1 4.8 8145 13670	22042.5 4.1 8810 14390	23795.3 3.9 8940 15290	25405.8 1.3 10053 15980	5720.5 2.7	6156.8 1.7	27100 2.5	28900 3.4	31000 4.3	
Gross industrial production										
annual change in % (real) Gross agricultural production	7.4	7.0	9.9	8.1	9.2	6.9	8	10	12	
Construction industry annual change in % (real)	6.8	-9.5	-0.7	-14.1	-0.3	-19.2	3	5	10	
Actual final concurrence to be used $ \Gamma $ be norm $\frac{2}{2}$	12062.1	14010 7	15744.4	16525.0	2049.2	4176.0		Ŭ	10	
annual change in % (real) ²⁾	2.8	3.6	1.9	-1.9	-1.8	-1.1	1.0	2	2.9	
Gross fixed capital form., HUF bn, nom. 2)	4650.7	5016.7	5169.5	5319.2	954.0	929.1				
annual change in % (real) ²⁾	7.6	5.3	-2.5	0.1	0.5	-5.4	4.5	6.5	10	
LFS - employed persons, th, avg.	3900.4	3901.5	3930.1	3926.2	3905.5	3884.2				
annual change in %	-0.5	0.0	0.7	-0.1	0.5	-0.5		•		
Reg. employees in industry, th pers., avg. "	/85.4	762.9	152.5	/45.4	748.9	/4/.1				
I FS - unemployed thipers average	-2.0 252.9	-2.9	316.8	-0.9	316.3	-0.2 332.6		•		
LFS - unemployment rate in %, average	6.1	7.2	7.5	7.4	7.5	8.0	7.8	7.8	7.5	
Reg. unemployment rate in %, end of period	9.1	9.3	9.1	10.1	10.3	10.5				
Average gross monthly wages, HUF ³⁾ annual change in % (real, net)	145520 -1.0	158343 6.3	171351 3.5	185004 -4.8	184000 -7.0	196024 -0.6	•	•		
Consumer prices, % p.a. Producer prices in industry, % p.a.	6.8 3.5	3.6 4.3	3.9 6.5	8.0 0.2	8.5 3.5	6.9 5.0	6.6	3.8	3.0	
General governm.budget. EU-def., % GDP 4)										
Revenues	42.4	42.1	42.6	44.6						
Expenditures	48.9	49.9	51.9	50.1						
Net lending (+) / net borrowing (-)	-6.4	-7.8	-9.3	-5.5			-3.9	-3.0	-3.0	
Public debt, EU-det., In % of GDP 7	59.4	61.6	65.6	66		•	-		•	
Base rate of NB, % p.a., end of period	9.5	6.0	8.0	7.5	8.0	7.5				
Current account, EUR mn	-6915.5	-6013.4	-5445.6	-5060.0	-1111.4		-4900	-4900	-4900	
Current account in % of GDP	-8.4	-6.8	-6.0	-5.0	-4.9		-4.5	-4.2	-4.0	
Gross external debt. EUR mn	55150.1	10070.4 66607.8	81458 1	10329.7 97451 9	85714.8	10/00.0	-		•	
Gross external debt in % of GDP	65.5	76.4	86.4	97.2						
FDI inflow, EUR mn	3633.3	6172.1	5427.5	4049.3	719.1		4000	5000	5000	
FDI outflow, EUR mn	892.1	1776.9	2922.7	3004.0	566.8	•	1500	1500	2000	
Exports of goods, BOP, EUR mn	44779.1	50119.7	59079.1	68674.5	16300.1		76900	86100	96400	
annual growth rate in %	18.1	11.9	17.9	16.2	19.6		12	12	12	
Imports of goods, BOP, EUR mn	47232.3	51609.6	60000.6	67243.0	16021.3		74600	83200	93600	
Exports of services BOP FUR mn	8769.5	9.3	10549 1	12.1	2487.7	•	14000	16100	12.5	
annual growth rate in %	8.0	17.3	2.5	15.6	15.4		14000	10100	10000	
Imports of services, BOP, EUR mn	8532.5	9232.9	9280.9	11068.3	2312.4		12700	14600	16800	
annual growth rate in %	5.7	8.2	0.5	19.3	7.3	•	15	15	15	
Average exchange rate HUF/USD	202.63	199.66	210.51	183.83	192.61	173.12				
Average exchange rate HUF/EUR (ECU)	251.68	248.05	264.27	251.31	252.35	259.36	250	250	250	
Purchasing power parity HUF/USD	126.13	128.51	129.19	134.03		•	•	•		
Furchasing power parity HUF/EUK	149.91	101.91	104.00	100.00	1 .		1 .			

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) Enterprises with more than 5 employees. - 4) According to ESA'95, excessive deficit procedure.

Source: wiw Database incorporating national statistics; Eurostat; wiw forecasts.



Leon Podkaminer

Poland: a gentle deceleration of growth

Growth becoming slower, but structurally sounder

The current cycle of fast GDP growth which began in the second quarter of 2006 is still far from over. However, the fastest phase of the cycle was already passed in the first quarter of 2007 when GDP rose by 7.3%. Since then growth has decelerated gently – to 6.1% in the first quarter of 2008. The slowdown is combined with changes in the dynamics of the GDP components. The role of domestic demand (up 9.3% a year ago) has been diminishing as it has risen by 6.3% currently. Public consumption, which rose by 6.2% a year ago, is now falling (by over 1%). Also, the pace of growth of fixed capital formation has diminished perceptibly (though still running at a respectable rate). Most importantly, the expansion of exports of goods and services has been accelerating while growth of imports of goods and services has been decelerating (in the first quarter of 2008 both exports and imports already rose at roughly the same – quite high – speed). In effect the high negative contribution of the trade balance to GDP growth has improved from minus 2.2 percentage points a year ago to about minus 0.4 percentage points in the first quarter of 2008. All in all, growth has been slower – but structurally much 'better' as well.³⁵

Corporate non-financial sector earning high profits

Net profits of the non-financial corporate sector³⁶ increased to PLN 20.4 billion in the first quarter of 2008 (from EUR 19 billion a year earlier). However, profitability indicators have deteriorated somewhat, remaining more than satisfactory all the same. For example, the ratio of the sector's net profits to its total revenue fell from 4.9% to 4.6%. This development reflects the fact that costs have risen slightly faster than revenues (by 13.9% and 13.5% respectively). Interestingly, one cannot detect yet any direct impacts on costs of rising prices of imported raw materials and fuels. The share of costs of materials (imported and of domestic origin combined) in total costs of the corporate sector has actually declined, by 0.9 percentage points. This may suggest that higher prices of materials might have induced some efficiency improvements (including some substitution away from the use of the most material-intensive technologies). It may be added that the share of gross wages paid to employees in the total sector's costs has risen by 0.6 percentage points. This (anticipated) development is discussed below. Before it comes to that it is worth adding that the sector's exporting

³⁵ Gross value added generated by the construction sector rose, in real terms, by 41% in the first quarter of 2007, clearly suggesting a great deal of overheating (indeed reflecting slightly insane developments on the real estate markets). Currently the construction sector's GVA is rising at a much less exuberant rate of 16.7%.

³⁶ The sector encompasses over 16,000 firms (excluding universities and firms operating in agriculture, forestry and fishery as well as in financial intermediation) employing over 50 persons.
firms overall fared very well (better than the non-exporters) on profitability, with some indicators even improving compared with the first quarter of 2007. This finding suggests that the ongoing strong nominal appreciation of the Polish zloty and rising average wages have not yet impaired the competitiveness of the export-oriented firms.

Rising wages and employment essential for supporting consumer demand

The average monthly wage rose strongly in the first guarter of 2008. At the same time there was a further rise in employment levels, resulting in the total wage bill increasing by 15.2% nominally (and about 10.7% in real terms). As mentioned above, the rising wage bill does not seem to be a problem for the corporate sector (also for the exporting firms) which report high profitability.³⁷ The reason for this apparent insensitivity is obvious enough: the rising labour productivity tends to compensate the rising labour costs (with some delay, if not immediately). The interesting thing to notice is, instead, a wide disparity between the rates of growth of household consumption (rising moderately, by 5.6% in the first guarter of 2008) and the gross wage bill rising at almost double that rate. This disparity is partly attributable to the gross social benefits (including primarily retirement pays and pensions) lagging – in growth terms – far behind the total wage bill in both nominal and real terms. (Total gross social benefits increased by 4.6% nominally and 0.5% in real terms.) Thus, the combined wage and social benefit incomes of the household sector rose by 6.9% in real terms - i.e. at a rate not that much different from the rate of growth of household consumption. In so far as the strong household consumption is the major pillar on which the overall GDP growth rests, rising wages are thus essential for maintaining the present prosperity - especially bearing in mind that the fiscal policy is unlikely to be supportive.³⁸

Conditions still conducive to fast investment growth and further improvements in foreign trade

Inflation triggered – as elsewhere – by rising prices of food and fuels is currently still above the official 2.5% target. Increasingly, the current inflation is dominated not so much by food as by other items, primarily related to housing (rents and tariffs on some public utilities). Neither these second-round price effects, nor vigorously rising average wages have so far met with any radical response from the National Bank of Poland. Somewhat unusually, the Monetary Policy Council had, until recently, been quite dovish. Its statements read like discussions of why this particular inflation was not all that dangerous. While accepting many of the arguments to the effect that GDP growth is moderating anyway and so should be inflation (in due time of course), one could also discern a different motive behind the inactivity of the NBP. As already mentioned, the Polish currency has

³⁷ Only to 7.4% of firms polled the high costs of labour are currently a barrier to growth – compared to e.g. 10.9% of firms naming shortages of skilled workers or 17.7% blaming the strong and volatile exchange rate. (See the website of the National Bank of Poland, <u>www.nbp.pl</u>.)

On the contrary, the policy of the current, liberally-minded government seeks to discretely reduce not only the budget deficits but also public spending. These tendencies are reflected in (1) public consumption contracting already in the first quarter of 2008; (2) passive acceptance of relative impoverishment of the recipients of social security benefits; (3) intended downsizing of the public healthcare system; (4) intended further redistribution of the burden of taxation – away from the better-off onto the lower-income population strata.

been strengthening at an amazing speed (not only vs. the US dollar, but also against the euro). This development, which has much to do with high inflows of capital (including FDI), is apparently worrying the NBP (as a potential source of loss of external competitiveness). A decisive NBP action - e.g. raising the official policy interest rates - would of course strengthen the exchange rates even further. This would re-create the macro environment of the years 2001-2002 when the uncompromising policy of the NBP plunged the country into recession (over plummeting investment, exports and imports). No doubt the desire to avoid another debacle makes the NBP more responsible this time round.³⁹ It is thanks to that restraint that the conditions remain broadly conducive to further expansion of investment into fixed assets and to further improvements in foreign trade. Of course, after several quarters of fast growth investment may be slowing down for quite natural reasons (high levels of uncertainty about the future course of international commodity prices, technology trends, forthcoming foreign demand and the exchange rate trends). Also the uncertainties over the availability of skilled labour and wage developments are having a bearing on investment decisions. Otherwise there are good grounds to expect a continuation of the investment expansion in the business sector (as well as into housing and infrastructure). Profitability is more than adequate, interest rates fairly moderate (by Polish standards at least) and the levels of capacity utilization very high. All these factors must bear on the opinions of firms polled. Firms generally signal the intentions to continue investment projects and to expand production capacities also in the export-oriented branches. This bodes well as far as foreign trade is concerned especially as high FDI inflows are set to continue. With the ongoing productivity gains, foreign trade (increasingly also in services) remains reasonably competitive - for the time being.

Growth deceleration all the same

Barring some extraordinary events on the global level, Poland's economic prospects are, on the whole, positive at least in the medium-term perspective. The current growth slowdown is due primarily to less vigorous growth in investments – which is a natural development given their fast growth in the recent past and the accumulation of global uncertainties. Foreign trade has been performing better than expected. Quite likely this trend will continue for some time. But it may also come to an end quite soon, especially if the zloty keeps strengthening excessively. A gentle disinflation will continue on its own with the NBP showing commendable restraint. The fast growth in wages expected under fairly tight labour markets will in fact be conducive to continuing strong growth, but the fiscal and social policies of the current government will not support the return of the vigorous growth that prevailed in 2006-2007.

³⁹ A strange reversal of roles has happened. Normally, the central bank's policy is criticized by the finance minister for being too restrictive (whether or not this is really the case). Recently, Poland's finance minister voiced discontent over monetary policy being too soft. This critique has had some impact: on 25 June the NBP interest rates were raised (by a symbolic 25 basis points).

Table PL

Poland: Selected Economic Indicators

	2004	2005	2006	2007 ¹	2007 2007 1st q	2008 uarter	2008	2009 Forecas	2010 st
Population, th pers., end of period	38173.8	38157.0	38125.5	38116.0	38116.0	38110.0			
Gross domestic product, PLN bn, nom. ²⁾ annual change in % (real) ²⁾ GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiw)	924.5 5.3 5341 10960	983.3 3.6 6401 11480	1060.0 6.2 7137 12340	1167.8 6.6 8098 13580	267.7 7.3	294.1 6.1	1280 5.5	1390 5.3	1500 5
Gross industrial production (sales) annual change in % (real) Gross agricultural production	12.6	3.7	11.2	10	13.1 ³⁾	8.5 ³⁾	10	8	8
annual change in % (real) Construction output total	7.5	-4.3	-1.2	16 1	50 4 ³⁾	14 8 ³⁾	•	·	
Concernation of boundedlade DIN by many 2	-7.0	G. I	13.7	704.4	50.4	14.0		•	
annual change in % (real) ²⁾ Gross fixed capital form., PLN bn, nom. ²⁾ annual change in % (real) ²⁾	589.4 4.7 167.2 6.4	614.3 2.1 179.2 6.5	652.8 5.0 208.3 14.9	5.0 253.8 17.6	6.8 38.5 23.8	5.6 45.3 15.7	5 16	5 12	4 6
LFS - employed persons, th, avg. annual change in % Reg. employees in industry, th pers, avg.	13794.8 1.3 2663 1	14115.6 2.3 2665.4	14593.6 3.4 2714 3	15240.3 4.4 2804	14839.0 5.3 2556 0 ³⁾	15515.0 4.6 2646 0 ³⁾	3	2	1
annual change in % LFS - unemployed, th pers., average LFS - unemployment rate in %, average	0.9 3230.3 19.0	0.1 3045.3 17.8	1.8 2344.3 13.8	3.5 1618.8 9.6	3.2 ³⁾ 1894.0 11.3	3.5 ³⁾ 1361.0 8.1	2 9	2	1 8
Reg. unemployment rate in %, end of period	19.1	17.6	14.8	11.4	14.3	11.1	10	•	•
Average gross monthly wages, PLN annual change in % (real, gross)	2273.4 0.7	2360.6 1.8	2476.9 4.0	2691.0 6.3	2737.8 ³⁾ 5.9 ³⁾	3049.9 ³⁾ 7.2 ³⁾	6	5	4
Consumer prices, % p.a. Producer prices in industry, % p.a.	3.5 7.0	2.1 0.7	1.0 2.3	2.5 2.3	2.0 3.3	4.1 3.0	4 3.5	3	2.6
General governm.budget, EU-def., % GDP ⁴⁾ Revenues Expenditures Net lending (+) / pet borrowing (-)	36.9 42.6	39.0 43.3	40.0 43.8	40.4 42.4					-25
Public debt, EU-def., % of GDP ⁴⁾	45.7	47.1	47.6	45.2			-2.5	-2.5	-2.5
Discount rate of NB % p.a., end of period	7.0	4.8	4.3	5.3	4.3	6.0	6	5.5	5
Current account, EUR mn Current account in % of GDP Gross reserves of NB excl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP	-8207 -4.0 25904 95163 42.0	-3008 -1.2 34536 112234 44 1	-7283 -2.7 35235 128818 46.6	-11499 -3.7 42812 156309 47 9	-2474 -3.6 36488 133288	-3876 46729	-16800 -4.7	-21000 -5.4	-20500 -4.9
FDI inflow, EUR mn FDI outflow, EUR mn	10453 668	8317 2756	15198 7134	12834 2395	3356 104	3231 974	16900 2200		•
Exports of goods, BOP, EUR mn annual growth rate in % Imports of goods, BOP, EUR mn annual growth rate in % Exports of services, BOP, EUR mn annual growth rate in % Imports of services, BOP, EUR mn annual growth rate in %	65847 22.3 70399 19.5 10815 9.8 10787 14.7	77562 17.8 79804 13.4 13105 21.2 12520 16.1	93406 20.4 98945 24.0 16354 24.8 15755 25.8	105348 12.8 116659 17.9 20874 27.6 17977 14.1	24664 13.4 26986 19.5 4427 27.7 3809 13.5	30399 23.3 33397 23.8 5408 22.2 4787 25.7	122200 16 136500 17 24400 17 20700 15	139300 14 157000 15 28500 17 23800 15	157400 13 179000 14 33300 17 27400 15
Average exchange rate PLN/USD Average exchange rate PLN/EUR (ECU) Purchasing power parity PLN/USD Purchasing power parity PLN/EUR	3.6540 4.5340 1.8587 2.2091	3.2348 4.0254 1.8984 2.2441	3.1025 3.8951 1.8656 2.2537	2.7667 3.7829 1.9111 2.2554	2.9670 3.8871	2.3886 3.5760	3.6	3.6	3.6

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary and wiw estimates. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices; revision in government sector, shadow economy, etc.). - 3) Enterprises with more than 9 employees. - 4) According to ESA'95 excessive deficit procedure; forecast wiw estimate.



Gábor Hunya

Romania: boom resumed

Slight overheating, continuing structural change

Economic growth accelerated in the first quarter of 2008 contradicting widespread expectations and external uncertainties. The 8.2% growth was the fastest rate in history and second fastest in the EU after Slovakia. Although private consumption is by far the most decisive factor of growth, fixed capital formation is also increasingly important: the investment rate rose from 23% of GDP in 2005 to over 26% in 2007 and is expected to reach 30% this year. The current investment boom is broadly based and is not confined to speculative housing investments as a saturation of demand for city apartments is visible. The wiiw, the IMF, as well as the international rating agencies have repeatedly warned that Romania is in a danger zone due to overheating, but the confidence of creditors was shaken only briefly at the beginning of the year. As the central bank raised the policy interest rate and the local currency depreciated, income prospects for investors improved and the latter have resumed pumping money into the Romanian economy.

The sector with the most dynamic output growth is construction, followed by services (first of all trade and telecommunications) and manufacturing. The structural change in manufacturing continued, with shrinking output in the textile, clothing and leather industries, and expansion in the automotive sector. Also the production of communication equipments and of construction materials boomed, while that of instruments and electrical machinery fell due to still ongoing restructuring in domestically owned companies. Successful activities are all dominated by foreign subsidiaries. Due to strong FDI inflows in recent years, the share of foreign investment enterprises in manufacturing output reached 59% and in exports 75% in 2006 – as high as in Hungary, the country with the highest exposure to FDI in Central Europe, just four years earlier.

Further economic growth is hampered by labour shortages. Romania has below-replacement fertility, unemployment is low, and at least one million persons of the 12 million labour force work abroad. Their remittances increase the demand especially for housing construction and consumer durables including cars. Construction could reportedly employ an additional 300,000 people. The tight labour market is one of the driving forces of wages and the wage drift is driving inflation. In April the average net real wage was 14.9% higher than a year earlier (RON 1282 or EUR 350) but unequally distributed among industries. Wage hikes were meagre in the automotive industry and in metallurgy, thus export competitiveness could be maintained at least until recent strikes have enforced some adjustment. The highest wage growth was observed in the banking sector, in construction and trade, sectors that are booming based on domestic consumption.

Inflation a growing concern

Rising inflation is the result of excessive wage drift but also of imported energy and food prices as well as the weakening domestic currency. The industrial producer price increase accelerated as well, which foreshadows more consumer price rises in the rest of the year. A significant increase in the gas prices is expected in July, but the price of domestically produced gas will not be raised to the international level. The inflation target of the Romanian National Bank was missed last year, and this year's 3-5% target will most probably not be met either, despite monetary tightening. The central bank has raised its main interest rate five times since October 2007, to 9.75% in May, which is the highest rate in the EU. The RON/EUR rate depreciated by 9.1% compared to the first quarter of last year and stabilized in May-June at around 3.62, 3.5% above the previous year's level.

Low public debt and a well-managed public deficit remain strong features of the Romanian economy. Earlier fears of a budgetary loosening have so far not materialized, as economic growth resulted in soaring budget revenues. In addition, expenditures were curtailed by a budget rectification. If everything remains on track, the 2008 deficit can remain below 3% of GDP.

The speed of the expansion of crediting remains a concern of the central bank but its level is still not very high. At the end of April 2008, non-government credit was up by 51% in real terms year-on-year. Foreign-currency denominated loans soared twice as fast as domestic-currency denominated ones. While until October last year domestic currency loans had a higher share in new loans than forex loans, following the weakening of the Romanian leu more loans are taken in foreign currency. Loans to the private sector represent 37% of GDP (end-2007), more than twice the year 2000 level, but this share is still the lowest among the NMS. It is particularly low compared to Estonia and Latvia, which registered over 90% and proved vulnerable to a turnaround. Loans to households in per capita terms were EUR 920 as of end-2007 both in Romania and Bulgaria, only half of the level in Poland and one fifth of that in Estonia. This difference in the exposure to foreign financing may explain why a hard landing is not on the agenda in Romania, but the country is vulnerable to corrections.

The current account deficit, reaching 15% of the GDP, is another sore point. But, for the first time in the last five years, exports grew slightly faster than imports in the first quarter of 2008, year-on-year. (However, the base period marked the introduction of the EU trade regime, resulting in soaring imports.) Although FDI financed only 45% of the current account deficit – the rest relied increasingly on short-term capital –, in the longer run FDI can generate exports to improve the external balance.

No hard landing but corrections in sight

The Romanian economy continues to be in a somewhat overheated stage in 2008. The depreciation of the domestic currency and increased interest rates could not cool it down. Wage rises and inflation are too high. Also the credit boom fuels aggregate demand and increases inflation. A considerable risk of failure exists due to excessively high debt service, current account deficit and real estate prices. But, for the time being, there is no abrupt turn in sight. Investor surveys show lasting optimism despite rapidly rising land prices and construction worker shortages. The currency



has been stable for quite some time and the budget deficit is not excessive. Still we think that the next government, coming to power after the elections later this year, will have to take stabilization measures and cut back the consumption race next year. This explains our forecast of only 5% growth in 2009. The Romanian authorities are committed to joining the eurozone in 2014; especially the inflation target will be hard to achieve.

Table RO

Romania: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st (2008 quarter	2008	2009 Foreca	2010 st
Population, th pers., mid-year	21673	21624	21584	21538					
Gross domestic product RON mp. nom. ²⁾	246469	288176	344536	404709	68842	86745	474100	542600	621200
annual change in % (real) $^{2)}$	2-10-103	4 2	7 9	60	61	82	65	5	6
GDP/capita (EUR at exchange rate)	2806	3678	4529	5631	0.1	0.2	0.0	0	0
GDP/capita (EUR at PPP - wiiw)	7360	7930	9140	10000					
Gross industrial production									
annual change in % (real)	5.3	2.0	7.2	5.4	7.6	5.4	6	6	7
Gross agricultural production									
annual change in % (real)	18.1	-13.1	2.4	-18.0		•			
Construction output total	0.2	0.5	27.0	22.6	20.9	22.2			
	9.2	9.5	21.0	33.0	29.0	32.2	•	•	•
Consumption of households, RON mn, nom. 2	167245	197024	233235	271398	54311	66887			
annual change in % (real) ²	14.5	9.9	12.6	11.2	12.4	15.6	11	6	8
appual change in % (real) ²⁾	0000U 11 1	12 7	10.3	123299	14323	21042	. 25	10	15
	11.1	12.7	19.5	20.9	20.0	55.2	25	10	15
LFS - employed persons, th, avg.	9157.6	9146.6	9313.3	9353.3	9105.9				
annual change in %	-0.7	-0.1	1.8	0.4	0.9	•			
Reg. employees in industry, th pers., avg.	1/41	1672	1632	15/2		20			•
I ES - unemployed th pers - average	-0.0	-4.0	-2.4	-3.7 640.8	-4.4 600.4	-3.0			•
I FS - unemployment rate in % average	8.0	704.0	7.3	6.4	7.0	•	60	. 6	6
Reg. unemployment rate in %, end of period	6.3	5.9	5.2	4.1	4.9	4.2			
Average gross monthly wages RON	818 3	968.0	1146 0	1410.0	1286 7	1601.0			
annual change in % (real, net)	10.6	14.3	8.9	15.4	14.3	13.7			
	11.0	0.0	6.6	4.0	2.0			7	5
Producer prices in industry % p a	11.9	9.0 10.5	0.0 11.6	4.8 8.1	3.8 9.4	8.0 14.4	8	1	5
				0.1	0.1				•
General governm.budget, EU-def., % GDP ³⁷	22.4	20.2	22.4	24.4					
Expenditures	32.4	32.3	35.1	36.0	•		•	•	•
Net lending (+) / net borrowing (-)	-1.2	-1.2	-2.2	-2.5		•	-25	-3.5	-3.0
Public debt, EU-def., % of GDP ³⁾	18.8	15.8	12.4	13.0			2.0		
Discount rate % p.a. end of period	18.0	75	8.8	7.5	8 1	9.0			
			0.0		0.1	0.0			
Current account, EUR mn	-5099	-6888	-10156	-16950	-31/3	-3519	-19000	-21500	-23000
Gross reserves of NB evel gold EUP mp	-0.4 108/18	-0.7	21310	25307	21530	25158	-14.0	-14.5	-13.0
Gross external debt FUR mn	21505	30914	41234	58797	43633	61067		•	•
Gross external debt in % of GDP	34.6	39.4	40.5	52.4					
FDI inflow, EUR mn	5183	5213	9060	7141	1890	1588	8000		
FDI outflow, EUR mn	56	-24	337	-45	-15	-88	100		
Exports of goods, BOP, EUR mn	18935	22255	25850	29402	7019	7965	33200	37200	42800
annual growth rate in %	21.3	17.5	16.2	13.7	12.9	13.5	13	12	15
Imports of goods, BOP, EUR mn	24258	30061	37609	47067	10534	11828	52700	58000	65000
annual growth rate in %	24.0	23.9	25.1	25.1	33.2	12.3	12	10	12
Exports of services, BOP, EUR mn	2903	4102	5587	7621	1892	2296	9500	11400	13700
annual growth rate in %	8.7	41.3	36.2	36.4	53.1	21.4	25	20	20
Imports of services, BOP, EUK mn	3116	4451	5583	/388	1607	2253	10300	13400	16100
	19.4	42.8	20.4	32.3	35.0	40.2	40	30	20
Average exchange rate RON/USD	3.2637	2.9137	2.8090	2.4383	2.5820	2.4617			<u>.</u>
Average exchange rate RON/EUR (ECU)	4.0532	3.6234	3.5245	3.33/3	3.3818	3.6892	3.65	3.6	3.5
Purchasing power parity RON/EUR	1.5445	1.6799	1.7459	1.8796		•	· ·		•
	•					-			

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) According to ESA'95, excessive deficit procedure.



Zdenek Lukas

Slovakia: in good shape on the threshold of the eurozone

The Maastricht criteria mastered

On 7 May 2008 the European Commission declared that Slovakia meets all the Maastricht criteria required to adopt the euro, and gave green light to join the eurozone. The average harmonized inflation rate over the reference period, April 2007 to March 2008, amounted to 2.2% and was thus well below the reference indicator of 3.2%. The appreciated domestic currency has acted as a buffer cushioning the steep increases in global energy and food prices. The fiscal deficit was 2.2% of GDP in 2007. The public debt ratio decreased to 29.4% of GDP. Last but not least, the average long-term interest rate amounted to 4.5% in March 2008 (year-on-year), when the reference value was set at 6.5%. That rate has in fact been below the reference value since Slovakia's EU accession in 2004.

Strengthening currency

The Slovak koruna has been part of the European Exchange Rate Mechanism (ERM) II since 26 November 2005. At that time the European Central Bank (ECB), in accordance with the Slovak authorities, set the central exchange rate parity at SKK 38.46 to the euro, with a \pm 15% fluctuation band. Driven by robust economic growth and capital inflows, the central parity appreciated by 8.5% to SKK 35.44 against the euro by March 2007. With continuing improvements in the economic fundamentals as well as the Commission's recent approval for joining the eurozone, the koruna was hitting new highs against the euro almost every day. Upon the request of the Slovak administration, on 29 May the ECB appreciated the central parity by another tremendous 17.6% to SKK 30.13 to the euro. Nobody had expected that it would be set beyond the market level (31.11 SKK/EUR on 28 May). The currency immediately reacted to the new central parity by jumping to a new high of 30.08 SKK/EUR, before easing slightly. The standard fluctuation band of \pm 15% continues to be observed around the central parity. Overall, the central rate of the SKK has appreciated by 27.6% within the past 30 months. The session of the EU finance ministers will announce the final conversion rate on 8 July.

Robust growth

In the first quarter of 2008 GDP grew by 8.7% year-on-year. Household consumption was the main driver behind the growth (8.4% y/y) based on strong wage growth (real wages rose by 6.2% y/y) and by higher employment. Foreign trade contributed less to GDP growth than earlier. The growth of gross industrial output eased and amounted to 6.8% in the first quarter of 2008 whereas industrial employment (LFS data) rose by some 2.7%; industrial labour productivity increased by about 4%.

With nominal wages up by some 8%, unit labour costs (ULCs) rose by about 4% in SKK terms and even more in EUR terms. Nevertheless, the competitiveness of Slovak tradable goods continues to rely on low wage rates as gross monthly wages averaged only some EUR 620 in the first quarter of 2008. Foreign investment enterprises in the automotive industry and in electrical & optical equipment are the most important driving forces of the Slovak economy. As agreed with the EU, Slovakia should shut down the second V1 reactor in the nuclear power station Jaslovské Bohunice at the end of this year. In order to avoid dependency on imported electricity, the Slovak administration is now looking for an opportunity to postpone the shutdown.

Potential risks after euro adoption

The crucial question is, why did the ECB agree to appreciate the Slovak exchange rate parity so massively? In recent months the EU administration has several times expressed concern about the sustainability of inflation convergence as the main challenge after Slovakia's joining the eurozone. A strong currency counteracts the inflation imported from global energy and agro-food markets. However, as of 1 January 2009 the entire burden of controlling the domestic inflation will shift to fiscal policy. At the same time, domestic and foreign price levels will converge due to inflation that is higher than in other euro countries. Despite massive appreciation, Slovakia will enter the eurozone with a price level amounting to just some 65% of the EU average. Also the government cheered the strong central parity, because wages converted to euro will be higher than otherwise - and the campaign for the 2010 parliamentary elections will start next year. Nevertheless, Slovakia will have the lowest average salary in the eurozone (slightly above EUR 700) as well as one of the lowest GDPs per capita (together with Portugal). At comparable productivity, wages and ULCs in Slovakia are still lower than in other Central European competitors (the Czech Republic, Hungary, Poland). However, this important comparative advantages is rapidly diminishing, as the real appreciation has been stronger than in these neighbour countries. Looking beyond next year, Slovakia will probably lose its low-cost advantages fairly soon.

The strong currency benefits importers and indirectly also consumers, while it puts exporters at a disadvantage. Slovakia is an open economy and a large part of its foreign trade is conducted with eurozone countries, in particular Germany. In fact, the strong currency may undermine domestic entrepreneurship, especially in small- and medium-sized enterprises. The pressure for rationalization will rise, with possibly negative effects on the domestic labour market. This phenomenon may be exacerbated by the diminishing attractiveness of jobs abroad as the wage gap in EUR terms has markedly declined, fuelled by the appreciating koruna and strong wage increases. All in all, the labour market will remain tight, Slovakia's external position will deteriorate and economic growth will slow down in the years to come.

Short- and medium-term prospects still rather bright

GDP growth will ease to 7.5% in 2008 and will slow down to some 6% later on. Domestic demand, with well above 5% growth, is likely to remain the main driving force of economic expansion in the coming years. Growth of gross fixed capital formation should remain robust at about 6%, supported by further FDI in the car and electronics industries and the subsequent arrival of related

subcontractors. The annual harmonized consumer price index (HCPI) in 2008 will rise to 4%. Because of the strong conversion rate and weakening inflationary pressures in the food sector, the HCPI will ease somewhat in 2009. The general government deficit will stabilize at a level below 3% of the GDP by 2010. The foreign trade surplus will turn into a deficit owing to the very strong currency. In addition, increasing repatriation of profits by FDI companies as well as expanding domestic demand covered by imports will deteriorate the external position over the next years. Even so, Slovakia will remain among the fastest expanding economies in the European Union.

Table SK

Slovak Republic: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st o	2008 quarter	2008	2009 Forecas	2010 t
Population, th pers., mid-year	5382.6	5387.3	5391.2	5399.0					
Gross domestic product, SKK bn, nom. ²⁾ annual change in % (real) ²⁾ GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	1361.7 5.2 6317 12360	1485.3 6.6 7144 13560	1659.6 8.5 8264 14990	1851.8 10.4 10157 17000	418.9 8.3	472.5 8.7	2030 7.5	2200 6	2390 6
Gross industrial production annual change in % (real) Gross agricultural production	4.1	3.8	9.9	13.0	15.1	6.8	10	8	7
Construction industry	5.0	-0.3	0.9 14 9	57	21.2	11 5	•		
Consumption of households, SKK by nom $^{2)}$	764.0	026 1	020 5	1020.1	21.2	272.0	•	•	•
annual change in % (real) 2 Gross fixed capital form., SKK bn, nom. 2	4.2 326.4	6.5 394.3	928.5 5.9 436.2	7.1 476.3	6.3 98.2	8.4 104.5	. 7	6	6
annual change in % (real)	4.8	17.6	8.4	7.9	11.0	2.4	6	6	5
LFS - employed persons, th, avg. annual change in % LFS - employed pers. in industry, th, avg.	2170.4 0.3 641.3	2216.2 2.1 649.1	2301.4 3.8 666.4	2357.3 2.4 690.9	2326.6 3.1 687.1	2391.3 2.8 705.7	•	•	•
annual change in % LFS - unemployed, th pers., average LFS - unemployment rate in %, average	1.1 480.7 18.1	1.2 427.5 16.2	2.7 353.4 13.3	3.7 291.9 11.0	5.2 303.0 11.5	2.7 280.5 10.5	10	10	9
Reg. unemployed, th pers, end of period Reg. unemployment rate in %, end of period	383.2 13.1	333.8 11.4	273.4 9.4	239.9 8.0	264.5 8.9	229.6 7.6	7	7	6
Average gross monthly wages, SKK ³⁾ annual change in % (real, gross)	15825 2.5	17274 6.3	18761 3.3	20146 4.3	18511 4.2	20443 6.2	5	•	•
Consumer prices, % p.a. Producer prices in industry, % p.a.	7.5 3.4	2.7 4.7	4.5 8.4	2.8 2.0	2.8 3.4	4.0 4.9	3.8 4.5	3.5 4	3.5 4
General governm.budget, EU-def., % GDP ⁴⁾ Revenues Expenditures Net lending (+) / net borrowing (-)	35.4 37.8 -2.4	35.3 38.1 -2.8	33.5 37.2 -3.6	34.7 36.9 -2.2			-2.5	-2.8	-3.0
Discount rate % p.a. end of period	41.4	34.Z	30.4 4 8	29.4 4.3	. 4.5	4.3			
Current account, EUR mn ⁵⁾ Current account in % of GDP Gross reserves of NB incl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP EDI inflow, EUR mn	-2656 -7.8 10954 17421 49.6 2441	-3268 -8.5 13067 22705 57.9 1952	-3127 -7.0 10145 24449 50.9 3324	-2920 -5.3 12907 30156 54.7 2387	-3 0.0 12437 26386	-91 -0.6 12688	-3500 -5.4	-4400 -6.0	-5500 -7.0
FDI outflow, EUR mn	-17	120	294	281	40	29	2000		
Exports of goods, BOP, EUR mn ⁵⁾ annual growth rate in % Imports of goods, BOP, EUR mn ⁵⁾ annual growth rate in % Exports of services, BOP, EUR mn ⁵⁾ annual growth rate in % Imports of services, BOP, EUR mn ⁵⁾ annual growth rate in %	22248 14.9 23485 17.9 3000 3.0 2785 3.0	25654 15.3 27571 17.4 3542 18.1 3285 18.0	33099 29.0 35120 27.4 4313 21.7 3710 12.9	42032 27.0 42665 21.5 5130 18.9 4742 27.8	9803 37.9 9752 27.5 1049 11.9 1019 27.6	11556 18.6 11241 17.0 840 ^{III} 26.1 ^{III} 920 ^{III} 39.3 ^{III}	51000 21 51000 19 6000 17 5700 20	58000 13 59000 16 6600 10 6800 20	65000 12 68000 16 7300 10 7800 15
Average exchange rate SKK/USD Average exchange rate SKK/EUR (ECU) Purchasing power parity SKK/USD Purchasing power parity SKK/EUR	32.26 40.05 17.23 20.47	31.02 38.59 17.20 20.33	29.72 37.25 17.13 20.53	24.69 33.77 17.05 20.17	26.24 34.37	22.09 33.06	31.6	30.2	30.2

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) From 2006 including wages of armed forces. - 4) According to ESA'95, excessive deficit procedure. - 5) Calculated from USD.



Hermine Vidovic

Slovenia: caught by inflation

Backed by continued investment expansion, Slovenia's GDP grew by 5.4% in the first quarter of 2008. Investment activities were focused first of all on construction, while investments in machinery and equipment were only modest. Household and government consumption grew by 3.4% each; government expenditures rose at a much higher rate than in the years before, probably due to the approaching parliamentary elections in autumn this year. The contribution of foreign trade to GDP growth was almost nil. Growth of industrial production, reporting a weak performance during the first quarter, has somewhat recovered recently and increased by 3.5% during the first five months of the year. Apart from the production of coke and petroleum products, the export-oriented chemical and car industries were the most successful during that period.

Highest inflation rate in the eurozone

Accelerating inflation is still the most critical economic issue. Consumer prices rose by 6.5% on annual average during the first five months of 2008, largely due to galloping prices of food and beverages (13.3%), housing, water and electricity (10.5%) and hotels and restaurants (7.1%). The price rises are mostly attributable to external factors, particularly the surge of world market prices of food and energy. An important domestic factor is the high concentration of the country's retail trade sector (four retail chains control 90% of the market). Wages, by contrast, have so far had no impact on inflation. During the first guarter of the year average gross wages grew by only 1.1% in real terms, net wages by 0.9%. However, after a long time, public sector wage growth has taken the lead again. The stipulations of the new wage system envisaging a reduction of income disparities within in the public sector by the end of 2010 will very likely worsen the situation. The new salary system was finally introduced in mid-June 2008 and will be applied to 160 thousand employees in the public sector. In order to curb inflation, the government introduced stricter controls of regulated prices and instructed the state competition regulators to investigate possible illegal price agreements in the retail sector. In a further attempt at bringing inflation under control the Slovenian parliament approved a revised budget for 2008 aiming at a surplus versus the originally planned small budget deficit.

Employment continued to benefit from GDP growth. National account data indicate a 3% rise in employment, particularly in construction, transport and business services. Labour force survey data, by comparison, put employment growth at only 1.4% and the unemployment rate at 5.1% in the first quarter of 2008. Work permits for foreign workers have been increasing steadily over recent years, amounting to about 72 thousand in March. Most foreign workers are engaged in construction or other jobs requiring only elementary or no education at all.

External position deteriorating

On the external side, goods imports grew faster than exports, resulting in a widening of the trade deficit. This may indicate a weakening of competitiveness following the introduction of the euro (prior to this the Slovenian tolar had been 'adjusted' regularly). Consequently the current account deficit increased significantly compared to the first quarter of 2007. Apart from the rising trade deficit, this deterioration was caused by growing imbalances both in the incomes (interest payments on foreign debt) and current transfers items. Trade in services performed dynamically in both directions, leading to a slightly higher surplus than a year earlier. As opposed to the past three years, when Slovenia was an FDI net exporter, FDI inflows were higher than outflows in the first quarter of 2008. Gross foreign debt continued to rise rapidly and stood at EUR 36.5 billion by the end of March, about EUR 2 billion more than by the end of 2007. The bulk of that increase was due to the borrowing of commercial banks abroad.

Back on moderate growth path

Slovenia's growth prospects in the medium term are sound, but less favourable than in the boom year 2007. GDP growth will decelerate to below 5% in 2008 owing to weaker exports. In contrast to our earlier expectations investments are still very strong, particularly in the construction sector (residential buildings). As regards other demand components, we expect an election-related boost to government spending; growth of household consumption will remain constant at about 3% backed by wage increases and, to a lesser extent, credit growth. The slower economic growth, expected to continue in the coming two years, will translate into moderate employment gains averaging about 1% per year in the period 2008-2010. Unemployment should remain almost stagnant at around 5% measured by the labour force survey. Labour shortages will continue, particularly in the segment of the lower educated. Public finances are well under control, turbulence is not in sight yet. Inflation is expected to decelerate during 2008, resulting in an average rate of 5.5%. The return to a more moderate level of inflation in the coming two years is conditioned both on the absence of further major shocks to world market prices of food and energy and, excessive wage claims. The export performance will largely depend on the economic environment, particularly in the EU. Assuming a deceleration of fixed capital formation, a main driver of growth, over the next years, the import growth rate should taper off.

Beyond 2008 wile expects GDP to grow by 4.3% to 4.8%. Growth of government consumption is likely to return back to normal after the election year 2008, while household consumption will remain stable up until 2010. Infrastructure investments are expected to dwindle, particularly in motorway construction from 2009 onwards.

