

# Economic Review

2/2012



BULGARIAN  
NATIONAL  
BANK

# Economic Review

2/2012



BULGARIAN  
NATIONAL  
BANK

Bulgarian monetary policy regime seeks national currency stability with a view to price stability. The BNB quarterly *Economic Review* presents information and analysis of balance of payments dynamics, monetary and credit aggregates, their link with the development of the real economy, and their bearing on price stability. External environment is also analyzed since the Bulgarian economy is influenced by international economic fluctuations. This publication contains quantitative assessments of the development in major macroeconomic indicators in the short run: inflation, economic growth, monetary and credit aggregate dynamics and interest rates.

The *Economic Review, issue 2/2012* was presented to the BNB Governing Council at its 12 July 2012 meeting. It employs statistical data published up to 5 July 2012.

The estimates and projections published in this issue should not be regarded as advice or recommendation. Exclusively the information user is liable for any consequences thereof.

The *Economic Review* is available at the BNB website, *Periodical Publications* sub-menu. Please address notes, comments and suggestions to the BNB Economic Research and Projections Directorate at 1000 Sofia, 1, Knyaz Alexander I Square, or to [econreview@bnbank.org](mailto:econreview@bnbank.org).

ISSN 1312 – 420X

© Bulgarian National Bank, 2012

This issue includes materials and data received up to 17 July 2012.

The contents of the BNB *Economic Review* may be quoted or reproduced without further permission.

Due acknowledgment is requested.

Elements of the 1999 issue banknote with a nominal value of 20levs are used in cover design.

Published by the Bulgarian National Bank  
1000 Sofia, 1, Knyaz Alexander I Sq.

Tel.: (+359 2) 9145 1351, 9145 1209, 9145 1231

Fax: (+359 2) 980 2425, 980 6493

Website: [www.bnb.bg](http://www.bnb.bg)

# Contents

---

<b>Summary</b> .....	5
<b>1. External Environment</b> .....	7
Current Business Situation .....	7
International Prices (Crude Oil, Major Raw Materials, and Gold) and the EUR/USD Exchange Rate.....	17
<b>2. Financial Flows, Money and Credit</b> .....	21
Financial Flows and External Position Sustainability .....	22
Monetary Aggregates .....	26
Credit Aggregates .....	31
<b>3. Economic Activity</b> .....	35
Household Behaviour.....	39
Government Finance and Consumption.....	43
Behaviour of Firms and Competitiveness .....	47
Exports and Imports of Goods .....	51
<b>4. Inflation</b> .....	55

## Abbreviations

APRC	Annual percentage rate of charge
BIR	Base interest rate
BOP	balance of payments
BTC	Bulgarian Telecommunications Company
b.p.	basis points
CEECs	Central and East European countries
CEFTA	Central European Free Trade Association
CIF	Cost, insurance, freight
CIS	Commonwealth of Independent States
CZK	Czech koruna
DXY	an index measuring the exchange rate of the US dollar against the basket of six major currencies
EA	Employment Agency
EC	European Commission
ECB	European Central Bank
EIB	European Investment Bank
EMBI	Emerging Markets Bond Index
EONIA	Euro OverNight Index Average
EU	European Union
EURIBOR	Euro Interbank Offered Rate
FDI	foreign direct investment
FOB	Free on board
FRS	Federal Reserve System
GDP	Gross Domestic Product
GFMS	Gold Fields Mineral Services
HICP	Harmonized Index of Consumer Prices
HRW	hard red wheat
HUF	Hungarian forint
IEA	International Energy Agency
IMF	International Monetary Fund
ISM	Institute for Supply Management
LEONIA	LEv OverNight Index Average
LIBOR	London Interbank Offered Rate
M1	narrow money
M2	M1 and quasi-money
M3	broad money
MF	Ministry of Finance
MFI	Monetary Financial Institutions
mt	metric tons
NPISHs	Non-profit institutions serving households
NSI	National Statistical Institute
OECD	Organization for Economic Cooperation and Development
OPEC	Organization of Petroleum Exporting Countries
PLN	Polish zloty
PMI	Purchasing Managers' Index
p.p.	percentage points
PPP	Purchasing Power Parity
CIS	Commonwealth of Independent States
RON	Romanian new leu
WTI	West Texas Intermediate

# Summary

---

In the second quarter of 2012 the global composite PMI indicator decreased compared with the first quarter, though remaining at a level still reflecting positive expectations of economic growth. Dynamics of conjunctural indicators shows differences across regions. Government bond market tensions and worsened projections of GDP growth had a negative effect on euro area business climate, unlike the USA where the expectations of a sustainable economic recovery continued in the second quarter of 2012. Based on the trends in conjunctural indicators and short-term developments in the world trade, it may be expected that global economic growth will stabilise in the second half of 2012 and slightly accelerate after the third quarter.

The worsening in global economic situation since the end of 2011 along with the external demand contraction had a negative effect on Bulgarian exports in the first quarter of 2012. This effect was offset by higher domestic demand due to the increased household consumption and improved investment activity. In the first quarter of 2012 household consumption posted a quarter-on-quarter increase of 0.7 per cent in real terms following the slight decline reported in the last quarter of 2011. Over the same period, fixed asset investment increased by 0.4 per cent in real terms. Over the first quarter real GDP remained at the previous quarter's level (0 per cent growth on a quarterly basis).

In the second half of 2012 economic growth is expected to gradually increase on a quarterly basis. Household consumption will recover slowly due to still unfavourable labour market developments and households' pessimism concerning the global economic situation and their financial performance in the coming months. Investment demand dynamics will continue to depend on the international financial market developments and foreign direct investment inflow. Export growth is likely to accelerate in the second half of 2012, provided that the sovereign debt crisis in the euro area does not escalate and the expectations of EU economic growth recovery materialise.

On an annual basis, the balance of payments current account recorded a 0.1 per cent deficit of GDP in April 2012, while the overall current and capital account balance remained in a surplus of 1.2 per cent of GDP. In April 2012 net foreign direct investment amounted to 4.1 per cent of annual GDP for the last four quarters.

Balance of payments current account in the first four months of 2012 was negative at EUR 597.5 million, and the total current and capital account balance also recorded a deficit of EUR 576.6 million. Over the same period, FDI inflows were EUR 407.2 million. The bulk of these investments were in the form of equity (46.6 per cent) and intercompany loans to the non-bank sector (25 per cent). The balance of payments financial account balance for the January to April period was negative at EUR 482.7 million, reflecting mainly bank operations oriented at increasing foreign assets and reducing foreign liabilities.

In 2012 the current and capital account balance is expected to remain positive as a result mainly of the sustained positive balance on services trade and net receipts in the form of current and capital transfers. In the second half of the year FDI inflow is expected to range between 3.5 and 4.5 per cent of GDP on an annual basis.

In the April to May period the growth rate of resident deposits remained high as a result of the high savings rate of households and corporations. Dynamics of bank reserves with the BNB followed that of attracted funds, increasing in June by 18.6 per cent on an annual basis. At the end of June the annual growth rate of currency in circulation was 9.4 per cent. Broad money retained its high growth rate,

posting in May an increase of 10.9 per cent on an annual basis. Over the same period quasi-money grew by 7.6 per cent on an annual basis against 7.3 per cent at the end of March, with lev-denominated deposits still contributing most significantly to this (8.7 percentage points). The annual growth rate of quasi-money and broad money is expected to gradually slow down in the second half of 2012, reflecting the recovery in private consumption and stabilisation of the savings rate at a slightly lower level compared to the comparatively high 2011 level. The slightly declining trend of interest rates on time deposits is expected to continue in the third and fourth quarters of 2012.

By end-May 2012 the annual growth rate of claims on the non-government sector accelerated to 3.8 per cent. Claims on non-financial corporations retained their annual growth rate, rising at the end of May by 6.5 per cent, from 6.3 per cent at the end of March. However, demand for loans by households continued to be driven by the uncertainty about their future income, reflecting the persistent unfavourable trends in the labour market. At the end of May the total volume of banks' claims on households fell by 0.8 per cent on an annual basis. In May the average interest rates on both loans to households and non-financial corporations decreased on March 2012. In the second half of 2012 the slightly declining trend in lending interest rates is expected to continue in line with our expectations of the dynamics of the cost of financing in the banking system.

Consumer price inflation remained at a comparatively low level, with 1.8 per cent annual inflation in May compared to 2.0 per cent in December 2011. The price dynamics over the review period reflected international commodity market developments and the still low core inflation level in Bulgaria. In the second half of the year inflation is projected to slightly increase above its current levels. It will be affected by the slow increase in core inflation in the context of a gradual improvement in domestic demand and higher electricity prices for households.

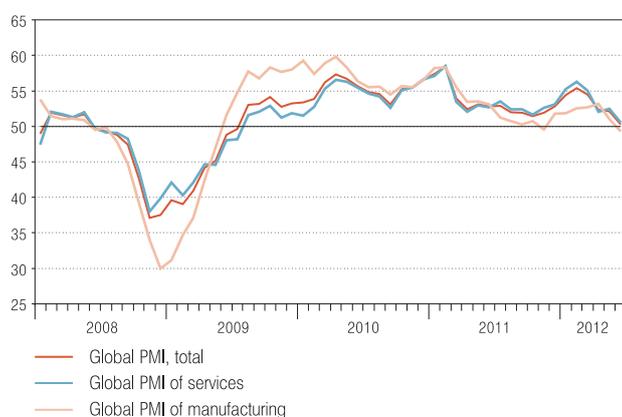
# 1. External Environment

In the second quarter of 2012 the global composite PMI indicator decreased compared with the first quarter, though remaining at a level still reflecting positive expectations of economic growth. Dynamics of conjunctural indicators shows differences across regions. The tense government securities market and worsened GDP growth forecasts had a negative effect on the euro area business climate, while in the USA, the expectations of a sustainable economic recovery were retained in the second quarter of 2012. Based on conjunctural indicator trends and short-term developments in the world trade, it may be expected that global economic growth will stabilise in the second half of 2012 and possibly accelerate slightly after the third quarter.

## Current Business Situation

In the second quarter of 2012 the global PMI indicator decreased compared with the first quarter and reached levels close to those of end-2011. However, the composite PMI remained above the threshold of 50 reflecting positive assessments of business environment and improved expectations of economic growth.

### Global PMI



Source: JP Morgan.