Table SI

Slovenia: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st (2008 quarter	2008	2009 Forecas	2010 st
Population, th pers., mid-year	1997	2001	2009	2019					
Gross domestic product, EUR mn, nom. ²⁾³⁾ annual change in % (real) ²⁾ GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	26677.5 4.4 13402 18430	28243.5 4.1 14114 19460	30448.3 5.7 15162 20660	33541.8 6.1 16610 22430	7678.5 7.2	8496.5 5.4	37100 4.3	40600 4.3	44000 4.8
Gross industrial production annual change in % (real) ⁴⁾ Gross agricultural production annual change in % (real) Construction output	4.8 19.2	3.3 -1.4	6.1 -7.0	6.5	8.7	1.7	3	3.5	4.5
annual change in % (real) $^{5)}$	2.5	3.0	15.3	18.2	35.5	33.0		•	•
Consumption of households, EUR mn, nom. $^{2)3)}$ annual change in % (real) $^{2)3)}$ Gross fixed capital form., EUR mn, nom. $^{2)3)}$ annual change in % (real) $^{2)3)}$	14196.5 3.0 6783.8 7.3	14967.7 2.9 7210.0 2.5	15955.6 4.0 7959.7 8.4	17205.2 3.1 9631.3 17.2	3881.0 2.3 2076.5 21.2	4308.9 3.4 2508.9 17.1	3 8	3 4	2.8 5
LFS - employed persons, th, avg. annual change in % Reg. employees in industry, th pers., avg. ⁶⁾ annual change in % ⁶⁾ LFS - unemployed, th pers., average LFS - unemployment rate in %, average Reg. unemployment rate in %, end of period	943 5.1 239.7 -1.0 64 6.3 10.1	949 0.6 239.3 -1.7 67 6.6 10.2	961 1.3 235.5 -1.6 61 6.0 8.6	985 2.5 237.4 0.8 51 4.9 7.3	958 1.3 236.9 0.8 58 5.7 8.1	971 1.4 237.3 ⁻ 0.3 ⁻ 52 5.1 6.9		4.7 7	4.6 6.8
Average gross monthly wages, EUR ³⁾⁷⁾ annual change in % (real, net) ⁷⁾	1117 2.1	1157 3.5	1213 2.5	1285 4.2	1238 5.2	1335 0.9	•	•	
Consumer prices (nat. def.), % p.a. Producer prices in industry, domestic, % p.a.	3.6 4.3	2.5 2.7	2.5 2.3	3.6 5.4	2.4 4.5	6.6 5.9	6 4	5 3.8	3.5 3
General governm.budget, EU-def., % GDP ⁸⁾ Revenues Expenditures Net lending (+) / net borrowing (-) Public debt in % of GDP ⁸⁾	44.2 46.5 -2.3 27.6	44.5 46.0 -1.5 27.5	44.1 45.3 -1.2 27.2	43.2 43.3 -0.1 24.1	· · · · · · · · · · · · · · · · · · ·	- - - -	-0.8	-1.0	-1.0
Discount rate % p.a., end of period 9)	3.3	3.8	3.8	4.0	3.8	4.0			
Current account, EUR mn Current account in % of GDP Gross reserves of NB excl. gold, EUR mn ¹⁰⁾ Gross external debt, EUR mn Gross external debt in % of GDP FDI inflow, EUR mn FDI outflow, EUR mn	-719.7 -2.7 6464.0 15343 57.5 665.2 441.0	-561.4 -2.0 6824.1 20508 72.6 472.6 515.6	-856.5 -2.8 5341.7 24034 78.9 511.7 718.5	-1641.4 -4.9 669.7 34358 102.4 1072.5 1153.8	-260.3 -3.4 836.8 28433 186.9 307.0	-620.6 710.9 36462 259.5 137.1	-1600 -4.3 1200 1000	-1500 -3.7	-1500 -3.4
Exports of goods, BOP, EUR mn annual growth rate in % Imports of goods, BOP, EUR mn annual growth rate in % Exports of services, BOP, EUR mn annual growth rate in %	12932.8 13.3 13941.6 16.6 2782.6 12.9 2095.0 8.8	14599.2 12.9 15625.0 12.1 3142.8 12.9 2293.5 9.5	17028.3 16.6 18179.3 16.3 3449.5 9.8 2583.8 12.7	19777.0 16.1 21441.1 17.9 4115.6 19.3 3075.5 19.0	4781.5 18.7 5027.9 18.7 829.3 23.1 624.9 16.7	5102.6 6.7 5566.9 10.7 988.2 19.2 765.2 22.5	21600 9 23600 10 4800 16 3600 18	23800 10 25700 9 5600 16 4200 16	26900 13 28800 12 6600 17 5000 18
Average exchange rate EUR/USD ³⁾ Average exchange rate EUR/EUR (ECU) ³⁾ Purchasing power parity EUR/USD ³⁾ Purchasing power parity EUR/EUR ³⁾	0.803 0.997 0.610 0.725	0.804 1.000 0.614 0.725	0.797 1.000 0.617 0.734	0.731 1.000 0.624 0.741	0.763 1.000	0.667 1.000	1	1	1

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95 (FISIM adjusted and real change based on previous year prices). - 3) Slovenia has introduced the Euro from 1 January 2007. For statistical purposes all time series in SIT as well as the exchange rates and PPP rates have been divided by the conversion factor 239.64 (SIT per EUR) to EUR-SIT. - 4) From July 2005 new methodology. - 5) Enterprises with at least 20 employees. - 6) From January 2005 data from Statistical Register of Employment, years before from Monthly Report on Earnings. - 7) From January 2005 including legal persons with 1 or 2 employees in private sector. - 8) According to ESA'95, excessive deficit procedure. - 9) From 2007 ECB main refinancing rate (minimum bid rate). - 10) From January 2007 (Euro introduction) only the foreign currency reserves nominated in non-euro currency are included. *Source:* wijw Database incorporating national statistics; Eurostat; wijw forecasts.



Sebastian Leitner

Baltic States: sharp slowdown in Estonia and Latvia, while Lithuania remains on high growth track

At the beginning of 2008 a long lasting boom, driven by household demand for consumer goods and investment in the real estate sector and facilitated by an enormous inflow of credit, has finally come to an end in two of the three Baltic States. With a growth rate of only 0.1% of GDP year-on-year in the first quarter of 2008, Estonia appears to be in a hard landing situation. In Latvia the slowdown of growth, to 3.3% in the first quarter, has so far been less pronounced, while Lithuania could maintain its good pace with a growth rate of 6.9%. The sudden slump in Estonia and Latvia has been mostly triggered by the simultaneous decline of investments in the real estate sector and the reduction of consumer spending.

In both Estonia and Latvia, by 2006 already all indicators – be it the widening current account deficit, rising inflation or the enormous growth of real wages – highlighted the symptoms of overheating, so that a downturn was due to take place. The only open questions were when it would exactly happen and whether the scenario of a soft or a hard landing was more likely.

Real estate 'bubble' bursting in Estonia and Latvia

From mid-2007 onwards housing prices, which had tripled in the preceding three-year period, started to fall in Estonia. This development was accompanied by a reduction in the growth rate of mortgage loans, which had reached a peak of 60% year-on-year throughout 2006, but came down to 25% at the beginning of 2008. A similar trend could be observed in Latvia, where debt levels of households have risen as enormously as in Estonia in the past five years and surpassed 80% of annual disposable income on average. The fast rise of mortgage loans which had been induced by real wage hikes and low interest rates came to an end in the second half of 2007, when housing prices in Riga approached the levels of West European capitals.

The sudden decline in the growth rate of GDP reflects that not only investments but also the growth in consumer spending came to an abrupt halt. Retail sales in the 1st quarter of 2008 decreased in Estonia as well as in Latvia. Although real wages still rise significantly in both countries, the eagerness of consumers to spend has faded away in the light of consumer inflation escalating to double-digit levels and increasing pessimism about future economic developments.

Inflationary pressures and labour shortages harm competitiveness

Although the dynamics of internal demand was reduced by large, prices are still on the rise in all of the Baltic States. In April year-on-year inflation reached a peak of 17.5% in Latvia and surpassed

11% in Estonia and Lithuania. Obviously the sharp increase in food and fuel prices has pushed up price levels, but above all the constraints on the supply side of the labour market have put pressure on employers to raise wages far beyond the growth of labour productivity, which resulted in the emergence of a wage-price spiral. A distinctive slowdown of consumer inflation is not likely to happen before 2009 in Estonia and Latvia. Administered prices for electricity are due to be raised further in the current year and food and fuel price growth will still exert an upward pressure. Only when demand for labour is reduced and unemployment rates start rising, the wage-price spiral will come to a halt.

With their national currencies pegged to the euro, the inflation-induced real appreciation generated a current account deficit of 22.9% of GDP in 2007 in Latvia and of 17.4% in Estonia, which declined only slightly in the first quarter of 2008. The loss of external competitiveness is to be observed in the decline of export dynamics and the slowdown of growth rates of industrial production. In particular manufacturers of labour-intensive products, which still make up a large part of the Baltic export structure, such as wood products and textiles, but also food products suffer from the rise in labour costs in Estonia and Latvia. The future prospects for the manufacturing sectors in those two countries are not rosy. The overvaluation of the currencies forces manufacturers to restructure production towards higher value added products. In the current situation of falling profits and rising credit cost, however, the eagemess to take the risk of new investments is low. Though the situation of overvaluation is a burden on manufacturers, the peg of the currencies to the euro is hardly debated. This is a logical consequence of the already high euro-denominated household indebtedness, which locks in the countries in their once chosen currency board (Estonia and Lithuania) and hard-peg (Latvia) options. A devaluation of the currencies would result in an excessive debt burden of a large part of the population.

Up to now the sharp decline in demand has not spilled over to the labour market. Labour force survey figures for the first quarter of 2008 still show a reduction of unemployment rates to 4.2% in Estonia and stagnant jobless figures in Latvia. Nevertheless, vacancies almost halved year-on-year and the rate of registered unemployment shows that the downward trend in unemployment has reversed. In Estonia most recently several manufacturing companies have announced to lay off employees or introduce part-time working in the near future in response to falling orders and sharply rising labour costs. Already in 2008, but even more so in 2009 and 2010 we expect employment to shrink in Estonia and Latvia, particularly in the construction sector, which more than doubled its employment from 2000 onwards. The manufacturing and the retail sectors will be affected alike by the reduction of domestic demand.

Fiscal policy response: restrictive in Estonia, less so in Latvia

The strong collection of revenues throughout the last two years allowed the Estonian government not only to increase current expenditures but at the same time to achieve fiscal surpluses of about 3% of GDP in both 2006 and 2007. However, the severe decline in the growth of tax revenues at the beginning of 2008 induced the Estonian government to approve a supplementary budget in May, reducing their expenditure plan for 2008. The fiscal authorities are obviously not willing to make full

use of the automatic stabilizers, but will try to stick to their policy of targeting a balanced budget. Nevertheless we expect that a further reduction of tax income will lead to a small fiscal deficit of 1% in 2008, while a balance will be aimed at by 2010.

Similarly, the plan of the Latvian government announced at the end of 2007 to achieve a fiscal surplus of 1% of GDP in 2008 is due to fail. Already in 2007, when GDP growth was still double-digit, the aim to reach a surplus of a meagre 0.5% was not met and the fiscal year ended in a balanced budget. Figures for the first quarter of 2008 already show that tax collection is far below target. At the same time the instability of the rather fragile four-party coalition makes a reduction of expenditures in the current year highly unlikely. We therefore expect a deficit of more than 1% for this year: The envisaged surpluses in the general government budget are unlikely to be achieved before 2011, when growth rates will probably pick up again.

Estonia in particular but also Latvia are threatened by the danger of recession. The risk of adverse consumption and investment responses caused by the shock of the sudden economic downturn is manifest. However, we expect household expenditures to pick up slightly in the course of the year. Estonia will reach the bottom of its slump already in 2008, while Latvia is likely to experience an even rockier phase in 2009. A recovery is expected to come about in 2010, when the countries have gradually digested the meltdown of the real estate markets. Domestic demand should pick up when the sentiments of unconfident consumers and investors turn from negative to stable. Nevertheless, in both Baltic States the enormous growth rates of investment and household consumption that could be observed until recently will by far not be reached in the forthcoming years. Therefore the medium-term forecast for GDP growth for Estonia and Latvia is in the range of 4-5%.

Lithuania remains on a high growth track, but 'soft landing' is in sight

Unlike in its northern Baltic neighbourhood, in Lithuania the economy continues to perform well. Domestic demand still grows at double-digit rates in terms of gross fixed capital formation as well as consumption of households. The same is true for construction, which – in line with credits granted to households – is still increasing by more than 40% year-on-year. A decline in housing investments is going to happen also in Lithuania but with some delay. The growth of real estate prices has slowed down, but since the previous hikes were not that high, a sharp fall similar to Estonia and Latvia is not likely to take place. Moreover, in Lithuania, household debt levels (at 40% of disposable income) are still substantially lower than in Estonia and Latvia, which makes a milder decline in housing demand most likely. In addition, there have been no signs so far of a reduction in households' propensity to spend. Nevertheless, rising inflation rates will induce households to revise their expenditure plans in Lithuania alike and thereby curb the dynamics of domestic demand in both 2009 and 2010.

At the same time, exports and thus industrial production are regaining momentum in 2008. On the one hand, the loss of competitiveness was less pronounced for Lithuanian manufacturers compared to its Baltic neighbours. But the main drivers of the surge in exports are fuel products and chemicals, as the refinery of Mazeiku Nafta has been able to work again at full capacity since the beginning of this year. Because of this one-time hike we expect to see lower growth rates of exports in the years

to come. Besides, the growth in industrial production in Lithuania may be threatened, from 2010 onwards, by electricity shortages. The Lithuanian government has committed itself in the accession treaty to shut down its Soviet-type atomic power plant in Ignalina by the end of 2009. Thereafter, imports of electricity will have to rise dramatically, since the planned construction of a substitute (together with Estonia, Poland and Latvia) will not be implemented before 2018 at the earliest. In general, Lithuania has benefited most from the recent surge in demand in the CIS countries, which increased their share in Lithuania's exports.

The forthcoming parliamentary elections in October 2008 make it plausible that the ruling parties of the Social Democrats, Farmers' Union/New Democracy and Social Liberals, which have entered the previous minority coalition government as recently as January, aim at pleasing the electorate by expanding public expenditures. A further reduction of the already moderate public deficit is envisaged in the medium term.

At present there are no conclusive signs that a sharp downturn comparable to Estonia and Latvia is likely to happen in Lithuania in 2008 or 2009. Nevertheless we expect the Lithuanian economy to slow down gradually next year and in 2010, provided that domestic demand is cooling down.

Table EE

Estonia: Selected Economic Indicators

	2004	2005	2006	2007	1)	2007 2008 1st quarter		2008	2009 Foreca	2010 st
Population, th pers., mid-year	1349.3	1346.1	1343.5	1341.7						
Gross domestic product, EEK mn, nom. annual change, % GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	149923 8.3 7101 12310	175392 10.2 8327 14110	207061 11.2 9850 16100	243252 7.1 11589 17770	54	1966 10.1	59476 0.1	268900 0.5	293500 2	323600 4
Gross industrial production	10 5	11.0		0.7						
annual change in % (real) Gross agricultural production	10.5	11.0	9.9	6.7 16.8		8.0	-1.4	0.5	2	4
Construction industry annual change in % (real)	11.0	19.8	30.0	8.9		23.3	-5.2			
Consumption of households, EEK mn, nom.	80460	91387	109203	125842	29	9605	32572			
annual change in % (real)	6.7	10.6	15.1	8.9		16.7	-0.4	2	3	5
Gross fixed capital form., EEK mn, nom annual change in % (real)	47091 4.4	53743 9.9	70569 22.4	77518 7.8	16	5921 15.0	17952.2 5.2	3	4	6
LFS - employed persons, th, avg.	595.5 0 2	607.4 2 0	646.3 6 4	655.3 1 4	6	47.0	656.5 1.5			
LES - employed pers in industry th ava	160.9	157.9	154.0	149.8	1	61.6	157.8			
annual change in %	7.3	-1.9	-2.5	-2.7		2.4	-2.4			
LFS - unemployed, th pers., average	63.6	52.2	40.5	32.0		36.3	28.7			
LFS - unemployment rate in %, average	9.6	7.9	5.9	4.7		5.3	4.2	5.5	6.5	8
Reg. unemployment rate in %, end of period	3.5	2.7	1.4	2.2		1.7	2.7			
Average gross monthly wages, EEK annual change in % (real, gross)	7287 5.2	8073 6.4	9407 11.6	1136 13.0	10)322 14.2	12337 7.6		•	
Consumer prices, % p.a. Producer prices in industry. % p.a.	3.0 2.9	4.1 2.1	4.4 4.5	6.6 8.3		5.2 7.0	11.1 8.2	11	8	7
General governm, budget, EU-def., % GDP ²⁾										
Revenues	35.9	35.4	36.6	36.9						
Expenditures	34.1	33.5	33.0	33.7						
Net lending (+) / net borrowing (-)	1.7	1.8	3.6	3.2				-1.0	-0.5	0.5
Public debt in % of GDP ²	5.1	4.5	4.2	3.4		•	•			
Money market rate, $\%$ p.a., end of period $^{3)}$	2.4	2.5	3.8	7.0		4.0	5.8			
Current account, EUR mn	-1176.7	-1117.5	-2051.4	-2697.6	-8	23.4	-698.2	-1700	-1850	-2100
Cross reserves of NP evel, gold, EUP mp	1211 0	-10.0	0112.7	-17.4		23.4	-10.4	-9.9	-9.9	-10.2
Gross external debt. FUR mn	7343.7	9560.7	12761.5	17151.3	1	3734	2000		•	•
Gross external debt in % of GDP	76.6	85.3	96.4	110.3		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,				
FDI inflow. EUR mn	775.1	2254.5	1341.0	1815.3		549	545.2	1600		
FDI outflow, EUR mn	216.6	507.4	876.0	1123.1	2	25.9	190.0	800		
Exports of goods, BOP, EUR mn	4806.1	6261.5	7680.0	8082.6	19	18.3	2000.5	8500	8800	9200
Imports of goods BOB EUD mp	6/35 8	30.3 7708 3	10027.1	0.2 10720 8	25	5.3 67.0	4.3	10500	10000	0 11600
annual growth rate in %	18.5	21.2	28.6	6 9	25	12.8	_4.09.7	-2	10900	6
Exports of services, BOP FUR mn	2281.9	2569.3	2773.2	3187.2	6	50.8	722.2	3500	3700	4000
annual growth rate in %	16.4	12.6	7.9	14.9	Ŭ	22.8	11.0	10	6	8
Imports of services, BOP, EUR mn	1415.1	1740.5	1961.7	2224.7	5	03.9	551.7	2500	2700	3000
annual growth rate in %	15.3	23.0	12.7	13.4		23.9	9.5	12	8	11
Average exchange rate EEK/USD	12.59	12.59	12.47	11.44	1	1.94	10.50			
Average exchange rate EEK/EUR (ECU)	15.65	15.65	15.65	15.65	1	5.65	15.65	15.65	15.65	15.65
Purchasing power parity EEK/USD, wiiw	7.59	7.81	8.05	8.60				· ·		
Purchasing power parity EEK/EUR, wiiw	9.02	9.24	9.57	10.20				.		

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95, excessive deficit procedure. - 3) TALIBOR 1 month interbank rate.

Table LV

Latvia: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st	2008 quarter	2008	2009 Foreca	2010 st
Population, th pers., mid-year	2312.8	2300.5	2287.9	2276.1					
Gross domestic product, LVL mn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	7434.5 8.7 4790 9880	9059.1 10.6 5603 11180	11171.7 12.2 6948 12630	13957.4 10.3 8727 14420	2877.2 11.3	3433.4 3.3	16600 2.5	18900 1	21400 4
Gross industrial production									
annual change in % (real) Gross agricultural production	6.0	5.6	4.8	0.5	0.8	-2.7	-2	0	2
Construction industry annual change in % (real)	14.8	15.8	-2.0						•
Consumption of households. LVL mn. nom.	4605.9	5578.2	7184.2	8936.3	1965.7	2305			
annual change in % (real)	9.1	11.3	21.4	14.0	30.1	2.4	2.0	1.5	5
Gross fixed capital form., LVL mn, nom.	2041.8	2773.8	3644.1	4542.1	869.6	992.2			
annual change in % (real)	23.8	23.6	16.3	8.4	16.4	5.1	4	2	4
LFS - employed persons, th, avg.	1017.7	1035.9	1087.6	1119.0	1084.4	1137.8			
annual change in %	1.1	1.8	5.0	2.9	2.6	4.9		•	•
LFS - employed pers. in industry, th, avg.	191.2	179.2	195.7	192.1	183.2	202.5			
annual change in %	-3.2	-6.3	9.2	-1.8	0.9	10.5	•	•	•
LFS - unemployed, th pers., average	118.0	99.1	79.9	72.1	79.8	/9./			
Reg. unemployment rate in %, average	8.5	7.4	6.5	4.9	6.3	4.9	0.5		o
Average gross monthly wages, LVL annual change in % (real, net)	211 2.4	246 9.7	302 15.6	398 19.9	354 22.8	453 11.4			•
Consumer prices % p a	6.2	67	6.5	10 1	7.6	16.4	17	14	10
Producer prices in industry, % p.a.	8.6	7.8	10.3	16.1	15.9	11.0			
General government budget, EU-def., % GDP 2)									
Revenues	34.7	35.2	37.7	38.0					
Expenditures	35.8	35.6	37.9	38.0				-	
Net lending (+) / net borrowing (-)	-1	-0.4	-0.2	0.0			-1.5	-2	-0.5
Public debt in % of GDP 2)	14.9	12.4	10.7	9.7			-		-
Discount rate, % p.a., end of period	4.0	4.0	5.0	6.0	5.5	6.0			
Current account, EUR mn 3)	-1422.9	-1610.1	-3571.4	-4554.2	-1089.2	-940.4	-4000	-3900	-4450
Current account in % of GDP	-12.8	-12.5	-22.5	-22.9	-26.6	-19.2	-16.9	-14.5	-14.6
Gross reserves of NB excl. gold, EUR mn	1403.4	1883.4	3320.2	3824.5	3365.0	3988.9			
Gross external debt, EUR mn	9871.2	12807.7	18127.8	26644.6	20604.3	26805.1		-	-
Gross external debt in % of GDP	89.1	99.4	114.0	134.2				-	•
FDI inflow, EUR mn ⁻³	512.4 88.3	567.9 103.0	1326.3	1589.1 166 1	351.5 12.9	-22.5	1600		•
Expects of goods, BOB, EUB, mn^{3}	2204.6	1212.1	1002 0	5026.2	1206 5	1566 4	6500	7000	7450
appual growth rate in %	3394.0 21.1	4313.1	4003.0	21.6	1390.5	1000.4	0500	7000	6.4
Imports of goods BOP FUR mn ³⁾	5634.2	6753.5	8947 3	10811.6	2516.7	2564.0	11300	12000	12800
annual growth rate in %	23.2	19.9	32.5	20.8	37.3	1 9	4.5	6.2	67
Exports of services, BOP, EUR mn ³⁾	1431.5	1743.0	2101.1	2688.2	538.1	656.2	3200	3700	4300
annual growth rate in %	7.4	21.8	20.5	27.9	17.1	21.9	19.0	15.6	16.2
Imports of services, BOP, EUR mn 3)	947.5	1255.6	1571.3	1956.8	413.4	506.7	2250	2500	2700
annual growth rate in %	15.3	32.5	25.1	24.5	34.6	22.6	15.0	11.1	8.0
Average exchange rate LVL/USD	0.5401	0.5651	0.5605	0.4818	0.5361	0.4697			
Average exchange rate LVL/EUR (ECU)	0.6711	0.7028	0.7028	0.7028	0.7028	0.7028	0.7028	0.7028	0.7028
Purchasing power parity LVL/USD, wiiw	0.2736	0.2980	0.3249	0.3585			· ·		
Purchasing power parity LVL/EUR, wiiw	0.3252	0.3522	0.3865	0.4254	.		.		

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95, excessive deficit procedure. - 3) Calculated from LVL.

Table LT

Lithuania: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 2008 1st quarter		2008	2009 Foreca	2010 st
						4			
Population, th pers., mid-year	3435.6	3414.3	3394.1	3375.6		•			•
Gross domestic product, LTL mn, nom.	62586.7	71380.4	81905.2	96739.7	19788.2	23979.2	112800	128500	147100
annual change in % (real)	7.3	7.9	7.7	8.8	8.1	6.9	6	5.5	5
GDP/capita (EUR at exchange rate)	5276	6055	6989	8300					
GDP/capita (EUR at PPP - wiiw)	10910	11910	13220	14880				-	
Gross industrial production									
annual change in % (real)	10.8	7.1	7.3	4.0	-1.1	7.2	6	5	5
Gross agricultural production									
annual change in % (real)	2.1	1.1	-13.0						
Construction industry									
annual change in % (real)	7.2	11.1	21.1	21.9		13.5			
Consumption of households, LTL mn, nom.	40649.1	46308.8	53309.8	63252.0	13671.9	17135.3			
annual change in % (real)	12.2	12.1	11.8	11.5	18.0	12.2	8	7	7
Gross fixed capital form., LTL mn, nom,	13968.2	16302.2	20290.8	25712.3	4642.3	5777.8			
annual change in % (real)	15.5	10.9	17.4	15.8	24.4	10.7	9	8	8
LEO ampleured approach the sure	4 4 9 9 9	4 4 7 2 0	1 400 0	4504.0	4507 7	4540.0			
LFS - employed persons, th, avg.	1436.3	1473.9	1499.0	1534.2	1507.7	1510.3		•	•
annual change in %	-0.1	2.0	1.7	2.3	1.0	0.2		•	•
LFS - employed pers. In Industry, In, avg.	200.7	290.2	296.0	299.4	203.9			•	•
annual change in %	-3.0	122.0	-0.1	1.1	-0.9	77 E		•	•
LFS - unemployed, in pers., average	104.4	132.9	09.3	69.0	79.5	11.5			
LFS - unemployment rate in %, average	11.4	0.3	5.0	4.3	5.0	4.9	4.5	4.5	5
Reg. unemployment rate in %, end of period	0.5	4.1	3.7	4.3	3.7	4.7			•
Average gross monthly wages, LTL	1149.3	1276.2	1495.7	1813.0	1737.8	2151.3			
annual change in % (real, net)	5.0	6.8	15.0	17.6	22.9	14.2			
Consumer prices % p a	12	27	37	57	43	10.6	11	9	10
Producer prices in industry, % p.a.	6.0	11.5	7.4	7.0	1.1	21.7			
(2)									
General goverm.budget, EU-def., % GDP -	04.0	00.4	00.4						
Revenues	31.8	33.1	33.4	34.3	•	•			•
Expenditures	33.4	33.0	33.9	35.6	•	•			
Net lending $(+)$ / net borrowing $(-)$	-1.5	-0.5	-0.5	-1.2	•	•	-1	-1	-0.5
Public debt in % of GDP	19.4	18.6	18.2	17.3	•	•		•	•
Money market rate, % p.a., end of period $^{3)}$	2.3	2.5	3.7	5.8	4.1	4.5			
Current account. EUR mn	-1393.6	-1481.3	-2551.2	-3836.7	-800.4	-1030.9	-4600	-4800	-6300
Current account in % of GDP	-7.7	-7.2	-10.8	-13.7	-14.0	-14.8	-14.1	-12.9	-14.8
Gross reserves of NB excl. gold, EUR mn	2578.4	3135.6	4307.6	5165.0	4145.1	5165.1			
Gross external debt, EUR mn	7686.6	10586.5	14441.8	20537.3	15500				
Gross external debt in % of GDP	42.4	51.2	60.9	73.3					
FDI inflow, EUR mn	623.1	826.0	1448.2	1412.0	360.8	207.5	1600		
FDI outflow, EUR mn	211.6	277.7	232.2	430.7	84.6	29.2	250		
Exports of goods BOP FUR mp	7477 7	9490 0	11262.8	12521.5	2793 9	3677 9	15500	17500	20000
annual growth rate in %	10.4	26.9	18.7	11.2	6.3	31.6	23.8	12.9	14.3
Imports of goods BOP FUR mn	9398.2	11849.0	14599.9	16619.9	3708.8	4834 1	20500	23000	27000
annual growth rate in %	13.8	26.1	23.2	13.8	13.8	30.3	23.3	12.2	17.4
Exports of services BOP FUR mn	1968 7	2502.8	2878.9	2958.8	584.9	649 7	3350	3650	3900
annual growth rate in %	18.5	27 1	15.0	2.8	-13.3	11 1	13.2	9.0	6.8
Imports of services BOP FUR mn	1313.4	1655.3	2018.3	2356.4	463.9	488.9	2700	3000	3300
annual growth rate in %	17.9	26.0	21.9	16.7	5.9	5.4	14.6	11	10.0
Average exchange rate LTL/USD	2.78	2.77	2.75	2.52	2.63	2.31			
Average exchange rate LTL/EUR (ECU)	3.45	3.45	3.45	3.45	3.45	3.45	3.45	3.45	3.45
Purchasing power parity L1L/USD, wilw	1.41	1.48	1.54	1.62	•			•	
Purchasing power parity LIL/EUR, wilw	1.67	1.75	1.83	1.93		•		•	

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) According to ESA'95, excessive deficit procedure. - 3) VILIBOR 1 month interbank rate.



Josef Pöschl*

Candidates and potential candidates for EU membership: economic growth continuing, inflation calming down

Introduction

This chapter focuses on seven countries in Southeast Europe (SEE-7) that are not – or rather not yet – EU members. The three candidate countries are Croatia, Macedonia (FYRM) and Turkey; the four potential candidate countries are Albania, Bosnia and Herzegovina (BiH), Montenegro and Serbia. For want of statistics, let alone reliable data, Kosovo has not been included in this report.⁴⁰

Basically, our previous forecast (of February 2008) remains valid. The updates we have since received are far from being substantial enough to change the overall economic picture. GDP growth rates in the region have remained significantly higher than those in the EU – the catching-up process continues apace (Table 1). Inflation and unemployment rates tend to be above the EU average. The region's overall consumption plus investment exceeds its own generation of value-added. The SEE-7 are running current account deficits that have increased still more following the surge in energy and food prices.

We now dispose of some new data and more details. Furthermore, in certain respects we have observed some significant new developments in terms of the business environment that have a direct bearing on our risk assessment. This overview will address the latter developments.

Major variances in the deceleration of GDP growth

The sequence of events bears great similarity to the patterns that have emerged in the United States, the EU and elsewhere in the world. In the course of 2007, GDP growth slowed down in most of the SEE-7 countries (see Figure 1 and Table 1). Growth was strong in the first quarter of 2007, yet decelerated thereafter. The slowdown was most pronounced in Turkey, where a long period of high prosperity (with peak rates close to 10%) came to an end.

After the first quarter of 2007, growth also diminished markedly in Croatia, but much less so in Macedonia. In Serbia it remained as high as it had been in the first quarter, while in Montenegro it even accelerated. A certain growth slowdown in some countries notwithstanding, GDP continues to grow at a relatively high rate. For 2008 as a whole (see Table 1), growth rates throughout the region

The research on this overview was completed on 24 June 2008. V. Gligorov and P. Havlik provided useful comments on the earlier draft.

⁴⁰ On Kosovo, see V. Gligorov (2007), 'Costs and Benefits of Kosovo's Future Status', *wiiw Research Reports*, No. 342.

are expected to range between 6% (Montenegro) and 4% (Turkey). Economic restructuring has proceeded far enough to lend a fillip to private entrepreneurship, both local and international, thus promoting a trend towards firm economic growth. It could be even firmer, were all the requisite reforms to be implemented. Much room remains for improvement and the situation calls for the establishment of adequate institutional infrastructure.



Source: National statistics.

Figure 1

Gross domestic product													
real change in % against preceding year													
	2004	2005	2006	2007 ¹⁾	2007 1st qu	2008 uarter	2008 Foreca	2009 st	2010	Index 1990=100 2007	Index 2000=100 2007		
Croatia	43	43	48	56	70		42	45	5	119 7	139.8		
Macedonia	4.1	4.1	4.0	5.1	6.8		5	6	6	106.9	117.3		
Turkey	9.4	8.4	6.9	4.5	7.6	•	4.0	5	6	265.2	139.7		
Candidate countries	8.9	8.0	6.7	4.6	7.0		4.0	5.0	5.9	241.2	139.2		
Albania	5.7	5.8	5.5	6.0			5.8	6.0	6.1	171.7	148.9		
Bosnia and Herzegovina	6.3	3.9	6.7	6.0			4.5	5	6		141.9		
Montenegro	4.4	4.2	8.6	8.2		8.1	6	6	6		134.9		
Serbia	8.4	6.2	5.7	7.5	8.2	7.1	5	5	5		146.6		
Potential candidate countries	7.4	5.6	6.0	7.0			5.1	5.2	5.4		145.3		
1) Preliminary.													
Source: wiiw Database incorpor	ating na	ational s	tatistics	, forecast:	wiiw.								

In 2009 and 2010, growth will pick up speed again since the turmoil on the international markets should have calmed down by that time. Food and energy prices on world markets prices will increase at a slower rate – if at all.

Industrial output growth was also high in the first few months of 2007 (except for Montenegro and Serbia; see Figure 2); this contributed to the high growth rates for 2007 as a whole. In most cases, industrial growth slowed down later in the year, although it has shown some signs of recovery more recently (late 2007, first few months in 2008).

We expect industrial output to grow less in 2008 compared to 2007 only in some of the countries (BiH, Croatia and Turkey, see Table 2). However, neither the slowdown nor acceleration will be very pronounced.

There has been no perceptible shift towards massive industrialization (or re-industrialization) in terms of increasing the secondary sector's share in GDP.

In Serbia, labour productivity in industry in 2007 grew by 14.3% compared to less than 3.7% output growth (see Table 3). This would point to industrial restructuring having had to struggle with rather difficult market conditions. In spite of labour shedding in industry, the level of overall unemployment dropped by almost one hundred thousand persons (Table 4). There was a marked shift in employment away from industry to services.

In Turkey, on the other hand, growth in labour productivity was much less than growth in industrial output (2.6% versus 5.4%). Output growth led to a less than proportional increase in employment.

Table 1





Source: National statistics.

Gross industrial production													
real change in % against preceding year													
	2004	2005	2006	2007 ¹⁾	2007 1st qu	2008 Jarter	2008 Fo	2009 precas	2010 st	Index 1990=100 2007	Index 2000=100 2007		
Croatia ²⁾	3.7	5.1	4.5	5.7	8.0	4.8	4.5	4.5	5	89.9	140.0		
Macedonia 3)	-2.2	7.1	3.6	3.7	11.6	5.8	5	5	5	57.2	108.3		
Turkey	9.8	5.4	5.8	5.4	8.5	6.9	5.0	7	9	214.8	140.1		
Albania 4)	14.1	2.5	7.3	8.0			8	9	9	63.0	176.1		
Bosnia and Herzegovina 5)	12.0	11.0	11.7	6.3	10.5	5.3	5.5	7	10		172.0		
Montenegro	13.8	-1.9	1.0	0.1	-5.3	11.1	5	5	5		115.5		
Serbia	7.1	0.8	4.7	3.7	4.8	6.0	5	5	5		115.9		
1) Preliminary 2) Enterprises	s with m	ore thar	n 20 em	ployees	3) Ente	rprises w	ith more	than 1	0 emp	oyees 4)	Gross value		

 Preliminary. - 2) Enterprises with more than 20 employees. - 3) Enterprises with more than 10 employees. - 4) Gross value added. - 5) wiw estimates based on weighted averages for the two entities (Federation BiH and Republika Srpska).
Source: wiw Database incorporating national statistics, forecast: wiw.

In 2008, it is estimated that unemployment will rise in Turkey given the steep decline in GDP growth; Serbia will suffer a similar fate on account of lower growth and continued industrial restructuring. In the other countries in the region, the rate of unemployment will hardly change; it might even decline slightly, but is likely to remain at a two-digit level. By 2010 the unemployment rate should have dropped slightly in all countries except Montenegro and Serbia.

Table 3

Labour productivity in industry

real change in % against preceding year

	2004	2005	2006	2007 ¹⁾	2007 1st qu	2008 Jarter	Index 1990=100 2007	Index 2000=100 2007
Croatia ²⁾	5.7	3.6	5.6	5.2	7.8	5.6	221.4	157.4
Macedonia ³⁾	4.6	11.9	7.3	4.8		6.0	174.9	147.7
Turkey 4)	8.3	5.5	6.3	2.6	5.9			145.4
Bosnia and Herzegovina	14.4	11.6						
Serbia	12.5	9.0	14.2	14.3				208.3
1) Preliminary 2) Enterpris manufacturing industry.	ses with mor	e than 20) employee	es 3) Ent	erprises with	more tha	n 10 employ	ees 4) In

Source: wiiw Database incorporating national statistics.

Table 2

			L FS d	Jnemplo efinition, ar	oymen nnual av	it /erage								
in 1000 persons unemployment rate in %														
	2004	2004 2005 2006 2007 ¹⁾ 2005 2006 2007 ¹⁾ 2007 2008 2 1st quarter										2010 st		
Croatia	250	229	199	182	12.7	11.1	10.0			9.8	9.4	9		
Macedonia	309	324	321	317	37.3	36.0	34.9	35.8		35	34	33		
Turkey ²⁾	2498	2520	2446	2323	10.3	9.9	9.9	11.4	11.6	12	11	9		
Albania 3)	157	153	148	143	14.1	13.6	14.0	13.6		13	12	11		
Bosnia and Herzegovina 4)	486	508	367	347	44.1	31.1	29.0			29	28	27		
Montenegro	72	78	75	52	30.3	29.6	19.0			18	18	19		
Serbia	665	720	693	585	20.8	20.9	18.8	•		21	23	23		
1) Preliminary - 2) From 2007	' new me	thodolc	av due	to census	2006 -	3) Re(nistered u	nemnlovr	nent en	d of neri	od - 4) Until		

1) Preliminary. - 2) From 2007 new methodology due to census 2006. - 3) Registered unemployment, end of period. - 4) Unt 2005 registered unemployment, end of period.

Source: wiiw Database incorporating national statistics, forecast: wiiw.

Prices over the hump

In the second half of 2007, the SEE-7 countries suffered a steep increase in their consumer price indices, just after the very same indices had dropped slightly in the course of the second quarter 2007 (Figure 3). By spring 2008, the prices had finally peaked in most of the countries – for the time being at least.

The price indices stopped rising; in some cases they even declined slightly (zero or negative change month-on-month, see Figure 3). In Serbia and Turkey, the inflation slowdown was somewhat less pronounced. Up until October 2007, the national currency in both countries appreciated against the euro. This also meant even stronger appreciation against the US dollar, thus diminishing the impact of the increase in world market prices for mineral oil and grains. Later on, however, both currencies depreciated and began fuelling inflation once more.

Higher inflation usually sparks off a debate on ways and means of fighting the phenomenon. In countries which lack their own currency (Montenegro) or have a currency board arrangement in place (BiH), monetary authorities can do little but issue a new set of regulations governing the activities of commercial banks. As a matter fact, authorities in other regulatory sectors could do much more. Unless local suppliers enjoy some form of protection, domestic prices for tradable goods should not differ much from those outside the country and match the latter's moves. If that is the case, interest rates should not necessarily be regarded as the main variable to be targeted. It is even possible to achieve low inflation while applying low interest rates, as has been amply demonstrated by the Czech Republic. In Turkey, after gradually reducing its benchmark interest rate over a long period from a very high initial level, the central bank has started increasing it again. Whereas the impact on inflation is uncertain, the trend towards gradual currency depreciation has been checked.

Table 4

Figure 3

CPI, PPI, 2007-2008



Source: wiiw Monthly Database incorporating national statistics.

Impact of inflation on household consumption

The increase in consumer prices was not accompanied by similar rises in categories of nominal income such as pensions or remittances from abroad. For nominal wages, the main source of income of households, the picture was mixed. In some countries, in 2007 nominal wages increased markedly and real wages thus rose; in other countries they almost stagnated. In the potential candidate countries, real wage growth was high: 20% in Serbia, 15% in Albania and Montenegro and 6.4% in BiH. Real wage growth was rather modest in the EU candidate countries: 1.6% in Turkey, 2.2% in Croatia and 5.5% in Macedonia.

Data for the first quarter of 2008 are available for some of the countries. Real wage growth has almost come to a standstill in Croatia (0.6%); it has slowed down to some 5% in both BiH and Serbia, but has accelerated in Macedonia (6.7%) and Montenegro (15.6%). Real growth of household consumption in each country will depend on the ratio between price increases and the development of the different income categories in nominal terms. In 2008 we expect real household consumption to continue growing throughout the region. However, it will be lower than GDP growth in some countries (Albania, BiH, Turkey), but higher in Macedonia. In both 2009 and 2010, we expect household consumption to increase less than GDP growth in BiH and Turkey, yet more in Macedonia and Montenegro (Table 5).

		real cha	ange in %	% against p	receding	year				
	2004	2007 1st qu	2008 arter	2008 Fore	2009 ecast	2010	in % of GDP 2007			
Croatia	4.8	3.4	3.5	6.2	7.1		4	3.5	4	55.8
Macedonia	8.0	5.7	6.0	5			6	7	7	78.2 ²⁾
Turkey	11.0	7.9	4.6	4.6	5.6		2	2	4	70.7
Albania	9.4	3.9	5.0	6.0	-		5	6	6	74.2
Bosnia and Herzegovina		6.2	4.5	6			3	5	5	92.6
Montenegro ³⁾	16	2.8	10	8			6	7	8	77.3 ²⁾
Serbia ³⁾		5	5.4	6 ³⁾			5	5	5	70.1 ²⁾
1) Preliminary 2) Year 2006	- 3) wiiw est	imate.								

Consumption of households

Table 5

Source: wiiw Database incorporating national statistics, forecast: wiiw.

Price and wage levels

As shown by a recently published Eurostat study⁴¹, price levels in Croatia and Turkey in 2006 reached 65% and 63% of the weighted EU-27 average. This means that in these two countries prices are higher than in certain EU member states: Hungary (55%), Romania (50%) and Bulgaria (38%). Elsewhere in SEE-7, price levels varied: Montenegro, Albania and BiH (around 50%), Serbia (45%) and Macedonia (38%). Among the components of the basket, two service categories recorded especially low prices ranging between 45% and 20% of the EU-27 average: housing, water, electricity, gas and other fuels as well as health and education.

The ratio between price levels in the EU and the SEE-7 countries is subject to change by virtue of real appreciation (nominal appreciation of the national currency against the euro in combination with the increase in price levels relative to the EU).