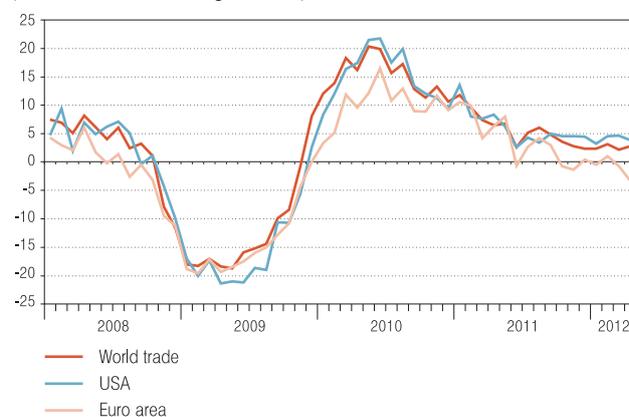
In the services and industry sectors, the levels of the major business activity indicators between April and June 2012 went down compared to the beginning of 2012. Their dynamics was driven mainly by the trends in China and the euro area, where industrial production and new orders indicators decreased. On the other hand, indicators in the USA continued to rise indicating expectations of a sustainable economic recovery.

The downward trend in the world trade volume growth continued in the first quarter of 2012. Its rate accounted for 2.5 per cent on an an-

nual basis (2.9 per cent in the previous quarter). The fall in the euro area foreign trade turnover moderated to -0.1 per cent on an annual basis (against -0.6 per cent in the last quarter of 2011), while the US foreign trade growth diminished somewhat from 4.5 per cent to 4.2 per cent. In April euro area external trade fell by 3.3 per cent on an annual basis, while 3.9 per cent growth was reported in the USA.

### World Trade

(annual rate of volume growth, %)



Source: CPB Netherlands Bureau for Economic Policy Analysis.

Based on conjunctural indicators trends and short-term developments in the world trade, it may be expected that global economic growth will stabilise in the second half of 2012 and possibly accelerate slightly after the third quarter.

Between January and March 2012 the average annual global inflation was 3.9 per cent, down by 0.5 percentage points on the previous quarter. In May the downward trend was retained and the inflation rate reached 3.3 per cent on an

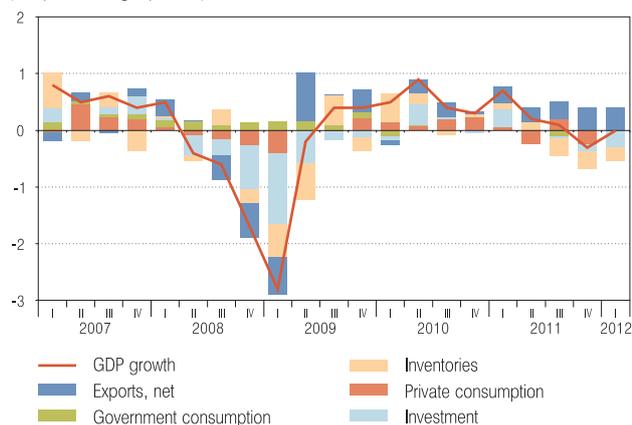
annual basis. This trend was observed in both developed and developing countries.

## Euro Area

On an annual basis, euro area GDP remained unchanged over the first quarter of 2012 *vis-à-vis* the growth of 0.7 per cent in the previous quarter. On a quarterly basis, no change in GDP occurred irrespective of the expected decline. By component, net exports had a positive contribution of 0.4 percentage points to the growth, while investment and inventories contributed negatively (-0.3 and -0.2 percentage points respectively). Household and government consumption reported no contribution to GDP changes in the first quarter of 2012, as it remained in real terms at the previous quarter's level.

### Contribution to Real GDP Growth in the Euro Area by Component (Quarterly)

(%; percentage points)



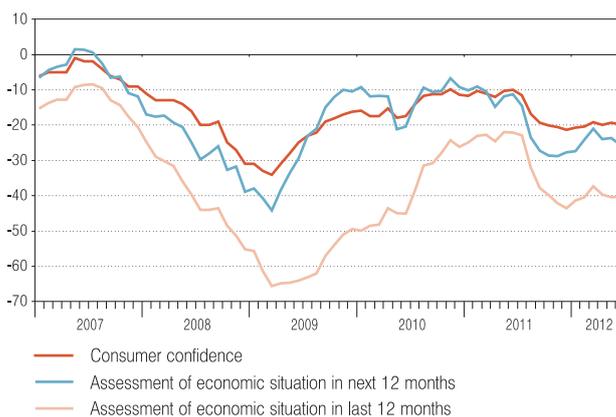
Source: Eurostat.

Between January and March 2012 the economic growth in Germany and France slowed down to 1.2 per cent and 0.3 per cent respectively on an annual basis (against 2 per cent and 1.2 per cent in the previous quarter). GDP in Spain and Italy recorded a decrease of 0.4 per cent and 1.4 per cent in the first quarter (compared to the previous values of +0.3 per cent and -0.5 per cent). A downturn was also reported in Greece (-6.5 per cent), Cyprus (-1.6 per cent), Netherlands (-0.8 per cent), Portugal (-2.2 per cent) and Slovenia (-0.2 per cent).

In the second quarter of 2012 the average values of euro area leading economic indicators were lower than their averages in the first quarter. In June the euro area economic sentiment index declined to 89.9 (previous value: 90.5),

while the European Commission business climate indicator fell to -0.94 (previous value: -0.79). The euro area consumer confidence index of the European Commission slightly declined to -19.8 in June against -19.3 in May. Based on conjunctural indicators dynamics, a decrease in euro area GDP may be expected in the second quarter of the year, though at a slower pace than in the fourth quarter of 2011. A slight increase in real GDP is projected in the second half-year.

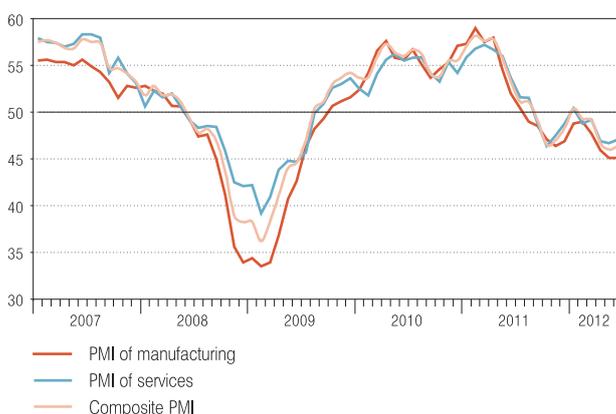
### Euro Area Consumer Confidence Indices



Source: European Commission.

Over the second quarter of 2012 the values of the euro area PMI were below the neutral level of 50, indicating an economic activity slowdown. In June the composite PMI rose marginally to 46.4 (from 46 in the previous month), while production and services subindices came to 45.1 (unchanged) and 47.1 (previous value: 46.7).

### PMI of Manufacturing and Services



Source: European Commission.

In May the European Commission revised downwards its euro area GDP growth projections for 2012 and 2013 to -0.3 per cent and 1 per cent respectively (from 0.5 per cent and 1.3 per cent

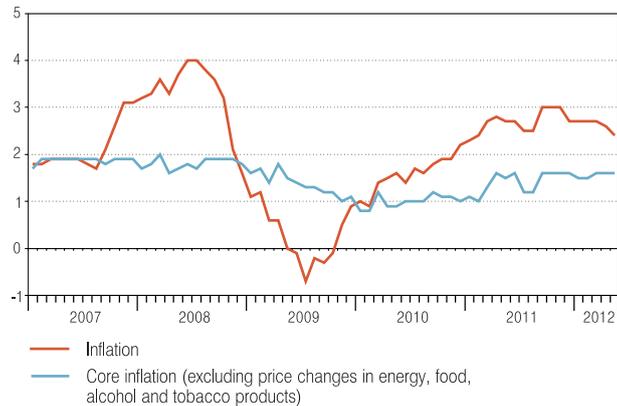
in the autumn 2011 economic forecast). On a quarterly basis, GDP growth is projected to reach -0.1 and 0.1 per cent in the second and third quarters of 2012 respectively. According to the latest ECB forecast released in early June 2012, the annual real GDP growth in the euro area for 2012 will range between -0.5 and -0.3 per cent (unchanged from the previous revision of March) and that for 2013 between 0 and 2 per cent (previous estimate: 0–2.2 per cent).

In May the euro area inflation rate moderated to 2.4 per cent on an annual basis compared to 2.6 per cent in the previous month. On a monthly basis, HICP went down by 0.1 per cent *vis-à-vis* 0.5 per cent in April. Annual inflation dynamics reflected rises in the energy prices, increasing by 7.3 per cent on an annual basis in May against 8.1 per cent in April. In May the annual change in euro area core inflation remained unchanged at 1.6 per cent in three consecutive months.

In May the annual inflation declined to 2.3 per cent in France (2.4 per cent in April), while in Germany, it retained its level of 2.2 per cent for the second month in a row. In Italy and Spain, consumer prices rose at a slower pace to 3.5 per cent and 1.9 per cent respectively compared to 3.7 per cent and 2 per cent in April.

### Euro Area Inflation Rate

(percentage change on same period of previous year)



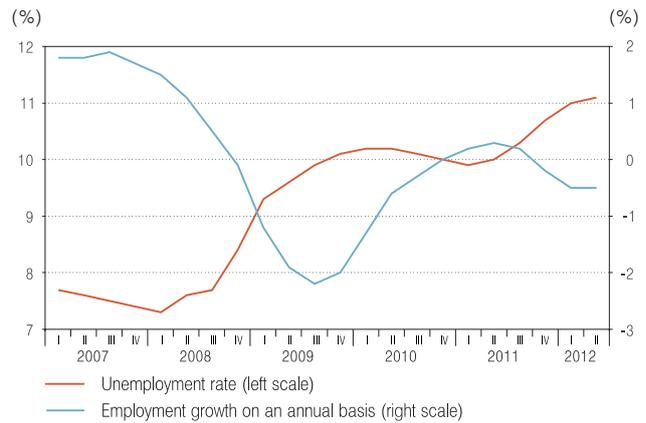
Source: Eurostat.

In May the EC revised upwards its forecast of euro area inflation for 2012 to 2.4 per cent (from 1.7 per cent in the autumn 2011 forecast) and that for 2013 to 1.8 per cent (from 1.6 per cent). According to the ECB projections of early June 2012, the increase in euro area HICP is expected to move between 2.3 per cent and 2.5 per cent in 2012 (March forecast: from 2.1 per cent to 2.7 per cent) and between 1.0 per cent and

2.2 per cent in 2013 (previous forecast: from 0.9 per cent to 2.3 per cent), with inflation rates projected to stay below 2 per cent in the beginning of 2013.

According to the Eurostat data, euro area unemployment in May 2012 came to 11.1 per cent, up from 11 per cent in April. The indicator of the expected unemployment level during the following 12 months included in the EC consumer confidence index rose to 33.4 in June (against the previous value of 30.8).

### Euro Area Unemployment Rate and Employment Growth



Source: Eurostat.

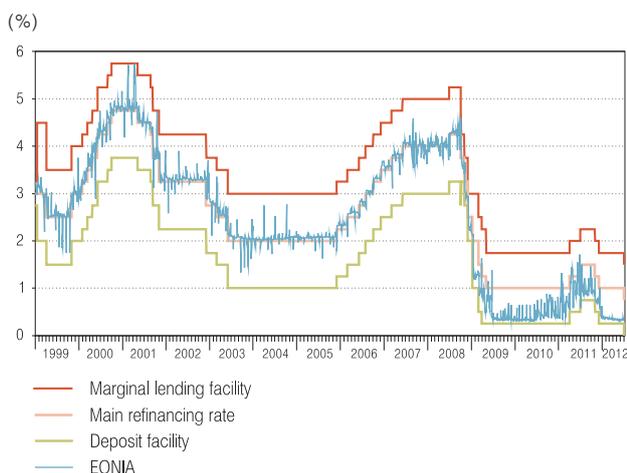
Assessing the risks to the inflation as balanced, the ECB did not change its interest rate policy in the second quarter of 2012 and kept its interest rate on main refinancing operations at 1 per cent, while the rates on deposit facility and marginal lending facility were set at 0.25 per cent and 1.75 per cent respectively. The decisions to leave interest rates unchanged were adopted unanimously at the April and May meetings of the ECB Governing Council, while in June the decision was taken by a great majority, although some members voted for a key rate reduction.

Based on its regular analyses of economic trends and dynamics of monetary and credit aggregates in the euro area, the ECB decided to cut its interest rates by 25 basis points on 5 July. According to these assessments, inflation will continue to moderate in the short term, while risks of further contraction in euro area economic activity exist due to the high uncertainty, low confidence, along with business and household pessimism. Pursuant to the taken decision, the interest rate on main refinancing operations was 0.75 per cent, effective from 11 July. The standing facilities corridor remained unchanged

at  $\pm 75$  basis points, with the interest rate on deposit facility standing at 0 per cent and the marginal lending rate at 1.50 per cent. The ECB decision to cut its interest rates was adopted unanimously without any discussion of the introduction of additional non-standard monetary measures.

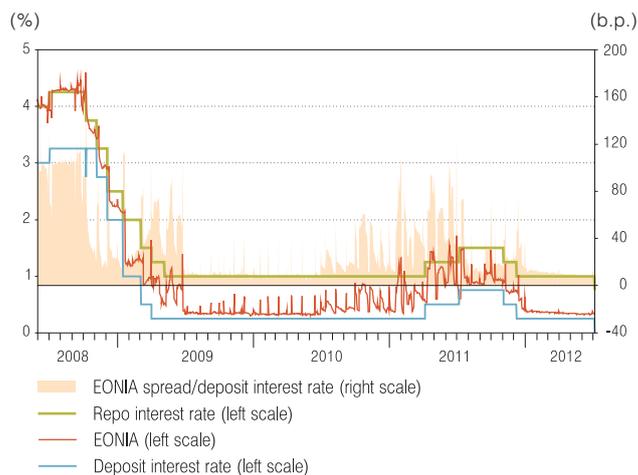
In June the ECB decided to continue its policy of full liquidity allotment on main refinancing operations (MROs) for as long as necessary, and at least until the end of the 12th maintenance period of 2012, expiring on 15 January 2013. The same conditions will apply to special-term operations with a maturity of one maintenance period that will be conducted as long as needed. The fixed rate in these special-term refinancing operations will be the same as the MROs rate prevailing in the corresponding period. Furthermore, it was decided that the three-month longer-term refinancing operations (LTROs) will be conducted until the end of 2012 as fixed rate tender procedures with full allotment. The rates in these three-month operations will be fixed at the average rate of the MROs over the life of the respective LTRO. As regards the two three-year LTROs conducted in December 2011 (amounting to EUR 489.2 billion) and in February 2012 (amounting to EUR 529.5 billion), it was assessed that the effects of their implementation have not been fully exploited.

### ECB Interest Rates



Source: Bloomberg.

### Short-term interest rates



Source: Bloomberg.

The excess liquidity in the euro area banking system<sup>1</sup> increased to EUR 770 billion on average in the second quarter of 2012 *vis-à-vis* EUR 650 billion in the previous quarter. Accordingly, EONIA decreased slightly by end-June to stand at 0.33 per cent (against 0.39 per cent by end-March 2012). The ECB balance sheet figure reached EUR 3.102 trillion as of 29 June 2012 (against EUR 2.964 trillion by end-March). Refinancing operations in the balance sheet assets rose to EUR 1260 billion (against EUR 1152 billion by 30 March 2012), while funds on deposit facility in the liabilities side decreased to EUR 772.9 billion (against EUR 778.7 billion by 30 March 2012).

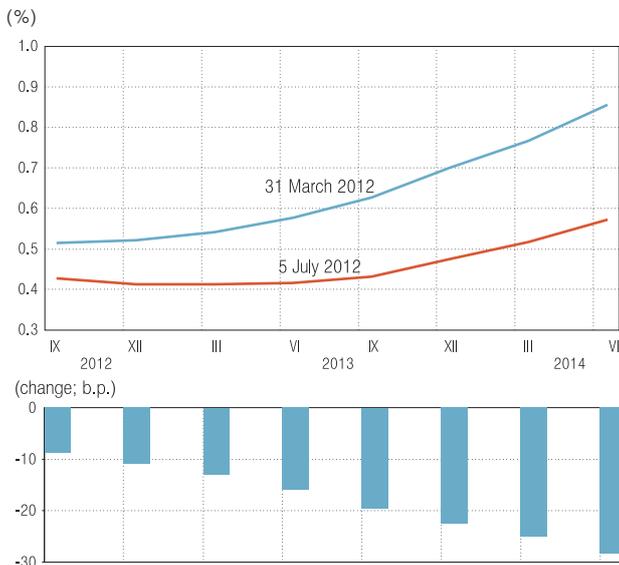
Market expectations derived from the prices of three-month EURIBOR futures contracts pointed to a decline in the money market reference interest rate to 0.75 per cent over the third quarter of 2012, retaining this level until the end of the year.

Over the second quarter a decrease in euro area interbank deposit rates was reported, more pronounced at long maturities. EURIBOR interest rates with a maturity of one month dropped by only 5 basis points to 0.37 per cent, while six- and 12-month rates fell more significantly to 0.93 per cent (-15 basis points) and 1.21 per cent (-20 basis points) respectively. Credit and liquidity premia, measured by the spread between the EURIBOR and OIS, remained almost unchanged. Three- and six-month segments stood at 42 ba-

<sup>1</sup> Excess liquidity is measured as the difference between the outstanding amount of ECB refinancing operations and two covered bond purchase programmes, on the one hand, and the amount of required reserves and autonomous factors, on the other.

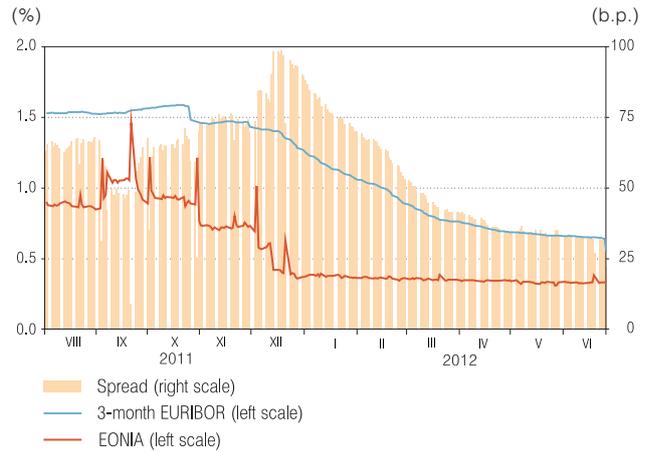
sis points (+1 basis point) and 71 basis points (-1 basis point) respectively at the end of the review quarter.

### Expected Reference Interest Rate in the Euro Area Based on EURIBOR Futures



Source: Bloomberg.

### Liquidity Risk Premium (Spread between the Three-month EURIBOR and EONIA)



Source: Bloomberg.

## The Balkan Region

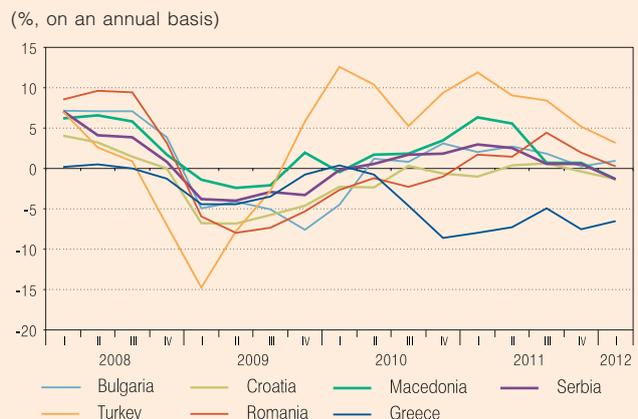
In the first quarter of 2012 the economic growth in the Balkan countries suggests divergent developments. Most economies reported declines or moderation of their growth rates, only Bulgaria's economic activity speeding up its recovery on an annual basis. At the same time, Greece continued to report the most significant decline of its economy.

Industrial output in **Bosnia and Herzegovina** was negative (-9.4 per cent) on an annual basis in the first quarter of 2012. Only mining grew (0.6 per cent), while manufacturing and energy went down (from 11 per cent and 9.8 per cent respectively). After falling in 2011, residential construction showed some signs of recovery. Employment dropped by 0.6 per cent on average. An increase in real estate operations and financial intermediation was observed, while construction and fishing reported a decline. The average annual inflation for the period was 2.4 per cent. Raised alcohol and tobacco excise duties were the major factors behind higher prices, while the downward trend in clothing prices was sustained.

**Macedonia's** economy contracted on an annual basis over the first quarter of 2012 following the strong economic recovery in 2011. Gross capital formation had the major contribution to the negative growth, while the contribution of net exports reduced the contraction of economic activity. By sector, the drop was especially pronounced in construction and industry, while hotel and restaurant services, financial intermediation and real estate operations contributed positively to value added. The labour market situation slightly deteriorated, reflecting the employment drop of 0.7 percentage points on an annual basis to 38.6 per cent, while unemployment grew by 0.4 percentage points to 31.6 per cent. Inflation moderated to 2.5 per cent in the first quarter.

The economic activity in **Greece** contracted further on an annual basis in the first quarter of 2012 mainly due to the private consumption and investment. The increasing unemployment and decreasing net household

### Real GDP Growth Rates in Balkan Countries



Note: Bulgaria, Greece, Romania, Macedonia, Romania, Serbia, Turkey and Croatia are included in the charts and tables of this section, as by the publication of the present issue, officially published data on GDP, inflation and unemployment level in the first quarter of 2012 were available only for these countries.