Montenegro introduced the euro unilaterally several years ago. BiH maintains a fixed peg in the context of a currency board arrangement. Albania, Croatia and Macedonia maintain an undeclared fixed peg vis-à-vis the euro (Figure 4). The floating exchange rate in Serbia was influenced by political developments. In the period March to October 2007, the dinar appreciated against the euro, but depreciated thereafter (from 77 to 85 dinar per euro). After a turbulent interlude, it started to appreciate once more from March 2008 onwards. Turkey displayed a similar pattern. The lira appreciated up until October 2007 only to depreciate rather significantly in March and April 2008. The euro increased from a monthly average of 1.7 (October 2007) to 2.05 (April 2008), when the situation reversed somewhat following a rise in interest rates. Political events are hardly likely to

⁴¹ Paul Konijn, Comparative Price Levels for the Western Balkan Region for 2006 – actually individual consumption, *Statistics in Focus* 36/2008; for more data on this issue, see Annex.

exert pressure on Serbia's exchange rate in the short term, whereas in Turkey depreciation tendencies could become more pronounced in the near future for political reasons.

Figure 4

Exchange rates*, 2005-2008

EUR per NCU



*Values over 100 indicate appreciation relative to January 2005 Bosnia and Herzegovina CPI-deflated. Serbia: based on end-of-month exchange rates. *Source:* wiiw Monthly Database incorporating national statistics.

Figure 4 reflects the fact that the nominal exchange rates of only two countries, Serbia and Turkey, have fluctuated against the euro. For the other five countries, inflation rates above the EU average were the sole source of real appreciation or depreciation. Most probably, the divide between fixed-peg countries and free-float countries will remain for some time. The inflation rate in Serbia has been relatively high in recent months; despite some measure of real appreciation however, manufacturing, the main producer of tradable goods, is slowly gaining strength and may remain competitive thanks to strong productivity gains. In Turkey, price levels are already quite high and inflation has reached double digits once more, at least for the time being. Increasing input prices put manufacturers under some strain. Some of them, however, especially those in the medium- and high-tech industries, are quite fit and likely to remain competitive, even if real appreciation continues.

High-price countries are also high-wage countries. In 2007, gross monthly wages calculated in euros at the annual exchange rate for that year were: 960 in Croatia and 800 in Turkey. In BiH, Montenegro and Serbia gross monthly wages varied between 480 and 500. In Macedonia, they were close to 400; in Albania close to 280 (see Annex for detailed data on wage developments).

Table 6

Foreign trade of Southeast European countries

(based on customs statistics)

		2003	2004	2005	2006	2007 ¹⁾	2008 1Q	2006	2007	<u>1 Q 08</u> 1 Q 07	
				EUF	R mn			change in %			
Albania	Exports	396	487	530	631	782	205	19.0	24.0	13.1	
	Imports	1643	1849	2111	2430	3048	772	15.1	25.4	17.1	
	Balance	-1247	-1363	-1581	-1800	-2266	-567			•	
Bosnia and Herzegovina	Exports	1188	1441	1934	2640	3035	801	36.5	15.0	14.8	
	Imports	4253	4758	5715	5823	7106	1878	1.9	22.0	27.3	
	Balance	-3066	-3317	-3781	-3183	-4071	-1077			•	
Croatia	Exports	5468	6453	7065	8253	9000	2175	16.8	9.0	8.2	
	Imports	12546	13343	14935	17104	18826	4845	14.5	10.1	13.5	
	Balance	-7079	-6890	-7870	-8851	-9826	-2670		•	•	
Macedonia	Exports	1208	1347	1642	1912	2449	613	16.5	28.1	9.5	
	Imports	2039	2357	2599	2997	3814	1050	15.3	27.3	30.8	
	Balance	-830	-1010	-957	-1085	-1365	-437				
Montenegro ²⁾	Exports	271	452	461	627	628		36.2	5.0		
Montenegro	Importo	620	452	401	1/027	2152	•	52.2	40.0	•	
	Balance	-359	-416	-514	-855	-1524	•	52.2	40.0	•	
3)											
Serbia ³	Exports	2441	2853	3617	5092	6429	1675	40.8	26.3	20.8	
	Imports	6603	8679	8470	10448	13338	3611	23.3	27.7	24.8	
	Balance	-4162	-5826	-4853	-5356	-6909	-1936			-	
Turkey	Exports	41761	50897	59147	68020	78085	22116	15.0	14.8	25.0	
	Imports	61248	78530	94015	111096	123955	32859	18.2	11.6	22.2	
	Balance	-19487	-27633	-34868	-43076	-45871	-10742				
1) Preliminary, - 2) From 2004 including trade with Serbia & Kosovo, - 3) Excluding trade with Kosovo and Metohia											

Source: wiiw Database incorporating national statistics.

Relatively low wages are one of the factors that boost the international competitiveness of local producers of tradables. The fact that Albania has a high trade deficit despite very low wages points to a lack of productive capacities and is symptomatic of technological and managerial backwardness: a combination that also implies low labour productivity.

Wages in Croatia and Turkey outstrip those in a number of EU countries, as well as in China, Russia and Ukraine: a factor contributing to the high trade deficits in both countries.

Figure 5



Source: wiiw Annual Database incorporating national statistics.

Current account deficits on the rise

In all of the SEE-7 countries, export revenues cover but part of import expenditures. In 2007, the ratio was close to two thirds for Turkey and Macedonia, somewhat less than half in Croatia and Serbia, and even less than that in BiH. In Albania it was particularly low (just over one quarter). The rise in world market prices for energy and cereals did not induce a comparably marked decline in demand; import expenditures thus rose and trade deficits increased. The countries now have to pay a higher bill for their imports of energy and food. All of them are net importers of energy; except for Serbia and Turkey, they are all net importers of food as well. Turkey is a major producer of food with high trade surpluses;

consequently, higher world market prices for agro-food products do not necessarily exert a negative impact on its trade balance. Turkey leads in the production of certain types of vegetables, fruits and nuts. It remains to be seen how world market prices develop in the course of the year – wiw expects a moderation (see special section on inflation).

Table 7

FDI inflow to SEE EUR million												
	2005	2006	2007 ¹⁾	2008 forecast	2005	2006	2007 f	2008 orecast	2007 stock			
								FDI net, % of CA				
Croatia	1468	2738	3626	2800	65	95	107	79	30375			
Macedonia	77	345	239	500	62	767	141	417	2400 ¹⁾			
Turkey	8287	15708	16100	15000	41	58	52	44	98876			
Candidate countries	9832	18791	19965	18300	43	63	59	48	131651			
Albania	224	259	477	600	45	53	56	69	2289 ²⁾			
Bosnia and Herzegovina	478	564	1478	800	31	69	105	49	4500 ¹⁾			
Montenegro	393	644	1008	800	247	88	52	50	2222 ²⁾			
Serbia	1265	3504	2258	2000	70	120	32	44	9912 ³⁾			
Potential candidate countries	2361	4971	5220	4200	58	101	49	49	18923			

1) wiiw estimate. - 2) Cumulated flows. - 3) Cumulated FDI net flows.

Note: CA means current account deficit. FDI net is defined as inflow minus outflow.

Source: wiiw FDI Database incorporating national bank statistics; wiiw forecasts.

According to customs statistics, imports in the West Balkans as a whole amounted to EUR 48.3 billion in 2007, exports to 22.3 billion⁴² (see Table 6). Compared to 2006, imports rose by 20%, exports by 17%. Turkey's exports totalled EUR 78 billion (up 12%) and imports EUR 124 billion (up 15%). The entire region's trade deficit amounted to some EUR 72 billion.

In the first quarter 2008, import growth in the West Balkans outstripped export growth (year-on-year). The contrary was true for Turkey (imports +22%, exports +25%). Even if Turkey's exports and imports were to grow at the same rate throughout 2008, the trade deficit would still increase by some EUR 8 billion. Under similar conditions, the aggregate trade deficit in the West Balkans would widen by about EUR 4 billion. Regardless whether actual growth performance deviates from this assumption, we can expect the overall trade deficit to increase. To some degree, the countries will bridge the gap on account of an increase in revenue from services, especially tourism (Albania, Croatia, Montenegro and Turkey). The surplus in other components of the current account will hardly increase to any substantial degree; we thus have to reckon with larger current account deficits.

⁴² In some of the SEE-7, customs statistics differ considerably from balance of payment statistics, which served as the basis for the country tables.

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Capital inflows will play a major role in covering the trade deficits. Figure 5 shows the gap between the trade balance and current account, both measured in per cent of GDP. In Albania, BiH, Croatia, Macedonia and Montenegro foreign direct investment (FDI) in 2007 covered the major part of the current account deficit. In the case of Turkey, loans exceeded foreign direct investment; to a much larger degree, this was also the case for Serbia. Only in a few countries (Serbia, Turkey and Macedonia) did portfolio investment also finance a substantial portion of the deficit. For 2008, we once again expect FDI to cover about half of the current account deficit in the potential candidate countries – less than the previous year. Given the prospects of slower GDP growth, higher inflation and political turbulence, Turkey as well will most probably attract less FDI than in 2007. In financing its current account deficit through loans, Turkey will have to pay a higher risk premium in 2008.

The structure of foreign debt has changed throughout the whole SEE-7 region: The private sector share in total foreign debt has increased in recent years. In Croatia this started back at the beginning of the current decade, only to be followed a few years later by the other SEE-7 countries, for which pertinent figures are available (Macedonia, Serbia and Turkey – see Figure 6).

Table 9														
Foreign financial position														
in % of GDP														
	Gross external debt ¹⁾			N (ex	Reserves of National Bank (excluding gold) ²⁾				Current account					
	2004	2005	2006	2007	2004	2005	2006	2007	2005	2006	2007	2008 For	2009 ecast	2010
Croatia	81.8	82.1	85.8	87.7	23.0	23.7	25.6	24.8	-6.3	-7.9	-8.6	-8.0	-8.0	-7.4
Macedonia	47.9	53.7	49.1	48.9	15.4	22.2	26.2	25.6	-2.6	-0.9	-3.1	-3.2	-3.0	-2.7
Turkey	38.8	35.1	38.4	33.7	12.0	14.0	15.2	15.2	-4.7	-6.1	-5.8	-6.3	-5.6	-5.2
Albania	20.6	20.6	20.0	19.5	16.9	18.0	18.9	18.0	-7.5	-6.5	-10.5	-9.8	-10.1	-10.8
Bosnia and Herzegovina	25.5	25.6	21.3	18.6	22.0	25.0	28.5	31.6	-18.0	-8.4	-13.1	-13.4	-12.1	-10.8
Montenegro	29.3	28.3	23.5	19.1				•	-8.5	-24.7	-41.6	-29.6	-22.4	-21.9
Serbia	57.1	63.9	57.6	59.3	16.6	23.3	34.2	31.4	-8.5	-12.0	-16.9	-13.5	-12.3	-11.1

1) End of period. General government foreign debt for Bosnia and Herzegovina and Montenegro. - 2) End of period. Albania: including gold; refer to total foreign assets of Bank of Albania. Bosnia and Herzegovina: from 2006 including investment in foreign securities.

Source: wiiw Database incorporating national statistics, forecast: wiiw.

Economic reforms: the impact of politics

All SEE-7 countries have the status of candidates or potential candidates for EU membership. The rejection of the Lisbon treaty through the Irish referendum has raised concerns that at least for the time being, the EU would have to find new solutions before taking new members on board. This would be a major setback first of all for Croatia where accession negotiations are already at a rather

advanced stage and accession was expected for 2011. At the same time, the other countries in the West Balkans and their reform efforts could lose vigour. The same holds true for Turkey. The Turkish government has always been conscious of the fact that politics tend to be the main stumbling block; it has thus invested major efforts in adjusting its economy in an efficient manner. In the meantime, the government has found it hard to sell EU membership as a realistic prospect to the electorate. In principle, even without being an EU member Turkey could become a Schengen country, as is the case with Norway, and intensify cooperation. However, in the absence of membership as a perspective, the Turkish government will find it increasingly difficult to push further reforms through. Turkey may well undergo a gradual reorientation. Turkish companies have excellent chances of playing an important role in the Black Sea region, as well as in the neighbouring countries to the east and the eastern Mediterranean region: something they may only otherwise be able to achieve in the EU periphery (including the Balkans).



Figure 6

Note: MK from 2004 according to new definition (IMF definition 2003). *Source:* National Banks of the respective countries.

Kosovo's declaration of independence spelt trouble for the EU authorities, whereas the majority of voters in Serbia made it clear that Kosovo did not feature as the top issue within their list of priorities. This is a good starting point for positive developments in the region, including BiH and Macedonia. Under these circumstances and provided the door to the EU remains open, the economic catching-up process in the region might even gain in strength.


Mario Holzner

Albania: on the verge of the inflation target

The Bank of Albania is committed to maintaining the inflation rate at 3%, with a tolerance band of \pm 1 percentage point. By the end of April 2008, inflation stood at 4.4%. Throughout the year inflation is expected to fluctuate around the upper limit of the target, surpassing it on average. The increases in international energy and food prices are the main cause. Though risks have grown, Albania is likely to maintain its medium-term potential growth path of 6% in the years to come. This is given continued strong domestic consumer demand and increased public investment in infrastructure.

Fighting effects of inflation

The inflation rate has been accelerating recently, though at a slower pace than in other countries in the region. Items exhibiting the biggest price increases in April 2008 as compared to December 2007 were: fuels, edible oils, fruits, bread and vegetables. Growing food import bills widen the trade deficit. The government announced some support for the farmers, such as fuel oil subsidies for greenhouse heating. Though the government was called upon to decrease taxes on bread, wheat and flour, the Albanian ministry of finance wants to take other measures: public sector wages and pensions should be raised in July 2008 in order to compensate for food price increases.

Fighting causes of inflation

A recent IMF mission to Albania was strictly opposing these plans. The Bank of Albania, too, warned about wage-push inflation. Both argued for some support for the very poor, though. The IMF officials were able to persuade the government to cut the planned spending by 2.7% of GDP. Now the targeted budget deficit for 2008 stands at 5.2% only. However, this is in conflict with the promised wage increase and the government has not decided yet what to do. On its own account, in 2007 the Bank of Albania raised three times the interest rate by 25 basis points in order to fight inflation. In the first quarter of 2008 the key interest rate remained unchanged at 6.25% as the growth of construction costs is decreasing and the growth of monetary supply is slowing down.

Credit boom and stagnant remittances

Still, credit to the economy grew by 47% in the first quarter of 2008. Though this could be seen as a sign of potential overheating, it should be noted that the credit volume grows from very low levels. Credit growth is rather an indicator of the development of the financial system. This is very important as a traditional source of financing is starting to dry up: Growth of remittances from Albanian migrants, mainly working in Greece and Italy, stagnated in 2007 at about EUR 950 million. At the

beginning of the decade annual growth rates of remittances had been at about 25%. Throughout the past ten years remittances were central to economic growth of Albania, fuelling the booming construction sector and private consumption. So far about half of the trade deficit has been covered by remittances. Given that the average migrant sends home remittances for about a decade and a half, and given the slowdown in emigration, it is fair to assume that the peak of the remittances flow has been reached. Domestic sources of finance as well as FDI inflows will have to gradually take over the role previously played by remittances.

FDI targets the energy sector

There are also benefits from rising energy prices. The energy sector is increasingly becoming a target for FDI. After foreign investment in Albanian oil fields and hydropower, a US-Swiss consortium offered the best bid of EUR 125 million for the sale of an 85% stake in the state-owned ARMO oil company. The consortium plans to invest another EUR 240 million in ARMO's facilities. ARMO runs two refineries and a small network of filling stations. It controls about a quarter of the market. Moreover, the government launched the privatization of the distribution business of the state electricity company KESH. Between 51% and 76% of the company's distribution arm are to be sold to a strategic investor via an open international tender. In other news Prime Minister Sali Berisha invited the Italian electricity company Enel to build a nuclear power station. Italy held a referendum the year after the 1986 Chernobyl disaster, deciding to shut down its four nuclear power plants. Since then a moratorium on the construction of new plants is in effect. Enel officials declared to be ready to assess the feasibility of a project in Albania once the governments of Albania and Italy have reached the respective agreement. With the new Italian government of Prime Minister Silvio Berlusconi fancying the reintroduction of nuclear power generation, this plan gains in likelihood.

Favourable growth prospects despite increasing risks

The overall growth prospects of the Albanian economy appear to be rather favourable given the expected investment in infrastructure. Strong domestic demand growth fuelled by remittances from Albanians working abroad is still at the core of the country's economic performance. However, an improved business climate and a more developed financial sector should be conducive to larger FDI in the export sector, making this sector an engine of economic growth. Rising inflation and decelerating growth in the construction sector as well as in loans to the economy pose certain risks to continued high growth. Still, our forecasts for GDP growth in 2008, 2009 and 2010 are at 5.8%, 6.0% and 6.1%, respectively. Compared to our previous assessment, growth forecasts for 2009 and 2010 have been reduced by a symbolic 0.1 percentage point reflecting the judgement on the rise in potential risks.

Table AL

Albania: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st c	2008 quarter	2008	2009 Forecas	2010 t
Population, th pers., end of period	3135	3149	3150	3150					
Gross domestic product, ALL bn, nom.	751.0	817.4	893.0	982.2			1060	1160	1270
annual change in % (real)	5.7	5.8	5.5	6.0			5.8	6.0	6.1
GDP/capita (EUR at exchange rate)	1881	2095	2304	2522	•	•		•	•
GDP/capita (EUR at PPP - wiiw)	4210	4530	4950	5390					
Gross industrial production annual change in % (real) ²⁾	14.1	2.5	7.3	8.0			8	9	9
annual change in % (real) ²⁾	6.3	0.9	3.2	1.5			3	2	2
annual change in % (real) ²⁾	7.9	11.9	6.9	6			9	10	11
Consumption of households, ALL bn, nom.	586.2	621.4	668.1	728.8					
annual change in % (real)	9.4	3.9	5.0	6.0			5	6	6
Gross fixed capital form., ALL bn, nom.	279.4	296.9	320.0	380.2	•	•			•
annual change in % (real)	2.7	11.2	7.0	8.0		•	10	10	11
Reg. employment total, th pers., end of per. 3)	931.2	932.1	935.1	934.0	932.8				
annual change in %	0.5	0.1	0.3	-0.1	0.2				
Reg. employm in industry, th pers., end of per. ³	75.6	74.8	73.9						
annual change in %	12.8	-1.1	-1.2			•			•
Reg. unemployeed, in pers., end of period	157.0	155.0	147.7	143.0	147.7		13	12	11
					0.0	•	10		
Average gross monthly wages, ALL 3^{\prime}	24393	26808	28822	34200	31850				
annual change in % (real, gross)	11.2	1.5	4.9	15.0	13.4			•	
Consumer prices, % p.a.	3.0	2.4	2.4	2.9	2.8	3.7	4.1	3.1	3.0
Producer prices in manufacturing ind., % p.a.	12.2	4.9	0.7	7.3	14.4	6.8	9		
General governm.budget, nat.def., % GDP									
Revenues	24.5	25.0	25.3	25.6					
Expenditures	29.6	28.4	28.5	29.0		•			
Deficit (-) / surplus (+), % GDP Public debt in % of GDP $^{4)}$	-0.1	-3.5	-3.2	-3.4 54.0	•	•	-7	-5	-4
	51.1	57.0	55.9	54.0				•	•
Refinancing base rate, % p.a., end of period	5.3	5.0	5.5	6.3	5.0	6.3		•	•
Current account, EUR mn	-287.8	-492.0	-471.0	-831.5	-176.6	-289.2	-850	-950	-1130
Gross reserves of BoA incl. gold. ELIP mn ⁵⁾	-4.9	-7.5	-0.0 1362 6	-10.5 1455 3	. 1372.2	1303.0	-9.0	-10.1	-10.0
Gross external debt EUR mn	1224.0	1373.5	1445.4	1572 1	1072.2	1000.0		•	•
Gross external debt in % of GDP	20.6	20.6	20.0	19.5					
FDI inflow, EUR mn	278.4	224.2	258.6	476.7	93.6	119.3	600		
FDI outflow, EUR mn	9.0	1.7	8.2	11.0	2.1	-5.4	10		
Exports of goods, BOP, EUR mn	485.6	530.2	630.6	786.3	182.3	205.2	900	1000	1100
annual growth rate in %	23.0	9.2	18.9	24.7	26.2	12.6	14	11	10
Imports of goods, BOP, EUR mn	1762.3	2006.9	2289.6	2890.4	625.1	736.6	3300	3700	4000
annual growth rate in %	12.1	13.9	14.1	26.2	22.9	17.8	14	12	8
EXPORTS OF SERVICES, BUP, EUK MN	007.0 27.6	907.3 10.9	1156.6	1415.1	205.2	295.8 11 5	1500	1800	∠000 11
Imports of services BOP FUR mo	27.0 848.1	19.0	1188.0	22.3 1402 3	-1.4 202.7	325.5	1500	20 1600	1800
annual growth rate in %	20.3	30.6	7.2	18.0	-0.7	11.2	7	7	13
Average exchange rate ALL/USD	102.8	99 9	98 1	90.4	95 7	82.5			
Average exchange rate ALL/EUR (ECU)	127.7	124.2	123.1	123.6	125.3	123.6	122	123	121
Purchasing power parity ALL/USD ⁶⁾	48.0	48.6	48.2	48.8			· ·		
Purchasing power parity ALL/EUR 6)	57.1	57.4	57.3	57.9			.		

1) Preliminary and wiw estimates. - 2) According to gross value added. - 3) Public sector only. - 4) Based on IMF data. - 5) Refer to total foreign assets of Bank of Albania. - 6) Benchmark results 2005 from Eurostat and wiw estimates.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Josef Pöschl

Bosnia and Herzegovina: at long last an EU associate

The GDP in Bosnia and Herzegovina (BiH) grew quite significantly again in 2007: by 6%. Assuming that the overall picture drawn from the data is correct, this is somewhat less than in 2006 (6.7%), the best year to date in the current decade. We have to reckon with still less, yet robust growth in 2008. In terms of growth rates, advantage vis-à-vis the EU remains. The economy continues to catch up, albeit from a rather modest starting point.

Prospects of slower private consumption growth and an increase in volume of imports

Data for the first quarter of 2008 are not yet available; however, we can safely assume that the leap in the consumer price index in 2007 will slow down private consumption growth in 2008. There is no indication, however, that investment growth will suffer to a similar extent. The construction sector is highly active throughout the country – albeit less so in the south-east region, the poorest area of the country. Export growth is also likely to remain strong, mainly on account of the country's specialization in metals: a sector enjoying favourable market conditions. It seems that the rise in world market prices has had a significant negative impact on demand for food and energy. Nevertheless, the country now has to settle much higher bills for its food and energy imports.

After the hike, price levels are stable again

In recent years, BiH has experienced long periods of either no inflation or even light deflation, interrupted by rather abrupt leaps and bounds in the price index. In 2006, the leap was due to higher taxation following the introduction of VAT. The more recent kick, even though it occurred already back in October and November 2007, was attributable to the increase in world market prices for energy and cereals. In the meantime, however, the price index has stopped moving. Even if the index remains stable for the rest of the year, annual average inflation in 2008 will be close to 6%. In BiH, increases in world market prices for energy and food tend to have a strong inflationary impact. In the basket of consumer goods basket, energy and food are 'heavyweights'. Only a minor share of the population, somewhat less than 20%, earns income from employment (compared to close to 50% in Slovenia). This calculation is based on LFS methodology; it thus includes persons working only a few hours per week, for instance, in unregistered jobs. About half a million people or 13% of total population draw pensions, the average monthly amount being very low (about EUR 130). Remittances from relatives working abroad constitute another major source of income. In recent years, they have invariably amounted to approximately EUR 1 billion per annum. That figure refers solely to remittances through official channels. Overall, domestic and foreign-based earners of

income support a large number of BiH citizens who do not earn incomes of their own. Under these circumstances, the rise in prices for housing, heating and food mean a serious reduction of income for a large proportion of the population. A recently published survey revealed that a large segment of society is living in straitened circumstances. For example, 93% of young married couples do not have homes of their own and more than 80% of the young people (in the age group 16-30) live with their parents. This is hardly likely to change very soon. At the same time, real estate prices are booming in the context of increasing income disparity; they are said to have doubled in 2007 (up to about EUR 2500 per square metre for new housing in central Sarajevo). Not surprisingly, public discontent has been aired over a number of price increases.

Contrary to the other types of income mentioned above, regular wages increased significantly in the first few months of 2008. In the first quarter of 2008, gross nominal wages averaged EUR 570 - up by 13% over the same period of the previous year. For the most part, this is attributable to an increase in public sector wages.

Strengthening cooperation with the outside world

Negotiations on the country's membership in the World Trade Organization (WTO) could still yield a positive outcome in 2008. Some of the necessary institutional arrangements (for example in the field of food safety) are already in place; however, changes have yet to be introduced in the field of commercial law.

The fact that a social insurance agreement with Slovenia entered into force on 1 July 2008 is indicative of some progress in terms of regional integration. BiH has signed similar agreements with Croatia and Macedonia. Another lesser example is the South Adriatic Eurodistrict: a cooperation platform encompassing Bosnia, Croatia, Montenegro, Albania and Italy. It includes Dubrovnik (Croatia), Scutari (Albania), Tivat, Budva, Herceg Novi, Kotor, Ulcinj (Montenegro) and a number of Italian towns. The aim is to foster joint of infrastructure development projects.

In the current year, by far the most important achievement has been the signing of the Stabilization and Association Agreement (SAA) between BiH and the EU on 16 June 2008. The interim agreement between Bosnia and the European Union entered into effect on 1 July. Starting from 1 August, it foresees a reduction in tariffs on primary and processed materials as well as equipment and machinery coming from EU countries. In the initial stage, BiH will halve the tariffs on a number of industrial products (plaster, gas, paints, cellulose, wood, agricultural machinery, tools, etc.). For oil, rubber and leather products, paper, clothes, footwear, cement, brick, telephones and the like, BiH import tariffs will initially be cut back to 75%. Lower prices for imported materials and technical equipment is good news for BiH manufacturers, although it also means that many of them will have to face stiffer competition on account of less protection. Under the agreement products categorized as sensitive (e.g. milk and meat) will remain protected up to the very moment of EU accession. One of the greatest barriers to improving the competitiveness of the food processing sector is the lack of laboratories entitled to ensure conformity with international standards.

The impact of the new arrangement with the EU will be lower prices because of lower prices for imports and more competition; inflation in the second half of 2008 should thus be low.

SAA – the beginning, not the end

Proceeding from the signature of the SAA to actual EU accession will call for an enormous effort, especially in the case of BiH. Preparations to date have been wanting in many respects. In a recent seminar, experts stressed that BiH currently uses less than 20% of the pre-accession funds provided by the EU, even though still more funds could be made available subsequent to further negotiations with the EU. Some EUR 440 million have already been allocated for the period 2007-2011 under the heading of Pre-Accession Assistance (IPA).

The government will have to initiate many steps, if it is to ensure that the country benefits from the SAA. For example, the BiH Parliament will have to adopt a law on establishing a national fiscal council: a European Partnership requirement. By so doing, BiH would provide for fiscal coordination between the state and the two entities (Federation and Republika Srpska). Another important task, which has been in the offing for years, will be the conclusion of an agreement on the allocation of indirect tax revenues. In 2006, BiH introduced VAT without solving the allocation issue.

For large segments of the population, the most attractive ripple-effect of the SAA is that it will pave the way to visa-free travel to EU-countries. Formal talks on that issue started in May. A positive conclusion will depend on the country fulfilling specific criteria and meeting conditions laid down in the road map for BiH.

According to reports in the media, the general public's hopes for improvement are mainly focused on something happening independently of what the people do of their own accord. These new-found hopes derive from such events as the discovery of oil in the north of the country, reports of businessmen from Hungary and Qatar interested in investing heavily in BiH winter tourism, Saudi Arabian interests in investing in the country's food sector or General Electric's expression of interest in investing in power generation. At the same time, however, the willingness to push reforms through is lacking. For example, a recently published study concluded that BiH could export much more electricity, were it to adopt such measures as consolidating the national power grid, harmonizing laws at both the domestic and EU levels, and meeting its international commitments in a responsible fashion. According to the OSCE Mission in BiH, higher education is yet another field where reforms have been insufficient. Although the universities claim emphatically that they have implemented the Bologna Process, in practice little has changed and adequate institutions are lacking. Only if assertive and tangible reforms are introduced, will EU integration progress smoothly.

Looming fiscal stress and strain

In recent years, the public sector has managed to maintain a more or less balanced budget. This is likely to remain so in the future, irrespective of the trade regime designed by the SAA reducing import-related government revenues that in previous years totalled some EUR 200 million (or 1.9% of the GDP in 2007).

The government's foreign debt is moderate (EUR 2 billion or 19% of GDP at the end of 2007); its servicing absorbs about 2% of the annual GDP. The major problem is internal debt, the size of which will depend on decisions relating to: (i) compensation of different types of claims, such as restitution of real estate; and (ii) compensation for bank accounts frozen during the war. Depending on the decisions ultimately taken on these issues, the government will have to set aside large appropriations in future budgets in order to service internal debt; fewer funds will thus be available for other purposes.

Concluding remarks

For BiH, becoming an EU member has become a realistic option. Tasks associated becoming a member, however, will necessitate a new working style. Gradually, politicians will become aware of that need. They will face a build-up of pressure given the people's desire for visa-free travel to EU countries and their fear of falling back behind other countries in the region (Albania, Montenegro, Serbia), compounded by the demands of entrepreneurs seeking more support in their struggle to achieve international competitiveness.

Table BA

Bosnia and Herzegovina: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st o	2008 quarter	2008	2009 Forecas	2010 st
Population, th pers., mid-year	3842	3843	3843	3846					
Gross domestic product. BAM mn. nom. ²⁾	15786.0	16927.9	19121.1	20950			23300	25100	27100
annual change in % (real)	6.3	3.9	6.7	6.0			4.5	5	6
GDP/capita (EUR at exchange rate)	2101	2252	2544	2785					
GDP by exp. approach, BAM mn, nom.	16680	18178	21151						
GDP/capita (EUR at PPP - wiiw)	4820	5130	5590	6080	-		-	•	
Gross industrial production annual change in % (real) ³⁾ Gross agricultural production, total	12.0	11.0	11.7	6.3	10.5	5.3	5.5	7	10
annual change in % (real)	27.7	-0.5	2.3				-		
Consumption of households, BAM mn, nom. 2)	15017.5	16513.9	18064.3	19400					
annual change in % (real)		6.2	4.5	6			3	5	5
Gross fixed capital form., BAM mn, nom. ²⁾	4044.4	4889.5	4756.8	5000		•	•	÷	
annual change in % (real)	•	18.5	-9.4	5	-	•	8	8	10
LFS - employed persons, th, April			811.0	849.6	-		-	•	
annual change in %		011.0		4.8					
Reg employees total, th pers., end of period	639.1	044.0	004.1	087.4	001.1	100.7		·	
LES upomployed theory April	0.5	0.0	366 9	3.5 346 7	2.0	10.0	•	•	•
LES - unemployment rate in % April	•		31.1	29.0	•	•	. 29	. 28	27
Reg. unemployment rate in %, end of period	43.2	44.1	44.1	42.9	44.7	39.3			
Average gross monthly wages, BAM	748	798	869	939	989	1120			
annual change in % (real, net) 4)	3.6	3.5	1.4	6.4	13.0	5.5	-		-
Consumer prices, % p.a. 5)	0.8	3.0	6.2	1.5	0.8	6.5	6.5	2.5	2
General governm.budget, nat.def., % GDP									
Revenues	40.4	42.1	44.9	44			45	44	43
Expenditures	38.8	39.6	42.0	42	•	•	43	42	41
Deficit (-) / surplus (+), % GDP	1.6	2.4	2.9	2			2	2	2
Public debt in % of GDP	27.5	27.5	22.9	20.5	-	•	-	•	-
Current account, EUR mn ⁶⁾	-1318.4	-1555.5	-816.4	-1400.6	-188.0		-1600	-1550	-1500
Current account in % of GDP	-16.3	-18.0	-8.4	-13.1			-13.4	-12.1	-10.8
Gross reserves of CB excl. gold, EUR mn ')	1778.8	2160.0	2787.4	3383.6	2825.8	3342.3			
Gross external public debt, EUR mn	2061.4	2217.9	2081.5	1996.1		•			•
Gross external public debt in % of GDP	25.5	25.6	21.3	18.6		•		•	•
FDI Inflow, EUR mn FDI outflow, EUR mn	566.9 1.3	478.3	564.2 1.9	1477.7 6.8	118.3	•	600 10		•
Every f and f	4070.0	0050.7	0007.0	2004 5	700.4		2000	4000	5000
appual growth rate in %	10/0.9	2059.7	2087.3	3091.5	706.1	•	3600	4200	5000
Imports of goods BOD EUD mp ⁶⁾	5354 5	6021.6	6003.0	7233.8	1/95 3	•	8700	0000	11500
annual growth rate in %	7.6	12.5	1 2	18.7	31.0	•	20	9000 10	20
Exports of services BOP EUR mn ⁶⁾	696.1	772.0	901.4	970.5	182.5	•	1100	1200	1400
annual growth rate in %	9.4	10.9	16.8	7.7	17.2		13	9	17
Imports of services. BOP. EUR mn ⁶⁾	349.2	371.0	400.3	422.0	69.0		450	480	500
annual growth rate in %	3.0	6.3	7.9	5.4	11.4	•	7	7	4
Average exchange rate BAM/USD	1.576	1.573	1.559	1.430	1.493	1.307			
Average exchange rate BAM/EUR (ECU)	1.956	1.956	1.956	1.956	1.956	1.956	1.96	1.96	1.96
Purchasing power parity BAM/USD, wiiw ⁸⁾	0.717	0.727	0.748	0.755					
Purchasing power parity BAM/EUR, wiiw ⁸⁾	0.852	0.859	0.890	0.896	-		-		

1) Preliminary and wiiw estimates. - 2) From 2004 GDP figures include the Non-Observed Economy (NOE). - 3) wiiw estimates based on weighted averages for the two entities (Federation BH and Republika Srpska). - 4) wiiw calculation. - 5) Until 2005 costs of living, from 2006 harmonized CPI. - 6) Converted from the national currency. - 7) From 2006 including investment in foreign securities. - 8) Benchmark results 2005 from Eurostat and wiiw estimates.

Source: wiiw Database incorporating national statistics, IMF; wiiw forecasts.



Hermine Vidovic

Croatia: inflation peaks, GDP growth moderates

Economic activities continued to expand, but at a lower pace than in 2007. Industrial output increased by 5.3% during the first four months of the year; construction activities rose by 10%, implying continued investment growth. On the other hand, retail trade turnover grew by only 2.2% in real terms. GDP data for the first quarter are not available but based on the above results we may assume that it grew close to 5%.

Curbing inflation is a key priority

Consumer price inflation accelerated to 6.5% in May year-on-year and reached its highest level since the introduction of the stabilization programme in 1993. Food and particularly energy price hikes on the world market had a strong inflationary impact. On top of that, some administered prices (such as for medical services) rose significantly. Only recently it has been announced that prices for electricity will be raised by 20% from July. Real wage growth was only moderate and has had no impact on inflation so far. In order to reduce inflationary expectations, the governor of the National Bank has urged the government repeatedly to reduce public spending, cut down state expenses, control prices in the public sector and restrict growth of salaries.

The situation on the labour market has continued to improve. Registration data point to a substantial rise in employment (4.1%) and a further decline of unemployment during the first four months of 2008. Except electricity and mining, all sectors reported employment gains, with above-average job creation in the services sector, such as in business services, trade and tourism, and in construction. Final Labour Force Survey data for 2007 indicate a decline of the overall unemployment rate to 10% and a reduction of youth unemployment by 5 percentage points to 24%; long-term unemployment (unemployed for more than one year in total unemployment) accounts for almost 60%.

The general government deficit was further reduced, from 3% of GDP in 2006 to 2.3%, according to final 2007 data. Based on the ESA 95 methodology, the deficit was even lower, at 1.6%. However, including pension debt repayments the deficit stood at an estimated 2.8%.

On the external side, merchandise imports grew again much faster than exports during the first months of 2008, resulting in a further widening of the trade deficit. Considering the continued deterioration of the trade deficit and rising interest payments, the current account deficit reached an estimated EUR 2.4 billion during the first quarter of the year. As for FDI, 2007 saw a record inflow worth EUR 3.6 billion, the bulk of which was oriented towards the services sector. However, greenfield investments are rare. Growth of foreign debt slowed down following the introduction of

restrictive measures set by the National Bank at the beginning of 2007, e.g. limiting credit growth of commercial banks to 12% per year. Additional measures curbing credit growth were implemented in the course of last year and extended to 2008.

Recently the authorities have announced restructuring plans concerning the shipbuilding industry, one of the country's main industrial branches, envisaging the sale of two shipyards by the end of 2008. Shipbuilding accounts for about 15% of total exports, but is also one of the biggest loss makers and is highly subsidized.

EU negotiations progressed only slowly in 2007. In March Commission President M. Barroso said that Croatia could complete its membership talks with the EU by November 2009. The EU will present an 'indicative timetable' for the technical conclusions, provided Croatia meets a number of conditions. These comprise complying with all legal obligations of the Stabilization and Association Agreement (SAA) including (i) cooperation with the International War Tribunal in The Hague, (ii) 'urgent' improvement of the management of EU financial assistance under the Phare and IPA programmes (the endorsement and approval of new projects under the Phare programme had been temporarily suspended at the beginning of the year due to institutional weaknesses), and (iii) the suspension of all aspects of Croatia's Ecological and Fisheries Protection Zone (ZERP), which envisaged fishing restrictions in a protected zone in the Adriatic Sea (affecting mostly neighbouring countries). ZERP was suspended already in March pursuant to hefty protests from Italy and Slovenia.

Moderate growth slowdown

Economic prospects have changed little against our previous forecast. Driven mainly by domestic demand, GDP should grow by slightly over 4% in 2008. Household consumption is expected to rise by 3.5%, while government expenditures should be lower after the election year. The rise in GDP growth will translate into moderate employment growth and a further reduction of unemployment. wiiw expects an average annual inflation rate of around 6% in 2008 and a gradual deceleration in the coming years.

The pace of GDP growth will decelerate further in 2009, associated with declining investment and the assumed weakening of private consumption growth (3-4%); government consumption is expected to remain flat. Croatia's external performance will largely depend on the economic environment in its main trading partners. We expect the trade deficit to remain at high levels, at about 25% of the GDP. Given the continued widening of the trade deficit, the current account deficit will further increase, despite higher earnings from tourism. A reversal of this trend is not in sight in the medium run. Prospects of joining the EU in the foreseeable future may help speeding up structural reforms.

Table HR

Croatia: Selected Economic Indicators

	2004	2005	2006	2007	¹⁾ 2007 1s	2008 2008 2008 2008	2008	2009 Foreca	2010 st
Population, th pers., mid-year	4439	4442	4440	4440					
Gross domestic product, HRK mn, nom.	214983	231349	250590	275078	62561		302400	328600	357100
annual change in % (real)	4.3	4.3	4.8	5.6	7.0).	4.2	4.5	5
GDP/capita (EUR at exchange rate)	6462	7038	7708	8445					
GDP/capita (EUR at PPP - wiiw)	10570	11200	12130	13190					
Gross industrial production ²⁾									
annual change in % (real)	3.7	5.1	4.5	5.7	8.0	4.8	4.5	4.5	5
Gross agricultural production									
annual change in % (real)	11.9	-8.7	4.4						
Construction industry, hours worked ²									
annual change in % (real)	2.0	-0.8	9.4	2.4	6.5	5 12.9		•	•
Consumption of households, HRK mn, nom.	123123	131671	140261	153421	36391				
annual change in % (real)	4.8	3.4	3.5	6.2	7.1		4	3.5	4
Gross fixed capital form., HRK mn, nom.	60512	65008	74792	82386	19530).			
annual change in % (real)	5.0	4.8	10.9	6.5	11.2	2.	6	5	5.5
LES - employed persons the avo	1563	1573	1586	1600	1563	3			
annual change in %	1.7	0.7	0.8	0.9					
Reg. employees in industry, th pers., avg.	281.7	278.9	284.1	293.0	290.0	290.7			
annual change in %	-0.3	-1.0	1.9	3.1	3.4	0.3			
LFS - unemployed persons, average	249.5	229.0	198.5	182	197	· .			
LFS - unemployment rate in %, average	13.8	12.7	11.1	10.0			9.8	9.4	9
Reg. unemployment rate in %, end of period	18.5	17.8	17.0	14.7	16.6	6 14.5	14		
Average gross monthly wages HRK	5985	6248	6634	7047	6854	7348			
annual change in % (real, net)	3.7	1.5	1.9	2.2	3.6	0.6 ⁻			
Consumer prices % p.a.	2.1	33	3.2	2.0	1.6	50	5.5	1	3.5
Producer prices in industry, % p.a.	3.5	3.0	2.9	3.4	1.9) <u>7.6</u>	3.5		
Conoral approximately hudget pat dof $\%$ CDD $^{3)}$									
Bevenues	11 0	44.5	11 8	16.3			45.2		
Expenditures	49.5	48.3	47.6	48.6		· ·	47.6	•	•
Deficit (-) / surplus (+) % GDP $^{4)}$	-4.8	-4.0	-3.0	-2.3			-2.3	-25	-2
Public debt in % of GDP% ⁵⁾	52.0	52.7	50.0	53					-
Discount rate % p.a., end of period	4.5	4.5	4.5	9.0	4.5	5 9.0			
		4075.0							
Current account, EUR mn	-1433.7	-1975.6	-2692.4	-3206.4	-2021.3	<u> </u>	-3300	-3600	-3600
Current account in % of GDP	-5.0	-6.3	-7.9	-8.6	-23.8	5 . 	-8.0	-8.0	-7.4
Cross external dabt. EUR mp	22022.0	7430.4	20272.0	9307.4	20140) 9041.7	•	•	•
Gross external debt in % of GDP	22933.0	20141.1	29273.9	32929.2 87.7	30149.4	54501.0	•	•	•
EDL inflow ELIR mn	949.6	1467.9	2737 9	3625.9	1360 6		2000	•	•
FDI outflow, EUR mn	278.8	192.1	176.7	206.5	99.2	· · ·	200		
Events of goods BOD FUD ma	6606.0	7000.0	0462.6	0102 5	2046	0.015	10100	10000	11000
annual growth rate in %	18 5	1220.3	0403.0	9192.5	2040.3	2213	10100	10900	00011
Imports of goods BOP FUP mp	13330.0	1/738 3	16807.8	18626.5	1205 6	5 0.2 5 4772	20000	23200	26000
annual growth rate in %	6.3	10.6	14.0	10020.0	8.8	135	12	20200	20000
Exports of services BOP FUR mn	7636.7	8052.6	8534.1	9179.0	771 5	5 10.0	9600	10400	10900
annual growth rate in %	0.9	5.4	6.0	7.6	16.3	, .	5	8	5
Imports of services, BOP, EUR mn	2867.8	2734.9	2823.7	2859.1	672.9) .	2900	2950	3000
annual growth rate in %	8.9	-4.6	3.2	1.3	-4.8	3.	1	2	2
Average exchange rate HRK/USD	6 0355	5 9480	5 8378	5 3645	5 6204	4 8699			
Average exchange rate HRK/FUR (FCU)	7,4952	7,4002	7.3226	7.3362	7 3622	7.2867	7 33	7 33	7 34
Purchasing power parity HRK/USD. wiiw	3.8542	3.9350	3.9108	3.9576					
Purchasing power parity HRK/EUR, wiiw	4.5812	4.6520	4.6516	4.6965					

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary and wiw estimates. - 2) Enterprises with more than 20 employees. - 3) On accrual basis. - 4) Including change in arrears and nonrecorded expenditures. - 5) Including guarantees. - 6) From 2008 new reporting system.

Source: wiiw Database incorporating national statistics; IMF; wiiw forecasts.



Vladimir Gligorov

Macedonia: external imbalances return

Unlike other Balkan countries, Macedonia was running a near-balanced current account in about the last two years. This year, however, exports are sluggish while imports are growing strongly; the trade deficit has widened and so has the current account deficit. Exports are expected to rebound later in the year and imports to decrease, but this is not going to be enough to bring the trade and current account deficits down by much.

Inflation is contributing to these developments. Macedonia has a fixed exchange rate with the euro and the eurozone countries are its most important trading partners. Therefore, a higher real exchange rate is having an influence on the competitiveness of Macedonian exports while imports are being helped by it. In the second quarter of 2008 inflation seems to be slowing down. This is partly a season effect, because the price of food is declining. It is also for the reason that Macedonian inflation has been fuelled by wage increases, which are now over. Real wages have been declining and their growth may have turned negative lately.

Another reason that may be contributing to the widening of external deficits is increased foreign direct investment in the first quarter of the year. At about EUR 200 million, FDI has been almost as high as for the whole last year. It is, however, not likely that foreign investments will continue coming in at that rate in the future.

GDP and industrial production should continue to grow at a rate of about 5% per year in the medium run. The boost to growth from domestic consumption should decline in importance, and investments and exports should again take over. Because of the firm peg to the euro, Macedonia cannot afford high inflation rates. Also, persistent external imbalances are risky. Therefore, growth has to rely on exports. The prospects should be good given the structure of exports, which is dominated by raw materials, metals and food, and given the growth prospects of major trading partners in the region (Serbia and Kosovo).

Political stability has continued to improve even though the early parliamentary elections in June have proved to be turbulent because of the conflicts between the rival Albanian parties. The governing coalition of Macedonian parties has secured the majority of seats in the parliament and could govern alone, though it is expected that it will form a coalition with one of the Albanian parties.

This election result will also strengthen the government in its negotiations with Greece over the name of this state. Greece blocked Macedonia's entrance into NATO and is threatening to do the

same when it comes to the start of negotiations with the EU. A strengthened Macedonian government will be hard to pressure to accept an unfavourable compromise. For the time being that should have no perceptible negative economic effects. In the medium term it could prove to be a problem because all other countries in the Balkans should make advances in EU integration and Macedonia would be left behind.

Table MK

Macedonia: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st c	2008 quarter	2008	2009 Forecas	2010 st
Population, th pers., mid-year 2)	2032.5	2036.9	2040.2	2045					
Gross domestic product, MKD mn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	265257 4.1 2128 5760	286619 4.1 2296 6250	310915 4.0 2491 6680	339258 5.1 2712 7280	75106 6.8		378000 5	413000 6	451000 6
Gross industrial production annual change in % (real) ³⁾	-2.2	7.1	3.6	3.7	11.6	5.8	5	5	5
Gross agricultural production annual change in % (real) Construction output, value added	6.8	0.3	0.5	5.1	-		· ·	•	•
annual change in % (real)	7.4	0.9	11.3	5.0	-		-		
Consumption of households, MKD mn, nom. annual change in % (real) $^{2)}$ Gross fixed capital form., MKD mn, nom. annual change in % (real) $^{2)}$	209075 8.0 47286 10.9	222726 5.7 48868 -5.4	243131 6.0 56485 11.6	5 6	· · ·	• • •	6 8	7 8	7 8
LFS - employed persons, th. avg. annual change in % Reg. employees in industry, th pers., avg. ⁴⁾ annual change in % ⁴⁾ LFS - unemployed, th pers., average LFS - unemployment rate in %, average Reg. unemployment rate in %, end of period	523.0 -4.1 101.5 -4.9 309.3 37.2	545.3 4.3 125.7 -3.1 323.9 37.3	570.4 4.6 125.4 -0.3 321.3 36.0	590.2 3.5 316.9 34.9	579 3.5 92.4 -2.2 323.3 35.8	88.4 -4.4	35		
Average gross monthly wages, MKD real growth rate, % (net wages)	20771 4.4	21330 2.0	23036 6.0	24136 5.5	23138 5	25145 6.7			
Consumer prices, % p.a. Producer prices in industry, % p.a.	-0.4 0.9	0.5 3.2	3.2 4.5	2.3 1.7	0.7 1.0	9.5 10.5	6 3	3	3
Central governm. budget, nat.def., % GDP ⁵⁾ Revenues Expenditures Deficit (-) / surplus (+), % GDP Public debt in % of GDP	33.2 33.2 0.0	35.2 35.0 0.3	33.5 34.0 -0.6	35.3 34.6 0.6	35.2 32.1 3.1		-1	-1	-1
Discount rate, % p.a., end of period	6.5	6.5	6.5	6.5	6.5	6.5			
Current account, EUR mn ⁶⁾ Current account in % of GDP Gross reserves of NB, excl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP FDI inflow, EUR mn FDI outflow, EUR mn	-362.7 -8.4 665.2 2070.6 47.9 260.7 1.0	-121.3 -2.6 1041.4 2518.1 53.7 77.2 2.3	-44.9 -0.9 1329.2 2495.2 49.1 344.8 0.1	-170.9 -3.1 1417.3 2711.5 48.9 239.3 -0.8	41.0 3.3 1322.3 2469.6 18.2	-188.0 1396.6 204.1	-200 -3.2	-200 -3.0	-200 -2.7
Exports of goods, BOP, EUR mn annual growth rate in % Imports of goods, BOP, EUR mn annual growth rate in % Exports of services, BOP, EUR mn annual growth rate in % Imports of services, BOP, EUR mn annual growth rate in %	1345.0 11.8 2259.3 15.5 363.7 8.5 407.2 19.3	1642.9 22.2 2501.4 10.7 416.2 14.4 440.8 8.3	1902.7 15.8 2923.1 16.9 477.3 14.7 455.1 3.2	2441.5 28.3 3614.3 23.6 580.0 21.5 550.0 20.9	558.7 49.3 769.7 29.1	611.0 9.4 982.0 27.6	3200 30 4300 20 700 20 600 15	4000 25 5200 20 800 20 700 15	5000 25 6200 20 1000 20 800 15
Average exchange rate MKD/USD Average exchange rate MKD/EUR (ECU) Purchasing power parity MKD/USD, wiiw Purchasing power parity MKD/EUR, wiiw	49.41 61.34 19.06 22.66	49.29 61.30 19.06 22.53	48.79 61.19 19.20 22.83	44.71 61.18 19.21 22.80	46.7 61.18	40.95 61.29	61.2	61.2	61.2

1) Preliminary. - 2) 2007 wiw estimate. - 3) Enterprises with more than 10 employees, - 4) From 2005 re-weighted data with information from pension and invalid insurance funds. Quarterly data are unweighted. - 5) Refers to central government budget and extra budgetary funds. - 6) Including grants.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Vladimir Gligorov

Montenegro: small miracle

Since the declaration of independence in May of 2006, Montenegro has experienced a strong economic upturn. The resolution of the uncertainty about its sovereignty has proved beneficial to foreign investments. In addition, the country proved capable of adopting a new constitution and of negotiating and signing a Stabilization and Association Agreement with the EU. Both the early parliamentary and regular presidential elections confirmed the strength of the pro-independence parties and politicians. Thus, this was one example of a stabilizing secession in the Balkans.

GDP growth has been remarkable in the last couple of years and should continue to be fast in the medium run. It has mainly been supported by investments in the tourist sector and in real estate in general. That has fuelled consumption as well, which also accounts for the sharp increase in the trade and current account deficits. Montenegro uses the euro and cannot influence the supply of money. As most of the inflow of investments has translated into growing imports, inflation has not speeded up as much as in other countries in the region. It can also be expected to slow down in the medium term.

Given the sharp speed-up in growth, the fiscal performance has been remarkable. Montenegro does not have a history of fiscal prudence, quite to the contrary. However, last year it ran a fiscal surplus and the same is expected in the medium term. Thus, fiscal policy has not been pro-cyclical, which is mostly due to political stability.

It is also supported by the considerable improvement in the labour market. Though there are some significant problems with the statistics, there is no doubt that employment has been growing quite fast and unemployment has been declining with similar speed. Indeed, Montenegro has been seen large inward migration from the neighbouring countries, primarily from Bosnia and Herzegovina.

Medium-term prospects are favourable. The main risk is connected with the slowdown of investments, which could lead to the adjustment of real estate prices and could require slower growth or decline in consumption. However, tourism and the services sector in general should continue to grow in the medium run because it has only recently started to grow. There are also significant investments in infrastructure, so risks of adverse adjustments in the medium run are low even though external imbalances are exceptionally large. Finally, EU integration prospects are quite good because of the internal consensus and due to the lack of open or difficult issue with the neighbours.

Table ME

Montenegro: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st c	2008 quarter	2008	2009 Forecast	2010
Population th pers., mid-year ²⁾	622.1	623.3	624.2	625					
Gross domestic product, EUR mn, nom. ³⁾ annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	1669.8 4.4 2684 6330	1815.0 4.2 2912 6730	2149.0 8.6 3443 8140	2422.8 8.2 3876 9040		586.6 8.1	2700 6	2900 6	3200 6
Gross industrial production annual change in % (real) Net agricultural production annual change in % (real) Construction industry annual change in % (real)	13.8 3.8	-1.9 -0.9	1.0 1.9	0.1	-5.3	11.1	5	5	5
Consumption of households, EUR mn, nom. real growth rate, $\%^{4)}$ Gross fixed capital form., EUR mn, nom. real growth rate, $\%^{4)}$	1221.1 16 286.1 36.7	1268.0 2.8 326.3 12	1660.9 10 469.8 8	8 10	· · ·		6 8	7 8	8 8
LFS - employed persons, th, Oct annual change in % LFS - employed persons in industry, th, Oct. annual change in % LFS - unemployed, th pers., Oct. LFS - unemployment rate in %, Oct. Reg. unemployment rate in %, end of period ⁵⁾	187.3 30.9 71.8 27.7 29.3	178.8 -4.5 29.2 -5.5 77.8 30.3 25.2	178.4 -0.3 26.5 -9.3 74.8 29.6 20.5	217.4 21.9 30.0 13.4 52.1 19.0 16.5	24.4	16.1		18	19
Average gross monthly wages, EUR 6) annual change in % (real, net)	303 9.1	326 6.7	377 12.0	497 15.0	464 13.0	576 15.6		•	•
Consumer prices, % p.a. Producer prices in industry, % p.a.	2.4 5.8	2.3 2.1	3.0 3.6	4.2 8.5	2.5 3.0	8.0 12.0	5 3	3	3
Central governm. budget, nat.def., % GDP ⁷⁾ Revenues Expenditures Deficit (-) / surplus (+), % GDP Public debt in % of GDP	22.3 24.3 -2.0	23.7 25.4 -1.7	26.4 24.8 1.6	31.8 27.2 4.5	· · ·		0	0	0
Discount rate, % p.a., end of period									
Current account, EUR mn ⁸⁾ Current account in % of GDP Gross reserves of NB, excl. gold, EUR mn Gross external public debt, EUR mn Gross external public debt in % of GDP FDI inflow, EUR mn FDI outflow, EUR mn	-119.6 -7.2 488.6 29.3 52.7 2.1	-154.0 -8.5 513.3 28.3 392.7 11.5	-531.2 -24.7 504.0 23.5 644.3 177.6	-1007.6 -41.6 462.1 19.1 1007.7 482.8	-216.8		-800 -29.6	-650 -22.4	-700 -21.9
Exports of goods, BOP, EUR mn ⁹⁾ annual growth rate in % Imports of goods, BOP, EUR mn ⁹⁾ annual growth rate in % Exports of services, BOP, EUR mn annual growth rate in % Imports of services, BOP, EUR mn annual growth rate in %	452.1 868.6 249.5 30.4 101.4 27.2	460.6 1.9 974.3 12.2 329.8 32.2 134.3 32.5	648.3 40.7 1497.7 53.7 418.0 26.8 220.9 64.6	627.7 -3.2 2151.9 43.7 674.1 61.2 230 5.9	136.1 22.9 377.6 41.1 49.3 48.0 45.2 -5.3		690 10 2580 20 940 40 250 10	790 15 3100 20 1320 40 280 10	910 15 3720 20 1720 30 310 10
Average exchange rate USD/EUR Purchasing power parity USD/EUR ¹⁰⁾ Purchasing power parity EUR/EUR ¹⁰⁾	1.24 0.36 0.42	1.24 0.37 0.43	1.26 0.36 0.42	1.37 0.36 0.43	1.31	1.50	. .		•

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) In 2007 wiiw estimate. - 3) Including non-observed economy. - 4) wiiw estimate. - 5) In % of unemployed plus employment (excluding individual farmers). - 6) In 2007 data refer to employees who received wages (previously wages were divided by all registered employees in enterprises); comparable value for 2006 is 433. - 7) Revenues excluding grants, expenditures excluding net lending. - 8) Including all transactions with Serbia. - 9) From 2004 trade with Serbia and Kosovo based on customs statistics (before on ITRS) . - 10) Benchmark results 2005 from Eurostat and wiw estimates.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Vladimir Gligorov

Serbia: fiscal blues

The first half of this year has been mostly about elections, with presidential election held in late January and early February while early parliamentary election and regular local elections were held in mid-May. The elections were mostly about the reaction to the independence of Kosovo, with the hardliners losing both the presidential and the parliamentary elections. However, during the preelection and post-election period (the latter is still not yet over), the government could hardly operate. That added to the uncertainty which was anyway increased because it was not easy to predict the election results and the government coalition that would emerge after the election. This led to a marked slowdown of foreign investments and a number of business deals had to be put on hold or given up on due to mounting political risks.

The major short-term consequence has been a growing threat to macroeconomic stability. Inflation has speeded up and is now running at close to 15% year-on-year. It is expected to slow down in the second half of 2008, but the rate of inflation will still be in double digits, most probably around 12%. This has temporarily helped the budget, which has relied on inflation tax to compensate for much lower than planned privatization receipts. However, the budget will run into increasing deficits in the near future if foreign investors continue to avoid Serbia.

Even if politics stabilizes, these worsened macroeconomic imbalances will keep the risks of investing in Serbia high. The Serbian central bank has had to hike the interest rate quite significantly, but that may not be enough both to slow down inflation and to reassure foreign creditors and investors. The perception of Serbian sovereign and corporate risks has worsened lately and some rating agencies have downgraded the country. Thus, even if money keeps coming in, the costs for the budget and for the economy will be higher.

In the medium run, Serbia's main problem is high external imbalance. The current account deficit was above 15% of GDP in the firs quarter of 2008 and though it may decline over the course of the year, it will still remain quite high at above 13%. This is unsustainable in the medium term. That means that the exchange rate will have to be adjusted, hopefully through slow depreciation. The central bank, however, prefers real appreciation of the exchange rate as the easiest way to keep the inflation under control or at least to prevent it from getting completely out of control. That, of course, only deepens the external imbalance.

In these circumstances, the medium-term outcomes depend on short-term stabilization policy. The expectations that GDP will continue to grow at around 5% annually for the next couple of years

depend on the new government taking control of the budget and thus supporting disinflation together with gradual depreciation of the dinar. In that, it will have to renege on the election promises of the likely coalition partners who have all promised more social justice in the form of higher pensions, higher wages and massive new public investments. The political cost of broken promises may be too high, in which case medium-term prospects would have to be revised as the serious risk of forced adjustment will emerge.

Table RS

Serbia: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾) 2007 1st	2008 quarter	2008	2009 Forecas	2010 t
Population, th pers., mid-year 2)	7463	7441	7412	7400		•			
Gross domestic product, RSD bn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	1431.3 8.4 2643 6700	1747.5 6.2 2833 7300	2042.0 5.7 3278 7830	2376.7 7.5 4010 8660	506.3 8.2	603.5 7.1	2790 5	3220 5	3650 5
Gross industrial production annual change in % (real) Gross agricultural production	7.1	0.8	4.7	3.7	4.8	6.0	5	5	5
annual change in % (real) Construction output total	26.0	-3.4	-2.6						
	000 F	2.0	1.1	·	-	•		·	
annual change in % (real) ⁴ Gross fixed capital form., RSD bn, nom.	998.5 253.3	1214.2 5 302.0	1432.0 5.4 374.4	6 12		•	5 10	5 8	5 8
LFS - employed persons, th. Oct	2930.8	2733.4	2630.7	2655.7					
annual change in % Reg. employees in industry, th pers., avg. annual change in %	0.4 562.2 -7.1	-6.7 536.1 -4.7	-3.8 493.3 -8.0	1.0 460.4 -6.7	470.0 -8.4	441 ⁻ -5.6 ⁻	•	•	
LFS - unemployed, th pers., Oct LFS - unemployment rate in %, Oct Reg. unemployment rate in %,end of period ⁵⁾	665.4 18.5 26.4	719.9 20.8 27.1	693.0 20.9 27.9	585.5 18.8 25.1	27.9	25.4	21	23	23
Average gross monthly wages, RSD annual change in % (real, net)	20555 10.1	25514 6.4	31745 11.4	38744 19.5	35048 18.6	41807 5.4			•
Consumer prices, % p.a. Producer prices in industry, % p.a.	11.4 9.1	16.2 14.2	11.7 13.3	7.0 5.9	4.8 5.5	13.3 11.7	12 6	10	8
General governm. budget, nat.def., % GDP Revenues	41.2								
Expenditures Deficit (-) / surplus (+), % GDP Public debt in % of GDP	42.6 -1.4	1.4	-0.6	-0.5			-2	-1	-1
Discount rate, % p.a., end of period	8.5	8.5	8.5	8.5	8.5	8.5			
Current account, EUR mn ⁶⁾ Current account in % of GDP Gross reserves of NB, excl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP EDI inflow EUR mn ^{6/7)}	-2308.0 -11.7 3008.0 10354.5 57.1 777 1	-1790.2 -8.5 4753.7 13064.0 63.9 1265 3	-2906.1 -12.0 8841.3 14884.6 57.6 3504.3	-5001.7 -16.9 9409.3 17769.3 59.3 2257 7	-906.9 -14.4 8598.4 14857.6	-1148.0 -15.8 9321.1 17957.3	-4500 -13.5	-4500 -12.3	-4500 -11.1
FDI outflow, EUR mn ⁶⁾		17.9	16.8	663.8	-11.4	3.9	20		
Exports of goods, BOP, EUR mn ⁶⁾ annual growth rate in % Imports of goods, BOP, EUR mn ⁶⁾ annual growth rate in % Exports of services, BOP, EUR mn ⁶⁾ annual growth rate in %	3283.8 11.8 8487.9 30.6 1188.2 29.2	3998.9 21.8 8255.3 -2.7 1316.3 10.8	5155.7 28.9 10107.8 22.4 1674.8 27.2	6431.3 24.7 12843.1 27.1 2134.6 27.4	1384.3 33.7 2965.9 33.8 514.0	1641.5 18.6 3554.0 19.8 673.0 30.9	8000 20 16300 25 2700 25	9600 20 20400 25 3400 20	11500 20 25500 25 4100 20
Imports of services, BOP, EUR mn ⁹ annual growth rate in %	1047.4 41.4	1321.2 26.1	1724.1 30.5	2147.7 24.6	548.0	620.5 13.2	2700 20	3200 20	3800 20
Average exchange rate RSD/USD Average exchange rate RSD/EUR (ECU) Purchasing power parity RSD/USD ⁸⁾ Purchasing power parity RSD/EUR ⁸⁾	58.38 72.57 24.08 28.63	66.71 82.91 27.21 32.17	66.82 84.06 29.59 35.19	58.15 80.09 31.26 37.10	60.86 80.19	54.23 82.85	84	88	90

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) wiiw estimate in 2007. - 3) Gross value added. - 4) wiiw estimate. - 5) Rate in per cent of labour force excluding farmers. - 6) Converted from USD at average cross exchange rate. From 2003 including transactions with Montenegro. - 7) In 2004 FDI net. - 8) Benchmark results 2005 from Eurostat and wiiw estimates.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Josef Pöschl

Turkey: Turkey's economy testing its mettle

Over the past few years resilient business dynamics was the main feature of the Turkish economy Turkey, even though the recent onset of 'stability' has started to attract attention in both economic and political terms. Real GDP growth peaked at 9.4% in 2004. It decelerated only slightly thereafter up until the first quarter in 2007, before going into decline and dropping to 3.4% in the second half of 2007. For reasons described below, we expect growth rates for 2008 and 2009 to range between four and five percent, returning thereafter to normality: a high degree of dynamics. Data from April 2008 suggest that the economy has not run out of steam; year-on-year growth in manufacturing output was 6.7%. The main driving force was output growth of 32% in the automotive sector and similarly pronounced overall growth in exports.

Of the sectors contributing to GDP, the manufacturing sector was mainly responsible for the deceleration of growth in 2007. The expenditure side hints at the reason for the manufacturing sector's failure to increase value-added: the massive growth in imports in the second half of 2007. The impact of foreign trade on GDP turned negative: a trend that growth in domestic demand could not offset.

In the context of reduced GDP growth, the rate of unemployment has been rising gradually since mid-2007: up to 11.4% in the first quarter of 2008. The number of persons of working age has risen steadily. In February 2008 they totalled 49.7 million, although the participation rate was lower than before: less than 46% (23% for women, 70% for men). It is unlikely that the rate of unemployment will decline in 2008-2009. Approximately 1 million newcomers join the labour force each year.

Higher than expected inflation slows down private consumption growth in 2008

For Turkey, single-digit inflation (as of 2005) was one of Turkey's major achievements over the past few years. Quite remarkably, the rapid drop in inflation occurred in tandem with pronounced GDP growth. The hike in world market prices for fuel, metals and food in recent months is pushing the country's inflation rate for the current year back up again - to more than 10%. The rise in most other prices has remained modest. Should further increases in food and energy prices be contained, inflation will return once more to single digits in 2009 and 2010. However, a note of caution should be struck. A somewhat pronounced depreciation of the lira (against USD and EUR) could mean inflation remaining above 10%. Inflation is definitely a matter of major concern to both the economy's internal and external stakeholders. The central bank felt itself compelled to revert to a policy of increasing interest rates - despite the adverse effect on growth to be of such a step expected.

High inflation is also slowing down the growth of real income in large segments of the population; we will thus have to reckon with low growth in private consumption in 2008. In April 2008, consumer confidence dropped to an unusually low level. In recent years, Turkey has experienced a boom in household borrowing; this, too, is likely to decelerate. Commercial banks used to bolster their lending policies by borrowing from abroad; however, they have since become cautious. In the context of increased volatility on global markets, bank managers anticipate a decline in profitability and are thus turning to safer loans with greater risk diversification. A number of banks have identified agriculture as a promising market. Gradual adoption of the principles of the EU Common Agricultural Policy and the emergence of higher world market prices for output are fuelling expectations of higher farm incomes in future. By the end of March 2008, the commercial banks' lending amounted to 37% of the GDP in 2007; this means that there should be space for further expansion in the long term.

Gross fixed investment, both private and public, grew only moderately throughout most of 2007. Surprisingly enough, growth was strongest in the final quarter thanks to private investment in machinery. Investment growth may well speed up in 2008, with government projects, such as the development project for south-east Turkey, playing a positive role. Exports are also likely to keep growing rapidly. In the course of the past 10 years, an increasing share of Turkish exports went to EU countries (56% in 2007 compared to 51% in 1997). At the same time, trade with neighbouring countries also intensified (Near and Middle East 14% in 2007 compared to 11% in 1997; partners in the Black Sea Economic Cooperation region⁴³ 16% compared to 15%). Most probably, the expansion of trade with neighbouring countries will continue over the next few years and contribute to overall export growth. As for imports, the rise in energy prices has increased the share of oil producing countries, with a corresponding drop in the share of EU-27 in total imports (from 54% in 1997 to 40% in 2007).

The art of bridging a rising gap in the current account

Compared to previous years, the current account deficit in 2008 will be substantially higher: EUR 30-35 billion, (6-7% of GDP). It is not likely to decline substantially over the next few years. The net inflow of foreign direct investment should cover close to one quarter the gap, with the main job being left to loans. Between spring 2007 and 2008, the corporate sector borrowed about EUR 25 billion from abroad.

In recent years, Turkey has had no problem financing the current account deficit; on the contrary, capital inflow far exceeded the deficit and currency reserves were on the rise. At the same time, close on a decade of assertive reforms had proved most effective, helping the economy's fundamentals to improve substantially. Almost nobody would really question this; however, the massive deceleration in GDP growth accompanied by a sharp rise in inflation has strained the markets' confidence. Even more stress stems from the conflict that has escalated after the lifting of the ban on wearing headscarves. Society appears deeply divided and the rift is perceptible in several other respects. Risk premia are on the rise. Bridging the current account gap has thus become more costly and will remain so throughout 2008 and 2009.

⁴³ Albania, Armenia, Azerbaijan, Bulgaria, Georgia, Greece, Moldova, Romania, Russia, Ukraine.

With the onset of turmoil on financial markets in mid-2007, the Istanbul Stock Market index fell. Whereas the Turkish lira appreciated during the first three quarters of 2007, a shift towards depreciation surfaced in the fourth quarter of 2007 and the first four months of 2008. The monthly YTL/EUR average dropped from 1.85 in January 2007 to 1.71 in October only to rise to 2.05 in April 2008. The lira appreciated once more in May 2008 (1.94), when the central bank increased the prime rate and made it quite clear that this was merely a first step. Whereas it is uncertain whether rising interest rates will curb inflation to any great degree, it will most probably slow down GDP growth. The central bank would prefer to see inflation being combated via fiscal austerity, an approach that the government cannot afford to pursue for political reasons. Further to the statement that 'stability' has become a matter of concern in Turkey, we should add that fear of 'stagflation' is growing; in mid-April, an article in the Wall Street Journal addressed that issue.

Turkey will need to enter into close cooperation with international financial players; it has already started strengthening ties with international financial institutions. New loans from the World Bank are on the agenda, further to which Turkey has applied for full membership in the EBRD, thus opening up an avenue to a new source of funds for private investment. An International Monetary Fund (IMF) lending accord expired on 10 May. Of course, large quantities of EU money are pouring in, one aim being, for example, to promote the development of SMEs.

Capital flows are not one-way; Turkish companies, especially the large conglomerates, are eager to invest abroad in a wide range of countries. One example is Iraq. With the support of the United States, the Iraqi government has opted for a new privatization policy, based on a public-private partnership approach, which includes guarantees and special export arrangements. The new strategy aims at promoting the rehabilitation, modernization and management of enterprises operating in such sectors as petrochemicals, textile, sugar and cement. Major Turkish companies and less prominent firms alike have sighted opportunities to participate in this programme; their investment could ultimately add up to some EUR 10 billion.

Concluding remarks

Both politically and economically, Turkey's current situation provides space for a number of potentially diverging developments. Low growth and high inflation may well prove short-lived. On the other hand, the possibility of further aggravation cannot be dismissed, for example, in the context of adverse international developments. It is not unlikely that in a few years time improved fundamentals and forceful entrepreneurial thinking will pave the way back to high growth rates and low inflation.

Table TR

Turkey: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st qu	2008 Jarter	2008	2009 Foreca	2010 Ist
Population, th pers., mid-year 2)	71152	72065	72974	73894					
Gross domestic product, TRY bn, nom.	559.0	648.9	758.4	856.4	188.7		980	1120	1270
annual change in % (real)	9.4	8.4	6.9	4.5	7.6	6.6	4.0	5	6
GDP/capita (EUR at exchange rate)	4421	5369	5745	6478					
GDP/capita (EUR at PPP - wiiw)	8150	8770	9700	10290	•	•	•		•
Gross industrial production annual change in % (real)	9.8	5.4	5.8	5.4	8.5	6.9	5.0	7	9
Gross agricultural production	0.7	6.6	1.0	7.0					
Construction industry	2.7	0.0	1.3	-7.3				•	
annual change in % (real)	4.6	21.5							
Consumption of households, TRY bn, nom.	398.6	465.4	534.8	605.2	141.0				
annual change in % (real)	11.0	7.9	4.6	4.6	5.6		2	2	4
Gross fixed capital form., TRY bn, nom.	113.7	136.5	169.0	195.4	42.9		<u> </u>		
annual change in % (real)	28.4	17.4	13.3	6.7	3.6	•	7	8	10
LFS - employed persons, th, avg. 3)	21791	22046	22330	21253	20356	20137			
LFS - employed pers. in agricult. th, avg. ³⁾	7400	6493	6088	5640	5173	4714			
LFS - employed pers. in industry th, avg. $\frac{3}{3}$	5017	5456	5674	5429	5118	5311			
LFS - employed pers. in services th, avg. "	9374	10097	10568	10184	10065	10112			
LFS - unemployed, th pers. average "	2498	2520	2446	2323	2587	2642			
Reg. unemployment rate in %, average	10.3	10.3	9.9	9.9	11.4	11.0	12	11	9
Average gross monthly wages, manuf, ind., TRY ⁵⁾	1030	1162	1301	1437	1376				
annual change in % (real) ⁵⁾		4.3	2.1	1.6	0.1				
Consumer prices, % p.a.	10.6	8.2	9.6	8.8	10.3	8.8	10.5	9	7
Producer prices in manufacturing, % p.a.	13.1	7.6	9.3	5.6	11.2	6.6	14.0	5	3
General governm. budget, EU-def., % GDP ⁶⁾									
Revenues			13.6	19.6					
Expenditures			13.7	20.9	-				
Deficit (-) / surplus (+)	-4.5	-0.6	-0.1	-1.2	-		-1.4	-1.2	-1
Public debt, EU-def., in % of GDP %	59.2	52.3	46.1	38.8			32.9	28.0	
Discount rate % p.a., end of period ⁷⁾	22.0	17.5	22.5	20.0	22.5	19.3	22		
Current account, EUR mn	-12482	-18167	-25704	-27709	-7051 ⁸⁾	-8028 ⁸⁾	-31000	-30000	-30000
Current account in % of GDP	-4.0	-4.7	-6.1	-5.8	-6.9		-6.3	-5.6	-5.2
Gross reserves of CB, excl. gold, EUR mn	20430	42823	40251	49791	50682	48366	•	•	•
Gross external debt in % of GDP	38.8	35 1	100073	33 7	30.1	•	•	•	•
EDL inflow EUR mn	2328	8287	15708	16100	7163 ⁸⁾	2921 ⁸⁾	15000		•
FDI outflow, EUR mn	693	875	722	1569	939 ⁸⁾	228 8)	1500		
Exports of goods, BOP, EUR mn	53889	62017	73072	82416	19017 ⁸⁾	23440 ⁸⁾	90000	100000	117000
annual change in %	19.3	15.1	17.8	12.8	14.6	23.3	9	11	17
Imports of goods, BOP, EUR mn	73102	89115	105953	116993	25824 ⁸⁾	31484 ⁸⁾	122000	134000	161000
annual change in %	27.1	21.9	18.9	10.4	8.7	21.9	4	10	20
Exports of services, BOP, EUR mn	18531	21597	20045	20923	3151 ⁸⁾	3478 ⁸⁾	22400	26000	30000
annual growth rate in %	16.7	16.5	-7.2	4.4	5.5	10.4	7	15	14
Imports of services, BOP, EUR mn	8165	9180	9125	10699	221/ 3/	2559 %	10100	11000	13000
annuai giowin faite in %	23.4	12.4	-0.0	17.2	11.5	15.4	-6	4	15
Average exchange rate TRY/USD	1.4286	1.3480	1.4408	1.3054	1.4110	1.2043		_ :	
Average exchange rate IRY/EUR (ECU)	1.7771	1.6771	1.8090	1.7891	1.8492	1.8036	2.0	2.1	2.2
Purchasing power parity TRY/ELR	0.0109	0.0003	1 0716	0.9407	•	•		•	·
	0.0000	1.0200	1.07.10	1.1200		•	i -	•	•

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) SIS projections. 2007 figure: Eurostat. SIS figure 2007 (end of year): 70586 th. persons based on new census methodology. -3) From 2007 new methodology due to census 2006. - 4) Industry including construction. - 5) From 2004 including overtime payment. -6) According to ESA'95, excessive deficit procedure. - 7) CBRT overnight, lending. - 8) Calculated from USD.

Source: CBRT-EDDS (Central Bank of Turkey, Electronic Data Distribution System), SIS (State Institute of Statistics), SPO (State Planning Organization), UT (Undersecretary of Treasury), Eurostat; wiw forecasts and European Commission (Spring Report 2008).



Peter Havlik and Vasily Astrov

Russian Federation: oil price surge, new leadership and old problems

GDP growth and the ambivalent role of energy

The oil price nearing USD 150 per barrel, the new Russian President Dmitry Medvedev and the new Prime Minister Vladimir Putin were the key early 2008 news from Russia. The economy has been booming and most analysts have been busy repeatedly revising GDP growth forecasts upwards, largely owing to surging energy prices. Russian GDP growth exceeded 8% in 2007, driven by a double-digit expansion of household consumption and even faster growth of investments (Table RU). Since the start of Putin's presidency in 2000, Russian GDP has increased by nearly 60% in real terms and even more so in nominal euro terms (Figure 1). At purchasing power parity (PPP), Russia's GDP amounted to EUR 1750 billion in 2007 – about 80% more than in 2000 and 25% more than the aggregate GDP of the new EU member states of Central and Eastern Europe (NMS). In per capita terms, Russia's GDP at PPP exceeded EUR 12,300 in 2007 – about 50% of the EU average – and the speed of catching up to the average per capita GDP level in the EU has been impressive: about 15 percentage points since the year 2000.

Thanks to large windfall gains from high world market energy prices and the related terms of trade improvement (see Box 1), the Russian government was able not only to repay nearly all outstanding public external debts, but to accumulate almost USD 450 billion of foreign exchange reserves as of end-June 2008. Apart from the Stabilization Fund (recently renamed Reserve Fund), another part of windfall proceeds from oil and gas exports is being accumulated in the newly established National Welfare Fund (more on that, see below). Moreover, several national development projects (targeting infrastructure, housing, the health sector, education, and agriculture) were launched and salaries in the public sector and pensions were raised.

Box 1

Effects of rising energy prices on Russian economic growth

Russian GDP growth has been driven since 2004 by booming private consumption and investment. At the same time, the growth effect of real net exports (exports minus imports, both at constant prices) has been negative because the volume of exports is growing at a slower pace than that of imports (Figure 3 below). Per definition, the methodology used for the measurement of real GDP excludes price effects – not only of the domestic inflation, but the effects of export and import prices as well (the effect of the so-called terms of trade). The latter effect, highly relevant in the current Russian context, is captured by another indicator: the real gross domestic income (RGDI).

RGDI is defined as:44

RGDI = GDP + ToT

(1)

(2)

where:

$$ToT = (X-M)/P - (X/Px - M/Pm)$$

and X(M) are nominal exports (imports), Px (Pm) are deflators of exports (imports), and P is the average deflator of exports and imports. A positive (improving) terms of trade effect thus results in gross domestic income being higher than GDP.

Russian GDP and estimated Real Gross Domestic Income (RGDI), 2003-2008

Year	2003	2004	2005	2006	2007	2008*
GDP (RUB bn, 2003 prices)	13243	14197	15105	16223	17537	18800
real GDP growth (%)	7.3	7.2	6.4	7.4	8.1	7.2
ToT (2003 = 100)	100.0	116.0	133.8	149.1	155.6	186.0
ToT (RUB bn, 2003 prices)		652.8	1423.5	2243.9	2931.6	4645.5
RGDI (RUB bn, 2003 prices)	13243.2	14849.5	16528.8	18467.0	20468.8	23440.5
RGDI growth (%)	9.9	12.1	11.3	11.7	10.8	14.5
ToT effect, pp.	2.6	4.9	4.9	4.3	2.7	7.3
ToT effect (EUR bn)		18.8	41.0	64.7	84.5	133.9

*) Projection assuming that ToT will improve by 20% in 2008.

Source: Years 2001-2003: OECD (2006); own estimates and forecast based on ROSSTAT and Central Bank of Russia.

As can be seen, the terms of trade effect has been positive since 2003 and RGDI has been growing faster than GDP. RGDI in 2007 was nearly 17% higher than the corresponding GDP. During 2004-2007, the cumulated terms of trade gains exceeded EUR 200 billion and economic growth (measured by RGDI) exceeded 10% per year – matching closely the Chinese results. Taking into account the current oil price developments,⁴⁵ it can be expected that another substantial terms of trade gain will be realized in 2008. The expected slowdown in real GDP growth notwithstanding (which will again result from a negative contribution of real net exports), RGDI growth may exceed 14% and the associated terms of trade gain EUR 130 billion in 2008.

⁴⁴ The term 'real' does not refer here to constant prices, but the product that the country has at its disposal. It is sometimes referred to as 'command' GDP, reflecting the real purchasing power of domestic residents – see Kohli (2004). The relation between RGDI and GDP was analysed by Vintrova (2005) and Mora (2006) for Central and East European countries, in particular for the Czech Republic, which reported rising terms of trade and thus higher RGDI than GDP in the period 1996-2004. For Russia, the relation was analysed in OECD (2006) and recently also by Kuboniwa (2007), who calculated various price deflators. The table reproduces these results (for 2003) and provides the author's own estimates of RGDI for the years 2004-2008 using the above expression (2) and implicit price deflators of exports and imports, based on the latest (April 2008) official Russian data from ROSSTAT.

⁴⁵ During the first quarter of 2008, the average price of Urals crude oil (USD 93.5 per bbl) increased by 73% in US dollar terms compared to the first quarter of 2007. According to preliminary balance of payments data from the Central Bank of Russia (CBR), export revenues increased by 50% in nominal USD terms in the first quarter of 2008 (of which revenues from energy exports by nearly 70%). The actual terms of trade gain in 2008 may be even higher than assumed in Box 1.

Figure 1



Russian economic growth: GDP and RGDI*

*) RGDI is Real Gross Domestic Income – see Box 1 for details. Source: Goskomstat, Central Bank of Russia, own estimates.

There have been a lot of other economic achievements of Putin's presidency which help to explain his extraordinary domestic popularity: rising incomes and wages, decreasing poverty levels, rising employment (and declining unemployment), nearly full repayment of the government's external debt, ballooning foreign exchange reserves, etc. At the same time, the Russian population has been declining due to a combination of high mortality rates and declining birth rates. Indeed, the adverse demographic developments and latent labour shortages are among the major challenges which Russia will be facing in the near future. And whereas the number of Russians with incomes below the official poverty threshold nearly halved between 2000 and 2006 (to 21.6 million, that is 15.3% of the population in 2006), the income differentiation increased substantially.⁴⁶

The recent economic boom can be explained to a large degree by surging world market commodity prices, in particular those of energy (Box 1). Figure 2 shows how the development of Russian exports has been closely linked to rising oil prices. Indeed, the surging revenues from energy exports have accounted for a major (and growing) share of total export revenues. During 1995-1998, energy export revenues fluctuated around EUR 25 billion per year (about 40% of total export revenues), compared to more than EUR 150 billion (and 60% of export revenues) recently. Yet after the surge of export revenues during 2004-2006, the export volume grew only slowly in 2007 while imports (in both real and nominal terms) soared by about 25%. As a result, the trade and current

⁴⁶ During the same period, the Gini coefficient increased from 0.395 to 0.410. For a more detailed analysis of recent Russian economic developments see, for example, Vinhas de Souza (2008).

account surpluses diminished and the contribution of real net exports to GDP growth has been negative already since 2004 (see Figure 3). Higher oil prices helped to increase energy export revenues, yet proceeds from other exports – in particular metals – expanded even faster in 2007. The share of energy in total export revenues dropped by about 2 percentage points in 2007 compared to 2006 (to 61%) but increased in the first quarter of 2008 (to 68%) again.



Figure 2

Source: Goskomstat, Central Bank of Russia, own estimates.

Return of double-digit inflation

The appreciation pressure remains strong given the huge inflows of foreign exchange, despite some relief provided by the Reserve and National Welfare Funds which accumulate a larger part of energy-related export revenues. Since the beginning of 2000, the rouble has appreciated by almost 50% against the euro in real terms (appreciation against the US dollar was even more pronounced). Notwithstanding some tightening of monetary policy, i.e. increases in interest rates (to 10.75% as of 10 June 2008) and minimum reserve requirements, the still rapid growth of money supply makes meeting the official inflation target of 10.5% in 2008 extremely difficult. Consumer price inflation is fuelled by rising prices for food, energy and housing as well as by administered tariff adjustments and, last but not least, by demand cost-push factors such as rising wages and salaries as well. All these factors translated into double-digit annual inflation in late 2007 again (12% in December year-on-year) and consumer price inflation even accelerated in the first months of 2008 (to more than 14% against the previous year) – mainly on account of rising food prices (despite price controls for major staples). Double-digit inflation is likely to persist in 2009 as well, and producer price inflation will be even higher. Apart from food price increases, inflation is being fuelled by rising government spending (see below) and by gradual adjustments of electricity and gas tariffs for domestic consumers (the latter are set to

reach export prices by 2014-2015). Both the Central Bank of Russia and the Ministry of Finance (as well as the IMF and the World Bank according to press reports)⁴⁷ warn about overheating since the domestic supply is growing much less than demand. On the other hand, the Ministry of Economy and other less 'liberal' quarters of the government and the Russian economic community argue for additional spending aimed at boosting domestic investment, economic diversification and modernization. Given the abundance of money accumulated in the Oil Funds it is difficult to resist the temptation to spend more. Indeed, the government-sponsored Industrial Policy measures will offer targeted support to various public-private partnership projects in the automotive, aviation, shipbuilding and selected high-tech industries (such as nano, nuclear and space technologies). Some of these initiatives were mentioned as the key priorities in the economic programme of the newly elected Russian President Dmitry Medvedev, yet the efficiency of their implementation raises serious doubts – not least due to widespread corruption and other institutional bottlenecks.