Sources: Eurostat, own calculations.

## Real GDP Growth on an Annual Basis

(quarterly non-adjusted data)

Country	2010				2011				2012
	I	II	III	IV	I	II	III	IV	I
Bulgaria	-4.5	1.2	0.8	3.1	2.1	2.7	1.9	0.3	0.9
Greece	0.4	-0.7	-4.6	-8.6	-8.0	-7.3	-5.0	-7.5	-6.5
Croatia	-2.3	-2.3	0.3	-0.6	-1.0	0.4	0.7	-0.4	-1.3
Romania	-2.6	-1.2	-2.2	-1.0	1.7	1.4	4.4	1.9	0.3
Macedonia	-0.4	1.7	1.8	3.5	6.3	5.6	0.7	0.7	-1.4
Serbia	-0.2	0.6	1.7	1.8	3.0	2.5	0.6	0.6	-1.3
Turkey	12.6	10.4	5.3	9.3	11.9	9.1	8.4	5.2	3.2

## Contribution to Real GDP Growth on an Annual Basis, First Quarter of 2012

(quarterly non-adjusted data)

Country	GDP growth	Private consumption	Government consumption	Investment	Exports, net
Bulgaria	0.9	1.6	-0.2	0.3	-4.2
Greece	-6.5	-6.8	-0.6	-3.3	5.6
Croatia	-1.3	-0.2	-0.3	-0.6	0.3
Romania	0.3	0.5	-0.6	2.2	-0.8
Macedonia	-1.4	0.5	0.0	-4.7	1.3
Turkey	3.2	0.2	0.5	0.4	4.5

Note: Non-additive contribution to real GDP growth by component due to chain-linked GDP data.

## Annual Inflation

(quarterly non-adjusted data)

Country	2010				2011				2012
	I	II	III	IV	I	II	III	IV	I
Bulgaria	1.9	2.9	3.3	4	4.5	3.4	3.1	2.5	1.9
Greece	3.0	5.1	5.6	5.1	4.5	3.3	2.1	2.6	1.7
Croatia	0.9	0.7	1.1	1.5	2.2	2.3	2.1	2.4	1.7
Romania	4.6	4.3	7.5	7.8	7.5	8.3	4.2	3.4	2.7
Macedonia	1.3	1.9	2.3	3	3.8	4.5	3.6	3.5	2.5
Serbia	4.5	4.1	6.5	9.6	12.6	13.6	10.7	7.9	4.7
Turkey	9.3	9.2	8.4	7.4	4.3	5.9	6.4	9.2	10.5

## Unemployment

(quarterly non-adjusted data)

Country	2010				2011				2012
	I	II	III	IV	I	II	III	IV	I
Bulgaria	9.3	10	10.4	11.2	11.1	11.2	11.1	11.6	12.3
Greece	11.1	12.1	12.9	14.1	15.2	16.8	18.4	20.5	21.5
Croatia	10.4	12.1	12.6	12.3	13.2	13.6	13.5	14.2	15.6
Romania	7.5	7.2	7.2	7.2	7.1	7.5	7.5	7.5	7.2
Macedonia	33.5	32.1	31.7	30.9	31.2	31.3	31.2	31.2	31.6
Turkey	11.5	10.6	10.6	9.9	9.2	9.1	8.6	8.3	8.0*
Serbia**		April	October		April	November		April	25.5
		22.2	19.2		25.5	23.7		25.5	

\* Preliminary data.

\*\* Labour force survey in Serbia is conducted twice a year within one calendar month.

Sources: Statistical institutes and central banks of respective countries.

disposable income continued to impact the domestic demand, which in turn adversely affected imports. As a result, net exports contributed positively to growth. On an annual basis, construction and industrial output experienced the most pronounced decline over the review period, with only real estate operations reporting an increase. On the labour market, employment dropped further, while unemployment continued growing. The average annual inflation slowed down over the reporting period, energy products and processed foods contributing most to the price rises, while services dampened inflationary pressures.

Economic activity growth in **Romania** moderated in the first quarter of 2012. Gross fixed capital formation had the major contribution to the growth, while net exports contributed negatively. Gross value added increased most significantly in agriculture, while construction posted the most significant decline. According to seasonally adjusted data on unemployment, gross value added went down in the first quarter of 2012 reaching its lowest level. The average annual inflation for the same period moderated, mostly reflecting the food price fall that allowed the central bank of Romania to cut its main policy rate in three steps by 25 basis points to 5.25 per cent.

Economic activity recorded a decrease in **Serbia** over the first quarter of 2012. Construction and telecommunications made a major contribution to the growth. Concurrently, transport posted the most sizable decline in gross value added. According to the Labour Force Survey, the unemployment rate rose to 25.5 per cent in April following the employment decline of 1.9 per cent on an annual basis in the first quarter. Inflation in Serbia slowed down over the review period. Food and oil products were the leading factors behind higher prices, while core inflation tended to reduce inflationary pressures. The slowdown allowed the Serbia's central bank to cut its benchmark interest rate to 9.5 per cent in January in order to stimulate economic activity. The depreciation of the exchange rate, however, forced the National Bank of Serbia to raise again the interest rate to 10 per cent in June.

All GDP components in **Turkey** grew on an annual basis over the first quarter of 2012. Net exports contributed most substantially to the growth in economic activity, while private consumption contributed less. Gross value added in energy and real estate operations increased most significantly, while only mining posted a decline. According to preliminary data, unemployment continued to fall in line with the continuously increasing economic activity. Inflation accelerated due to the enhanced domestic demand, rising food and fuel prices, while transport and health services dampened inflationary pressures.

Economic activity in **Croatia** went down on an annual basis over the first quarter of 2012, following the negative contribution of all GDP components to the growth, excluding net exports. Industrial output and construction contracted most markedly, while gross value added in tourism posted a marginal increase. The contraction of economic activity in the review period was the main driver of the downward trend in employment from end-2011. Unemployment also increased to reach its highest level (15.6 per cent) for the last nine years. Inflation dynamics reflected mainly the rises in indirect taxes and administered prices. Weak domestic demand depressed the price rises in services and contributed negatively to the total price level growth.

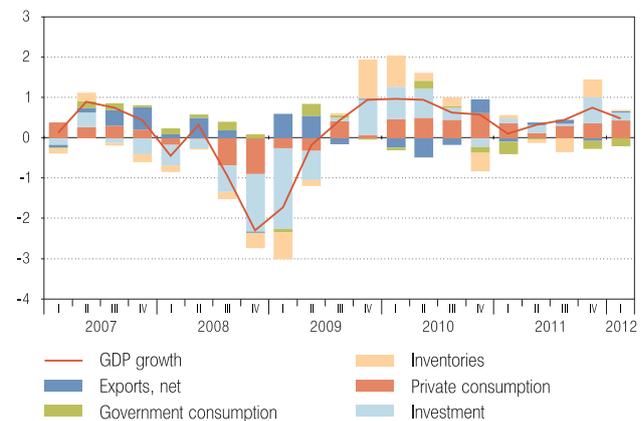
Industrial production in **Montenegro** contracted by 14.7 per cent on an annual basis in the first three months of 2012, gross value added falling most significantly in energy, while industrial output and mining grew by 4.3 per cent and 0.7 per cent respectively. According to preliminary data, construction turnover picked up by 1.7 per cent on the same period of the previous year. Tourism also recorded an increase, with the number of tourists visiting the country rising by 0.4 per cent and the duration of their stay by 7 per cent. On the labour market, unemployment went down by 0.5 percentage points to 20.7 per cent, while employment grew by 1.4 percentage points to 38.5 per cent. Inflation was 2.8 per cent in the first quarter: food, fuels and tobacco prices contributed most to the price rises, while lower clothing prices dampened inflation.

### United States

Between January and March 2012 the US real GDP growth slowed down to 0.5 per cent on a quarterly basis against 0.7 per cent in the previous quarter. The annual growth was 2 per cent in the first quarter against 1.6 per cent in the fourth quarter of 2011. Private consumption and exports were the major factors behind growth in the first quarter. Household consumption registered a 0.43 percentage point contribution to GDP growth (0.37 percentage points in the previous quarter), while exports contributed 0.14 percentage points (0.09 percentage points in the previous quarter). The slowdown in growth between January and March 2012 was driven mainly by the decreasing contribution of the change in inventories and business investment. Over the review period the contribution of the change in inventories declined to 0.02 percentage points, while that of business investment to 0.08 percentage points (from 0.45 and 0.13 percentage points in the previous quarter). The negative contribution of imports reached 0.12 percentage points (from -0.16 percentage points in the previous quarter). Government expenditure continued to contribute negatively to economic growth by -0.20 percentage points (-0.21 percentage points in the previous quarter).

Contribution to US GDP Growth by Component (Quarterly)

(%; percentage points)



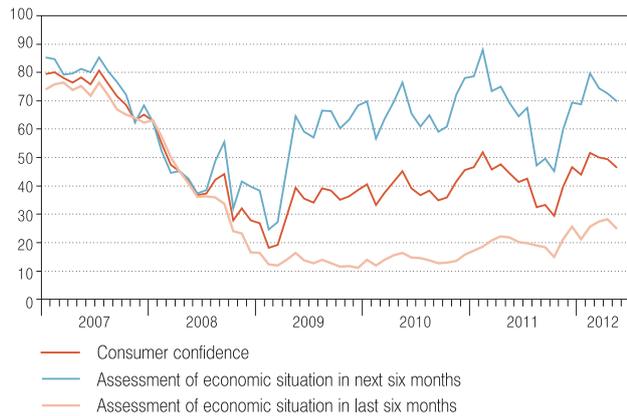
Source: Bureau of Economic Analysis.

Over the second quarter of 2012 the downward trend in US consumer confidence indicators reflected mainly the deteriorating labour market conditions. After reaching 79.3 percentage points in May (the highest value since October 2007), the University of Michigan Consumer Sentiment Index fell to 73.2 percentage points in June. In May the Conference Board Consumer Confidence Index<sup>2</sup> dropped for the third month in a row. Deterioration in consumer sentiment was shown both in the assessment of current economic situation and in the economic prospect expectations in the next six months.

<sup>2</sup> The Conference Board (Economic Research Service).

## US Consumer Confidence Indices

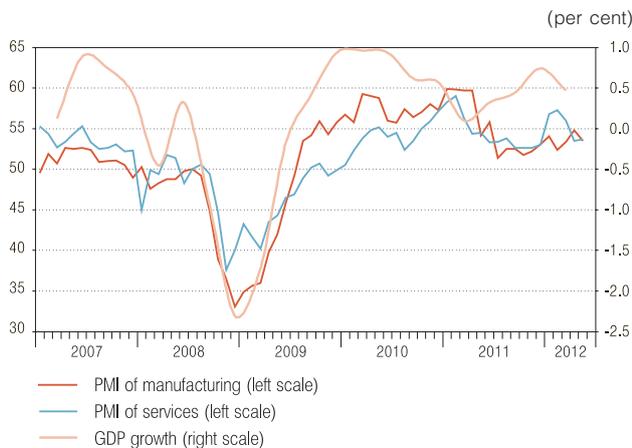
(2000 = 100)



Source: The Conference Board.

Demand for goods and services decreased in line with the falling consumer confidence. Retail sales, accounting for almost 60 per cent of the component households' consumption in the GDP index, posted a 0.2 per cent decline on a monthly basis for the second consecutive month in May compared with the growth rate of 0.7 per cent in the first quarter.

## US Manufacturing and Services ISM-PMI and GDP Growth



Source: Institute for Supply Management.

In the second quarter of 2012 major conjunctural industrial and services indicators reported worsening expectations of economic activity in the USA. In June 2012 manufacturing ISM-PMI went down to reach 49.7 points against 53.5 points a month earlier. After rising marginally by 0.2 points to 53.7 in May, services ISM-PMI dropped to 52.1 in June, which is the lowest value since January 2010. These developments point to a slowdown in US economic activity.

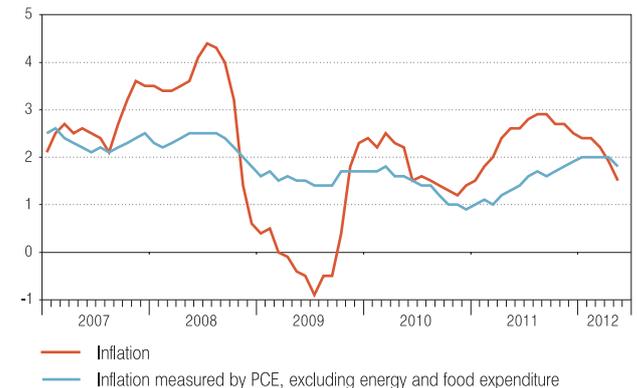
In the first quarter of 2012 investment activity in the housing sector continued to improve. The

National Association of Home Builders (NAHB) index continued to grow in June. However, the improving expectations of the building entrepreneurs were not underpinned by the sentiments of households which currently prefer to delay a home purchase according to the latest confidence survey by the Conference Board. Still high unemployment and tight credit conditions impeded home sales growth despite the low mortgage rates and falling real estate prices. These factors will continue to negatively impact the sustainable recovery and investment activity in this sector.

Inflation measured on an annual basis by personal consumption expenditure (PCE) deflator decreased to 1.5 per cent in May against 1.9 per cent in April and 2.2 per cent in March. The core PCE index fell slightly to 1.8 per cent in May against 2 per cent in the previous month. The annual growth rate of the core PCE index is anticipated to remain close to its current level in the third and fourth quarters of 2012.

## US Inflation Rate

(per cent)

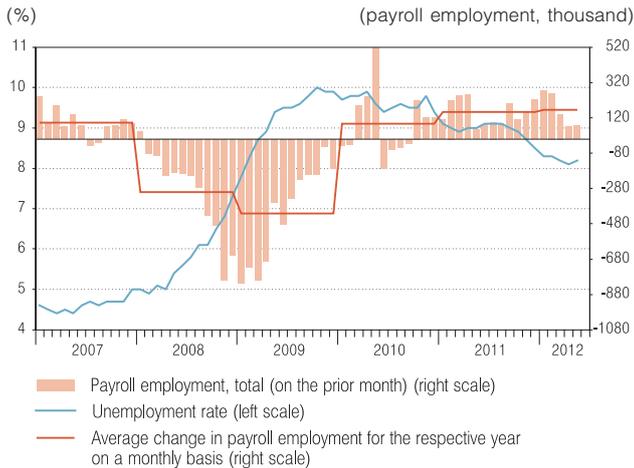


Note: Inflation is measured by the personal consumption expenditure deflator.

Source: Bureau of Labor Statistics.

The change in the consumer price index, the other measure of the US inflation, posted a decline of 1.7 per cent on an annual basis in May 2012 against 2.3 per cent in April. In May the core PCE price index remained unchanged at 2.3 per cent for the third consecutive month. Expected domestic consumer price inflation up to one year, which is a component of the University of Michigan consumer confidence index, posted a 3 per cent decline in May, from 3.2 per cent in April, while long-term inflation expectations rose only slightly. In the second half of 2012 the US consumer price inflation is expected to gradually stabilise close to the target levels consistent with the Federal Reserve's price stability target.

## US Unemployment Rate and Changes in Payroll Employment



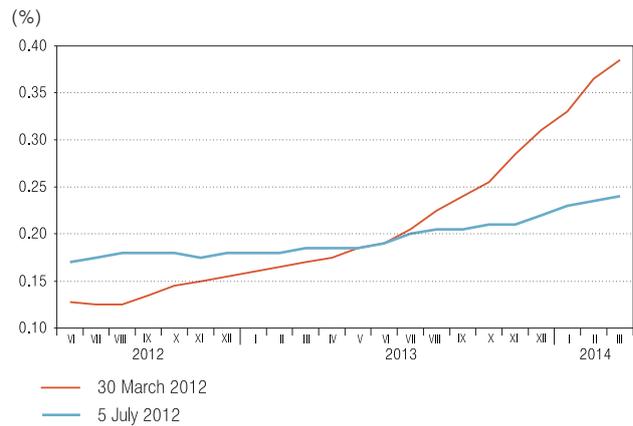
Source: Bureau of Labor Statistics.

Over the second quarter the downward trend in the US unemployment rate was discontinued, following the 8.2 per cent rise in May, from 8.1 per cent in April. The slowdown in the employment rate in the non-agricultural sector was more significant than in the beginning of the year. In May 69,000 new jobs were created (77,000 in April and 143,000 in March). In May and April new jobs came to 73,000 on average *vis-à-vis* 226,000 in the previous quarter. The trend to a gradual slowdown in the unemployment rate is expected to recover until end-2012.

At its 19–20 June meeting, the Federal Open Market Committee (FOMC) decided to continue through the end of 2012 its programme for extension of the average maturity of the securities in the Federal Reserve's portfolio (called Operation Twist) rather than completing the programme at the end of June 2012 as previously scheduled. In its announcement on this occasion, the Federal Reserve Bank of New York stated that approximately USD 267 billion will be added to the initial programme volume of USD 400 billion until end-2012. The implementation of the operation will continue and the current monthly amount and maturity ratio for purchased long-term bonds will be retained. US government securities with a term to maturity between six and 30 years will be purchased, while simultaneously, the Federal Reserve System will sell US short-term bonds with a maturity of up to three years in the same volume. Committee members decided to keep the federal funds rate unchanged between 0.00–0.25 per cent. According to their January 2012 assessment, the federal funds rate would remain unchanged

until late 2014. The members of the Committee also approved that the earnings from mortgage-backed securities and debt securities of government agencies from the Federal Reserve assets will be further reinvested in mortgage bonds. At the same time, it was decided that the reinvestment of earnings of US maturing government bonds in US government bonds will be discontinued until the expiration of the programme for extension of the average maturity of the securities in the Federal Reserve's portfolio.

## Expected Reference Interest Rate on US Federal Funds Based on Futures Contracts



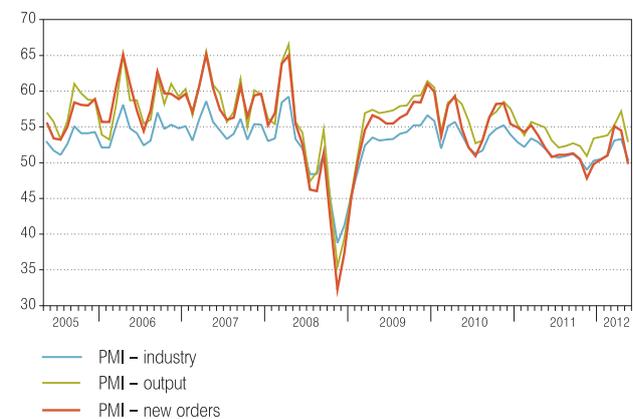
Source: Bloomberg.

The expected reference interest rate in the money market based on futures contracts on US federal funds will remain unchanged until the end of 2014. Market expectations will continue to retain the cost of US short-term resources close to its current levels.

## China

China's economic growth started to slow down. The latest manufacturing PMI data pointed to a higher-than-expected decline in economic activity in China.

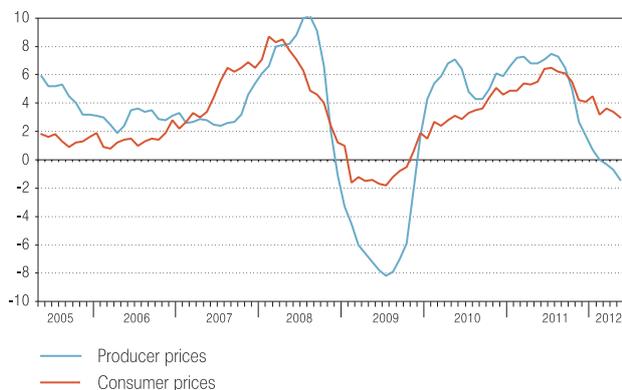
## Manufacturing PMI, Output and New Orders



Source: Bloomberg.

Manufacturing PMI fell to 50.4 in May, from 53.3 in April. The new orders subcomponent fell most significantly to 49.8 *versus* 54.4 in April.

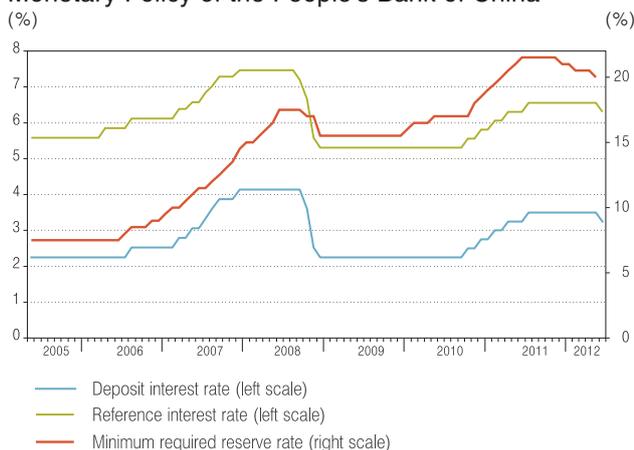
### Inflationary Indices



Source: Bloomberg.

In April and May the annual inflation continued to fall to 3.4 per cent and 3.0 per cent respectively. On a monthly basis, the consumer price index went down by 0.6 per cent in May. Producer prices fell by 0.7 per cent on an annual basis in April. The fall deepened further to -1.4 per cent in May. The low inflationary pressure of fuel and food prices was the main factor behind the moderation of price increases. The June data on fuel prices are expected to show a further drop, following their retail price decreases approved by the government regulator in the review month.