The role of the Oil Fund(s)

The Russian Oil Stabilization Fund (OSF) was established in January 2004 with the purpose of (1) reducing the vulnerability of the state budget to the volatility of world oil prices, and (2) sterilizing the impact of oil-related foreign exchange inflows on the money supply and inflation. The OSF accumulated money as long as the world price for Russia's Urals oil exceeded the cutoff price (initially set at USD 20 per barrel, but raised to USD 27 as of 2006) and could be tapped for covering federal budget deficits when the Urals price fell below the cutoff price. The fund collected revenues from two taxes: (1) a portion of the export duty on crude oil, and (2) a portion of the mineral resources extraction tax on oil (both referred only to that part of the tax that stemmed from the world price in excess of the cutoff price). In addition, parts of the federal budget surpluses (which were attained even though the additional tax revenues from high oil prices were absorbed by the OSF rather than by the current budget) were transferred to the OSF as well. The OSF was managed by the Ministry of Finance and until mid-2006 was held entirely in Russian roubles that were deposited interest-free at the Central Bank of Russia (CBR).⁴⁸ However, in summer 2006, a strategic decision was taken on converting the OSF into foreign-currency denominated assets, and the conversion was completed by the end of the year. The government guideline was that the OSF should be invested in high-quality sovereign bonds of 14 developed countries - the euro area countries, the UK and the US. In practice, it was held in a currency basket with the following composition: 45% in US dollar, 45% in euro and the remaining 10% in pound sterling.

Apart from covering the federal budget deficits, the OSF could also be tapped for other purposes in case it had accumulated more than RUB 500 billion. Given the persistently high oil prices that hovered far above the cutoff price, this threshold had already been surpassed by the end of 2004. As a result, the OSF funds were subsequently used to repay the country's foreign debt,⁴⁹ to cover

⁴⁷ See, for example, http://www.rb.ru/topstory/economics/2008/06/03/093829.html.

⁴⁸ The main consideration behind were the perceived fears of the Russian assets 'abroad' being frozen as a result of possible international legal disputes.

⁴⁹ The early settlement of public foreign debt enabled Russia to economize on interest payments, despite the penalties charged to the country for the premature contract withdrawal.

the public pension fund deficit, and – more recently – to finance the newly established Investment Fund and the equity stakes in the so-called 'state corporations', notably the one dealing with nanotechnologies. Still, by the end of 2007, the OSF had built up assets worth more than RUB 3.8 trillion, corresponding to nearly 12% of Russia's GDP (see Table 1), and nearly eight times the value of the RUB 500 billion threshold, above which the funds could be used for purposes other than budget deficit financing. Besides, the pressure to spend the OSF was all the more intense as most short- and medium-term oil price forecasts assumed values above USD 50 per barrel, and it seemed extremely unlikely that the price would fall below USD 27 (the cutoff price set for the OSF). This implied that stabilization in the sense in which it was meant at the time when the OSF was set up, i.e. as a buffer for federal fiscal balances, was unlikely to be required anytime soon.

Table 1

Dynamics of the Oil Stabilization Fund

RUB billion	2004	2005	2006	2007
Inflows/revenues				
Unspent federal budget surplus from previous year	106	218	48	157
Oil revenues (export duty plus extraction tax)	416	1,175	1,641	1,587
Interest accrued			23	152
Outflows/withdrawals				
External debt repayment				
IMF		94		
Paris Club		430	605	
Vneshekonombank		124		
Other				34
Pension Fund	•	30		
Investment Fund and equity stakes in 'state corporations'				300
Net inflows	522	716	1,107	1,529
As % of GDP	3.1	3.3	4.1	4.6
Balances, end of year*	522	1,238	2,347	3,849

* Balances in a given year may deviate from the sum of balances in previous years and net inflows due to changes in valuation. *Source*: Ministry of Finance, own calculations.

The mounting OSF reserves were one of the major reasons behind the recent decision by the Russian government to implement a profound budgetary reform, the details of which are presented in Box 2. Most notably, as of February 2008, the OSF was divided into the so-called 'Reserve Fund' (with essentially the same function and the same allocation strategy as the previously existing OSF) and the 'National Welfare Fund' (NWF), which is supposed to save the oil-related wealth for future generations (based on the idea of intergenerational equity) and may be invested into riskier but potentially more profitable assets.⁵⁰

⁵⁰ Currently, the existing regulations allow the NWF to be invested into a wider range of foreign bonds with investment rating above AA (according to Standard and Poor's), implying some (moderate) relaxation compared to the very conservative investment approach applied to the Reserve Fund. At the same time, discussions on the allocation strategies for the NWF are going on.

Box 2

Features of the Russian federal budgetary reform as of 2008

- three-year budget planning (now for 2008-2010);
- division into 'oil' and 'non-oil' budget;
- 'oil budget' now *also* collects revenues from oil products and natural gas unlike the OSF, which collected revenues from oil only;
- OSF ('oil budget') divided as of February 2008 into two funds: 'Reserve Fund' (RUB 3.1 trillion) and 'National Welfare Fund' (RUB 0.8 trillion);
- Reserve Fund serves the purpose of fiscal stabilization (in line with the original OSF goal), is maintained at 10% of GDP and invested in highly liquid and low-yielding foreign securities;
- annual transfers from Reserve Fund to 'non-oil' budget (in 2008 envisaged at some 6% of GDP);
- 'non-oil' budget deficit capped at 4.7% of GDP, and the maximum transfer from the Reserve Fund to the 'non-oil' budget at 3.7% of GDP – both effective starting from 2011 (in 2008-2010, 'oil transfer' is expected to be significantly higher);
- the National Welfare Fund preserves the oil-generated wealth in the long term for the benefit of future generations.

Essentially, the present dilemma for the Russian authorities is to decide whether the NWF should be increasingly spent or saved. In case the government opts for saving, one possibility would be to invest into foreign equities. This would be in line with, e.g., Norway's experience and might have the advantage of higher returns in the long run as compared to foreign sovereign bonds (as demonstrated by past performance). Besides, in terms of risk diversification, investing in foreign (rather than domestic) assets seems justified, since securities issued by countries which would benefit from falling oil prices – such as the United States or the EU – provide, to some extent, a hedge against excessive reliance on the oil revenues. However, in terms of profitability, such a decision appears rather ambiguous.⁵¹

Alternatively, the government could decide to spend at least part of the NWF money now, or else spend (part of) the future inflows into the NWF on a current basis. Indeed, given the good growth prospects for the Russian economy, concerns about intergenerational solidarity appear to be of minor relevance, as future generations will presumably be much wealthier than the present generation of Russians. Instead, the Fund's money could be directed to upgrading the country's infrastructure, thus encouraging private investment in the non-energy branches of the economy. The government could also target, for instance, education, health and ecological cleanup activities with these investments. So far, spending from the Fund has been largely countered by two main arguments: (1) given the extensive corruption at all government levels, any spending within Russia would be inefficient, and (2) any domestic spending would be inflationary. However, provided that the (net) benefits are positive, additional spending could be advocated even if institutional

⁵¹ In particular, it is questionable whether the return on foreign equities will match the combined effects of the Russian rouble's (likely) nominal appreciation and of the return on rouble-denominated assets.

weaknesses limit the effectiveness of public expenditures. One might also argue that some additional spending, e.g. in the area of public sector wages, in combination with other measures, could even reduce the incentives for corruption in these areas, which in many cases reflect people's efforts to make ends meet. Besides, the additional inflationary pressure arising from government spending is likely to be kept within limits as long as it is import-intensive, e.g. made within the framework of infrastructure development programmes involving large-scale imports of investment goods.

Diversification with Industrial Policy tools

The main challenge for the Russian economy in the medium and long run is whether it will succeed in replacing energy exports as the key growth driver by the development of other sectors (diversification towards manufacturing, high-tech branches, services, etc.), and how it will cope with the acute demographic crisis (the population is projected to decline by nearly 10 million in the coming decade). The officially endorsed long-term development programme until the year 2020 envisages in its 'innovation scenario' an ambitious economic diversification away from the current heavy reliance on energy and a gradual switch to innovation-based development supported by the above-mentioned Industrial Policy measures, as well as the completion of reforms aimed at improving the climate for investments and entrepreneurship. Growing investments in transport infrastructure, education, health and R&D should help to generate an average annual GDP growth rate above 6% over the next decade. In this scenario, the Russian economy will restructure, become more efficient, modern and competitive in the medium and long run. Alternative scenarios, based on continued heavy reliance on energy resources, lower oil prices and less investment would generate GDP growth rates around 4-5% whereas the Urals oil price at last year's level (USD 70 per bbl) would help to keep GDP growth at 7% in 2008 – see Dashkeyev (2008).

Growth slowdown appears inevitable, current account surplus melting down

The range of GDP growth forecasts for the year 2008 fluctuates between 6% and 8%, largely depending on assumptions regarding the level of energy prices. As shown in Figure 3, since 2004 the Russian GDP growth has mainly been driven by booming private consumption and, increasingly, also by expanding investment. The contributions of real net exports to GDP growth has become negative as the volume of exports has been growing only at a modest pace (less than 10% per year) whereas import volumes have been surging by more than 20% per year.

The wiiw medium-term forecast of Russian GDP growth for the coming years is closer to the official 'intermediate' scenario which reckons with ongoing reliance on the (modernized) energy sector, possibly with a few high-tech niches, and an average annual GDP growth of around 6% in 2010. The expected modest growth slowdown appears inevitable, at least until the end of the decade, before any (uncertain) modernization efforts start to bear fruit.

This forecast is based on relatively stable oil prices (Urals costing not more than USD 100/bbl on average) and limited effects of any (potential) impact of current financial markets turmoil. Both private consumption and investments are expected to grow at double-digit rates and thus faster than

GDP, real exports will continue to be sluggish while imports will expand roughly in line with private consumption (see Table RU for details). This implies an ongoing negative (albeit diminishing) contribution of real net exports to GDP and – in nominal terms – a gradual reduction of trade and current account surpluses (in fact, the current account surplus may disappear already in 2009-2010).⁵² Inflation will remain above 10% in 2008 and stubbornly close to 10% thereafter. Assuming a fairly constant nominal rouble exchange rate against the euro, this implies continued real appreciation. The latter represents – apart from the less likely risk of an oil price collapse – the major challenge for Russian growth, restructuring and competitiveness owing to its adverse effect on unit labour costs. Another potential risk is related to the danger of overheating in consumer and credit markets where especially consumer credits were growing particularly fast (by about 40% per year during 2006-2007, albeit from a low level). The danger of contagion from the current subprime crisis cannot be ignored either, particularly if the possible recession in the United States this year leads to a slump in global oil prices. However, the accumulated foreign exchange reserves (including the two Oil Funds) represent a cushion and should help to avoid any major financial crisis.



Drivers of Russian GDP growth (contributions of main components)





⁵² Higher oil price (say USD 130/bbl) would only marginally increase the current GDP growth (but substantially higher RGDI growth) since a larger part of additional export revenues would be sterilized. Possible higher growth of consumption and investments would be initially associated with more imports (and thus with a larger negative contribution of net exports to GDP growth).

A potentially more serious barrier to future sustainable economic growth and a successful diversification of the Russian economy away from resource-based sectors is - apart from labour shortages - related to the danger of Dutch Disease and the gradual erosion of costs competitiveness. The latter results from a combination of factors such as the ongoing real appreciation of the rouble, rapid growth of wages and only sluggish productivity improvements. Average gross wages exceeded EUR 370 per month in 2007, which represents a nominal increase by almost 25% year-on-year. During 2000-2007, unit labour costs were rising by more than 20% per year and their level is now already higher than in some Central European new EU member states (such as Bulgaria and Slovakia - see Annex for a detailed comparison). Given the competition from Central and Eastern Europe (including Ukraine) and especially from China, Russia could soon become a location too expensive (and thus non-competitive) for export-oriented manufacturing. Rising local production costs may distract even such investments (in particular FDI) which are oriented at the (rapidly expanding) domestic market since the respective imports are becoming cheaper. The expected accession to WTO (possibly already in 2008 since all bilateral talks have been completed) and the related reduction of import tariffs may even aggravate these problems. It is also not clear whether some of the above-mentioned envisaged Industrial Policy tools may not be conflicting with the WTO accession rules.

Duo Medvedev-Putin working in tandem or potentially dissonant?

The recent economic developments have been overshadowed by politics, in particular by the issue of Vladimir Putin's successor after the presidential elections of 2 March 2008. Putin's last-minute support of the United Russia party had helped to secure it a comfortable majority in last year's Duma elections; his endorsement of Deputy Prime Minister (and Gazprom Chairman) Dmitry Medvedev as the preferred candidate while agreeing to serve as Prime Minister in the new government secured Mr Medvedev's easy victory (70% of the vote). The elections were not entirely fair since Putin's preferred candidate had been disproportionately endorsed by the state-controlled media, yet there is little doubt that both Mr Putin and Mr Medvedev (the latter seen as a guarantee for the continuity of Putin's successful policies) enjoy overwhelming support in the Russian electorate. Owing to his popularity and age, Mr Putin is likely to dominate Russian politics in the years to come - he may even return to the Kremlin after some time. Despite more than 17 years of working together and notwithstanding their good personal relationship, the present constellation (President Medvedev and Prime Minister Putin) may lead to tensions, at least between their respective apparatuses.⁵³ Some preliminary hints regarding future political stability in Russia appeared already in April-June 2008. when the new government was formed and the reshuffle in the presidential administration initiated. Both went on rather smoothly, with Prime Minister Putin taking some of his close allies (notably I. Sechin, S. Sobyanin and I. Shuvalov) into the government. Under the Russian Constitution, the new President Medvedev keeps the control of the power ministries where only a few replacements occurred (such as the appointment of one of Medvedev's allies, A. Konovalov, as Minister of Justice). Simultaneously, the mighty presidential administration will be headed by S. Naryshkin (with one of the Kremlin's chief ideologues, Mr. V. Surkov, continuing as a Deputy Head) and the Security

⁵³ Formally, the Russian Constitution gives much more power to the President who may, *inter alia*, appoint (or dismiss) the Prime Minister.

Council by former FSB Chief N. Patrushev. All these appointments suggest that the Medvedev-Putin team may work in tandem rather than conflict – at least for the time being.

The economic outlook remains broadly positive with both consumption and investment (including FDI) expected to expand further. The risks of overheating, particularly in housing and credit markets, appear manageable whereas the above-mentioned concerns regarding inflation, real appreciation and the erosion of competitiveness may represent a more serious potential threat in the medium and long run. With a stronger economy, more financial resources and power consolidation at home, Russia's self-confidence (as well as outward investments) will grow further – and this may lead to more conflicts with both the EU and USA, although the present tensions may calm down provided the new President Medvedev keeps his credentials as a liberal politician who supports the rule of law and fight against corruption. However, there is little doubt that both Mr Medvedev and Mr Putin will defend Russian interests, and these need not necessarily be identical with those of either the EU or the USA and may lead to additional tensions.⁵⁴ Apart from energy issues, which dominate EU-Russian relations, some of these challenges will be addressed in the negotiations of the new EU-Russia agreement which started at the EU-Russia Summit in Siberia in June 2008.

Summary conclusions

The Russian economy has been booming in the past couple of years; the period of Putin's presidency has been very successful economically. The per capita GDP reached 50% of the EU average in 2007 and the speed of catching-up was even faster than that of the new EU member states of Central and Eastern Europe. Russian economic growth has been fuelled mainly by surging energy revenues which gave a boost to both private consumption and investments. The government's external debts were paid back, foreign exchange reserves reached almost EUR 350 billion by mid-2008, the current account and state budget are both in surplus. However, the excessive dependence on energy represents – together with adverse demographic developments – a major challenge for the sustainability of growth in the medium and long run. The Russian rouble has considerably appreciated in real terms, inflation has returned to double digits and cost competitiveness has deteriorated.

Policy makers are aware of these vulnerabilities and have launched an ambitious economic modernization programme which aims to diversify the economy and foster innovations with the help of Industrial Policy tools and public-private partnership financing schemes. There are, however, serious doubts that these efforts will lead to the desired results, *inter alia* due to the high risk of abuse, inefficiency and other institutional bottlenecks. In addition, there are also political risks related to the transition of power since the new governing duo Medvedev-Putin can be potentially dissonant. The medium-term growth outlook is still positive, although a growth slowdown appears inevitable and the current account surplus will soon disappear.

⁵⁴ For a balanced overview of Russian foreign policy after the year 2000 and an analysis of reasons underlying the worsened relations with the West see Sakwa (2008).

Apart from the collapse of oil prices and potential spillover effects on Russia from the global financial turbulence (which both seem manageable), other challenges relate to the future integration in the world economy, in particular regarding Russia's accession to the WTO (which may conflict with the planned Industrial Policy tools) and the relations with the EU. The latter have deteriorated recently owing to Russia's growing assertiveness, which went together with the economic recovery and the enlargement of the EU. Despite large economic asymmetries between Russia and the EU (most evident in the areas of foreign trade, investments and economic size) and sometimes conflicting interests (in particular regarding energy supplies and the contest for influence on the post-Soviet space), mutual interdependence requires cooperative approaches which would serve best the interests of both Russia and the EU.

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Table RU

Russia: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st	2008 quarter	2008	2009 Foreca	2010 st
Population, th pers., end of period ²⁾	143474	142754	142221	142009	142100	141900	141000	140500	140000
Gross domestic product, RUB bn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	17048.1 7.2 3310 9170	21625.4 6.4 4290 10030	26879.8 7.4 5536 11070	32987.4 8.1 6630 12330	6747.9 7.4	8838.1 8.5	40500 7.3	43000 6.8	49000 6.0
Gross industrial production annual change in % (real) Gross agricultural production	8.0	5.1	6.3	6.3	7.2	6.2	6	6	6
Construction output total annual change in % (real)	10.1	10.5	18.1	18.2	17.6	28.9		•	•
Consumption of households, RUB bn, nom. annual change in % (real) Gross fixed capital form., RUB bn, nom. annual change in % (real)	8405.6 12.1 3130.5 12.6	10590.0 11.8 3836.9 10.6	12880.9 11.2 4968.4 17 7	15815.5 12.8 6951.1 20 8	3381.9 12.4 978.5 22.0	•	13.8 21	12 17	11 13
LFS - employed persons, th, avg. annual change in % Reg. employment in industry, th pers., avg. annual change in %	67275 14775 -1.1	68169 1.3 14469 -2.1	68855 1.0 14325 -1.0 5312.0	70573 2.5	69359 2.4	70233 1.3	70300	70500	70600
LFS - unemployment rate in %, average Reg. unemployment rate in %, end of period	7.8 2.6	7.2 2.5	7.2 2.3	4383.0 6.1 2.1	7.0 2.3	6.8 2.0	5.8	5.5	5.5
Average gross monthly wages, RUB annual change in % (real, gross)	6739.5 10.6	8554.9 12.6	10633.9 13.3	13527.0 16.2	11878.3 18.2	15432.3 14.0	•		
Consumer prices, % p.a. Producer prices in industry, % p.a.	11.0 24.0	12.5 20.7	9.7 12.4	9.1 14.1	7.7 8.6	12.9 25.7	15 19	13 16	9 15
General governm.budget, nat.def., % GDP Revenues Expenditures Deficit (-) / surplus (+), % GDP Public debt, nat.def., in % of GDP ³⁾	31.9 27.4 4.5 21.6	39.7 31.5 8.1 14.9	39.5 31.2 8.4 8.9	40.5 34.5 6.0 7.2	· · ·		43 37 6		
Refinancing rate of NB % p.a., end of per.	13	12	11	10	10.5	10.3	11		
Current account, EUR mn ⁴⁾ Current account in % of GDP Gross reserves of NB, excl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP FDI inflow, EUR mn ⁴⁾ FDI outflow, EUR mn ⁴⁾	47868 10.1 88663 156689 34.8 12422 11085	67851 11.0 148094 216553 34.2 10354 10258	75696 9.6 244190 256609 32.5 25979 18570	57222 6.1 317220 313956 34.2 38344 33358	17524 6.8 247719 260967 13572 4829	24726 6.8 312936	50000 4.5 350000 40000 30000	5000 0.4	-15000 -1.1
Exports of goods, BOP, EUR mn ⁴) annual growth rate in % Imports of goods, BOP, EUR mn ⁴) annual growth rate in % Exports of services, BOP, EUR mn ⁴) annual growth rate in % Imports of services, BOP, EUR mn ⁴) annual growth rate in %	147358 22.5 78327 16.4 16564 15.4 26774 11.6	195894 32.9 100787 28.7 20064 21.1 31229 16.6	243490 24.3 131777 30.7 24948 24.3 35967 15.2	259740 6.7 163255 23.9 28751 15.2 43245 20.2	54822 -2.0 32679 27.5 5859 18.7 8320 20.7	72239 31.8 40563 24.1 6282 7.2 8687 4.4	270000 4 200000 23 30000 4 50000 16	275000 2 230000 15 32000 7 55000 10	285000 4 255000 11 35000 9 60000 9
Average exchange rate RUB/USD Average exchange rate RUB/EUR (ECU) Purchasing power parity RUB/USD, wiw ⁵ Purchasing power parity RUB/EUR, wiw ⁵	28.81 35.81 11.03 12.92	28.30 35.22 12.74 15.06	27.34 34.08 14.29 17.04	25.58 35.01 15.79 18.83	26.33 34.46	24.26 36.31	24.4 36.6 21.7	24.7 37 24.4	25 37.5 27

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary . - 2) Resident population. - 3) wiiw estimate. - 4) Converted from USD at average official cross exchange rate. - 5) wiiw estimates based on the 2005 International Comparison Project benchmark.

Source: wiiw Database incorporating national statistics; wiiw forecasts.


Vasily Astrov

Ukraine: a new WTO member

WTO accession paving way for free trade negotiations with the EU

On 16 May 2008, Ukraine officially became a member of the World Trade Organization. This move should have a number of consequences for the country's economy. According to the terms of accession, the binding import tariffs⁵⁵ on agricultural products were lowered by about 3.5 percentage points to 10.66% on (unweighted) average, with the highest tariffs applying to sugar (50%)⁵⁶ and sunflower seed oil (30%). For industrial goods, the average binding import tariff has been set at 4.95%; however, in effective terms, a reduction of tariffs may not necessarily take place, given that the WTO-conform tariff regime for industrial goods were implemented already in 2005. On the export side, export duties (such as for metals scrap, oilseeds and grain) will be gradually reduced, and export guotas eliminated. Also, the import guota for Ukrainian steel in the EU has been scrapped, and the import tariffs in WTO member countries applied to Ukrainian goods were reduced to the MFN ('most-favoured-nation') regime levels. In the case of the EU, however, no automatic tariff reduction has taken place, since MFN tariffs were being applied within the framework of the Partnership and Cooperation Agreement already before. Finally, the incidence of anti-dumping measures against imports from Ukraine (such as chemicals) should go down substantially, as the country will get access to WTO trade dispute facilities. Thus, metals and chemicals are likely to be the two sectors of the economy benefiting most from WTO accession.

Probably more importantly, judging from the earlier experience of other countries, WTO membership should further improve the climate for FDI, particularly into the country's still largely inefficient and energy-intensive industrial sector. Overall, Ukraine is offering a lucrative combination of a highly qualified and still cheap workforce, proximity to EU markets and good market prospects both at home and in Russia. Last but not least, WTO accession clears the way for the formation of a free trade area with the EU (the negotiations on this have already started). However, for that, a number of difficult issues will have to be settled, most notably the compatibility with Ukraine's largely free trade regime with Russia and other CIS countries.

⁵⁵ According to the WTO regulations, the actually applied import tariffs may not exceed the so-called 'binding' tariffs agreed upon accession.

⁵⁶ At the same time, a tariff quota on raw sugar (260 thousand tons at 2%) has been set and will be raised subsequently.

Household consumption gains momentum

Well in line with our earlier predictions, the impact of the global economic slowdown and financial turmoil on the Ukrainian economy has proved to be small, at least so far. In January-May, GDP went up by 6.4%, driven – as before – primarily by the strong domestic demand. Industrial output grew by 8%, with machinery doing particularly well (+31.1%), largely on account of surging car production. At the same time, the metals industry was nearly stagnant – notwithstanding the favourable world price dynamics.

The retail trade turnover – a proxy for private consumption – soared by 30.2% in real terms, and trade as a whole (including wholesale trade) recorded the highest growth in real value-added across all main economic sectors (+15.3% in January-April). The consumption boom is underpinned by a strong pick-up in disposable households incomes (+17.7% in real terms in January-April), although the growth of real wages proved to be much more modest (+11.9%) and has been decelerating. Instead, generous social payments played a decisive role, as did the USD 1 billion worth (so far) government compensation of private deposits in the former Soviet Sberbank, which had been eaten away by hyperinflation during the 1990s.⁵⁷ According to a government resolution adopted in March, pensions were raised to the subsistence minimum, while the introduction of targeted – as opposed to undifferentiated – social assistance starting from 1 May has been postponed. Finally, access to household credit has hardly tightened (more on that, see below).

By contrast, investment expansion has slowed down markedly. In the first quarter, gross fixed investment increased by a relatively modest 10.4% (compared to 32.2% in the first quarter of 2007), whereas in metallurgy investments even fell. Another indicator of the relatively weak investment activity have been the declining construction volumes (by 1.1% in January-May). The slowdown in industrial investments under the second government of Yulia Tymoshenko may not come as a surprise given the earlier experience from the time of her first premiership in 2005, even if this time her policies are generally more balanced and arguably less controversial.

Rising inflation puts downward pressure on real interest rates

Despite the global financial turmoil and the marked fall of the Ukrainian stock market,⁵⁸ financial stability has been generally preserved. At the end of April, outstanding credits of the banking sector were some 75% higher than the year before (although credit growth decelerated somewhat in April). Some of the country's biggest banks which are foreign-owned have enjoyed access to the funds of their parent companies, although many of the domestically owned smaller banks are reportedly facing difficulties to re-finance themselves. Between January and May, lending rates in hryvnia indeed rose by about 3.5 percentage points (to 17.5% in average weighted terms). However, over the same period, consumer price inflation surged by more than 10 percentage points (to 31.1%), implying that in real terms, interest rates became even more negative. The latter holds true even

⁵⁷ These compensations take place with a generally flat fee of USD 200 per depositor.

⁵⁸ After reaching its peak in mid-January 2008, over the following five months Ukraine's PFTS stock index lost 32% of its value.

more for loans denominated in foreign currencies (US dollar and euro): the nominal interest rates charged on them are lower than for hryvnia-denominated loans, whereas the exchange rate outlook is rather stable: if anything, the hryvnia will rather appreciate.

As has been the case last year, the rising inflation is explained first of all by the soaring prices of food (+50.5% in May 2008 year-on-year), notably fruit (+84.9%), oils and fats (+83.2%), and vegetables (+80.9%).⁵⁹ One 'cost-push' factor behind the rising inflation is represented by the rising wages, particularly in the public sector. On average, official nominal wages in April 2008 were 41.7% higher than a year earlier – far ahead of labour productivity. At the same time, the surge in food prices has little to do with domestic 'overheating' but rather reflects global trends: the speculative demand for the key food commodities and the increased use of crops for biofuels production. Nevertheless, the poor grain harvest in Ukraine last year played a role as well. This year, the harvest is expected to be good (up to 40 million tons of grain), which will almost certainly mitigate inflationary pressures, at least over the summer months. In contrast, the restrictive steps undertaken by the National Bank – the tightening of capital adequacy requirements in February and the two successive hikes in the refinancing rate, to 12% p.a. by the end of April – seem to have had very limited effect, which is hardly surprising against the background of the fixed exchange rate regime (against the US dollar) and Ukraine's high degree of capital market integration, meaning that the money supply is largely determined by flows of foreign exchange.

Hryvnia revalued against the US dollar

The booming domestic demand causes the country's external position to deteriorate still further. In the first quarter of 2008, the current account deficit reached as much as 9.6% of GDP (after 4.2% in 2007 as a whole), reflecting first of all the booming goods imports. According to the customs statistics, in January-April 2008, goods exports increased by 30.9% in US dollar terms year-on-year – far below the growth of registered imports (+50.3%), although the latter can be partly attributed to the current anti-smuggling campaign.

Despite the widening external deficits, the abundant capital inflows have exerted strong appreciation pressure on the hryvnia. Starting from April, the National Bank was increasingly reluctant to defend the peg of UAH 5.05 to the US dollar, which had been maintained for the past three years. As a result, the hryvnia was persistently appreciating in the interbank market (to UAH 4.55 per US dollar by 21 May), ultimately prompting the National Bank to revise the official exchange rate to a new peg of UAH 4.85 per US dollar, implying a 4% nominal revaluation. Given the modest scale of revaluation and the global weakness of the US dollar, the move itself is unlikely to hamper the country's external competitiveness in a serious way. Other factors such as domestic wage pressures and the rising price of imported energy may potentially play a far greater role, although at the

⁵⁹ The high weight of foodstuffs (55%) in the consumer basket underlying CPI calculations may, however, be exaggerated as it is derived from household surveys, which tend to capture primarily the poorer segments of the population, spending relatively more on food. Therefore, the 'true' inflation rate may be somewhat lower than suggested by official statistics.

moment, they are to a large degree offset by the favourable terms of trade (first of all high export prices for steel, chemicals and agricultural products).

Yushchenko-Tymoshenko coalition loses majority

Well in line with our earlier forecast, the continuation of economic growth in excess of 6% in 2008 appears likely given the ongoing fiscal expansion, the availability of credit and – last but not least – the expected good harvest. At the same time, the forecasts for inflation and the current account deficit this year had to be revised upwards. Next year, a GDP growth slowdown may follow, after the effects of the current fiscal impulse have died down, and with the level of private indebtedness possibly approaching unsustainable levels. Also, any major downturn in global steel prices (which may result e.g. from a recovery of the US dollar) remains a risk factor. By contrast, a more vibrant investment activity – conceivable in the case of a change of government – would obviously help economic growth.

A departure of the Tymoshenko government might result from the recent loss of absolute majority in the parliament by the ruling coalition between her party (BYuT) and the party of President Yushchenko (OUPS). This event was the culmination of the mounting tensions between Ms Tymoshenko and Mr Yushchenko, which manifested themselves *inter alia* in the lengthy struggle over the control of the State Property Fund (with pro-presidential forces successfully undermining the government privatization plans) and in controversies over the planned constitutional reform (with Mr Yushchenko seeking to strengthen presidential power and Ms Tymoshenko aspiring for the opposite). Also, the government has revoked a major oil production-sharing agreement (PSA) with the US-based Vanco signed under the former government and with the approval of the president. The latter move is aimed at confirming Ms Tymoshenko's image as a fighter against 'oligarchs' and corruption who safeguards the country's 'national interests' (the insufficient transparency of the Vanco deal and its alleged ties to Russia's Gazprom were the official reasons for the PSA revocation). Irrespective of how long her government will hold, Ms Tymoshenko is currently one of the two main contenders for the presidential elections scheduled for the end of 2009 (along with the opposition leader Viktor Yanukovych), with the incumbent president Yushchenko being an outsider.

Table UA

Ukraine: Selected Economic Indicators

	2004	2005	2006	2007	¹⁾ 2007 1st	2008 quarter	2008	2009 Foreca	2010 st
Population, th pers., end of period	47281	46930	46646	46373	46560	46287	46000	45800	45600
Gross domestic product, UAH mn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	345113 12.1 1100 4460	441452 2.7 1467 4720	544153 7.3 1836 5220	712945 7.6 2216 5800	137648 8.9	189768 6.0	896000 6.5	1082700 6	1262400 6
Gross industrial production annual change in % (real) Gross agricultural production	12.5	3.1	6.2	10.2	12.5	7.8	8	8	8
annual change in % (real) Construction output total annual change in % (real)	19.7 17.2	0.1 -6.6	2.5 9.9	-5.6 15.8	5.0 16.5	0.2 1.7		•	•
Consumption of households, UAH mn, nom. annual change in % (real)	180956 13.5	252624 16.6	319383 15.9	422837 17.1	86385 19.1		20	15	12
annual change in % (real)	20.5	96965 3.9	21.2	24.8	25.9	•	10	20	20
LFS - employed persons, th, avg. annual change in % Reg. employees in industry, th pers., avg. ²⁾ annual change in % LFS - unemployed, th pers., average LFS - unemployment rate in % average	20295.7 0.7 3408.3 -0.2 1906.7 8 6	20680.0 1.9 3415.8 0.2 1600.8 7 2	20730.4 0.2 3361.9 -1.6 1515.0 6.8	20904.7 0.8 3278.8 -2.5 1417.6	20537.2 0.5 3303.3 -2.2 1633.8 7.4	3246.6 -1.7	- - - - -	6.6	68
Reg. unemployment rate in %, average	3.5	3.1	2.7	2.3	2.8	2.3	. 0.4	0.0	0.0
Average gross monthly wages, UAH ² ⁹ annual change in % (real, gross)	589.6 17.0	806.2 20.4	1041.4 18.4	1351 15.0	1161.0 14.7	1619.0 13.8		•	•
Consumer prices, % p.a. Producer prices in industry, % p.a.	9.0 20.5	13.5 16.7	9.1 9.6	12.8 19.5	10.2 16.6	22.5 26.9	18	14	10
General governm.budget, nat.def., % GDP Revenues Expenditures ³⁾ Deficit (-) / surplus (+), % GDP Public debt in % of GDP	26.5 29.7 -3.2 24.7	30.4 32.2 -1.8 17.7	31.6 32.3 -0.7 14.8	30.8 31.9 -1.1 12.5	32.0 27.4 4.6	32.5 29.5 3.0			
Refinancing rate of NB % p.a., end of period	9.0	9.5	8.5	8.0	8.5	10.0			
Current account, EUR mn ⁴⁾ Current account in % of GDP Gross reserves of NB excl. gold, EUR mn Gross external debt, EUR mn Gross external debt in % of GDP FDI inflow, EUR mn ⁴⁾ FDI outflow, EUR mn ⁴⁾	5560 10.6 6977 22528 47.1 1380 3	2030 2.9 16058 33504 45.3 6263 221	-1289 -1.5 16587 41391 50.6 4467 -106	-4320 -4.2 21634 57529 59.9 7220 491	-921 -4.4 16814 44758 1309 5	-2418 -9.6 20535 58551 1853 107	-7000 -6.3	-8500 -5.8	-10000 -5.3
Exports of goods, BOP, EUR mn ⁴⁾ annual growth rate in % Imports of goods, BOP, EUR mn ⁴⁾ annual growth rate in % Exports of services, BOP, EUR mn ⁴⁾ annual growth rate in %	26906 28.0 23895 16.3 6325 37.0 5329 35.5	28093 4.4 29004 21.4 7503 18.6 6054 13.6	31048 10.5 35188 21.3 9000 19.9 7305 20.7	36383 17.2 42900 21.9 10337 14.9 8369 14.6	8279 21.3 9603 20.8 1924 5.0 1845 11.8	9312 12.5 12199 27.0 2401 24.6 2227 20.7	40000 10 50000 17 12000 16 10000 19	44000 10 56000 12 13700 14 11500 15	48000 9 62000 11 15300 12 12500 9
Average exchange rate UAH/USD Average exchange rate UAH/EUR (ECU) Purchasing power parity UAH/USD, wilw ⁵ Purchasing power parity UAH/EUR, wilw ⁵	5.319 6.609 1.392 1.631	5.125 6.389 1.680 1.986	5.050 6.335 1.869 2.229	5.050 6.918 2.215 2.641	5.050 6.617	5.050 7.559	4.9	4.8 7.4	4.8 6.7

Note: The term 'industry' refers to NACE classification C+D+E.

1) Preliminary. - 2) Excluding small enterprises. - 3) From 2004 including lending minus repayments. - 4) Converted from USD at average official cross exchange rate. - 5) wiw estimates based on the 2005 International Comparison Project benchmark.

Source: wiiw Database incorporating national statistics; wiiw forecasts.



Olga Pindyuk

Kazakhstan: inflation back under control, but growth prospects worsen

Banking crisis, aggravated by housing bubble burst, turns out to be more profound

Banking sector problems remain central to Kazakhstan's economic development. Kazakh banks are burdened by external debt worth over EUR 26 billion (about 50% of the country's total external debt), EUR 7.7 billion of it being due in 2008, while they still face difficulties with access to external financing.⁶⁰ In order to diversify sources of financing, banks have been making efforts to attract more deposits at the domestic market by offering higher interest rates: in March 2008, deposits increased by 25% year-on-year. However, this influx of deposits is not large enough to compensate for the lost sources of external financing – by the end of March 2008, the total stock of deposits was only EUR 22 billion or 57% of total loans.

At the same time Kazakh banks have faced a worsening in their assets quality, particularly in the construction and real estate sector, where they are exposed as lenders both to home buyers and property developers. The situation in these sectors and related ones (such as advertising or construction materials production) deteriorated dramatically due to the bursting of the housing bubble. Construction output increased only by 3.3% y/y in January-February 2008, while production of construction materials fell by 21.7% y/y in the first quarter of 2008. There is already anecdotal evidence that labour shedding in these sectors has been taking place.

The six largest banks in terms of assets announced credit losses of about EUR 0.8 billion; the share of losses in total retail loans reached 8% in April 2008, while the share of loans with delayed payments increased by 2.5 times to 2% as compared to June 2007, with the corresponding shares in construction and industry reaching 6.7%. This made the banks more cautious in providing loans and they increased loan interest rates significantly – by about 3 percentage points against July 2007 (the revision of interest rates has been made in the existing loan contracts as well). Together with the lack of funds and stricter banking regulation and supervision, this situation resulted in virtual stagnation of loans: during September 2007 to April 2008, total banking loans increased by 2% only.

On the positive side, the government has sufficient financial resources to withstand the crisis. The country's foreign assets (both forex reserves and the oil fund) exceed EUR 28 billion (more than 40% of GDP) and have been increasing regardless of considerable expenditures to fight the current

⁶⁰ Starting from the beginning of 2008, there were only two cases of major external borrowing by Kazakh banks – ATF and Halyk. In particular, in April 2008, Halyk bank issued bonds with a coupon rate of 9.25%, which is 2 percentage points higher than a year ago.

crisis. The government made generous efforts to support the ailing banking system by creating a USD 4 billion stabilization fund aimed at mitigating liquidity constraints and offloading some of the loans on Kazakhstan's state mortgage company. Banking regulation and supervision has also been tightened in order to reduce possibilities of too risky behaviour of banks.

The most likely scenario for overcoming the consequences of the crisis and the medium-term development of the Kazakh banking system embraces an increase in the foreign ownership of banks, which has been the lowest in the region so far. The process has already started with Unicredit buying a strategic stake at ATF, the fifth biggest bank, for USD 2.2 billion, and a South Korean bank buying a 30% stake in the sixth largest bank CenterCredit. The three largest Kazakh banks BTA, Kazkommerzbank and Halyk (the former state savings bank) are reluctant at the moment to sell their strategic stakes as valuations are low, but the situation is likely to change in the near future.

Inflation outlook improved on the back of efficient policies

In January-April 2008, consumer prices increased by 3.4% (year-on-year, the CPI reached 19.1% in April). Inflation was driven primarily by food prices, which accelerated by 27.5% y/y. Though these figures are high, they are still significantly lower than in Ukraine, and do not differ noticeably from the previous year's dynamics. By the end of 2008 the annual average CPI should reach 11%, and gradually decelerate further to 9% in 2010.

We have revised our inflation forecast downwards, primarily due to higher efficiency of the government's anti-inflationary policy which has included a broad spectrum of measures. First, monetary policy has been quite restrictive. Starting from December 2007, the National Bank of Kazakhstan raised the refinancing rate by 2 percentage points to 11%. During January-April 2008, the money supply (M3) increased by only 4.8% as compared with 8.2% during the same period in 2007 (22% y/y growth in April 2008 versus 72% y/y growth in April 2007).

Second, the government has been quite active in introducing administrative measures. In particular, on 15 April Kazakhstan imposed a ban on wheat exports until 1 September (the country being the fifth largest exporter of grain and the largest wheat exporter in the world); a ban on oil products exports valid until 1 September was introduced starting from 1 June.

Besides, fiscal policy has been quite tight, with the budget balance being kept positive. The government has been attempting to squeeze more resources from the oil sector – thus, an export duty on crude oil (USD 110 per ton) was introduced, which is anticipated to increase budget revenues by about EUR 0.6 billion in 2008. The duty is currently applied to only about 50% of crude oil produced, as the (mostly foreign-owned) companies which secured tax stability in their contracts are exempt from paying this duty (thus the duty is applied primarily to the state oil company KazMunaigaz Exploration and Production). However, it is expected that the exemptions from the oil export duty will be eliminated in two years.

On the expenditures side, the country has been balancing between the need to support people who are the most vulnerable to food price increases, and struggling with inflation. The first step in subsidizing the most vulnerable ones will be made in July 2008, when social payments will be raised. More targeted government subsidies to stimulate household consumption are expected to be introduced in the future.

GDP growth slows down, but remains still high thanks to rocketing commodity prices

We have reduced our forecast of the GDP growth due to more severe problems resulting from the banking crisis. According to our new forecast, GDP will increase by just 5.5% in 2008; in 2009 and 2010 growth will speed up to 6.5% and 7% respectively.

The current economic growth has primarily been determined by the mining industry, which is in a favourable position owing to rocketing world commodity prices. In the first quarter of 2008, the extraction industry increased its output by 6.8% y/y, while manufacturing industry faced a decline of real output by 1.2% y/y. Diversification came to a halt: the mining industry will remain the biggest contributor to economic growth during the forecasted period, and also cause a swift increase in merchandise exports.

Investment growth will remain double-digit, as the booming FDI in the mining sector is expected to continue, and FDI in the financial sector is likely to speed up soon, thus imports of investment goods and also services should continue to grow. However, high inflation, slowdown in wage growth and deteriorated access to consumer credit will cause less fast increases in private consumption, and consequently in imports. Thus, the trade balance is expected to improve during the forecasting period from a surplus of EUR 5.2 billion in 2007 to EUR 8.6 billion in 2010. Nevertheless, the current account balance will remain negative (though declining), mostly due to the high level of investment income being directed out of the country.