### Monetary Policy of the People's Bank of China

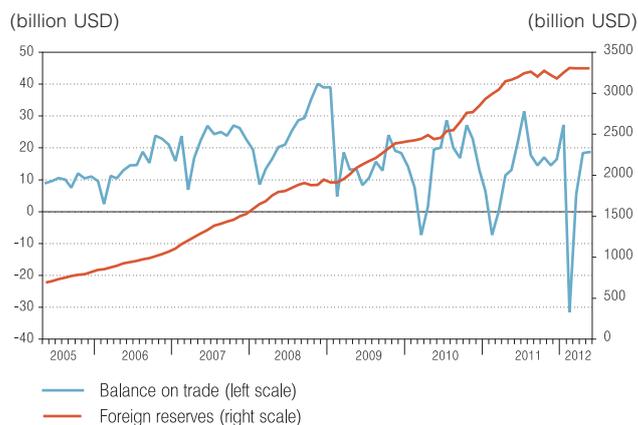


Source: Bloomberg.

In early May the People's Bank of China lowered the banks' reserve requirements ratio by 50 basis points to 20.5 per cent. This was followed by the 25 basis point cut in the benchmark interest rates in the beginning of June. The interest rate on one-year deposits was 3.25 per cent and

the lending rate was 6.31 per cent. In addition to the reduction of the key policy rate and the minimum required reserve rate and as part of China's financial market liberalisation, the corridors in which the banks can deviate from the announced rates were broadened. Banks are already allowed to add a 10 per cent premium to the deposit interest rate, thus the interest rate on deposits can reach 3.575 per cent. An allowance of up to 20 per cent (against the previous 10 per cent) is granted to the lending interest rates.

### Foreign Trade and International Foreign Exchange Reserves



Source: Bloomberg.

After falling in April, exports and imports picked up by 12.7 per cent and 15.3 per cent respectively on an annual basis in May. The trade surplus came to USD 18.7 billion. In April foreign reserves showed a slight decline of USD 5 billion.

### RMB/USD Exchange Rate



\* The chart scale is inverted, the upward movement shows an appreciation.

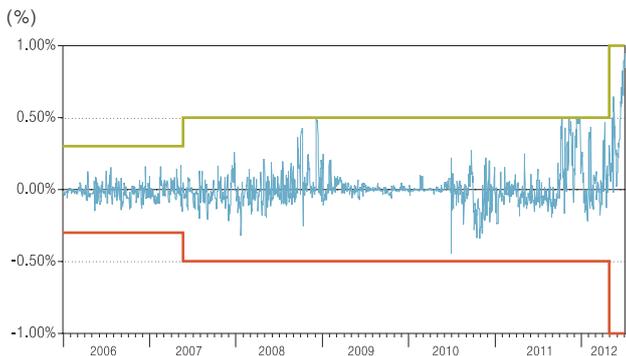
Source: Bloomberg.

The exchange rate dynamics was impacted by the changes in the foreign reserves. Between January and March the Chinese currency depreciated by 1.0 per cent against the US dollar.

In April the People's Bank of China announced its decision to widen the yuan's trading band<sup>3</sup> from  $\pm 0.5$  per cent to  $\pm 1.0$  per cent. This measure became effective on 16 April.

The last time the corridor was widened from  $\pm 0.3$  per cent to  $\pm 0.5$  per cent was in May 2007. In response to the global financial crisis, the RMB was effectively pegged to the USD at a rate of 6.83 yuan *per* dollar from October 2008 to June 2010 without officially announcing changes in the corridor.

### RMB Corridor of Deviation from the Fixed Exchange Rate



Source: Bloomberg.

Despite the widening of the corridor, no significant pressure for intervention by the central bank is expected in case of deviation above the corridor range. Since June 2010 the bank has corrected the market levels against the fixed rate only 13 times.

## International Prices (Crude Oil, Major Raw Materials, and Gold) and the EUR/USD Exchange Rate

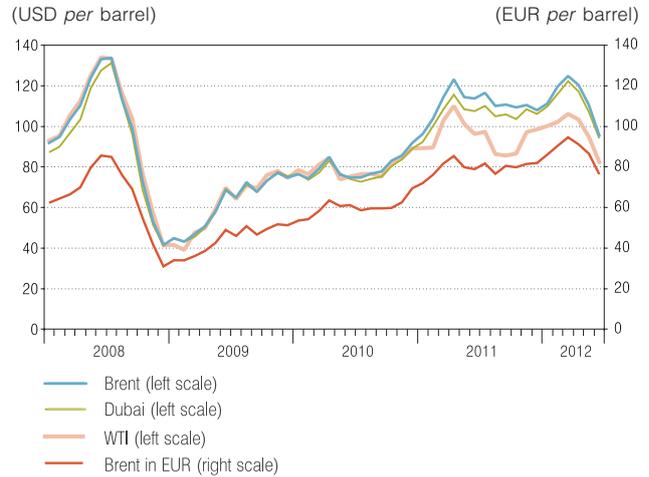
### Crude Oil Prices

In the second quarter of 2012 the price of Brent crude oil in US dollars decreased to USD 102.8 *per* barrel on average (EUR 84.6 *per* barrel in the first quarter). The lower price of crude oil in international markets and correspondingly the weaker oil demand reflected, on the one hand, the expected moderation in global economy and, on the other hand, the increased supply. The euro area debt crisis, political uncertainty in

<sup>3</sup> The RMB/USD central parity rate is set daily by the People's Bank of China. China's commercial banks have the right to deviate from the fixing and to conclude transactions at exchange rates other than fixes announced by the central bank. This deviation is allowed within a tight range set by the central bank and thus creating a corridor.

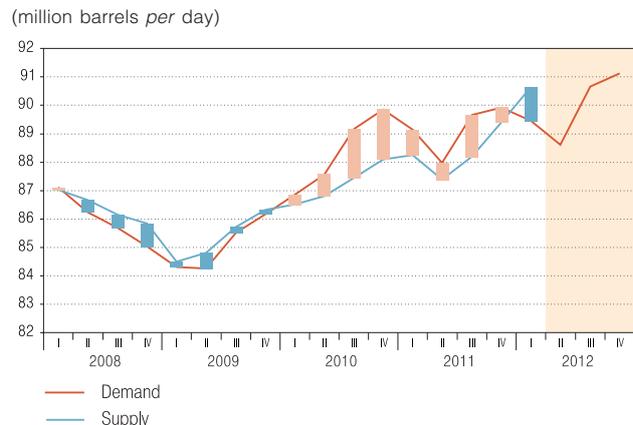
Greece and signs of a decline in China's economic growth affected negatively the expectations of global oil demand and resulted in crude oil price falls. For instance, in May when the newly-elected parliament failed to elect government and thus exacerbated the Greek political crisis, Brent crude oil fell to approximately USD 97.5 *per* barrel.

### Crude Oil Prices



Source: World Bank.

### World Crude Oil Supply and Demand (Quarterly)



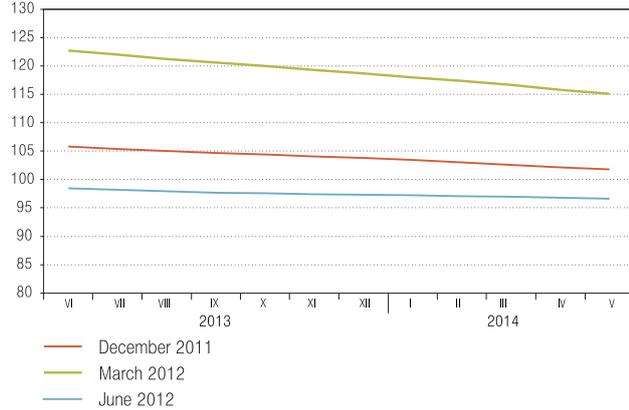
\* Crude oil demand projection (IEA, February 2012).

Source: IEA.

In May 2012 the International Energy Agency (IEA) revised upwards its crude oil market data for the first quarter 2012, but this did not alter the decreasing trend in demand. The trend towards growing supply was still sustained. Between April and May higher oil production and exports were observed mostly in North America, where the production compensated the lower output in the North Sea, Sudan, Syria and Yemen. IEA expectations for the third and fourth quarters of the year show that oil demand will rise provided that the expected global economic recovery materialise.

## Brent Crude Oil Futures Prices (Average Price of the Contract in the Corresponding Month)

(USD per barrel)



Source: JP Morgan.

According to the market sentiment measured by the futures prices as of 15 June 2012, Brent crude oil will trade in the USD 95–100 range *per* barrel in the next 12 months. Price expectations are lower than in March 2012 and December 2011.

## Major Raw Material and Commodity Prices<sup>4</sup>

Over the second quarter of 2012 steel prices rose by an average of 1.6 per cent on the first quarter. According to ECB data, the general metal price index fell by 2.7 per cent in the same period. Non-ferrous metal prices decreased by 5.6 per cent quarter on quarter, with nickel (-10.9 per cent), tin (-8.6 per cent) and aluminum (-7.4 per cent) posting the most significant decline. Metal prices are expected to stabilise over the third and fourth quarters.

In the second quarter the food price index slightly went up by 0.3 per cent compared to the first quarter. Some food prices posted an increase: rice and cereals rose by 12.6 per cent and 3.1 per cent respectively, while the price of meat fell by 0.3 per cent.

In May 2012 the International Grains Council revised downwards its forecast of cereals production growth. The crop production is foreseen to grow by 1.7 per cent in 2012 compared with a year earlier and the consumption by 1.6 per cent in the third and fourth quarters of 2012.

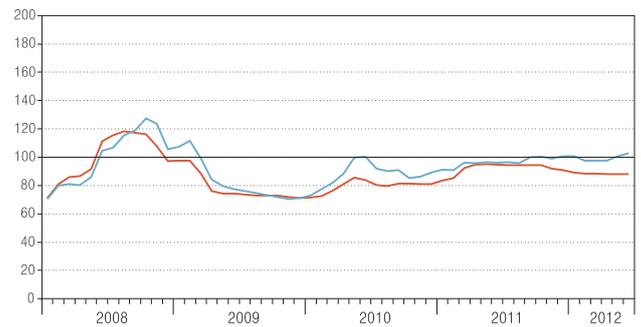
Cereal prices are not expected to rise in international commodity markets in the third and fourth quarters of 2012.

<sup>4</sup> Euro price dynamics of major goods and commodities is analysed in this section.