The exchange rate of the Kazakh tenge remains de facto fixed to the US dollar since October 2007; however, the National Bank is likely to return to a more flexible exchange rate policy when the crisis is over. Strong growth of export revenues in 2009 and 2010 should result in gradual appreciation of the tenge.

Table KZ

Kazakhstan: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st c	2008 quarter	2008	2009 Forecas	2010 st
Population, th pers., end of period	15074.8	15219.3	15396.9	15571.5			15880	16200	16520
Gross domestic product, KZT bn, nom.	5870.1	7590.6	10139.5	12763.2	2536	3144	15900	19000	22300
annual change in % (real)	9.6	9.7	10.6	8.7	10.6	6.0	5.5	6.5	7.5
GDP/capita (EUR at exchange rate)	2313	3029	4185	4914			5500	7100	8600
GDP/capita (EUR at PPP - wiiw/WDI)	6520	7360	8260	8850		•		•	
Gross industrial production									
annual change in % (real)	10.4	4.8	7.0	4.5	9.6	3.7	6.5	7	8
Gross agricultural production									
annual change in % (real)	-0.5	7.3	7.0	8.4	3.7	3.7	7.5	9	11
Construction output total							_		
annual change in % (real)	17.9	47.4	28.6	15.3		•	7	12	14
Private consumption, KZT bn, nom.	3054	3686	4547	5468			6400	7500	8900
annual change in % (real)	14.1	10.9	12.7	11.0			6	8	10
Gross fixed capital form., KZT bn, nom.	1472	2123	3084	8948			11500	14300	17600
annual change in % (real)	22.5	28.1	29.7	17.8	7.1	16.1	10	12	14
LFS - employed persons, th, avg.	7181.8	7261.0	7403.5	7631.8	7490	7876			
annual change in %	2.8	1.1	2.0	3.1	2.8	2.9			
Reg. employees in industry, th pers., avg.	869.6	891.8	904.5	940					
annual change in %	1.7	2.6	1.4	3.9					
LFS - unemployed, th pers., average	658.8	640.7	625.4	578.8					
LFS - unemployment rate in %, average	8.4	8.1	7.8	7.0		•	7.5	7	6
Reg. unemployment rate in %, end of period	1.6	1.3	1.1	0.8		•	•	•	•
Average gross monthly wages, KZT	28329	34060	40790	53238	50910	58599			
annual change in % (real, gross)	14.6	11.7	10.3	17.8		1.5			
Consumer prices % p.a	6.9	76	86	10.8	63	13/	11	9.5	٩
Producer prices in industry % p.a.	16.7	23.7	18.4	12.4	12.2	20.8	18	9.5 12	9
		_0				20.0			•
General governm.budget, nat.def., % GDP				~~ ~					
Revenues and grants	24.6	28.1	27.9	22.6	•	•	•	•	•
Expenditures and net lending	22.1	22.3	20.4	24.3					17
Deficit (-) / Surpius (+), % GDP	2.0	0.0	1.0	-1.7	•	•	1.2	1.5	1.7
	3.9	9.5	11.5	1.2	•	•		•	
Refinancing rate of NB % p.a., end of period	7.0	8.0	9.0	9.0	7.0	11.0		•	
Current account, EUR mn ²⁾	269.9	-848.1	-1525.3	-5245.9	-321.2		-3600	-4400	-4300
Current account in % of GDP	0.8	-1.8	-2.4	-6.9	-2.1		-4.1	-3.8	-3.0
Gross reserves of NB excl. gold, EUR mn ²	6810	5965	14525	11970	16305	12434			
Assets of the National Oil Fund, EUR mn ²⁷	4129	6486	11227	15340	12127	15442		•	
Gross external debt, EUR mn	24013.1	36643.3	56252.3	65435.6	61943.2	•	•	•	•
Gross external debt in % of GDP	09.1	1502 5	87.8 4059.0	80.0	1002.2			•	•
FDI outflow, EUR mn ²⁾	-1029.3	-117.2	-308.7	2308.1	429.9			•	
Exports of goods ROP EUP mp ^{2}	16591 0	22722 E	30880 0	35307 1	7764 0		44100	52000	61400
annual growth rate in %	10501.0 /1 /	22733.3	35.8	1/1 3	36.6		25	18	18
Imports of goods BOP EUR mn ²⁾	11120.2	14442.2	19216.1	24250.6	4982.9	•	29800	35800	42200
annual growth rate in %	31.3	29.9	33.1	26.2	58.8		23	20	18
Exports of services, BOP, EUR mn ²⁾	1617.0	1790.1	2236.7	2593.9	546.8		3000	3500	4000
annual growth rate in %	6.6	10.7	25.0	16.0	24.0		17	15	15
Imports of services, BOP, EUR mn ²⁾	4110.7	6021.2	6946.7	8414.4	1551.7		9800	12000	14600
annual growth rate in %	23.6	46.5	15.4	21.1	5.6		17	22	22
Average exchange rate KZT/USD	136.04	132.88	126.09	122.50	124.85	120.45	120.5	118.1	116.9
Average exchange rate KZT/EUR (ECU)	169.04	165.42	158.27	167.75	163.49	180.36	180.8	165.3	157.8
Purchasing power parity KZT/USD, wiiw ³⁾	50.44	57.61	67.42	75.95					
Purchasing power parity KZT/EUR, wiiw ³⁾	59.95	68.11	80.19	93.17	.		.		

1) Preliminary and wiw estimates. - 2) Converted from USD. - 3) Based on ICP benchmark results 2005 and wiw estimates. Source: National statistics; World Bank; wiw forecasts.



Waltraut Urban

China: how to curb inflation while sustaining growth?

In the first quarter of 2008, the Chinese GDP expanded at a rate of 10.6%, less than in the same quarter of last year (11.1%) and in 2007 on average (11.9%), but still faster than expected. The deceleration of foreign demand was largely compensated by accelerated growth of domestic demand, consumption as well as investment in fixed assets. Probably, the slowing down of the global economy will have a significant impact on the Chinese economy only in the months to come. Rapidly rising consumer and producer prices in China are raising concern and call for action. China's decision makers must now balance inflationary pressures against the weakening global economic outlook.

Taking into account the recent upward revision of GDP growth in 2007 (from 11.4% to 11.9%) and assuming a certain decoupling of Asia from the US-led global economic downturn, we expect the Chinese economy to expand at a rate of 10% in 2008, 9.7% in 2009 and resuming growth of about 10% in 2010, in line with the expected recovery of the world economy.

Limited impact of natural disasters on overall growth

In January and February, the southern part of China including the province of Guangdong, an industrial and export hub as well as an important supplier of fruit and vegetables, was hit by unprecedented low temperatures and winter storms; this has contributed to the slowing down of the overall economy in the first quarter to a certain extent. In May, a disastrous earthquake killed more than 80,000 people and destroyed the homes of about 5 million inhabitants as well as important infrastructure in the central province of Sichuan. The loss of output as a consequence of the disaster, however, is negligible from an overall point of view – Sichuan being one of the poor and industrially less developed provinces of China, taking a share of only 4% in total GDP; and output and reconstruction of infrastructure will even boost investment and thus economic growth to a certain extent. The impact of the heavy rainfalls starting in June in the South of China as well as in the Yellow River area cannot yet be assessed.

Strong domestic demand compensating slowdown of external demand

Investment in fixed assets rose by 24.6% (in nominal terms) in the first quarter of this year, 0.9 percentage points faster than in the same period of 2007, despite several administrative measures to cool down investment in place for more than a year now. A major driver of investment is investment in real estate and infrastructure associated with urbanization. But also investment growth in rural areas picked up, reaching 18.3%, a rise of 1.6 percentage points. However, as profits

declined sharply in the first quarter of 2008 and less loans will be available for the rest of the year, investment growth may decelerate in the months to come.

Retail trade turnover as a proxy for private consumption increased by 20.6% (in nominal terms), much faster than in the same period of 2007 (14.9%), due to rising prices but faster rising incomes as well. Measured in real terms, the growth of private consumption reached 13.2%, up 0.4 percentage points from the same period of last year.

Food prices driving inflation, but upstream price pressure on the rise

Retail prices rose by 7.4% and the consumer price index increased by 8.0% in the first three months of 2008. This was the highest price rise in the last 11 years and is causing concerns for consumers as well as policy makers in China. The major drivers of inflation were food prices, rising by 21% and contributing 6.8 percentage points to the overall price hike. Increasing costs for housing contributed another percentage point, prices for other categories of commodities witnessed slight rises or drops. After reaching a peak in February (8.7%), consumer price inflation has somewhat eased because of a deceleration of food prices and the inflation rate came down to 7.7% in May. But in the meantime, producer prices have accelerated due to soaring energy and raw material costs and in May the rise of the producer price index hit 8.2%, which can be expected to spill over at least partly to consumer prices, after a certain lag. Thus inflation may well reach 7% for the year 2008 as a whole.

So far, despite price hikes, real per capita incomes have risen very fast, although somewhat less than last year in urban areas (by 12%, down from 14.2%), but much stronger in rural areas (by 19%, up from 13.5%), due to rising prices for agricultural products. However, real wage increases in export-oriented industries, which are under double pressure from the weakening of external demand and the continuous revaluation of the yuan against the US dollar, were significantly lower than last year. Also, poor families, which still take a significant proportion of China's population, were hit over-proportionately by inflation because of the large share of food expenditures in their incomes.

Government policies to curb inflation

Government measures to contain inflation include administrative price caps on the one hand and attempts to absorb liquidity on the other. The central government controls the prices of public utilities and fuels such as gasoline and diesel and has also put pressure on local governments to control the price rise of agricultural products.⁶¹ To absorb excess liquidity and constrain the expansion of bank lending, the Chinese central bank has raised the reserve requirement ratio for commercial banks 5 times in this year already; by the end of June the ratio will stand at 17.5%, which is very high by

⁶¹ Prices for gasoline and diesel were kept constant since November last year despite soaring international crude oil prices, causing a big loss for Chinese refineries. Their losses were partly compensated by state subsidies, but especially smaller oil refineries cut down or even halted production which led to severe shortages of refined petroleum products. Therefore, on 20 June, the government raised prices for gasoline and diesel by 16% and 18% respectively. Electricity prices will go up by 4.7% for commercial units. Certain compensations were notified for producers of grain and for taxi drivers. The retail price for 93-octane gasoline is now 6.09 yuan (57 euro cents) per litre, which is still low by international standards.

international standards.⁶² Notably, the reference interest rate was left untouched to avoid an additional spread of the interest levels between China and the USA, which may attract more 'hot money' and thus liquidity despite existing capital controls. Therefore, real interest rates on deposits in China remain clearly negative and real lending rates are still quite low. To curb the expansion of loans, the government uses lending quotas and a number of regulatory measures rather. The total quota for new loans in 2008 is yuan 4.1 trillion (EUR 381 million) of which 44% have already been taken in the first four month of the year, indicating a certain slowing down of credit growth and thus of domestic demand in the second half of the year.

Weakening demand from the USA and Europe

In the first three months of 2008, export growth in US dollar terms weakened moderately compared to the same period of last year (from 27.8% to 21.4%) and import growth accelerated strongly (from 18.2% to 41.4%), resulting in a significantly lower trade surplus (USD 41.4 billion, -11%) and thus a smaller contribution of net exports to GDP growth than last year. Due to the strong devaluation of the US dollar versus the euro, Chinese exports in euro terms dropped more dramatically, import growth declined as well and the trade surplus showed a significantly stronger reduction (EUR 27.9 billion, -21%). So far, most of China's trade is denominated in US dollar, but recently denomination in euro is gaining importance. The following structural data refer to trade in dollar terms:

The growth of Chinese exports to the USA declined strongly, rising only 5.4% in the first quarter of 2008, compared to 20.4% in the same period a year earlier. But exports to the EU decelerated significantly as well, reaching 24.2%, ten percentage points less than last year when exports had expanded particularly fast. Together, these two regions make up 37% of China's total exports. By contrast, export growth to Asia (including Japan), Africa, Latin America and Oceania remained largely stable, supporting the idea that a 'decoupling' of the emerging markets from the downturn of the established economies is possible to a certain degree. From the Chinese side, export restrictions on grain, certain energy-intensive products (e.g. steel), reduced tax refunds for exports, intensified quality controls and the continued revaluation of the Chinese currency versus the US dollar dampened export growth. In the first three months of this year, the yuan appreciated by 4% versus the US dollar, but depreciated by 3.1% versus the euro. For the rest of the year, a continued and even stronger appreciation of the yuan against the US dollar is expected.

The acceleration of import growth was driven by rising prices for raw materials including agricultural products and the increased import of refined petroleum products because of shortages of these products on the domestic markets. Both tendencies – deceleration of exports and acceleration of imports – will continue, thus the contribution of net exports to GDP growth in 2008 will be significantly smaller than last year.

⁶² According to official estimates, the five increases of the reserve ratios since the beginning of this year have frozen more than 1000 billion yuan of funds, equivalent to one quarter of new loans issued in China in 2007 (China Daily, June 11 2008)

Soaring foreign direct investment despite new regulations

The inflow of foreign direct investment during the first quarter of 2008 amounted to EUR 18.2 billon (USD 27.4 billion), up 40% (61% in US dollar terms), despite various regulations taking effect in 2008 putting foreign investors in a less favourable position than before. On 1 January, a new tax law and a new labour law entered into force. By the new tax law, a unified corporate tax rate of 25% is stipulated for all enterprises (formerly the rate for foreign investment enterprises had been 15% while that for Chinese enterprises 33%). The new Labour Contract Law may raise labour costs due to increased severance payments and extended labour standards and minimum wage regulations. However, the actual fear is that the law will be enforced more strictly on foreign enterprises, thereby putting them in a less competitive position as compared to local entrepreneurs. Nevertheless, the growth potential and profit expectations still seem to outweigh these deteriorations of the business climate, respectively, they are compensated by other improvements such as reported progress in the protection of property rights.

Manufacturing industry loses steam

The slowing down of foreign demand had a moderate but distinct impact on industrial production. Value-added of industry (including construction) expanded at a rate of 11.5% in the first quarter of 2008, compared to 13.2% in the same period a year earlier; value-added of industrial enterprises above a designated size, excluding construction, expanded at a rate of 16.4% (compared to 18.3%). Fears that the appreciation of the yuan would drive out a large number of producers of low value-added standardized products such as clothing, shoes, toys etc. have not materialized on a large scale, notwithstanding several shutdowns and corresponding job losses, in particular in the South of China. Under the assumption of a further slowing down of the global economy, growth of the industrial sector in China will continue to decelerate.

Table CN

China: Selected Economic Indicators

	2004	2005	2006	2007 ¹⁾	2007 1st (2008 quarter	2008	2009 Forecas	2010 st
Population, mn pers., end of period	1299.9	1307.6	1314.5	1321.3					
Gross domestic product, CNY bn, nom. annual change in % (real) GDP/capita (EUR at exchange rate) GDP/capita (EUR at PPP - wiiw)	15987.9 10.1 1094 3040	18386.8 10.4 1374 3460	21087.1 11.1 1606 3920	24953.9 11.9 1816 4490	5028.7 11.1	6149.9 10.6	29200 10	33600 9.7	38400 10
Industrial value added ²⁾ annual change in % (real) Agricultural value added annual change in % (real)	11.1 6.3	11.7 5.2	13.0 5.0	13.4 3.7	13.2 4.4	11.5 2.8			
Retail trade turnover, CNY bn annual change in % (real) Total investment in fixed assets, CNY bn annual change in % (nominal)	5950.1 13.3 7047.7 26.8	6717.7 12.9 8877.4 26.0	7641.0 13.8 10999.8 23.9	8921.0 13.0 13723.9 24.8	2118.8 12.8 1752.6 23.7	2555.5 13.2 2184.5 24.6			
Reg. employment total, mn pers., end of period annual change in % Staff and workers, mn pers., end of period ³⁾ annual change in % Reg. unemployment rate (urban) in %, end of per. ⁴⁾	752.0 1.0 105.8 0.8 4.2	758.3 0.8 108.5 2.6 4.2	764.0 0.8 111.6 2.9 4.1	769.9 0.8 114.3 2.4 4.0	110.3 2.2	112.9 2.4	4.3	4.3	4.2
Average gross annual wages, CNY ⁵⁾ annual change in % (real) ⁶⁾	16024 10.5	18364 12.8	21001 12.7	24717 13.8	22195 15.5	26254 10.3			•
Retail prices, % p.a. Consumer prices, % p.a.	2.8 3.9	0.8 1.8	1.0 1.5	3.8 4.8	2.1 2.7	7.4 8.0	7	6	5
General government budget, nat.def., % GDP Revenues Expenditures Deficit (-) / surplus (+), % GDP	16.5 17.8 -1.3	17.2 18.5 -1.2	18.4 19.2 -0.8	20.6 19.9 0.7	•	- - -			•
Refinancing rate of NB % p.a., end of per. $^{7)}$	3.3	3.3	3.3	3.3	3.3		-		
Current account, EUR bn Current account in % of GDP Gross reserves of NB excl. gold, EUR bn Gross external debt, EUR bn Gross external debt in % of GDP FDI inflow, EUR bn ⁸⁾ FDI outflow, EUR bn ⁸⁾	51.4 3.6 447.7 167.8 11.8 40.3 1.3	128.8 7.2 694.2 238.2 12.5 63.3 9.0	198.9 9.4 810.0 245.4 12.2 62.2 14.2	255.4 10.7 1038.2 373.0 16.0 60.3 13.7	13.0	18.2	240 8.7	270 7.7	300 6.9
Exports of goods total, EUR bn ⁹⁾ annual change in % Imports of goods total, EUR bn ⁹⁾ annual change in % Trade balance of goods, EUR bn ⁹⁾	435.5 12.5 411.9 12.9 23.6	609.3 39.9 527.8 28.1 81.6	771.3 26.6 630.0 19.4 141.3	888.7 15.2 697.5 10.7 191.2	192.5 32.5 157.0 22.60 35.5	203.7 5.8 175.8 12.0 27.9			
Average exchange rate CNY/USD Average exchange rate CNY/EUR Purchasing power parity CNY/USD, wiw ¹⁰⁾ Purchasing power parity CNY/EUR, wiw ¹⁰⁾	8.277 11.276 3.419 4.064	8.206 10.261 3.45 4.079	7.972 10.015 3.451 4.105	7.607 10.426 3.554 4.218	7.761 10.167	7.161 10.754	6.7 10.7	6.5 9.8	6.3 8.8

Note: CNY: ISO code for the Chinese yuan.

1) Preliminary and wiiw estimates. - 2) Including construction. - 3) Staff and workers (on duty) refer to persons who work in state-owned enterprises, urban collectives, shareholding ownership and foreign invested enterprises. - 4) Ratio of registered urban unemployed in per cent of urban employed and unemployed. - 5) Average gross annual wages of staff and workers, defined as: total wages of staff and workers on duty per average number of staff and workers on duty. - 6) Staff and workers cost of living index is used as deflator for calculating real wage (for 2007 and 2008, the consumer price index was used as a deflator instead). - 7) Overnight rate. - 8) Annual data are net investments drawn from the Chinese balance of payments. 2007 data are gross investments given by the Chinese Ministry of Commerce. - 9) According to customs statistics. - 10) wiw estimates based on the 2005 International Comparison Project benchmark (World Bank).

Source: China Statistical Yearbook; China Monthly Statistics; China Daily etc.; wiiw forecasts.

Appendix

Selected Indicators of Competitiveness

Table A/1

Table AVT	~~~	••			(=1.1=)						
	GDP pe	r capita	at curre	ent PPPs	5 (EUR),	from 200	08 at co	nstant P	PPs		
	1991	1995	2000	2004	2005	2006	2007	2008	2009	2010	2015
								and z	ero populat	ion growth p	.a.
Bulgaria	4443	4675	5285	7286	7891	8644	9492	9966	10564	11219	14319
Cyprus Czech Republic	8800	12982	13036	19540	20748	18412	20117	23019	24493	25400 23178	32417 29581
Estonia	5463	5310	8512	12314	14108	16104	17774	17952	18311	18861	24071
Hungary	6777	7339	10379	13674	14385	15287	15983	16382	16939	17668	22549
Latvia	6518	4542	6893	9884	11179	12634	14415	14847	14996	15446	19713
Lithuania	7103	4810	7479	10907	11914	13216	14875	15767	16634	17466	22292
Malta	22857	12697	15925	16655	1/3/6	18110	19286	19787	20282	20789	26533
Romania	4006	4525	4924	7363	7933	9143	9997	10647	11180	11850	15124
Slovak Republic	5816	6923	9535	12357	13563	14994	17004	18279	19376	20539	26213
Slovenia	8535	9823	14964	18427	19459	20661	22429	23393	24399	25570	32635
NMS-12	5454	6250	8552	11011	11709	12762	13978	14691	15411	16197	20672
Croatia	6029	5736	8112	10571	11196	12133	13192	13746	14364	15083	19250
Macedonia	4273	3991	5123	5760	6245	6675	7277	7641	8099	8585	10957
lurkey	3740	4313	7600	8151	8773	9698	10294	10706	11241	11916	15208
Albania	1475	1982	3177	4206	4532	4947	5385	5697	6039	6407	8177
Bosnia & Herzeg.		•	3501	4824	5127	5591	6081	6355	6673	7073	9027
Serbia	•	•	5425 5096	6699 6699	7301	0144 7829	9039 8656	9080	9544	10765	12790
Kenallataa			1107	0033	7001	1023	0000	3003	0000	10021	12730
Kazakhstan	7571	3078	4167	6522 0172	7358	8259	8811 12325	9296	9900 14124	10642	13583
Nussia Ukraine	4635	2624	2836	4458	4719	5218	5804	6181	6552	6945	8864
China	758	1268	2060	3035	3457	3919	4328	4371	4795	4843	6181
								projection	assuming 2	% na GDF	arowth
								and z	ero populat	ion growth p	.a.
Austria	18754	19865	25360	27834	28854	30010	31783	32482	33067	33728	37239
Germany	18013	18912	22564	25187	25798	26862	28363	28874	29307	29893	33004
Greece	12271	12343	16009	20283	21548	22895	24451	24989	25439	25948	28648
Spain	12757	13444	18530	21863	23060	2/703	25018	26/88	26065	27504	30367
USA	21394	23278	30258	33481	35488	37077	38610	38958	39231	40015	44180
ELI(15) average	16060	16060	21802	24443	25278	26/15	27765	28237	28660	20233	32276
EU(25) average	14356	15286	19935	22515	23345	24475	25833	26350	26824	27360	30208
EU(27) average	13670	14591	18990	21602	22424	23558	24893	25416	25898	26416	29166
			Europ	ean Unio	n (27) ave	erage = 10	00				
	1991	1995	2000	2004	2005	2006	2007	2008	2009	2010	2015
Bulgaria	33	32	28	34	35	37	38	39	41	42	49
Cyprus	139	89	89	90	93	92	91	93	95	96	111
Czech Republic	64	69	69	75	76	78	81	83	85	88	101
Estonia	40	36	42	57	63	68	/1 64	/1	/1	/1	83
nungary Latvia	50 48	50 31	24 36	03 46	04 50	60 54	04 58	04 58	00 58	67 58	68
Lithuania	52	33	39	50	53	56	60	62	64	66	76
Malta	167	87	84	77	77	77	77	78	78	79	91
Poland	33	42	48	51	51	52	55	56	58	60	69
Romania	29	31	26	34	35	39	40	42	43	45	52
Slovak Republic	43	45	50	57	60	64	68	72	75	78	90
NMS-12	62 40	00 43	79 45	00 51	07 52	00 54	90 56	92 58	94 60	97 61	71
	40	-0	40	40	50	50	50	50	55		
Macadonia	44	39	43	49	20	52 28	53 20	54 30	55 31	5/	38
Turkev	27	30	40	38	39	41	41	42	43	45	52
Albania	11	1/	17	10	20	21	22	22	22	24	28
Rosnia & Herzeg		14	18	22	20	21	22	22	25	24	31
Montenegro			29	29	30	35	36	38	39	41	47
Serbia			27	31	33	33	35	36	37	38	44
Kazakhstan		21	22	30	33	35	35	37	38	40	47
Russia	55	36	35	42	45	47	50	52	55	57	66
Ukraine	34	18	15	21	21	22	23	24	25	26	30
China	6	9	11	14	15	17	17	17	19	18	21
Austria	137	136	134	129	129	127	128	128	128	128	128
Germany	132	130	119	117	115	114	114	114	113	113	113
Greece	90	85	84	94	96	97	98	98	98	98	98
Fortugal Snain	02	15 Q2	7 Q Q Q	75 101	75 103	74 105	74 104	73 104	73 104	/3 104	10/
USA	157	160	159	155	158	157	155	153	151	151	151
ELI(15) average	117	116	115	112	112	110	110	111	111	111	111
EU(25) average	105	105	105	104	104	104	104	104	104	104	104
EU(27) average	100	100	100	100	100	100	100	100	100	100	100

Sources: National statistics, Eurostat, wiiw estimates.

Table A/2

Indicators of macro-competitiveness, 2000-2007

EUR based, annual averages

	2000	2001	2002	2003	2004	2005	2006	2007
								prelim.
Czech Republic								
Producer price index, 2000=100	100.0	102.8	102.3	101.9	107.7	110.9	112.7	117.3
Consumer price index, 2000=100	100.0	104.7	106.6	106.7	109.7	111.8	114.5	117.8
GDP deflator, 2000=100	100.0	104.9	107.8	108.8	113.8	113.4	114.4	118.6
Exchange rate (ER), CZK/EUR	35.61	34.08	30.81	31.84	31.90	29.78	28.34	27.76
ER nominal, 2000=100	100.0	95.7	86.5	89.4	89.6	83.6	79.6	78.0
Real ER (CPI-based), 2000=100	100.0	107.038	118.1	112.2	112.7	120.4	126.9	130.1
Real ER (PPI-based), 2000=100	100.0	106.184	117.6	112.6	116.1	122.5	124.8	129.4
PPP, CZK/EUR	16.35	16.56	16.76	16.60	16.96	17.02	17.01	17.10
Price level, EU27 = 100	46	49	54	52	53	57	60	62
Average monthly gross wages, CZK	13614	14793	15866	16917	18041	18992	20219	21694
Average monthly gross wages, EUR (ER)	382	434	515	531	565	638	713	781
Average monthly gross wages, EUR (PPP)	833	893	947	1,019	1,064	1,116	1,189	1,269
GDP nominal, CZK mn	2189169	2352214	2464432	2577110	2814762	2983862	3215642	3551364
Employed persons - LFS, th., average ¹⁾	4731.6	4750.2	4764.9	4733.2	4706.6	4764.0	4828.1	4922.0
GDP per employed person, CZK	462670	495182	517205	544481	598046	626335	666026	721529
GDP per empl. person, CZK at 2000 pr.	462670	472202	479682	500295	525659	552169	581944	608513
Unit labour costs, CZK, 2000=100	100.0	106.5	112.4	114.9	116.6	116.9	118.1	121.2
Unit labour costs, ER adj., 2000=100	100.0	111.2	129.9	128.5	130.2	139.8	148.4	155.4
Unit labour costs, PPP adj., Austria=100	31.16	34.17	38.82	37.83	39.00	40.83	42.49	43.69
11								
Hungary					400 -			
Producer price index, 2000=100	100.0	105.2	103.3	105.8	109.5	114.2	121.6	121.9
Consumer price index, 2000=100	100.0	109.2	115.0	120.4	128.6	133.2	138.4	149.5
GDP deflator, 2000=100	100.0	108.5	116.9	123.7	129.1	132.0	137.1	144.5
Exchange rate (ER), HUF/EUR	260.04	256.68	242.97	253.51	251.68	248.05	264.27	251.31
ER, nominal 2000=100	100.0	98.7	93.4	97.5	96.8	95.4	101.6	96.6
Real ER (CPI-based), 2000=100	100.0	108.3	118.0	116.1	122.3	125.8	120.1	133.2
Real ER (PPI-based), 2000=100	100.0	105.4	109.9	107.2	109.3	110.6	105.5	108.5
PPP, HUF/EUR	124.09	128.86	134.43	142.58	149.91	151.91	154.55	158.08
Price level, EU27 = 100	48	50	55	56	60	61	58	63
Average monthly gross wages, HUF	87645	103553	122482	137187	145520	158343	171351	185004
Average monthly gross wages, EUR (ER)	337	403	504	541	578	638	648	736
Average monthly gross wages, EUR (PPP)	706	804	911	962	971	1,042	1,109	1,170
GDP nominal, HUF bn	13151	15270	17181	18941	20718	22042	23795	25406
Employed persons - LFS, th., average	3856.2	3868.3	3870.6	3921.9	3900.4	3901.5	3930.1	3926.2
GDP per employed person, HUF	3410291	3947503	4438744	4829481	5311794	5649744	6054631	6470836
GDP per empl. person, HUF at 2000 pr.	3410291	3639593	3796394	3903242	4113843	4279785	4416537	4479017
Unit labour costs, HUF, 2000=100	100.0	110.7	125.5	136.8	137.6	144.0	151.0	160.7
Unit labour costs, ER adj., 2000=100	100.0	112.2	134.4	140.3	142.2	150.9	148.5	166.3
Unit labour costs, PPP adj., Austria=100	28.29	31.28	36.45	37.49	38.68	40.03	38.63	42.45
Poland								
Producer price index 2000=100	100.0	101 6	102.6	105.3	112 7	113 4	116 1	118 7
Consumer price index 2000=100	100.0	105.5	107.5	108.4	112.2	114.5	115.7	118.5
GDP deflator 2000=100	100.0	103.5	105.9	106.2	110.6	113.6	115.3	119.1
Exchange rate (FR) PLN/EUR	4 011	3 669	3 856	4 398	4 534	4 025	3 895	3 783
ER nominal 2000=100	100.0	91.5	96.1	109.6	113.0	100.4	97 1	94.3
Real FR (CPI-based) 2000=100	100.0	112.9	107.2	92.9	91.3	102.8	105.0	108.3
Real FR (PPI-based), 2000=100	100.0	109.8	106.1	94.9	96.3	104.4	105.3	108.3
PPP PI Z/FUR	2 118	2 167	2 140	2 178	2 209	2 244	2 254	2 255
Price level $EU27 = 100$	53	59	56	50	49	56	58	60
Average monthly gross wages PLN	1894	2045	2098	2185	2273	2361	2477	2691
Average monthly gross wages FUR (FR)	472	557	544	497	501	586	636	711
Average monthly gross wages FUR (PPP)	894	944	980	1003	1029	1052	1099	1193
GDP nominal PI N mn	744378	779564	808578	843156	924538	983302	1060031	1167796
Employed persons - LFS the average 2)	14526	14207	13782	13617	13795	14116	14594	15240
GDP per employed person PI N	51245	54872	58669	61921	67021	69661	72637	76626
GDP per empl. person. PI N at 2000 pr	51245	53023	55421	58283	60580	61336	63003	64312
Unit labour costs. PLN, 2000=100	100 0	104 4	102.4	101 4	101 6	104 1	106 4	113.2
Unit labour costs, ER adi 2000=100	100.0	114 1	106.6	92.5	89.8	103.8	109.5	120.1
Unit labour costs, PPP adi., Austria=100	45.01	50.63	45.99	39.34	38.88	43.79	45.32	48.75

1) From 2002 according to census 2001. - 2) From 2003 according to census 2002.

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
Slovak Bopublic								prelim.
Braducer price index 2000=100	100.0	106 E	109.7	117 0	101 0	107 5	120.0	141.0
Consumer price index, 2000–100	100.0	100.5	110.7	120.0	121.0	127.5	138.5	141.0
GDP deflator 2000=100	100.0	107.1	10.0	120.0	123.0	124.5	128.2	129.6
Exchange rate (ER) SKK/EUR	42 59	43 31	42 70	41 49	40.05	38 59	37 25	33 77
ER, nominal, 2000=100	100.0	101.7	100.3	97.4	94.0	90.6	87.5	79.3
Real ER (CPI-based), 2000=100	100.0	103.1	105.8	115.9	126.3	131.8	139.6	154.7
Real ER (PPI-based), 2000=100	100.0	103.5	107.8	119.4	125.1	130.0	139.3	152.9
PPP, SKK/EUR	18.22	18.30	18.61	19.78	20.47	20.33	20.53	20.17
Price level, EU27 = 100	43	42	44	48	51	53	55	60
Average monthly gross wages, SKK	11430	12365	13511	14365	15825	17274	18761	20146
Average monthly gross wages, EUR (ER)	268	286	316	346	395	448	504	597
Average monthly gross wages, EUR (PPP)	628	676	726	726	773	850	914	999
GDP nominal, SKK mn	937964	1018430	1108117	1222483	1361683	1485301	1659573	1851787
Employed persons - LFS, th., average	2101.7	2123.7	2127.0	2164.6	2170.4	2216.2	2301.4	2357.3
GDP per employed person, SKK	446288	479555	520976	564761	627388	670201	721115	785554
GDP per empl. person, SKK at 2000 pr.	446288	456675	477653	491696	515902	538401	562711	606325
Unit labour costs, SKK, 2000=100	100.0	105.7	110.4	114.1	119.8	125.3	130.2	129.7
Unit labour costs, ER adj., 2000=100	100.0	104.0	110.2	117.1	127.4	138.2	148.8	163.6
Unit labour costs, PPP adj., Austria=100	25.27	25.90	26.70	27.95	30.95	32.75	34.57	37.30
Slovenia								
Producer price index, 2000=100	100.0	108.9	114.5	117.3	122.4	125.7	128.5	135.5
Consumer price index, 2000=100	100.0	108.4	116.5	123.1	127.5	130.7	133.9	138.8
GDP deflator, 2000=100	100.0	108.6	116.9	123.5	127.6	129.7	132.3	137.4
Exchange rate (ER), EUR-SIT/EUR	0.8556	0.9063	0.9440	0.9752	0.9968	1.0000	0.9998	1.0000
ER, nominal, 2000=100	100.0	105.9	110.3	114.0	116.5	116.9	116.9	116.9
Real ER (CPI-based), 2000=100	100.0	100.1	101.2	101.5	100.7	100.7	101.0	102.2
Real ER (PPI-based), 2000=100	100.0	101.6	103.1	101.7	101.5	99.3	97.0	99.7
PPP, EUR-SIT/EUR	0.6116	0.6582	0.6885	0.7275	0.7249	0.7253	0.7337	0.7406
Price level, EU27 = 100	/1	/3	/3	/5 1057	1117	1157	1010	1205
Average monthly gross wages, EUR-SIT	000	090	902	1007	1117	1157	1213	1200
Average monthly gross wages, EUR (ER)	1308	900 1360	1/27	1005	1540	1505	1213	1200
GDP nominal FUR-SIT mn	18214	20396	22758	24716	26677	28243	30448	33542
Employed persons - LES the average	901	916	910	897	943	949	961	985
GDP per employed person, EUR-SIT	20215	22267	25009	27554	28290	29761	31684	34053
GDP per empl. person, EUR-SIT at 2000 pr.	20215	20500	21390	22311	22166	22939	23947	24789
Unit labour costs, EUR-SIT, 2000=100	100.0	110.4	116.1	119.7	127.3	127.5	128.0	131.0
Unit labour costs, ER adj., 2000=100	100.0	104.2	105.2	105.0	109.3	109.1	109.5	112.1
Unit labour costs, PPP adj., Austria=100	65.24	67.03	65.83	64.73	68.55	66.73	65.69	65.97
Bulgaria								
Producer price index 2000=100	100.0	103.8	105.0	110 1	116 7	124 8	136.3	148 0
Consumer price index, 2000=100	100.0	100.0	113.6	116.2	123.4	129.6	139.0	150.7
GDP deflator. 2000=100	100.0	106.7	110.7	112.7	118.5	123.0	133.8	144.3
Exchange rate (ER), BGN/EUR	1.9558	1.9558	1.9558	1.9558	1.9558	1.9558	1.9558	1.9558
ER, nominal, 2000=100	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Real ER (CPI-based), 2000=100	100.0	105.1	108.9	109.3	113.6	116.7	122.5	129.8
Real ER (PPI-based), 2000=100	100.0	102.6	104.4	108.8	112.8	115.3	120.1	127.3
PPP, BGN/EUR	0.6196	0.6508	0.6512	0.6594	0.6848	0.7007	0.7417	0.7774
Price level, EU27 = 100	32	33	33	34	35	36	38	40
Average monthly gross wages, BGN	225	240	258	273	292	324	360	431
Average monthly gross wages, EUR (ER)	115	123	132	140	150	166	184	220
Average monthly gross wages, EUR (PPP)	362	369	396	414	427	462	486	555
GDP nominal, BGN mn	26753	29709	32335	34628	38823	42797	49361	56520
Employed persons - LFS, th., average	2794.7	2698.8	2739.6	2834.8	2922.5	2980.0	3110.0	3252.6
GDP per employed person, BGN	9573	11008	11803	12215	13284	14362	15872	17377
Upr per empi. person, BGN at 2000 pr.	9573	10317	10661	10841	11209	116/5	11858	12041
Unit labour costs, BGN, 2000=100	100.0	99.2	103.0	107.5	111.2	118.2	129.6	152.7
Unit labour costs, ER auj., 2000=100	17 14	99.2 16.76	103.0	107.5	10.22	110.2	129.0	102.7
Unit labour costs, FFF auj., Austria=100	17.14	10.70	10.93	17.41	10.33	19.00	20.41	23.01

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
Pomania								prelim.
Producer price index 2000=100	100.0	138 1	169.9	203.0	241.8	267.2	298.1	322.3
Consumer price index, 2000=100	100.0	134.5	164.8	190.0	212.5	231.7	246.9	258.7
GDP deflator, 2000=100	100.0	137.4	169.6	210.2	241.6	271.2	300.5	333.0
Exchange rate (ER), RON/EUR	1.9956	2.6027	3.1255	3.7556	4.0532	3.6234	3.5245	3.3373
ER, nominal, 2000=100	100.0	130.4	156.6	188.2	203.1	181.6	176.6	167.2
Real ER (CPI-based), 2000=100	100.0	100.9	100.8	94.9	96.3	115.0	123.2	133.2
Real ER (PPI-based), 2000=100	100.0	104.7	107.9	106.6	115.0	136.0	148.8	165.7
PPP, RON/EUR	0.7276	0.9572	1.1592	1.3996	1.5445	1.6799	1.7459	1.8796
Price level, EU27 = 100	36	37	37	37	38	46	50	56
Average monthly gross wages, RON	284	422	532	664	818	968	1146	1410
Average monthly gross wages, EUR (ER)	142	162	170	177	202	267	325	422
Average monthly gross wages, EUR (PPP)	390	441	459	474	530	576	656	750
GDP nominal, RON mn	80377	116769	151475	197565	246469	288176	344536	404709
Employed persons - LFS, th., average "	10508.0	10440.0	9234.3	9222.5	9157.6	9146.6	9313.3	9353.3
GDP per employed person, RON	7,649	11,185	16,404	21,422	26,914	31,506	36,994	43,269
GDP per empl. person, RON at 2000 pr.	7649	8138	9674	10190	11139	11618	12311	12994
Unit labour costs, RON, 2000=100	100.0	139.7	148.1	1/5.4	197.8	224.4	250.7	292.2
Unit labour costs, ER adj., 2000=100	100.0	107.1	94.0	93.2	97.4	123.0	141.9	1/4./
Offit labour costs, FFF auj., Austria-100	31.23	52.97	20.32	27.50	29.25	30.19	40.75	49.24
Estonia								
Producer price index, 2000=100	100.0	104.4	104.8	105.0	108.1	110.3	115.3	124.9
Consumer price index, 2000=100	100.0	105.8	109.6	111.0	114.4	119.1	124.3	132.5
GDP deflator, 2000=100	100.0	105.3	109.3	114.2	116.3	123.5	131.1	143.8
Exchange rate (ER), EEK/EUR	15.647	15.647	15.647	15.647	15.647	15.647	15.647	15.647
ER, nominal, 2000=100	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Real ER (CPI-based), 2000=100	100.0	103.5	105.1	104.4	105.3	107.3	109.6	114.1
Real ER (PPI-based), 2000=100	100.0	103.2	104.2	103.8	104.4	102.0	101.6	107.4
PPP, EENEUR	0.191	0.000	0.741	0.090	9.025	9.230	9.570	10.200
Average monthly gross wages EEK	J2 1007	5510	6144	6723	7287	8073	0/07	10000
Average monthly gross wages, ELIR (ER)	314	352	303	430	466	516	601	697
Average monthly gross wages, EUR (PPP)	599	634	703	756	808	874	983	1 069
GDP nominal FFK mn	95491	108218	121372	136010	149923	175392	207061	243252
Employed persons - LFS, th., average	572.5	577.7	585.5	594.3	595.5	607.4	646.3	655.3
GDP per employed person, EEK	166797	187326	207297	228858	251760	288759	320380	371207
GDP per empl. person, EEK at 2000 pr.	166797	177965	189676	200401	216512	233832	244341	258123
Unit labour costs, EEK, 2000=100	100.0	105.2	110.1	114.0	114.4	117.4	130.9	143.5
Unit labour costs, ER adj., 2000=100	100.0	105.2	110.1	114.0	114.4	117.4	130.9	143.5
Unit labour costs, PPP adj., Austria=100	35.53	36.86	37.52	38.28	39.08	39.10	42.74	46.01
Latvia								
Producer price index. 2000=100	100.0	101.7	102.7	106.0	115.1	124.1	136.9	158.9
Consumer price index, 2000=100	100.0	102.5	104.4	107.5	114.1	121.8	129.7	142.8
GDP deflator, 2000=100	100.0	101.7	105.4	109.1	116.8	128.7	141.4	160.1
Exchange rate (ER), LVL/EUR	0.5600	0.5627	0.5826	0.6449	0.6711	0.7028	0.7028	0.7028
ER, nominal, 2000=100	100.0	100.5	104.0	115.2	119.8	125.5	125.5	125.5
Real ER (CPI-based), 2000=100	100.0	99.8	96.2	87.7	87.7	87.4	91.1	98.0
Real ER (PPI-based), 2000=100	100.0	100.1	98.2	90.9	92.8	91.4	96.1	108.9
PPP, LVL/EUR	0.2865	0.2894	0.2920	0.3062	0.3252	0.3522	0.3865	0.4254
Price level, EU27 = 100	51	51	50	47	48	50	55	61
Average monthly gross wages, LVL	150	159	173	192	211	246	302	398
Average monthly gross wages, EUR (ER)	267	283	297	298	314	350	430	566
Average monthly gross wages, EUR (PPP)	522	549	592	629	649	698	782	935
GDP nominal, LVL mn	4685.7	5219.9	5758.3	6392.8	/434.5	9059.1	11171.7	13957.4
Employed persons - LFS, In., average	941.1	962.1	989.0	1006.9	7005	1035.9	1087.6	1119.0
GDP per employed person, LVL	4979	5426 5325	5622	0349 5010	1305	0/45 6700	10272	124/3
Unit labour costs 1 1/1 2000-100	49/9	0000	104 0	110.2	0200 110 0	120 /	1200	170.0
Unit labour costs, EVE, 2000-100	100.0	99.2 08 8	104.2	05.7	02.7	05.0	110 /	125 /
Unit labour costs, PPP adi., Austria=100	35.44	34.50	34.05	32.03	31.92	31.87	35.97	43.30
		000	000	02.00	002	0	00.07	

3) Methodological break in 2001/2002.

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
Lithuania								prelim.
Litnuania	100.0	07.0	04.0	00.0	00.4	110.0	440.4	407.4
Producer price index, 2000=100	100.0	97.0	94.3 101.6	93.8	99.4 101.6	110.9	119.1	127.4
GDP deflator 2000=100	100.0	99.7	90 8	98.9	101.0	104.3	100.2	114.4
Exchange rate (ER) TI /FUR	3 6990	3 5849	3 4605	3 4528	3 4528	3 4528	3 4528	3 4528
ER. nominal. 2000=100	100.0	96.9	93.6	93.3	93.3	93.3	93.3	93.3
Real ER (CPI-based), 2000=100	100.0	102.3	104.1	101.1	100.2	100.7	102.2	105.5
Real ER (PPI-based), 2000=100	100.0	98.9	100.2	99.3	102.9	109.8	112.4	117.4
PPP, LTL/EUR	1.7451	1.7029	1.6622	1.6213	1.6703	1.7547	1.8260	1.9267
Price level, EU27 = 100	47	48	48	47	48	51	53	56
Average monthly gross wages, LTL	971	982	1014	1073	1149	1276	1496	1813
Average monthly gross wages, EUR (ER)	262	274	293	311	333	370	433	525
Average monthly gross wages, EUR (PPP)	556	577	610	662	688	727	819	941
GDP nominal, LTL mn	45674	48585	51971	56804	62587	71380	81905	96740
Employed persons - LFS, th., average	1397.8	1351.8	1405.9	1438.0	1436.3	1473.9	1499.0	1534.2
GDP per employed person, LTL at 2000 an	32675	35941	36967	39502	43575	48430	54640	63055
GDP per empi. person, LTL at 2000 pr.	32675	36034	37041	39950	42927	45152	47796	120.1
Unit labour costs, ET 2000=100	100.0	91.0 04.7	92.1	90.4	90.1	95. I 101 Q	100.0	120.1
Unit labour costs, ER adj., 2000-100	32 33	30 18	30.5	29.57	30.01	30 90	33 54	37 54
	52.55	50.10	50.54	23.57	50.01	50.50	55.54	57.54
	100.0	400.0	100.0	405.4	100.0	440.4	445.0	110.0
Producer price index, 2000=100	100.0	103.6	103.2	105.1	108.8	112.1	115.3	119.3
COnsumer price index, 2000=100	100.0	104.9	100.7	108.0	110.9	114.0	118.2	121.0
GDP defiator, 2000=100	7 6350	7 4600	7 4068	7 5634	7 4052	7 4002	7 3226	7 3362
ER nominal 2000=100	100.0	07.4090	7.4000 07.0	00 1	08.2	06.0	95.0	06.1
Real ER (CPI-based) 2000=100	100.0	104.9	105.4	103.1	104.0	106.5	108.7	109.0
Real ER (PPI-based), 2000=100	100.0	104.5	105.4	104.9	107.1	106.8	106.0	106.8
PPP. HRK/EUR	4.2376	4.3240	4.3768	4.5450	4.5812	4.6520	4.6516	4.6965
Price level, EU27 = 100	56	58	59	60	61	63	64	64
Average monthly gross wages, HRK	4869	5061	5366	5623	5985	6248	6634	7047
Average monthly gross wages, EUR (ER)	638	678	724	743	799	844	906	961
Average monthly gross wages, EUR (PPP)	1149	1170	1226	1237	1306	1343	1426	1500
GDP nominal, HRK mn	152519	165640	181231	198422	214983	231349	250590	275078
Employed persons - LFS, th., average	1553.0	1469.0	1528.0	1536.5	1562.5	1573.0	1586.0	1600.0
GDP per employed person, HRK	98209	112757	118607	129139	137589	147075	158001	171924
GDP per empl. person, HRK at 2000 pr.	98209	108400	110039	115229	118185	122450	127273	133225
Unit labour costs, HRK, 2000=100	100.0	94.2	98.4	98.4	102.1	102.9	105.1	106.7
Unit labour costs, ER adj., 2000=100	100.0	90.3	101.4 61.72	99.4 50.50	104.0	106.2 63.20	109.0	63 50
	03.47	00.24	01.72	39.39	05.50	05.20	03.90	03.39
Macedonia		100.0		100.0				
Producer price index, 2000=100	100.0	102.0	101.1	100.8	101.7	104.9	109.7	111.5
COnsumer price maex, 2000=100	100.0	103.5	107.4	100.7	100.2	100.0	112.3	114.0
Exchange rate (ER) MKD/ELIR	60.73	60.01	60.98	61.26	61 34	61 30	61 10	61 18
ER nominal 2000=100	100.0	100.31	100.30	100.9	101.0	100.9	100.8	100 7
Real ER (CPI-based), 2000=100	100.0	102.9	102.5	101.3	98.6	97.1	98.2	98.2
Real ER (PPI-based), 2000=100	100.0	100.5	100.1	98.7	97.3	96.1	95.9	95.2
PPP, MKD/EUR	22.77	23.15	23.38	23.42	22.66	22.53	22.83	22.80
Price level, EU27 = 100	37	38	38	38	37	37	37	37
Average monthly gross wages, MKD	17958	17886	19025	19950	20771	21330	23036	24136
Average monthly gross wages, EUR (ER)	296	294	312	326	339	348	376	395
Average monthly gross wages, EUR (PPP)	789	773	814	852	917	947	1,009	1,059
GDP nominal, MKD mn	236389	233841	243970	251486	265257	286619	310915	339258
Employed persons - LFS, th., average	549.8	599.3	561.3	545.1	523.0	545.3	570.4	590.2
GDP per employed person, MKD	429919	390185	434620	461351	507189	525662	545079	574786
GDP per empl. person, MKD at 2000 pr.	429919	376587	405486	429324	465791	465104	462400	469651
Unit labour costs, MKD, 2000=100	100.0	113.7	112.3	111.2	106.8	109.8	119.3	123.0
Unit labour costs, EK adj., 2000=100	100.0	113.4	20.70	110.3	105.7	108.8	20.24	122.1
oniciabour cosis, PPP auj., Austria=100	30.13	40.38	30.70	31.04	30.72	30.85	39.31	39.81

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
								prelim.
Albania	400.0	00.0	07.5	00.0		110.0		100.0
Producer prices, manufact.ind., 2000=100	100.0	92.8	97.5	99.3	111.4	116.8	117.7	126.2
Consumer price index, 2000=100	100.0	103.1	108.5	110.9	114.2	110.9	119.8	123.2
	100.0	103.3	105.8	111.5	114.1	117.4	121.0	120.1
Exchange rate (ER), ALL/EUR	132.58	128.47	132.36	137.51	127.67	124.19	123.08	123.62
	100.0	96.9	99.8	103.7	96.3	93.7	92.8	93.2
Real ER (CPI-based), 2000=100	100.0	104.1	07.1	100.5	109.2	112.0	113.7	110.0
Real ER (PPI-based), 2000=100	100.0	94.0	97.1	94.0	57.000	115.2	TTT./	57.000
PPP, ALL/EUR	53.777	54.423	54.374	57.120	57.099	57.404	57.317	57.909
Price level, $EO27 = 100$	41	42	41	42	40	40	4/	47
Average monthly gross wages, ALL	14903	17210	140	21525	24393	20000	20022	34200
Average monthly gross wages, EUR (ER)	270	216	149	100	191	210	204	Z// 501
CDB naminal ALL mn	2/0 500040	50000	30Z	373	427	407	203	000000
Bog employment total the everage ⁵⁾	1067	1066	022711	094090	020	01/3/4	093000	902200
CDP per employed percent ALL	1007	1000	920	923	929	932	934	930
CDP per employed person, ALL at 2000 pr	490302	520027	620576	674007	700504	747466	706054	00001011
GDP per empl. person, ALL at 2000 pr.	490362	529837	039576	6/428/	708581	141400	10000	833342
Unit labour costs, ALL, 2000=100	100.0	106.5	100.7	103.6	112.8	117.5	120.0	134.5
Unit labour costs, ER adj., 2000=100	100.0	109.9	100.9	99.9	117.2	125.5	129.3	144.2
Unit labour costs, PPP adj., Austria=100	28.55	30.94	27.63	26.96	32.16	33.59	33.93	37.16
Bosnia and Herzegovina								
Producer price index, 2000=100								
Consumer price index, 2000=100	100.0	103.2	104.5	105.7	106.5	109.7	116.5	118.3
GDP deflator, 2000=100	100.0	103.6	108.6	110.5	113.1	116.7	123.6	127.8
Exchange rate (ER), BAM/EUR	1.96	1.96	1.96	1.96	1.96	1.96	1.96	1.96
ER, nominal, 2000=100	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Real ER (CPI-based), 2000=100	100.0	101.0	100.2	99.4	98.1	98.9	102.7	101.9
Real ER (PPI-based), 2000=100								
PPP, BAM/EUR	0.809	0.821	0.840	0.852	0.852	0.859	0.890	0.896
Price level, EU27 = 100	41	42	43	44	44	44	46	46
Average monthly gross wages, BAM	539	598	660	717	748	798	869	939
Average monthly gross wages, EUR (ER)	276	306	337	367	382	408	444	480
Average monthly gross wages, EUR (PPP)	666	728	786	842	878	929	976	1,048
GDP nominal, BAM mn	10713.5	11599.2	12829.4	13442.6	15786.0	16927.9	19121.1	20950.0
Employed persons - LFS, th., average ⁶⁾	636	633	632	636	636	640	811.0	849.6
GDP per employed person, BAM	16853	18321	20311	21141	24812	26433	23577	24659
GDP per empl. person, BAM at 2000 pr.	16853	17685	18699	19134	21932	22642	19075	19301
Unit labour costs, BAM, 2000=100	100.0	105.7	110.4	117.2	106.6	110.2	142.4	152.1
Unit labour costs. ER adi., 2000=100	100.0	105.7	110.4	117.2	106.6	110.2	142.4	152.1
Unit labour costs, PPP adj., Austria=100	30.53	31.82	32.31	33.79	31.30	31.54	39.97	41.90
Montonogro								
Reducer price index, 2001=100		100.0	114 E	110 7	106.6	100.0	124.0	145 0
Consumer price index, 2001=100		100.0	114.0	102.0	120.0	129.3	134.0	140.0
CDD defleter 2001-100	02.1	100.0	102.1	123.0	120.0	129.7	100.0	140.2
Bool ED (CDI boood) 2001-100	03.2	100.0	112.0	111.7	110.2	123.3	104.0	140.2
Real ER (CPI-based), 2001=100	63.9	100.0	115.0	110.9	102.0	119.4	120.3	122.0
Real ER (PPI-based), 2001=100		0.00	0.20	0.44	123.0	120.0	0.42	120.4
PPP, EUR	0.32	0.38	0.38	0.41	0.42	0.43	0.42	0.43
Price level, EU27 = 100	32	38	38	41	42	43	42	43
Average monthly gross wages, EUR	151	1/6	251	271	303	320	3//	497
Average monthly gross wages, EUR (PPP)	4/0	467	662	661	/14	/55	893	1159
	1065.7	1295.1	1360.4	1510.1	1669.8	1815.0	2149.0	2422.8
Employed persons - LFS, th., average	230.3	214.4	220.6	200	187.3	1/8.8	1/8.4	217.4
GDP per employed person, EUR	4627	6042	6167	7551	8913	10150	12048	11144
GDP per empl. person, EUR at 2000 pr.	4627	5026	4978	5626	6272	6846	7451	6614
Unit labour costs, EUR, 2000=100	100.0	107.5	154.8	147.7	148.0	146.2	155.3	230.4
Unit labour costs, PPP adj., Austria=100	24.13	25.57	35.83	33.68	34.35	33.09	34.45	50.16

4) Excluding private sector. - 5) From 2002 according to census 2001. - 6) Until 2005 registered employees, from 2006 based on LFS.

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
• • •								prelim.
Serbia								
Producer price index, 2000=100	100.0	187.7	204.2	213.6	233.1	266.1	301.5	319.3
Consumer price index, 2000=100	100.0	193.3	225.4	247.7	275.9	320.6	358.2	383.2
GDP defiator, $2000=100$ Evolution rate (EB), RSD/EUB ⁷⁾	100.0	188.0	234.8	203.0	296.4	340.7	3/0./	407.8
ER nominal 2000=100	100.0	113 1	115 5	123.8	138.1	157.8	160.0	00.09 152.4
Real FR (CPI-based) 2000=100	100.0	167.2	187.1	188.1	183.9	183.1	197.4	216.6
Real ER (PPI-based), 2000=100	100.0	164.0	175.9	170.5	163.0	155.9	166 1	180.2
PPP. RSD/EUR	10.4	19.1	23.3	26.0	28.6	32.2	35.2	37.1
Price level, $EU27 = 100$	20	32	38	40	39	39	42	46
Average monthly gross wages, RSD ⁸⁾	3799	8691	13260	16612	20555	25514	31745	38744
Average monthly gross wages, EUR (ER)	72	146	219	255	283	308	378	484
Average monthly gross wages, EUR (PPP)	366	455	569	639	718	793	902	1044
GDP nominal, RSD mn	397656	783897	1020117	1171564	1431313	1747459	2042048	2376660
Employed persons - LFS, th., average	3094	3106	3000	2919	2931	2733	2631	2656
GDP per employed person, RSD	128538	252414	340014	401414	488362	639296	776240	894916
GDP per empl. person, RSD at 2000 pr.	128538	134245	144836	152601	164763	187637	206073	219439
Unit labour costs, RSD, 2000=100	100.0	219.0	309.8	368.3	422.1	460.1	521.2	597.4
Unit labour costs, ER adj., 2000=100	100.0	193.6	268.3	297.5	305.7	291.6	325.8	391.9
Unit labour costs, PPP adj., Austria=100	13.47	25.70	34.65	37.86	39.58	36.83	40.34	47.63
Russia								
Producer price index, 2000=100	100.0	119.1	133.0	153.8	190.7	230.2	258.7	295.1
Consumer price index. 2000=100	100.0	121.6	141.1	160.2	177.9	200.1	219.5	239.5
GDP deflator, 2000=100	100.0	116.5	134.7	153.5	184.4	219.8	254.4	288.8
Exchange rate (ER), RUB/EUR	26.029	26.130	29.647	34.686	35.814	35.218	34.079	35.010
ER, nominal, 2000=100	100.0	100.4	113.9	133.3	137.6	135.3	130.9	134.5
Real ER (CPI-based), 2000=100	100.0	118.5	118.7	113.1	119.0	133.3	147.8	153.3
Real ER (PPI-based), 2000=100	100.0	117.2	116.1	114.0	133.9	157.2	174.2	188.7
PPP, RUB/EUR	7.535	8.596	9.700	11.021	12.924	15.061	17.038	18.833
Price level, EU27 = 100	29	33	33	32	36	43	50	54
Average monthly gross wages, RUB	2223	3240	4360	5499	6740	8555	10634	13527
Average monthly gross wages, EUR (ER)	85	124	147	159	188	243	312	386
Average monthly gross wages, EUR (PPP)	295	377	450	499	521	568	624	718
GDP nominal, RUB bn	7306	8944	10831	13243	17048	21625	26880	32987
Employed persons - LFS, th., average	65070	65123	66659	66432	67275	68169	68855	70573
GDP per employed person, RUB	112273	137334	162477	199350	253410	31/232	390383	467422
GDP per empi. person, ROB at 2000 pr.	100.0	120 0	120090	129041	2476	200.2	240.0	101000
Unit labour costs, ROB, 2000=100	100.0	130.0	162.0	213.0	247.0	299.0	349.9 267.2	422.0
Unit labour costs, ER duj., 2000-100	13 22	130.2	20.33	20.05	22.88	221.2	207.2	37 /3
	10.22	10.02	20.00	20.00	22.00	27.40	52.45	57.45
Ukraine								
Producer price index, 2000=100	100.0	108.7	112.0	120.5	145.2	169.4	185.7	221.9
Consumer price index, 2000=100	100.0	112.0	112.9	118.8	129.5	147.0	160.4	180.9
GDP deflator, 2000=100	100.0	109.9	115.6	124.9	143.8	179.1	205.6	250.2
Exchange rate (ER), UAH/EUR	5.029	4.814	5.030	6.024	6.609	6.389	6.335	6.918
ER, nominal, 2000=100	100.0	95.7	100.0	119.8	131.4	127.0	126.0	137.6
Real ER (CPI-based), 2000=100	100.0	114.5	108.2	93.2	90.7	104.2	112.2	113.2
Real ER (PPI-based), 2000=100	1 2106	1 2122	1 2460	99.3	100.7	123.2	129.9	138.7
PFF, OAH/EUR Brice level EU27 - 100	1.2190	1.3133	1.3409	1.4500	1.0313	1.9001	2.2200	2.0412
Average monthly gross wages LIAH	24	21	376	462	500	806	10/1	1351
Average monthly gross wages, CAT	200 46	65	75	77	89	126	164	195
Average monthly gross wages, EUR (PPP)	189	237	279	319	361	406	467	512
GDP nominal. UAH mn	170070	204190	225810	267344	345113	441452	544153	712945
Employed persons - LFS, th., average	20175.0	19971.5	20091.2	20163.3	20295.7	20680.0	20730.4	20904.7
GDP per employed person, UAH	8430	10224	11239	13259	17004	21347	26249	34105
GDP per empl. person, UAH at 2000 pr.	8430	9299	9725	10620	11827	11921	12769	13632
Unit labour costs, UAH, 2000=100	100.0	122.5	141.8	159.4	182.6	247.7	298.8	363.0
Unit labour costs, ER adj., 2000=100	100.0	128.0	141.7	133.1	138.9	195.0	237.2	263.9
Unit labour costs, PPP adj., Austria=100	15.27	19.27	20.76	19.21	20.40	27.92	33.29	36.36

7) Black market rate used in 2000. - 8) Until 2000 wiiw estimate.

Table A/2 (ctd.)								
	2000	2001	2002	2003	2004	2005	2006	2007
A								prelim.
Austria								
Producer price index, 2000=100	100.0	101.5	101.1	102.7	107.7	110.0	113.2	117.8
Consumer price index, 2000=100	100.0	102.7	104.5	106.0	108.2	110.7	112.4	114.9
GDP deflator, 2000=100	100.0	101.8	103.2	104.4	106.6	108.5	110.4	113.0
Real ER (CPI-based), 2000=100	100.0	100.5	100.2	99.7	99.6	99.8	99.1	98.9
Real ER (PPI-based), 2000=100	100.0	100.3	100.5	101.5	104.1	101.6	99.8	101.4
PPP, EUR	1.0355	1.0683	1.0481	1.0465	1.0378	1.0327	1.0376	1.0316
Price level, EU27 = 100	104	107	105	105	104	103	104	103
Average monthly gross wages, EUR	2390	2428	2483	2530	2577	2639	2708	2781
Average monthly gross wages, EUR (PPP)	2308	2272	2369	2417	2483	2556	2609	2696
GDP nominal, EUR mn	210392	215878	220841	226175	236149	245330	257897	272669
Employed persons - LFS, th., average ⁸⁾	3686	3711	3762	3794	3744	3824	3928	4028
GDP per employed person, EUR	57083	58169	58701	59622	63074	64149	65651	67695
GDP per empl. person, EUR at 2000 pr.	57083	57162	56872	57086	59177	59116	59453	59928
Unit labour costs, EUR, 2000=100	100.0	101.4	104.3	105.8	104.0	106.6	108.8	110.8
Unit labour costs, PPP adjusted	0.52	0.53	0.54	0.55	0.54	0.55	0.57	0.58

8) From 2004 new methodology.

ER = Exchange Rate, PPP = Purchasing Power Parity, Price level: PPP / ER.

EUR-SIT: SIT divided by fixed parity before 2007 (1 € = .239.64 SIT).

PPP rates have been taken from Eurostat based on the new benchmark results 2005. Albania, Bosnia and Herzegovina, Montenegro and Serbia are integrated in this results for the first time. Available data 2005 and 2006 have been extrapolated by wiw with GDP deflators. Russia and Ukraine are estimated by wiw using the OECD PPP benchmark results 2005 and extrapolation with GDP price deflators.

Sources: National statistics; WIFO; Eurostat; Purchasing power parities, 2005 benchmark year, OECD November 2007; wiiw estimates

Table A/3

Indicators of macro-competitiveness, 2000-2007

annual changes in %

	2000	2001	2002	2003	2004	2005	2006	2007	2000-07
Czech Republic								prelim.	average
GDP deflator Exchange rate (ER), CZK/EUR Real ER (CPI-based) Real ER (PPI-based) Average gross wages, CZK Average gross wages, real (CPI based) Average gross wages, real (CPI based)	1.5 -3.4 5.6 4.1 6.4 1.4 2.4	4.9 -4.3 7.0 6.2 8.7 5.7 3.8	2.8 -9.6 10.3 10.7 7.3 7.8 5.4	0.9 3.3 -5.0 -4.2 6.6 7.0 6.5	4.5 0.2 0.5 3.2 6.6 0.9 3.7	-0.3 -6.6 6.8 5.5 5.3 2.2 3.3	0.9 -4.8 5.4 1.8 6.5 4.8 3.9	3.6 -2.0 2.5 3.7 7.3 3.1 4.4	2.3 -3.5 4.0 3.8 6.8 4.1 4.2
Average gross wages, EUR (ER) Employed persons (LFS) ¹⁾ GDP per empl. person, CZK at 2000 pr. Unit labour costs, CZK at 2000 prices Unit labour costs, ER (EUR) adjusted	10.2 -0.7 4.3 1.9 5.6	13.5 0.4 2.1 6.5 11.2	18.6 0.8 1.1 6.1 17.4	3.2 -0.7 4.3 2.2 -1.1	6.4 -0.6 5.1 1.5 1.3	12.8 1.2 5.0 0.2 7.4	11.9 1.3 5.4 1.0 6.1	9.5 1.9 4.6 2.6 4.8	10.7 0.5 4.0 2.7 6.5
GDP deflator Exchange rate (ER), HUF/EUR Real ER (CPI-based) Real ER (PPI-based) Average gross wages, HUF Average gross wages, real (PPI based) Average gross wages, real (CPI based) Average gross wages, EUR (ER) Employed persons (LFS) GDP per empl. person, HUF at 2000 pr. Unit labour costs, HUF at 2000 prices Unit labour costs, ER (EUR) adjusted	9.7 2.9 4.7 4.0 13.5 1.7 3.4 10.4 1.2 3.9 9.3 6.2	8.5 -1.3 8.3 5.4 18.2 12.3 8.2 19.7 0.3 3.7 13.9 15.4	7.8 -5.3 9.0 4.3 18.3 20.4 12.3 25.0 0.1 4.3 13.4 19.8	5.8 4.3 -1.6 -2.5 12.0 9.4 7.0 7.3 1.3 2.8 8.9 4.4	4.4 -0.7 5.3 1.9 6.1 2.5 -0.7 6.8 -0.5 5.4 0.6 1.4	2.2 -1.4 2.9 1.2 8.8 4.3 5.0 10.4 0.0 4.0 4.6 6.1	3.8 6.5 -4.6 8.2 1.6 4.1 1.6 0.7 3.2 4.9 -1.6	5.4 -4.9 10.9 2.8 8.0 7.8 0.0 13.5 -0.1 1.4 6.5 12.0	5.9 -0.1 4.3 1.5 11.5 7.3 4.8 11.6 0.4 3.6 7.7 7.8
Poland GDP deflator Exchange rate (ER), PLN/EUR Real ER (CPI-based) Real ER (CPI-based) Average gross wages, PLN Average gross wages, real (CPI based) Average gross wages, EUR (ER) Employed persons (LFS) ²⁾ GDP per empl. person, PLN at 2000 pr. Unit labour costs, PLN at 2000 prices Unit labour costs, ER (EUR) adjusted	7.2 -5.1 13.9 8.9 11.6 -1.6 6.0 5.3 11.0	3.5 -8.5 12.9 9.8 8.0 6.3 2.4 18.1 -2.2 3.5 4.4 14.1	2.3 5.1 -5.0 -3.3 2.6 1.6 0.7 -2.4 -3.0 4.5 -1.9 -6.6	0.4 14.1 -13.3 -10.6 4.2 1.5 3.3 -8.7 0.6 3.3 0.8 -11.6	4.1 3.1 -1.7 1.5 4.0 -2.8 0.5 0.9 1.3 3.9 0.1 -2.9	2.7 -11.2 12.6 8.5 3.8 3.1 1.7 17.0 2.3 1.2 2.6 15.5	1.5 -3.2 2.1 0.8 4.9 2.6 3.9 8.4 3.4 2.7 2.1 5.6	3.3 -2.9 3.1 2.8 6.0 11.9 4.4 2.1 6.4 9.6	3.1 -1.4 2.6 2.1 2.5 7.4 0.6 3.4 2.5 3.9
Slovak Republic GDP deflator Exchange rate (ER), SKK/EUR Real ER (CPI-based) Real ER (CPI-based) Average gross wages, sKK Average gross wages, real (CPI based) Average gross wages, real (CPI based) Average gross wages, EUR (ER) Employed persons (LFS) GDP per empl. person, SKK at 2000 pr. Unit labour costs, SKK at 2000 prices Unit labour costs, ER (EUR) adjusted	9.4 -3.5 13.8 10.0 6.5 -3.8 -4.9 10.4 -1.4 2.9 3.6 7.3	5.0 1.7 3.1 3.5 8.2 1.6 1.0 6.4 1.0 2.3 5.7 4.0	3.9 -1.4 2.6 4.2 9.3 7.0 5.8 10.8 0.2 4.6 4.5 6.0	5.3 -2.8 9.5 10.7 6.3 -1.8 -2.0 9.4 1.8 2.9 3.3 6.3	5.9 -3.5 9.0 4.8 10.2 6.5 2.5 14.1 0.3 4.9 5.0 8.8	2.4 -3.6 4.3 3.9 9.2 4.3 6.3 13.3 2.1 4.4 4.6 8.5	2.9 -3.5 5.9 7.1 8.6 0.2 3.9 12.5 3.8 4.5 3.9 7.7	1.1 -9.3 10.8 9.8 7.4 5.3 4.4 18.4 2.4 7.8 -0.3 9.9	4.5 -3.3 7.3 6.7 8.2 2.3 2.1 11.9 1.3 4.3 3.8 7.3
Slovenia GDP deflator Exchange rate (ER), EUR-SIT/EUR Real ER (CPI-based) Real ER (PPI-based) Average gross wages, EUR-SIT Average gross wages, real (PPI based) Average gross wages, real (CPI based) Average gross wages, EUR (ER) Employed persons (LFS) GDP per empl. person, EUR-SIT at 2000 pr. Unit labour costs, EUR-SIT at 2000 prices Unit labour costs, ER (EUR) adjusted	5.6 5.9 0.9 -2.6 10.6 2.8 1.6 4.5 1.7 2.4 8.0 2.0	8.6 5.9 0.1 1.6 11.9 2.8 3.3 5.7 1.7 1.4 10.4 4.2	7.6 4.2 1.1 1.5 9.7 4.4 2.1 5.3 -0.7 4.3 5.2 1.0	5.6 3.3 -1.4 7.5 4.9 1.8 4.1 -1.4 4.3 3.1 -0.2	3.3 2.2 -0.8 -0.2 5.7 1.3 2.0 3.4 5.1 -0.7 6.4 4.1	1.7 0.3 0.0 -2.1 3.6 0.9 1.1 3.3 0.6 3.5 0.1 -0.2	2.0 0.0 -2.4 4.8 2.5 2.3 4.8 1.3 4.4 0.4 0.4	3.8 0.0 1.2 2.8 5.9 0.5 2.3 5.9 2.5 3.5 3.5 2.3 2.3	4.8 2.7 0.4 -0.4 7.5 2.5 2.0 4.6 1.3 2.9 4.4 1.7

1) From 2002 according to census 2001. - 2) From 2003 according to census 2002.

Table A/3 (ctd.)									
	2000	2001	2002	2003	2004	2005	2006	2007	2000-07
Bulgaria								preim.	average
GDP deflator	6.7	6.7	3.8	1.8	5.2	3.8	8.8	7.8	5.5
Exchange rate (ER), BGN/EUR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Real ER (CPI-based)	8.2	5.1	3.7	0.3	3.9	2.8	5.0	5.9	4.3
Real ER (PPI-based)	12.6	2.6	1.8	4.2	3.7	2.2	4.2	6.0	4.6
Average gross wages, BGN Average gross wages, real (PPI based)	-5.0	6.9 3.0	7.3	0.1	7.0	10.7	11.3	19.7	10.0
Average gross wages, real (CPI based)	-5.0	-0.4	14	3.7	0.9	5.0	3.8	10.2	3.2
Average gross wages, EUR (ER)	11.7	6.9	7.3	6.1	7.0	10.7	11.3	19.7	10.0
Employed persons (LFS)	-2.8	-3.4	1.5	3.5	3.1	2.0	4.4	4.6	1.6
GDP per empl. person, BGN at 2000 pr.	8.4	7.8	3.3	1.7	3.4	4.2	1.6	1.5	4.0
Unit labour costs, BGN at 2000 prices	3.0	-0.8	3.9	4.3	3.5	6.3	9.6	17.9	5.8
Unit labour costs, ER (EUR) adjusted	3.0	-0.8	3.9	4.3	3.5	6.3	9.6	17.9	5.8
Romania									
GDP deflator	44.2	37.4	23.4	24.0	14.9	12.2	10.8	10.8	21.7
Exchange rate (ER), ROL/EUR	22.5	30.4	20.1	20.2	7.9	-10.6	-2.7	-5.3	9.4
Real ER (CPI-based)	16.7	0.9	0.0	-5.9	1.5	19.4	7.2	8.1	5.7
Average grees wages, POI	20.1	4.7	3.0	-1.Z	7.9	18.2	9.4 10 4	22.0	9.0
Average gross wages, ROL Average gross wages, real (PPI based)	47.0	40.0	20.1	24.0 1 1	23.3	10.3	10.4	23.0	20.3
Average gross wages, real (CPI based)	-5.7	10.5	2.5	4.4 8.2	10.2	8.5	11 1	17.0	8.7
Average gross wages, EUR (ER)	20.7	13.9	5.0	3.8	14.2	32.3	21.7	29.9	17.3
Employed persons (LFS) ³⁾	-0.3	-0.6		-0.1	-0.7	-0.1	1.8	0.4	0.0
GDP per empl. person, ROL at 2000 pr. ³⁾	2.4	6.4		5.3	9.3	4.3	6.0	5.5	4.9
Unit labour costs, ROL at 2000 prices ³⁾	44.4	39.7		18.4	12.8	13.4	11.7	16.6	18.8
Unit labour costs, ER (EUR) adjusted ³⁾	17.9	7.1		-1.4	4.5	26.9	14.9	23.1	11.2
Estonia									
GDP deflator	4.4	5.3	3.8	4.5	1.8	6.2	6.2	9.7	5.2
Exchange rate (ER), EEK/EUR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Real ER (CPI-based)	2.1	3.5	1.5	-0.6	0.8	1.9	2.2	4.1	1.9
Real ER (PPI-based)	0.5	3.2	1.0	-0.4	0.6	-2.4	-0.3	5.7	1.0
Average gross wages, EEK	10.5	12.3	11.5	9.4	8.4	10.8	16.5	15.9	11.9
Average gross wages, real (CPI based)	5.4	7.0	76	9.2	5.3	8.5 6.4	11.5	7.0	8.Z
Average gross wages, Fear (CFF based)	10.5	12.3	11.5	9.4	8.4	10.8	16.5	15.9	11.9
Employed persons (LES)	-1.2	0.9	14	1.5	0.1	2.0	6.4	14	1.6
GDP per empl. person, EEK at 2000 pr.	10.8	6.7	6.6	5.7	8.0	8.0	4.5	5.6	7.0
Unit labour costs, EEK at 2000 prices	-0.3	5.2	4.6	3.6	0.3	2.6	11.5	9.7	4.6
Unit labour costs, ER (EUR) adjusted	-0.3	5.2	4.6	3.6	0.3	2.6	11.5	9.7	4.6
Latvia									
GDP deflator	2.8	1.7	3.6	3.6	7.0	10.2	9.9	13.3	6.4
Exchange rate (ER), LVL/EUR	-10.2	0.5	3.5	10.7	4.1	4.7	0.0	0.0	1.5
Real ER (CPI-based)	12.1	-0.2	-3.6	-8.8	-0.1	-0.3	4.2	7.6	1.2
Real ER (PPI-based)	7.4	0.1	-1.9	-7.4	2.1	-1.6	5.2	13.3	2.0
Average gross wages, LVL	6.1	6.3	8.8	11.3	9.6	16.5	23.0	31.5	13.8
Average gross wages, real (PPI based)	5.4	4.6	7.7	7.8	0.9	8.1	11.6	13.3	7.4
Average gross wages, real (CPI based)	3.4	3.7	6.8	8.1	3.2	9.2	15.5	19.4	8.5
Average gross wages, EUR (ER)	18.1	5.8 2.2	5.1 2.9	0.5	5.3 1 1	11.2	23.0	31.5	12.2
GDP per empl. person 1 VI at 2000 pr	-2.0	5.7	2.0	53	7.5	8.7	6.9	2.9	6.8
Unit labour costs 1 VL at 2000 prices	-3.6	0.6	5.0	5.7	1.0	72	15.1	22.7	6.5
Unit labour costs, ER (EUR) adjusted	7.4	0.1	1.5	-4.5	-2.1	2.4	15.1	22.7	5.0
Lithuania									
GDP deflator	0.5	-0.3	0.1	-0.9	2.7	5.7	6.6	8.6	2.8
Exchange rate (ER), LTL/EUR	-13.4	-3.1	-3.5	-0.2	0.0	0.0	0.0	0.0	-2.6
Real ER (CPI-based)	14.4	2.3	1.8	-2.9	-0.9	0.5	1.5	3.3	2.4
Real ER (PPI-based)	28.4	-1.1	1.3	-0.9	3.7	6.6	2.4	4.4	5.3
Average gross wages, LTL	-1.7	1.2	3.2	5.8	7.2	11.0	17.2	21.2	7.9
Average gross wages, real (PPI based)	-15.2	4.3	6.2	6.3	1.1	-0.4	9.1	13.3	2.7
Average gross wages, real (CPI based)	-2.7	-0.1	2.9	7.1	5.9	8.1	13.0	14.7	6.0
Average gross wages, EUR (ER)	13.5	4.4	6.9	6.0	1.2	11.0	17.2	21.2	10.8
CDP per emply person LTL at 2000 pr	-4.U	-3.3 10.2	4.U 2.0	2.3 7.0	-0.1	2.0 5.0	1.7	2.3	0.7
Unit labour costs TL at 2000 prices	-9.4	-8.2	∠.0 ∩ 4	-19	-0.3	5.2	10.7	0.3 14 1	0.7
Unit labour costs, ER (EUR) adjusted	4.7	-5.3	4.0	-1.7	-0.3	5.6	10.7	14.1	3.8

3) In 2002 no comparable growth rates available due to methodological break in employment. Average 2000-2007 is calculated without 2002.

Table A/3 (ctd.)									
	2000	2001	2002	2003	2004	2005	2006	2007	2000-07
Creatia								prelim.	average
	4 7	4.0	2.6	1.0	2.0	2.2	2.4	2.0	2.0
Exchange rate (ER) HRK/EUR	4.7	-2.2	-0.8	4.0	-0 9	3.Z	-1 0	0.2	-0 4
Real FR (CPI-based)	3.5	49	-0.0	-2.1	-0.3	24	2.0	0.2	-0
Real ER (PPI-based)	4.4	4.7	1.0	-0.9	2.1	-0.2	-0.8	0.7	1.4
Average gross wages, HRK	7.0	3.9	6.0	4.8	6.4	4.4	6.2	6.2	5.6
Average gross wages, real (PPI based)	-2.5	0.3	6.5	2.8	2.8	1.4	3.2	2.7	2.1
Average gross wages, real (CPI based)	0.7	-0.9	4.3	2.9	4.3	1.0	2.9	3.2	2.3
Average gross wages, EUR (ER)	6.2	6.3	6.9	2.6	7.4	5.7	7.3	6.0	6.0
Employed persons (LFS)	4.1	-5.4	4.0	0.6	1.7	0.7	0.8	0.9	0.9
GDP per empl. person, HRK at 2000 pr.	-1.1	10.4	1.5	4.7	2.6	3.6	3.9	4.7	3.7
Unit labour costs, HRK at 2000 prices	8.2	-5.8	4.4	0.1	3.8	0.8	2.2	1.5	1.8
Unit labour costs, ER (EUR) adjusted	7.4	-3.7	5.3	-2.0	4.7	2.1	3.2	1.3	1.3
Macedonia									
GDP deflator	8.2	3.6	3.4	0.3	1.3	3.8	4.3	3.8	3.6
Exchange rate (ER), MKD/EUR	0.2	0.3	0.1	0.5	0.1	-0.1	-0.2	0.0	0.1
Real ER (CPI-based)	3.6	2.9	-0.4	-1.2	-2.6	-1.6	1.2	-0.1	0.2
Real ER (PPI-based)	5.9	0.5	-0.4	-1.4	-1.4	-1.2	-0.1	-0.7	0.1
Average gross wages, MKD	9.0	-0.4	6.4	4.9	4.1	2.7	8.0	4.8	4.9
Average gross wages, real (PPI based)	-1.5	-2.4	7.3	5.2	3.2	-0.5	3.3	3.0	2.2
Average gross wages, real (CPI based)	3.1	-5.6	4.5	3.6	4.5	2.2	4.6	2.4	2.4
Average gross wages, EUR (ER)	8.8	-0.7	6.3	4.4	4.0	2.8	8.2	4.8	4.8
Employed persons (LFS)	0.8	9.0	-6.3	-2.9	-4.1	4.3	4.6	3.5	1.0
GDP per empl. person, MKD at 2000 pr.	3.0	-12.4	1.7	5.9	8.5	-0.1	-0.6	1.0	1.0
Unit labour costs, MRD at 2000 prices	5.2	13.7	-1.2	-1.0	-4.0 -4.2	2.0	0.0 8.8	3.2	3.3
	0.0					2.0	0.0	0.2	0.2
Albania									
GDP deflator	4.0	3.3	2.4	5.4	2.4	2.8	3.6	3.8	3.4
Exchange rate (ER), ALL/EUR	-9.8	-3.1	3.0	3.9	-7.2	-2.7	-0.9	0.4	-2.1
Real ER (CPI-based)	8.8	4.1	0.0	-3.5	8.6	3.0	1.1	0.1	2.7
Real ER (PPI-based)	13.1	-5.4	2.0	-2.0	18.1	3.1	-3.1	4.3	3.5
Average gross wages, ALL	10.5	15.1	14.2	0.0 6 5	14.4	9.9	7.5 6.9	10.7	13.2
Average gross wages, real (CPI based)	10.5	2 4 .0 11.6	8.5	0.J 6 1	2.0	4.0	5.0	15.3	10.2
Average gross wages, FUR (FR)	30.5	18.8	10.8	4.4	23.2	13.0	8.5	18.1	15.6
Registered employment, total ⁴⁾	-0.8	-0.1	-0.1	0.3	0.6	0.3	0.2	0.1	0.1
GDP per empl. person, ALL at 2000 pr.	7.5	8.1	4.3	5.4	5.1	5.5	5.3	5.9	5.9
Unit labour costs, ALL at 2000 prices	9.5	6.5	9.5	2.9	8.9	4.2	2.1	12.1	6.9
Unit labour costs, ER (EUR) adjusted	21.4	9.9	6.3	-1.0	17.2	7.1	3.0	11.6	9.2
Bosnia and Herzegovina									
GDP deflator	4 1	36	48	17	24	32	59	34	36
Exchange rate (ER), BAM/EUR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Real ER (CPI-based)	2.9	1.0	-0.8	-0.8	-1.3	0.8	3.9	-0.8	0.6
Real ER (PPI-based)									
Average gross wages, BAM	7.2	10.9	10.4	8.6	4.3	6.7	8.9	8.1	8.1
Average gross wages, real (PPI based)					•	•			
Average gross wages, real (CPI based)	2.2	7.5	9.0	7.5	3.5	3.6	2.5	6.5	5.2
Average gross wages, EUR (ER)	7.2	10.9	10.4	8.6	4.3	6.7	8.9	8.1	8.1
Employed persons (LFS) ³⁾	-0.8	-0.4	-0.2	0.7	0.1	0.7	1.1	4.8	0.7
GDP per empl. person, BAM at 2000 pr.	6.4	4.9	5.7	2.3	14.6	3.2	5.5	1.2	5.4
Unit labour costs, BAM at 2000 prices	0.7	5.7	4.4	6.2	-9.0	3.3	3.2	6.8	2.6
Unit labour costs, ER (EUR) adjusted	0.7	5.7	4.4	0.2	-9.0	3.3	3.2	0.0	2.0
Montenegro									2001-07
GDP deflator		20.2	3.1	8.3	5.9	4.3	9.1	4.2	7.7
Real ER (CPI-based)		19.1	13.6	4.7	0.3	0.1	0.8	1.8	5.5
Real ER (PPI-based)			15.2	3.8	3.5	-2.4	-1.2	5.9	4.0
Average gross wages, EUR	•	16.8	42.6	7.8	11.7	7.8	15.6	31.7	18.6
Average gross wages, real (PPI based)			24.5	3.2	5.6	5.6	11.6	21.4	11.7
Average gross wages, real (CPI based)		-4.1	23.0	1.1	9.1	5.4	12.2	26.4	10.0
CDP per empl persons EUP		-0.9	2.9	-9.3	-0.3	-4.5	-0.3	21.9	-0.8
GDP per empl. person, EUP at 2000 pr	·	30.0 8 6	_1.0	22.4 13.0	10.0	0.1	ιο./ ΩΩ	-7.5	13.4 50
Unit labour costs EUR at 2000 prices		7.5	-1.0 44 0	-4.6	0.2	-1 2	6.0	48.4	0.Z 12 7

4) From 2002 according to census 2001. - 5) Until 2006 based on registered employees.