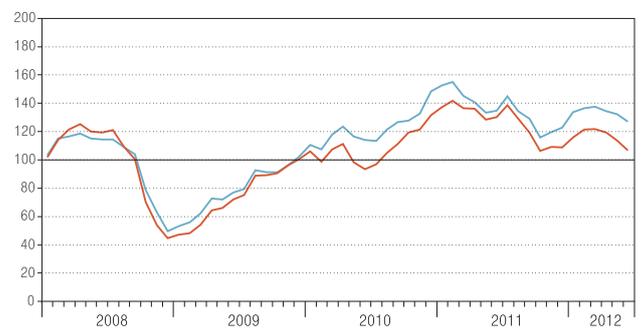
## Price Indices of Major Raw Material and Commodity Groups

(2008 = 100)

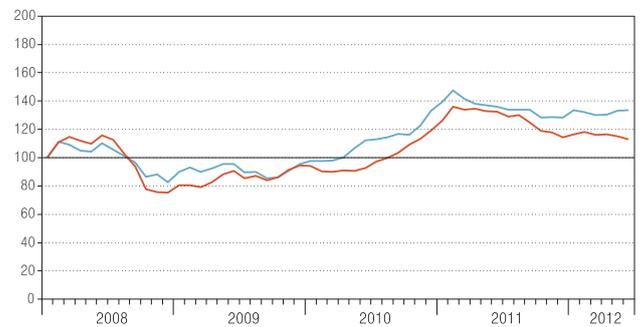
### Steel



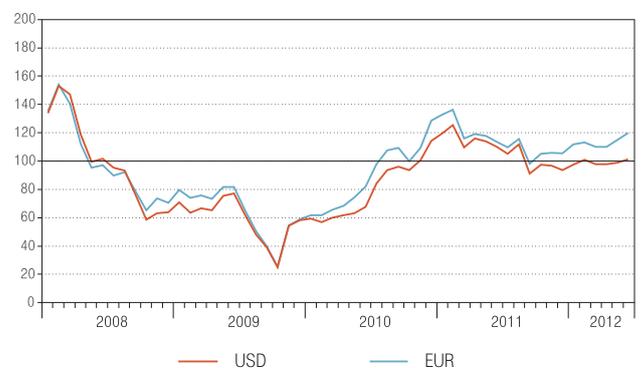
### Copper



### Food



### Wheat



Sources: World Bank, ECB and BNB.

## Gold Prices

Over the second quarter of 2012 the average spot price of gold went down by 4.7 per cent on a quarterly basis to USD 1616.3 *per* troy ounce. In euro terms, the price of gold went down by 2.5 per cent, despite its depreciation against the US dollar.

In the second quarter gold continued to trade like a risky asset. Its price closely reflected the US stock market indices dynamics and commodity price declines. Investor expectations that the Federal Reserve System will initiate new non-conventional monetary measures (not announced at the FOMC meeting on 20–21 June) also contributed strongly to the gold price dynamics. Weak demand for physical gold in India put a downward pressure on gold prices in the review quarter due to the strike of Indian jewellers against the gold taxes hike and its high price in domestic currency amid a depreciating Indian rupee.

The measure initiated by the CME Group to decrease by 10 per cent the margin requirements in gold futures trading pushed up the gold price. This has been the second decrease since 9 February 2012 and the third since early 2011.

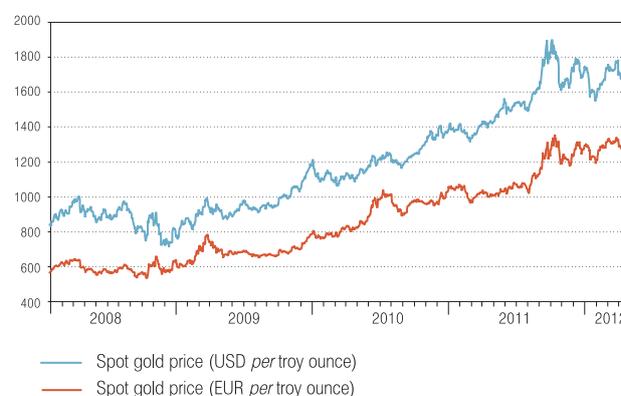
Demand for physical gold by exchange-traded funds (ETF), collateralised by gold, also marked a decrease in the reporting period after the pick in the beginning of 2012. However, at the end of the second quarter physical gold assets of the funds following global gold demand trends reported an increase. By 18 June 2012 the assets of funds investing in gold accounted for 2400 tonnes of gold. However, gold assets of the SPDR Gold Trust, the largest gold-backed exchange-traded fund, slightly fell by 0.4 per cent over the review period, whereby the fund managed 1282 tonnes of gold as of 18 June.

Based on World Gold Council's data in its latest Gold Demand Trends report (May 2012), demand for gold in the first quarter went down by 5 per cent on an annual basis to 1098 tonnes and jewellery sector demand by 6 per cent, while investment demand went up by 13 per cent. After the strike in the Indian jewellery sector to protest against the hike in import duty on gold, gold demand in India fell by 19 per cent on an annual basis and investment demand by

46 per cent. In China, gold jewellery and investment demand rose by 8 per cent and 13 per cent respectively. Central banks continued to be net purchasers of gold, although the purchases growth rate moderated by 41 per cent.

Based on International Monetary Fund data, the biggest purchases of gold in April were made by the central banks of Mexico (2.9 tonnes) and Kazakhstan (2.0 tonnes). IMF data suggest a sharp increase in gold inventories of the central bank of Turkey (by 29.7 tonnes) as a result of the adopted policy for minimum reserve requirements imposed on Turkish commercial banks, with some of them allowed to maintain monetary gold reserves.

## Spot Gold Price



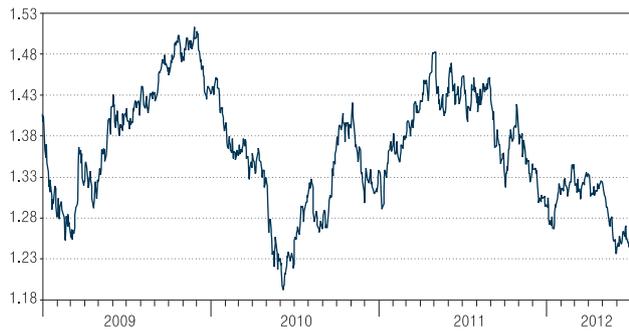
Source: Bloomberg.

## The EUR/USD Exchange Rate

In the second quarter of 2012 the average value of the US dollar appreciated against the euro (+2.2 per cent). Over the period the US currency traded within a range of 1.24–1.33 *per* euro. The cumulative appreciation of the US dollar against the euro between early March and 5 July 2012 was 7.0 per cent. Within this period, the single European currency steadily depreciated at the expense of the US dollar and other currencies perceived to be safe havens. Two main factors determine the exchange rate fluctuations: the risk appetite of market participants and the interest rate differential between the euro area and the USA.

## The USD/EUR Exchange Rate

(USD per EUR 1)



Source: ECB.

Lower-than-expected macroeconomic data for the euro area that undermined investor confidence in the single currency had an additional effect on the euro depreciation against the US dollar.

## 2. Financial Flows, Money and Credit

On an annual basis, the balance of payments current account recorded a 0.1 per cent deficit of GDP in April 2012, while the overall current and capital account balance remained at a surplus of 1.2 per cent of GDP.

Between January and April 2012 the balance of payments current and capital account balance was negative at EUR 576.6 million. The balance of payments financial account balance was also negative with a deficit of EUR 482.7 million, reflecting mainly operations oriented towards an increase in bank foreign assets and a decrease in foreign liabilities. According to the 2012 balance of payments data, international foreign exchange reserves (excluding valuation adjustments and changes related to the price of gold) increased by EUR 6.8 million in the first four months of 2012.<sup>1</sup>

By end-May 2012 the market value of international foreign reserves (an asset in the BNB Issue Department balance sheet) which includes changes stemming from transactions and re-valuation adjustments came to BGN 26.5 billion (EUR 13.5 billion), up BGN 389.6 million (EUR 199.2 million) on end-2011.

The change in the market value of international reserves is mainly driven by liabilities developments in the BNB Issue Department balance sheet.<sup>2</sup> Liabilities to the government and other budget organisations contributed mostly to the rise in the balance sheet value. Dynamics of the government deposit which is an essential part of Issue Department's liabilities is determined

<sup>1</sup> The *errors and omissions* item was positive at EUR 1066.2 million between January and April 2012.

<sup>2</sup> According to Article 28, paragraph 1 of the Law on the BNB, 'the aggregate amount of monetary liabilities of the Bulgarian National Bank shall not exceed the lev equivalent of gross international reserves,' with the lev equivalent determined on the basis of the fixed exchange rate. Pursuant to Article 28, paragraph 2 of this Law, the Bank's monetary obligations include all circulating banknotes and coins issued by the BNB, and all BNB account balances held by other persons except those of the IMF. For further details, see *The Principles of Operation of the Currency Board in Bulgaria* box, Economic Review, 1/2009, p. 18–19.

by the fiscal policy and budget deficit financing policy. Over the first five months the government deposit with the BNB rose by BGN 375.3 million (EUR 191.9 million) as a result also by the BNB contribution of BGN 180.5 million to the state budget. Therefore, in May 2012 the government deposit with the BNB reached BGN 4734.5 million (EUR 2420.7 million). In addition, liabilities to other depositors increased by BGN 234.8 million (EUR 120.1 million) over the first five months of the year. Banknotes and coins in circulation (a seasonal decline of BGN 391.2 million or EUR 200 million) had the major negative contribution to the change in the balance sheet value.

Bank reserves with the BNB increased by BGN 76.2 million (EUR 39 million).

Information about the major operations of the central bank provides additional data on money flow developments which led to more significant changes in gross international reserves.

### Monetary Flows Which Prompted Significant Changes in Gross International Reserves

(million EUR)

External Flows	January – December 2011	First half 2011	First half 2012
Total for the period	-24	-633	289
Purchases and sales of euro	-543	-738	199
at tills	-11	-5	-5
banks, incl.	-532	-732	204
banks' purchases	33 698	15 968	22 812
banks' sales	-34 230	-16 701	-22 609
Flows on accounts of banks, the MF, etc.	520	105	91
Minimum required reserves	-128	-80	-349
Government and other depositors	647	185	440

Source: BNB.

On a cash basis, disregarding valuation adjustments and changes in the price of gold, gross international reserves increased by EUR 289 million in the first half of 2012. Banks' net sales of euro to the BNB came to EUR 204 million and banks' reserves denominated in euro decreased by EUR 349 million.