2000 2001 2002 2003 2004 2005 2007 2001-or prelim. Schale CDP deflator 61.0 86.0 24.9 12.1 12.7 14.9 10.6 8.3 22.4 Real ER (PI-based) -15.7 67.2 11.9 0.6 12.1 2.7.2 4.4 4.6 8.5 6.6 Average gross wages, Rell (PI based) 5.9 2.1 9.8 1.3.4 2.7 2.4.1 4.44 6.6 5.5 Average gross wages, Rell (PI based) 6.2 1.8.4 3.0.9 14.0 11.1 6.8 12.2 4.8.1 Average gross wages, Rell (PI based) 6.2 1.8.4 3.0.9 4.6 1.3.9 9.8 6.5 7.5 Unit labour costs, RSD at 2000 price 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 3.7 13.5 18.8 BCP emptip-based) 19.5 18.5 15.7 14.0 20.1 1.9.2 1.3.1 1.3 1.	Table A/3 (ctd.)									
Serbia cprelim. average GDP defator 81.0 88.0 24.9 12.1 12.7 14.9 10.6 8.3 24.4 Exchange rate (ER), RSD/EUR ⁽⁸⁾ -15.7 67.2 11.9 0.6 -2.2 -0.4 7.8 9.7 7.8 Real ER (PPI-based) -7.2 64.0 7.2 -3.1 -4.4 -4.4 66 8.5 6.6 Average gross wages, real (PI based) -5.9 2.1.9 40.2 19.8 13.4 8.7 9.8 15.2 14.8 Average gross wages, real (PI based) -5.9 2.1.9 40.2 19.4 11.0 6.8 11.4 11.3 2.3 9.4 6.7 14.8 14.4 10.9 1.9 8.6 10.7 -1.9 8.6 7.5 Unit labour costs, RSD at 2000 pr. 4.8 4.4 7.9 5.4 8.0 13.3 9.8 6.5 7.5 Unit labour costs, RSD at 2000 pr. 4.8 4.3 1.4 4.4 9.8 14.6 <th></th> <th>2000</th> <th>2001</th> <th>2002</th> <th>2003</th> <th>2004</th> <th>2005</th> <th>2006</th> <th>2007</th> <th>2000-07</th>		2000	2001	2002	2003	2004	2005	2006	2007	2000-07
Serbia Serbia GDP deflator 81.0 88.0 24.9 12.1 12.7 14.9 10.6 8.3 24.4 Exchange rate (ER), RSDEUR. ^{®1} 109.1 13.1 2.1 7.2 11.6 14.2 7.4 4.4 4.4 6.6 8.5 6.6 Average gross wages, Rell (PP based) -7.2 64.0 7.2 3.1 4.4 4.4 6.6 8.5 6.6 Average gross wages, Rell (PP based) -5.9 21.9 40.2 19.8 13.4 8.7 9.8 10.4 1.1 1.6 11.4 1.4 1.4 1.1 1.4 1.4 1.1 1.4 1.1 1.4 1.1 1.4 1.1 1.4 1.1 1.4 1.1 1.4 1.1 1.3 1.2									prelim.	average
GDP deflator 81.0 88.0 24.9 12.1 12.7 14.9 10.6 8.3 28.4 Real ER (CPI-based) -15.7 67.2 11.9 0.6 -2.2 -0.4 7.8 9.7 7.8 Real ER (PI-based) -7.2 61.0 7.2 3.1 -4.4 4.6 6.8 5.6 Average gross wages, Rel (PI based) -5.9 1.9 40.2 1.8 1.3 8.7 9.8 1.3 4.4 4.4 6.6 8.5 6.6 Average gross wages, Rel (PI based) -5.9 21.9 40.2 4.8 8.7 9.8 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.6 1.5 1.2 1.6	Serbia									
Exchange rate (ER), RSD/EUR ⁶⁹ 1091 13.1 2.1 7.2 11.6 14.2 1.4 -4.7 15.6 Real ER (PP-based) -15.7 67.2 11.9 0.6 -2.2 -0.4 7.8 9.7 7.8 Real ER (PP-based) -7.2 64.0 7.2 -3.1 -4.4 4.4 6.6 8.5 6.6 Nerrage gross wages, real (PP based) -5.9 21.9 40.2 19.8 13.4 8.7 9.8 15.2 14.8 Average gross wages, real (PP based) -5.9 21.9 40.2 19.8 13.4 8.7 9.8 15.2 14.8 Average gross wages, real (PP based) -6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 Average gross wages, real (PP based) -6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 CP erempl, person, RD at 2000 pr. 4.8 10.2 49.5 16.9 10.9 8.6 22.7 2.8 1 25.4 MeV and persons (LFS) -0.3 0.4 -3.4 -2.7 0.4 6.7 -3.8 10.1.9 CP erempl, person, RD at 2000 pr. 4.8 14.4 7.9 5.4 8.0 13.9 9.8 6.5 7.5 Unit labour costs, RD at 2000 pr. 4.8 14.4 7.9 5.4 8.0 13.9 9.8 6.5 7.5 Unit labour costs, RD at 2000 pr. 4.8 14.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, RD at 2000 pr. 4.8 14.9 17.9 5.4 8.0 13.9 19.8 6.5 7.5 Nunt labour costs, RD at 2000 pr. 4.8 14.9 14.6 19.0 13.3 14.6 34.7 Nunt labour costs, RD at 2000 pr. 4.8 14.9 17.0 3.1 7.7 3.2 2.7 3.7 Real ER (PP-based) 19.5 18.5 0.2 4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PP-based) 19.5 18.5 0.2 4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PP-based) 19.5 18.5 0.2 4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PP-based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 9.4 Average gross wages, real (PP based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 9.4 Average gross wages, real (PP based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 5.4 CP based) 20.9 19.9 15.0 11.0 10.4 12.8 13.3 16.6 15.1 5.5 10.1 14.0 00.5 R.B at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 10.1 16.0 TOS R.B at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 10.1 16.0 TOS R.B at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 10.1 16.0 TOS R.B at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0.6 13.5 5.5 5.1 0	GDP deflator	81.0	88.0	24.9	12.1	12.7	14.9	10.6	8.3	28.4
Real ER (PF)-based) -15.7 67.2 11.9 0.6 -2.2 -0.4 7.8 9.7 7.8 Average gross wages, RSD 90.7 128.8 52.6 25.3 2.3.7 2.4.1 2.4.4 4.4 4.6 6.8 8.5 6.6 Average gross wages, real (CPI based) 6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 Average gross wages, real (CPI based) 6.2 18.4 30.9 14.6 10.9 8.6 2.2.7 2.8.1 2.5.4 Employed persons (LFS) -0.3 0.4 -3.4 -2.7 0.4 -6.7 -3.8 10.0 1.9 9.8 6.5 7.5 Unit labour costs, RSD at 2000 prices 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 7.8 8.8 10.0 13.3 14.6 44.7 10.1 10.1 10.1 10.1 10.1 10.1 10.7 13.5 18.6 11.7 13.5 18.8 14.8 13.1 10.0 13.3 14.6 1	Exchange rate (ER), RSD/EUR ⁶⁾	109.1	13.1	2.1	7.2	11.6	14.2	1.4	-4.7	15.6
Real ER (PPI-based) -7.2 64.0 7.2 -3.1 -4.4 -4.4 6.6 8.5 6.6 Average gross wages, real (PPI based) -5.9 21.9 40.2 19.8 13.4 8.7 9.8 15.2 14.8 Average gross wages, real (PPI based) -6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 Average gross wages, real (PPI based) -6.2 18.4 3.0 1.0 9.8 6.2.7 2.8 16.0 10.9 8.6 2.2.7 2.81 25.4 Init labour costs, RSD at 2000 prices 61.9 10.0 41.4 18.9 9.4 6.0 13.3 14.6 3.4 3.3 1.6 7.5 1.5.7 1.3.5 18.8 Exchange rate (ER) 3.8 3.6 1.	Real ER (CPI-based)	-15.7	67.2	11.9	0.6	-2.2	-0.4	7.8	9.7	7.8
Average gross wages, real (PPI based) 90.7 128.8 52.6 25.3 23.7 24.1 24.4 22.0 44.9 Average gross wages, real (PPI based) 6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 Average gross wages, real (CPI based) 6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.9 GDP per empt person, RDS at 2000 prices 61.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 7.4 6.6 17.7 2.0 16.6 CDP per empt person, RDS at 2000 prices 61.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 7.9 Real ER (PI-based) -0.8 0.4 13.5 17.0 3.3 17.7 13.5 18.8 12.0 13.3 14.6 14.8 14.1 14.9 4.4 4.3 17.4 10.8 8.4 13.1 13.3 14.2 14.3 <	Real ER (PPI-based)	-7.2	64.0	7.2	-3.1	-4.4	-4.4	6.6	8.5	6.6
Average gross wages, real (CPI based) -5.9 21.9 40.2 19.8 13.4 8.7 9.8 15.2 14.8 Average gross wages, real (CPI based) 6.2 18.4 30.9 14.0 11.1 6.8 10.2 48.6 10.9 10.9 8.6 22.7 28.1 25.4 IDP per empl. persons (LFS) 0.3 0.4 -3.4 -2.7 0.4 6.6 7.3.8 10.0 -1.9 IDI tabour costs, RSD at 2000 prices 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, ER (EUR) adjusted -13.0 9.8 8.86 10.9 2.7 -4.6 11.7 20.3 16.6 Real ER (PI-based) 19.5 18.5 0.2 -4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PI-based) -0.4 18.7 7.4 17.4 17.4 17.4 17.4 18.4 13.1 4.6 15.1 Average gross wages, real (PI based) -0.4 22.4 20.4 9.1 -1.2	Average gross wages, RSD	90.7	128.8	52.6	25.3	23.7	24.1	24.4	22.0	44.9
Average gross wages, real (CPI based) 6.2 18.4 30.9 14.0 11.1 6.8 11.4 14.1 13.1 Average gross wages, real (CPI based) -0.3 0.4 -3.4 -2.7 0.4 -6.7 -3.8 1.0 -1.9 GDP per empt, person, RSD at 2000 prices 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, ER (EUR) adjusted -13.0 93.6 38.6 10.9 2.7 4.6 11.7 20.3 16.6 Russia GDP deflator 3.7.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.8 Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 1.7 -3.2 2.7 3.7 Real ER (PP-based) -0.4 16.5 7.46 26.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, real (CPI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (CPI based)	Average gross wages, real (PPI based)	-5.9	21.9	40.2	19.8	13.4	8.7	9.8	15.2	14.8
Average gross wages, EUK (EK) -6.8 10.2 49.5 10.9 10.9 8.0 22.7 28.1 25.4 GDP per empl. persons (LFS) 10.00 prices 8.19 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, RSD at 2000 prices 8.19 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, RSD at 2000 prices 8.19 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, RSD at 2000 prices 37.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.8 Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 -1.7 -2.2 2.7 3.7 Real ER (PF-based) -0.4 14.16 7.2 4.5 12.6 10.6 11.5 9.4 Average gross wages, real (PI based) 20.9 19.9 16.0 11.0 10.4 12.8 <t< td=""><td>Average gross wages, real (CPI based)</td><td>6.2</td><td>18.4</td><td>30.9</td><td>14.0</td><td>11.1</td><td>6.8</td><td>11.4</td><td>14.1</td><td>13.9</td></t<>	Average gross wages, real (CPI based)	6.2	18.4	30.9	14.0	11.1	6.8	11.4	14.1	13.9
Employed persons (Lrs) -0.3 0.4 -2.4 0.4 -6.7 -3.8 1.0 -1.9 GDP per employed persons (RD at 2000 prices 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 Unit labour costs, ER (EUR) adjusted -13.0 93.6 38.6 10.9 2.7 -4.6 11.7 20.3 16.6 Russia Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 -1.7 -3.2 2.7 3.7 Real ER (PPI-based) 19.5 18.5 0.2 -4.8 5.3 12.0 10.9 7.7 9.9 Average gross wages, RuB 46.0 45.7 34.6 2.6.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, RuB (PEI based) -0.4 22.4 2.4 9.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (PPI based) 20.9 19.9 16.0 11.0 11.4 12.8 33.3 16.6 15.1 Average gross wages, real (PPI based) .0.4	Average gross wages, EUR (ER)	-8.8	102.2	49.5	16.9	10.9	8.6	22.7	28.1	25.4
Gub per empt. person, RSD at 2000 prices 4.8 4.4 7.9 5.4 6.0 13.9 9.8 6.5 7.5 Unit labour costs, RSD at 2000 prices 81.9 119.0 41.4 18.9 14.6 9.0 13.3 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 34.7 14.6 44.6 14.7 14.7 14.8 14.6 14.7 14.7 14.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.7 13.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.7 14.8 14.8 14.8 14.8 14.8 14.8 <td>Employed persons (LFS)</td> <td>-0.3</td> <td>0.4</td> <td>-3.4</td> <td>-2.7</td> <td>0.4</td> <td>-6.7</td> <td>-3.8</td> <td>1.0</td> <td>-1.9</td>	Employed persons (LFS)	-0.3	0.4	-3.4	-2.7	0.4	-6.7	-3.8	1.0	-1.9
Unit labour costs, ER (EUR) adjusted -13.0 93.6 38.6 10.9 2.7 -4.6 11.7 20.3 16.6 Russia GDP deflator 37.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.6 Russia Russia Russia A.6 0.4 15.7 14.6 17.7 -3.2 2.7 3.7 Real ER (CPI-based) 19.5 18.5 0.2 -4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PI-based) 41.6 17.2 -0.9 -1.8 17.4 11.8 8.4 13.1 Average gross wages, real (PI based) -0.4 22.4 2.4 9.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (CPI based) -0.4 2.2 2.4 0.4 9.1 -1.2 5.2 10.6 11.5 14.6 Average gross wages, real (CPI based) 2.3 7.7 5.9	GDP per empi. person, RSD at 2000 pr.	4.8	4.4	7.9	5.4	8.0	13.9	9.8	0.5	C.)
Unit labour costs, Ex (EUR) adjusted -1.3.0 93.5 38.6 10.9 2.7 4.6 11.7 20.3 16.6 Russia GDP deflator 37.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.8 Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 -1.7 -3.2 2.7 3.7 Real ER (CPI-based) 19.5 18.5 0.2 -4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PI-based) 41.6 17.2 -0.9 -1.8 17.4 10.8 8.4 13.1 Average gross wages, real (PI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (PI based) -0.4 22.4 20.4 9.1 -1.2 25.2 10.6 11.5 9.4 20.5 1.4 GDP depersons (LFS) 3.4 0.1 2.4 1.6 1.1.7 15.5 <	Unit labour costs, RSD at 2000 prices	81.9	119.0	41.4	18.9	14.0	9.0	13.3	14.0	34.7
Russia GDP deflator 37.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.8 Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 1.7 -3.2 2.7 3.7 Real ER (PPI-based) 19.5 18.5 0.2 4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PPI-based) 41.6 17.2 -0.9 -1.8 17.4 17.4 18.8 4.13.1 Average gross wages, real (PPI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (CPI based) 20.9 19.9 16.0 11.0 10.4 28.1 31.6 15.1 Average gross wages, FUB 46.0 17.2 45.2 18.6 7.8 18.7 29.1 28.5 23.8 26.7 Cmp or empl, person, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 20.6	Unit labour costs, ER (EUR) adjusted	-13.0	93.6	38.6	10.9	2.7	-4.6	11.7	20.3	16.6
GDP deflator 37.7 16.5 15.7 14.0 20.1 19.2 15.7 13.5 18.8 Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 -1.7 -3.2 2.7 3.7 Real ER (PPI-based) 11.5 12.0 10.9 3.7 7.9 Real ER (PPI-based) 41.6 17.2 -0.9 -1.8 17.4 17.4 10.8 8.4 13.1 Average gross wages, RuB 46.0 45.7 34.6 26.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, real (PPI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (PI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 10.6 5.5 Employed persons (LFS) 3.4 0.1 2.4 -0.3 1.7.1 15.8 20.9 16.9 20.6 24.6 Unit labour costs, RUB at 2000 prices 37.2 3.8 31.6 17.1 15.5 23.6	Russia									
Exchange rate (ER), RUB/EUR -0.8 0.4 13.5 17.0 3.3 -1.7 -3.2 2.7 3.7 Real ER (CPI-based) 19.5 18.5 0.2 -4.8 7.4 10.8 8.4 13.1 Average gross wages, RUB 46.0 45.7 34.6 26.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, real (CPI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (CPI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 Average gross wages, real (CPI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 Average gross wages, real (CPI based) 3.4 0.1 2.4 0.3 1.3 1.0 2.5 1.4 GDP per empl. person, RUB at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 Unit labour costs, ER (EUR) adjusted 38.3 38.2 15.0	GDP deflator	37.7	16.5	15.7	14.0	20.1	19.2	15.7	13.5	18.8
Real ER (CPI-based) 19.5 18.5 0.2 -4.8 5.3 12.0 10.9 3.7 7.9 Real ER (PPI-based) 41.6 17.2 -0.9 -1.8 17.4 17.4 10.8 8.4 13.1 Average gross wages, RuB 46.0 45.7 34.6 26.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, real (PPI based) -0.4 22.4 20.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (PPI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 10.6 15.1 Average gross wages, EUR (ER) 47.2 45.2 18.6 7.7 5.9 5.0 6.3 5.5 5.5 Unit labour costs, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 20.9 16.9 20.6 24.6 Unit labour costs, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 22.9 2.8 17.4 21.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 <td>Exchange rate (ER), RUB/EUR</td> <td>-0.8</td> <td>0.4</td> <td>13.5</td> <td>17.0</td> <td>3.3</td> <td>-1.7</td> <td>-3.2</td> <td>2.7</td> <td>3.7</td>	Exchange rate (ER), RUB/EUR	-0.8	0.4	13.5	17.0	3.3	-1.7	-3.2	2.7	3.7
Real ER (PPI-based)41.617.2 -0.9 -1.8 17.417.410.88.413.1Average gross wages, real (PPI based)0.422.420.49.1 -1.2 5.210.611.59.4Average gross wages, real (PPI based)20.919.916.011.010.412.813.316.615.1Average gross wages, real (PPI based)20.919.916.011.010.412.813.316.615.1Average gross wages, real (PPI based)3.40.12.4-0.31.31.31.02.51.4GDP per empl. person, RUB at 2000 prices37.23.831.617.115.820.916.920.624.6Unit labour costs, RUB at 2000 prices37.23.831.617.115.820.916.920.624.6Unit labour costs, RUB at 2000 prices37.23.8.331.617.115.820.916.920.624.6Unit labour costs, RUB at 2000 prices37.23.8.331.617.115.82.920.817.420.1Ukraine20.911.112.122.920.817.420.1Schange rate (ER), UAH/EUR14.5-4.34.519.89.7-3.3-0.89.25.8Real ER (PPI-based)1.112.3-0.9-10.77.415.55.46.84.3Average gross wages, real (PPI based)7.324.417.5<	Real ER (CPI-based)	19.5	18.5	0.2	-4.8	5.3	12.0	10.9	3.7	7.9
Average gross wages, RUB 46.0 45.7 34.6 26.1 22.6 26.9 24.3 27.2 31.4 Average gross wages, real (CPI based) -0.4 22.4 9.1 -1.2 5.2 10.6 11.5 9.4 Average gross wages, real (CPI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 Average gross wages, EUR (ER) 47.2 45.2 18.6 7.8 18.7 29.1 28.5 23.8 26.7 Employed persons (LFS) 3.4 0.1 2.4 -0.3 1.3 1.3 1.0 2.5 1.4 GDP ger empl. person, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 20.9 16.9 20.6 24.6 Uht labour costs, ER (EUR) adjusted 38.3 38.2 15.9 0.1 12.1 22.9 20.8 17.4 20.1 Ukraine 20.7 23.1 9.9 5.1 8.0 15.2 2.46 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 <	Real ER (PPI-based)	41.6	17.2	-0.9	-1.8	17.4	17.4	10.8	8.4	13.1
Average gross wages, real (PPI based)-0.422.420.49.1-1.25.210.611.59.4Average gross wages, real (CPI based)20.919.916.011.010.412.813.316.615.1Average gross wages, EUR (ER)47.245.218.67.818.729.128.523.826.7Employed persons (LFS)3.40.12.4-0.31.31.31.02.51.4GDP per empl, person, RUB at 2000 prices37.238.831.617.115.820.916.920.62.46Unit labour costs, RUE at 2000 prices37.238.831.617.112.122.920.817.420.1UkraineGDP deflator23.19.95.18.015.224.614.821.715.1Exchange rate (ER), UAH/EUR14.5-4.34.519.89.7-3.3-0.89.25.8Real ER (CPI-based)1.112.3-0.9-10.77.415.55.46.84.3Average gross wages, real (PPI based)1.120.720.016.717.020.518.415.016.0Average gross wages, real (PPI based)1.120.720.016.717.020.518.415.016.0Average gross wages, real (PPI based)1.120.720.016.717.020.518.415.016.0Average gross wages, real (Average gross wages, RUB	46.0	45.7	34.6	26.1	22.6	26.9	24.3	27.2	31.4
Average gross wages, real (CPI based) 20.9 19.9 16.0 11.0 10.4 12.8 13.3 16.6 15.1 Average gross wages, EUR (ER) 47.2 45.2 18.6 7.8 18.7 29.1 28.5 22.8 22.6 22.5 1.4 GDP per empl. person, RUB at 2000 pr. 6.4 5.0 2.3 7.7 5.9 5.0 6.3 5.5 5.5 Unit labour costs, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 20.9 16.9 20.6 24.6 Unit labour costs, ER (EUR) adjusted 38.3 38.2 15.9 0.1 12.1 22.9 20.8 17.4 20.1 Ukraine 23.1 9.9 5.1 8.0 15.2 24.6 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 1.1 12.3 -0.9 -10.7 7.4 15.5 5.4 6.8 4.3 Average gross wages, real (CPI based)	Average gross wages, real (PPI based)	-0.4	22.4	20.4	9.1	-1.2	5.2	10.6	11.5	9.4
Average gross wages, EUR (ER)47.245.218.67.818.729.128.523.826.7Employed persons (LFS)3.40.12.4-0.31.31.02.51.4GDP per empl. person, RUB at 2000 prices37.238.831.617.115.820.916.920.624.6Unit labour costs, RUB at 2000 prices37.238.831.617.115.820.916.920.624.6Unit labour costs, ER (EUR) adjusted38.338.215.90.112.122.920.817.420.1UkraineGDP deflator23.19.95.18.015.224.614.821.715.1Exchange rate (ER), UAH/EUR14.5-4.34.519.89.7-3.3-0.89.225.8Real ER (PPI-based)1.112.30.910.77.415.55.46.84.3Average gross wages, real (PPI based)7.324.417.514.15.917.217.98.613.9Average gross wages, real (PPI based)1.120.720.016.717.020.518.415.016.0Average gross wages, real (PPI based)1.334.215.82.516.341.430.318.821.8Average gross wages, real (PPI based)7.324.417.514.15.917.217.98.613.9Average gross wages, real (PPI based) <td< td=""><td>Average gross wages, real (CPI based)</td><td>20.9</td><td>19.9</td><td>16.0</td><td>11.0</td><td>10.4</td><td>12.8</td><td>13.3</td><td>16.6</td><td>15.1</td></td<>	Average gross wages, real (CPI based)	20.9	19.9	16.0	11.0	10.4	12.8	13.3	16.6	15.1
Employed persons (LFS)3.40.12.4-0.31.31.31.02.51.4GDP per empl. person, RUB at 2000 pr.6.45.02.37.75.95.06.35.55.5Unit labour costs, RUB at 2000 prices37.238.831.617.115.820.916.920.624.6Unit labour costs, ER (EUR) adjusted38.338.215.90.112.122.920.817.420.1UkraineGDP deflator23.19.95.18.015.224.614.821.715.1Exchange rate (ER), UAH/EUR14.5-4.34.519.89.7-3.3-0.89.25.8Real ER (CPI-based)1.112.3-0.9-10.77.415.55.46.84.3Average gross wages, real (PPI based)7.324.417.517.017.020.518.415.016.0Average gross wages, real (PPI based)1.120.720.016.717.020.518.415.016.016.0Average gross wages, real (PPI based)1.341.221.611.40.87.16.83.31.821.8CDP per empl. person, UAH at 2000 pr.5.210.34.69.211.40.87.16.86.9Unit labour costs, LFS0.6-1.00.60.40.71.90.20.80.5 <trr< tr="">GDP per empl. person, UAH at</trr<>	Average gross wages, EUR (ER)	47.2	45.2	18.6	7.8	18.7	29.1	28.5	23.8	26.7
GDP per empl. person, RUB at 2000 prices 37.2 38.8 31.6 7.7 5.9 5.0 6.3 5.5 5.5 Unit labour costs, RC (EUR) adjusted 38.3 38.2 15.9 0.1 12.1 22.9 20.8 17.4 20.1 Ukraine GDP deflator 23.1 9.9 5.1 8.0 15.2 24.6 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 9.9 14.5 -5.5 -13.8 -2.7 14.9 7.7 0.9 2.8 Average gross wages, seques, UAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (CPI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gr	Employed persons (LFS)	3.4	0.1	2.4	-0.3	1.3	1.3	1.0	2.5	1.4
Unit labour costs, RUB at 2000 prices 37.2 38.8 31.6 17.1 15.8 20.9 16.9 20.6 24.6 Unit labour costs, ER (EUR) adjusted 38.3 38.2 15.9 0.1 12.1 22.9 20.8 17.4 20.1 Ukraine GDP deflator 23.1 9.9 5.1 8.0 15.2 24.6 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 9.9 14.5 -5.5 -13.8 -2.7 14.9 7.7 0.9 2.8 Average gross wages, UAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (PI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS)	GDP per empl. person, RUB at 2000 pr.	6.4	5.0	2.3	7.7	5.9	5.0	6.3	5.5	5.5
Unit labour costs, ER (EUR) adjusted 38.3 38.2 15.9 0.1 12.1 22.9 20.8 17.4 20.1 Ukraine GDP deflator 23.1 9.9 5.1 8.0 15.2 24.6 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 9.9 14.5 -5.5 -13.8 -2.7 14.9 7.7 0.9 2.8 Average gross wages, UAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.8 18.4 21.8 21.8<	Unit labour costs, RUB at 2000 prices	37.2	38.8	31.6	17.1	15.8	20.9	16.9	20.6	24.6
Ukraine GDP deflator 23.1 9.9 5.1 8.0 15.2 24.6 14.8 21.7 15.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 9.9 14.5 -5.5 -13.8 -2.7 14.9 7.7 0.9 2.8 Average gross wages, UAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (CPI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 2.2 0.8 0.5 GDP per empl. person, ULFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2	Unit labour costs, ER (EUR) adjusted	38.3	38.2	15.9	0.1	12.1	22.9	20.8	17.4	20.1
ContrainedGDP deflator23.19.95.18.015.224.614.821.715.1Exchange rate (ER), UAH/EUR14.5-4.34.519.89.7-3.3-0.89.25.8Real ER (CPI-based)9.914.5-5.5-13.8-2.714.97.70.92.8Real ER (PPI-based)1.112.3-0.9-10.77.415.55.46.84.3Average gross wages, UAH29.635.221.022.827.636.729.229.728.9Average gross wages, real (CPI based)7.324.417.514.15.917.217.98.613.9Average gross wages, EUR (ER)13.341.215.82.516.341.430.318.821.8Employed persons (LFS)0.6-1.00.60.40.71.90.20.80.5GDP per empl. person, UAH at 2000 prices23.222.515.712.514.535.720.621.520.6Unit labour costs, UAH at 2000 prices23.222.515.712.514.440.321.611.313.9AustriaGDP deflator1.81.81.41.22.11.81.82.31.8Real ER (CPI-based)0.50.5-0.3-0.50.00.1-0.7-0.2-0.1Real ER (PPI-based)-0.30.30.20.9<	likraine									
Duri denator 20.1 3.5 5.1 0.03 10.2 21.1 10.1 Exchange rate (ER), UAH/EUR 14.5 -4.3 4.5 19.8 9.7 -3.3 -0.8 9.2 5.8 Real ER (CPI-based) 1.1 12.3 -0.9 -10.7 7.4 15.5 5.4 6.8 4.3 Average gross wages, uAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (PI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.8 18.8 21.8 20.6 21.8 20.6 21.8 20.6 2	GDP deflator	23.1	00	51	8.0	15.2	24.6	1/1 8	21 7	15 1
Real ER (CPI-based) 9.9 14.5 -5.5 -13.8 -2.7 14.9 7.7 0.9 2.8 Real ER (CPI-based) 1.1 12.3 -0.9 -10.7 7.4 15.5 5.4 6.8 4.3 Average gross wages, real (PPI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (PPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2 0.8 0.5 GDP per empl. person, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.5 35.7 20.6 21.5 20.6 Unit labour costs, EN (EUR) adjusted 7.6 28.0<	Exchange rate (ER) LIAH/ELIR	14.5	_1 3	4.5	10.0	9.7	_3 3	-0.8	21.7	5.8
Real ER (PPI-based) 1.1 12.3 -0.9 -10.7 7.4 15.5 5.4 6.8 4.3 Average gross wages, UAH 29.6 35.2 21.0 22.8 27.6 36.7 29.2 29.7 28.9 Average gross wages, real (PPI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2 0.8 0.5 GDP per empl. person, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.4 40.3 21.6 11.3 13.9 Hit labour costs, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.4 40.3 21.6 11.3 13.9 GDP deflator 1.8 1.8 1.	Real FR (CPI-based)	9.9	- - .5 14 5	-5.5	-13.8	-27	-3.5 14 9	-0.0	0.2	2.8
Interform (11) (11) (12)1.11.1.31.1.41.1.41.1.41.1.51.1.71.1.51.1.51.1.51.1.71.1.51.1.51.1.51.1.71.1.51.1.51.1.51.1.71.1.51.1.51.1.51.1.71.1.51.1.51.1.51.1.71.1.51.1.51.1.71.1.51.1.51.1.71.1.51.1.51.1.71.1.51.1.51.1.71.1.51.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.51.1.71.1.61.1.71.1.5	Real ER (PPI-based)	5.5 1 1	12.3	-0.0	-10.7	-2.7	15.5	54	6.8	2.0 4.3
Average gross wages, real (PPI based) 7.3 24.4 17.5 14.1 5.9 17.2 17.9 8.6 13.9 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2 0.8 0.5 GDP per empl. person, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.5 35.7 20.6 21.5 20.6 Unit labour costs, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.4 40.3 21.6 11.3 13.9 Austria GDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.4 1.6 2.3 1.9 1.9 2.4 <td>Average gross wages LIAH</td> <td>29.6</td> <td>35.2</td> <td>21.0</td> <td>22.8</td> <td>27.6</td> <td>36.7</td> <td>29.2</td> <td>29.7</td> <td>28.9</td>	Average gross wages LIAH	29.6	35.2	21.0	22.8	27.6	36.7	29.2	29.7	28.9
Average gross wages, real (CPI based) 1.1 20.7 20.0 16.7 17.0 20.5 18.4 15.0 16.0 Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2 0.8 0.5 GDP per empl. person, UAH at 2000 pr. 5.2 10.3 4.6 9.2 11.4 0.8 7.1 6.8 6.9 Unit labour costs, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.5 35.7 20.6 21.5 20.6 Unit labour costs, ER (EUR) adjusted 7.6 28.0 10.7 -6.1 4.4 40.3 21.6 11.3 13.9 Austria GDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.3 1.8 0.1 -0.7 -0.2 -0.1 Real ER (CPI-based) -0.3 0.3 0.2 0.9 2.6 -2.4 -1.8 1.6 0.1 </td <td>Average gross wages, colline (PPI based)</td> <td>73</td> <td>24.4</td> <td>17.5</td> <td>14 1</td> <td>59</td> <td>17.2</td> <td>17.9</td> <td>86</td> <td>13.9</td>	Average gross wages, colline (PPI based)	73	24.4	17.5	14 1	59	17.2	17.9	86	13.9
Average gross wages, EUR (ER) 13.3 41.2 15.8 2.5 16.3 41.4 30.3 18.8 21.8 Employed persons (LFS) 0.6 -1.0 0.6 0.4 0.7 1.9 0.2 0.8 0.5 GDP per empl. person, UAH at 2000 pr. 5.2 10.3 4.6 9.2 11.4 0.8 7.1 6.8 6.9 Unit labour costs, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.5 35.7 20.6 21.5 20.6 Unit labour costs, ER (EUR) adjusted 7.6 28.0 10.7 -6.1 4.4 40.3 21.6 11.3 13.9 Austria GDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.4 40.3 21.6 11.3 13.9 Average gross wages, EUR 0.5 0.5 -0.3 -0.5 0.0 0.1 -0.7 -0.2 -0.1 Average gross wages, real (PPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -0.2 2.1 1.4 0.4	Average gross wages, real (CPI based)	1.0	20.7	20.0	16.7	17.0	20.5	18.4	15.0	16.0
Ausge gross higge, EUR (ELY) 10.5 11.2 10.6 11.1 10.6 10.7 10.6 10.8 10.7 11.1 10.6 11.3 11.3 13.9 11.1 11.3 13.9 11.3 13.9 11.3 13.9 11.3 13.9 11.3 13.9 11.3 13.9 11.3 13.9 11.3 13.9 13.9 13.0	Average gross wages FUR (FR)	13.3	41.2	15.8	2.5	16.3	41.4	30.3	18.8	21.8
Line by our periods (cf. G)5.210.31.60.11.11.60.2GDP per empl. person, UAH at 2000 pr. 5.2 10.3 4.6 9.2 11.4 0.8 7.1 6.8 6.9 Unit labour costs, UAH at 2000 prices 23.2 22.5 15.7 12.5 14.5 35.7 20.6 21.5 20.6 Unit labour costs, ER (EUR) adjusted 7.6 28.0 10.7 -6.1 4.4 40.3 21.6 11.3 13.9 AustriaGDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 2.1 2.1 1.8 1.8 2.1 1.8 1.8 2.1 1.8 1.8 2.1 2.1 2.1 2.1 2.1 2.1 1.8 1.8 2.3 1.8 1.8 2.3 1.8 2.3 1.8 1.8 2.3 1.8 2.3 2.1 2.1 2.1 2.1 2.1 2.1 2.1 2.1	Employed persons (LES)	0.6	-1.0	0.6	0.4	0.7	19	0.2	0.8	0.5
Out in tabour costs, UAH at 2000 prices23.222.515.712.514.535.720.621.520.6Unit labour costs, ER (EUR) adjusted7.628.010.7-6.14.440.321.611.313.9AustriaGDP deflator1.81.81.41.22.11.81.82.31.8Real ER (CPI-based)0.50.50.5-0.3-0.50.00.1-0.7-0.2-0.1Average gross wages, EUR2.41.62.31.91.92.42.62.72.2Average gross wages, real (CPI based)-1.50.12.70.3-2.90.3-0.3-1.3-0.4Average gross wages, real (CPI based)0.0-1.10.50.5-0.20.11.10.50.2Employed persons (LFS) ⁷¹ 0.40.71.40.80.02.12.72.51.3GDP per empl. person, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4Unit labour costs, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4	GDP per empl. person. UAH at 2000 pr	5.2	10.3	4.6	9.1	11.4	0.8	7 1	6.8	6.9
Unit labour costs, ER (EUR) adjusted 7.6 28.0 10.7 -6.1 4.4 40.3 21.6 11.3 13.9 Austria GDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.1.6 11.3 13.9 Real ER (CPI-based) 0.5 0.5 -0.3 -0.5 0.0 0.1 -0.7 -0.2 -0.1 Average gross wages, EUR 2.4 1.6 2.3 1.9 1.9 2.4 2.6 2.7 2.2 Average gross wages, real (PPI based) -1.5 0.1 2.7 0.3 -0.2 0.1 1.1 0.5 0.2 Average gross wages, real (CPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -1.3 -0.4 Average gross wages, real (CPI based) 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷¹ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 prices -0.5	Unit labour costs UAH at 2000 prices	23.2	22.5	15.7	12.5	14.5	35.7	20.6	21.5	20.6
Austria GDP deflator 1.8 1.8 1.4 1.2 2.1 1.8 1.8 2.3 1.8 Real ER (CPI-based) 0.5 0.5 -0.3 -0.5 0.0 0.1 -0.7 -0.2 -0.1 Real ER (PPI-based) -0.3 0.3 0.2 0.9 2.6 -2.4 -1.8 1.6 0.1 Average gross wages, real (PPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -0.4 Average gross wages, real (CPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -0.4 Average gross wages, real (CPI based) 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷¹ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5	Unit labour costs, ER (EUR) adjusted	7.6	28.0	10.7	-6.1	4.4	40.3	21.6	11.3	13.9
AustriaGDP deflator1.81.81.41.22.11.81.82.31.8Real ER (CPI-based)0.50.5-0.3-0.50.00.1-0.7-0.2-0.1Real ER (PPI-based)-0.30.30.20.92.6-2.4-1.81.60.1Average gross wages, EUR2.41.62.31.91.92.42.62.72.2Average gross wages, real (PPI based)-1.50.12.70.3-2.90.3-0.3-1.3-0.4Average gross wages, real (CPI based)0.0-1.10.50.5-0.20.11.10.50.2Employed persons (LFS) ⁷⁾ 0.40.71.40.80.02.12.72.51.3GDP per empl. person, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4Unit labour costs, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4	Austria									
GDP defiator1.81.81.41.22.11.81.82.31.8Real ER (CPI-based)0.50.5-0.3-0.50.00.1-0.7-0.2-0.1Average gross wages, EUR2.41.62.31.91.92.42.62.72.2Average gross wages, real (PPI based)-1.50.12.70.3-2.90.3-0.3-1.3-0.4Average gross wages, real (CPI based)0.0-1.10.50.5-0.20.11.10.50.2Employed persons (LFS) ⁷⁾ 0.40.71.40.80.02.12.72.51.3GDP per empl. person, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4Unit labour costs, EUR EX (200 prices)-0.51.42.81.5-0.42.52.01.91.4		1.0	4.0		1.0	0.4	4.0	4.0		1.0
Real ER (CPI-based) 0.5 0.5 -0.5 -0.5 0.0 0.1 -0.7 -0.2 -0.1 Real ER (PPI-based) -0.3 0.3 0.2 0.9 2.6 -2.4 -1.8 1.6 0.1 Average gross wages, EUR 2.4 1.6 2.3 1.9 1.9 2.4 2.6 2.7 2.2 Average gross wages, real (PPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -1.3 -0.4 Average gross wages, real (CPI based) 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷⁾ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	GDP deflator	1.8	1.8	1.4	1.2	2.1	1.8	1.8	2.3	1.8
Real ER (PPI-based)-0.50.60.20.92.6-2.4-1.61.60.1Average gross wages, EUR2.41.62.31.91.92.42.62.72.2Average gross wages, real (PPI based)-1.50.12.70.3-2.90.3-0.3-1.3-0.4Average gross wages, real (CPI based)0.0-1.10.50.5-0.20.11.10.50.2Employed persons (LFS) ⁷⁾ 0.40.71.40.80.02.12.72.51.3GDP per empl. person, EUR at 2000 pr.2.90.1-0.50.42.3-0.10.60.80.8Unit labour costs, EUR at 2000 prices-0.51.42.81.5-0.42.52.01.91.4	Real ER (CPI-based)	0.5	0.5	-0.3	-0.5	0.0	0.1	-0.7	-0.2	-0.1
Average gross wages, real (PPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -1.3 -0.4 Average gross wages, real (PPI based) 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷⁾ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	Average gross wages EUD	-0.3	0.5	0.2	0.9	2.0	-2.4	-1.0	1.0	0.1
Average gross wages, real (CPI based) -1.5 0.1 2.7 0.3 -2.9 0.3 -0.3 -1.3 -0.4 Average gross wages, real (CPI based) 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷⁾ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	Average gross wages, EUK	∠.4 1 F	1.0	2.3	1.9	1.9	2.4	2.0	2.7	2.2
Employed persons (LFS) ⁷⁾ 0.0 -1.1 0.5 0.5 -0.2 0.1 1.1 0.5 0.2 Employed persons (LFS) ⁷⁾ 0.4 0.7 1.4 0.8 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4 Unit labour costs, ER (EUR) adjusted -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	Average gross wages, real (CPI based)	-1.5	U.I 1 1	2.1	0.3	-2.9	0.3	-0.3	-1.3	-0.4
Composed persons (LF 3) 0.4 0.7 1.4 0.0 0.0 2.1 2.7 2.5 1.3 GDP per empl. person, EUR at 2000 pr. 2.9 0.1 -0.5 0.4 2.3 -0.1 0.6 0.8 0.8 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	Employed persons (LES) ⁷⁾	0.0	-1.1	0.0	0.0	-0.2	0.1	1.1	0.5	1.2
Output labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4 Unit labour costs, EUR at 2000 prices -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	CDP per empl. person EUP at 2000 pr	0.4	0.7	1.4	0.0	0.0	2.1	2.1	2.5	1.3
Unit labour costs, E. or.7 at 2000 prices -0.5 1.4 2.0 1.5 -0.4 2.5 2.0 1.9 1.4 Unit labour costs, E.R. (EUR) adjusted -0.5 1.4 2.8 1.5 -0.4 2.5 2.0 1.9 1.4	Unit labour costs, ELID at 2000 prices	2.9 0 F	U.I 4 4	-U.D 0 0	0.4	2.3	-0.1	0.0	1.0	0.8
	Unit labour costs ER (FUR) adjusted	-0.5	1.4	2.0	1.5	-0. 4 -0.4	2.5	2.0 2.0	1.9	1.4

6) Black market rate used until 2000. - 7) From 2004 new methodology.

ER = Exchange Rate, PPI = Producer price index, CPI = Consumer price index.

Sources: National statistics and wiiw estimates.

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