In April 2012 the average monthly coverage of imported goods and services by BNB international reserves was 6.2 months.<sup>3</sup>

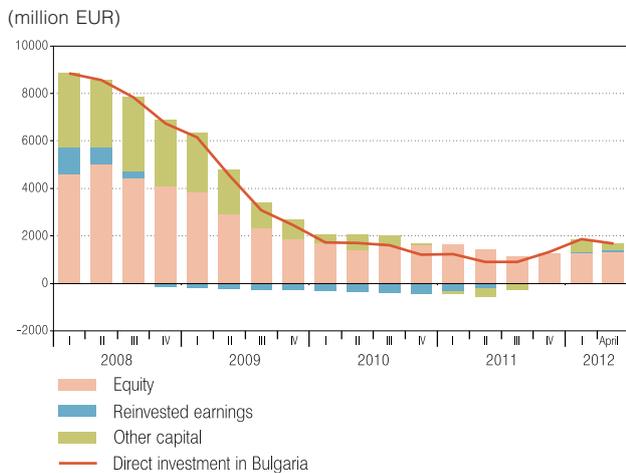
<sup>3</sup> The average value of goods and services imports for the last 12 months and BNB reserves by the end of April 2012 were used in the calculation of this indicator.

## Financial Flows and External Position Sustainability

Balance of payments current account in the January to April 2012 period was negative at EUR 597.5 million, and the total current and capital account balance also recorded a deficit of EUR 576.6 million. On an annual basis, the current account recorded a 0.1 per cent deficit of GDP, while the overall current and capital account balance remained at a surplus of 1.2 per cent of GDP. In the fourth quarter of 2012 the overall current and capital account balance is expected to remain positive on an annual basis as a result mainly of the sustained positive balance on services trade and net receipts in the form of current and capital transfers.

The balance of payments financial account between January and April recorded a deficit of EUR 482.7 million. Transactions of banks which increased their foreign assets by EUR 499.9 million and reduced their external liabilities by EUR 45.8 million contributed most significantly to this deficit. The non-bank private sector reduced its foreign obligations by EUR 190.3 million.

### FDI in Bulgaria by Type of Investment (on an annual basis)

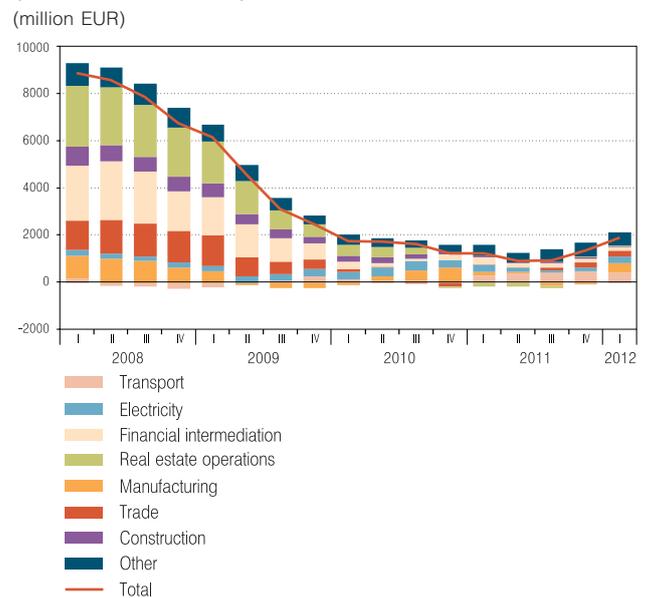


In the first four months of 2012 foreign direct investment inflow in Bulgaria rose by EUR 344.1 million to EUR 407.2 million.<sup>4</sup> The bulk of this investment was in the form of equity (46.6 per cent) and intercompany loans of corporations to the non-bank sector (25 per cent).

<sup>4</sup> Preliminary data that are subject to revision upon receipt of additional information from direct investment enterprises.

According to preliminary data, in the first quarter of 2012 foreign direct investment inflow was directed mainly to the *electricity* and *transport* sectors. In total stock of FDI attracted, *real estate operations*, *financial intermediation* and *manufacturing*<sup>5</sup> occupied the largest shares.

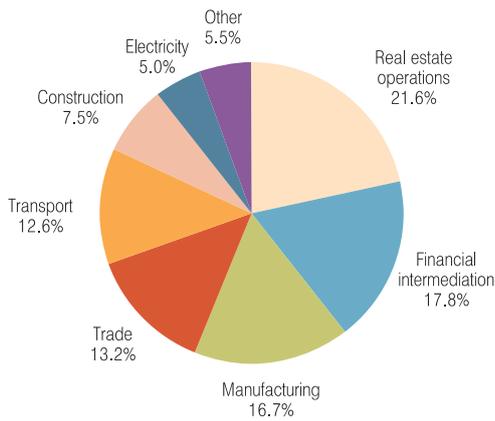
### FDI in Bulgaria by Economic Sector (on an annual basis)



<sup>5</sup> In this section, the headings of the economic sectors should read as follows: real estate operations – real estate operations, lessors activities and business services; electricity – production and distribution of electricity, heating, gaseous fuels and water; transport – transport, storage and communications; trade – trade, repair of motor vehicles and motorcycles, personal belongings and household goods; healthcare – healthcare and social activities; agriculture – agriculture, forestry and fishery.

### Sectoral Structure of FDI Stock in Bulgaria as of March 2012

(per cent)



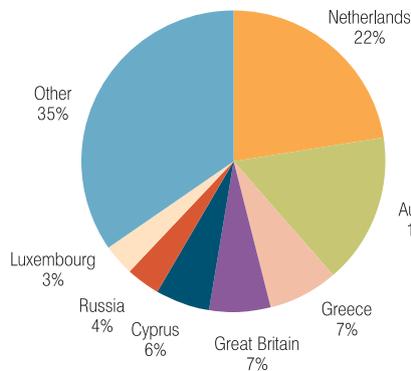
Source: BNB.

In the first quarter of 2012 the main FDI inflow came from Netherlands.

In April 2012 net foreign direct investment accounted for 4.1 per cent of annual GDP for the last four quarters. In the third and fourth quarters of 2012 FDI inflow is expected to remain close to the current level of 3.5 to 4.5 per cent of GDP. Risks to this projection remain related to the euro area debt crisis development.

### Geographic Structure of FDI in Bulgaria in March 2012

(per cent)



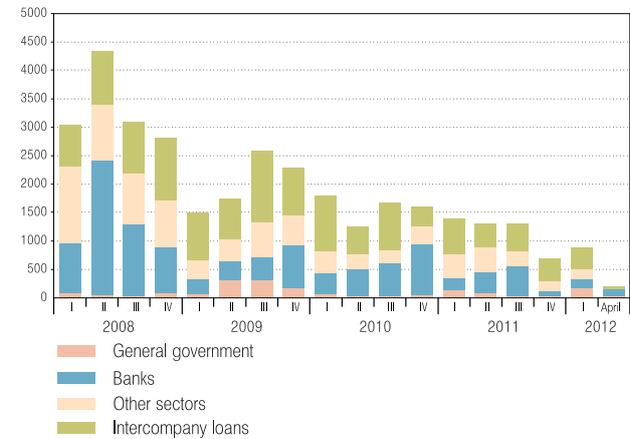
Source: BNB.

In April 2012 gross external debt increased on December 2011 mainly due to the increased foreign liabilities on intercompany loans. Gross external debt grew by EUR 102.6 million to reach in April EUR 35.5 billion, or 92.5 per cent of GDP for the last four quarters. Net repayment of borrowed funds was EUR 1723.2 million between January and April 2012 (revaluations and changes in trade and revolving loans excluded). Principal payments totalled EUR 1507.3 million (compared to EUR 2384.2 million in the corresponding period of the previous year). In the

first four months of the year loans and deposits received amounted to EUR 1435.1 million, most of them (40.6 per cent) in the form of intercompany lending.

### Loans and Deposits Received by Institutional Sector

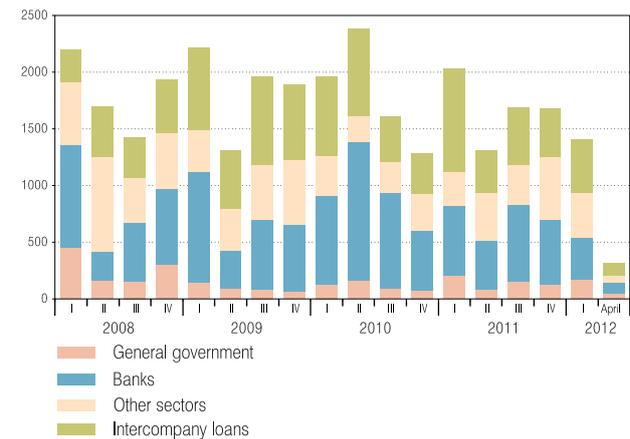
(million EUR)



Source: BNB.

### Gross Foreign Debt Service by Institutional Sector

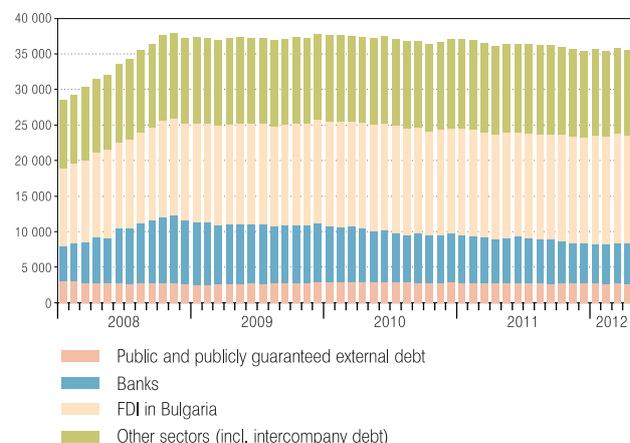
(million EUR)



Source: BNB.

### Gross Foreign Debt by Institutional Sector

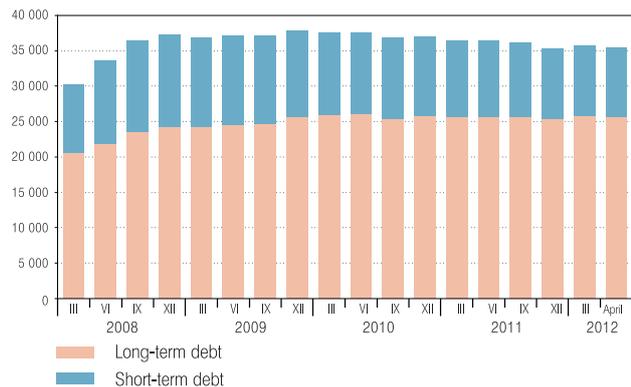
(million EUR)



Source: BNB.

## Long- and Short-term Gross External Debt Dynamics

(million EUR)



Source: BNB.

In the maturity structure of gross external debt, short-term external debt continued to tend downwards. It decreased by EUR 821 million on an annual basis, its share falling to 27.5 per cent of total external debt (29.3 per cent a year earlier).

In the currency structure of gross external debt, the euro retained its high relative share which by end-March 2012 reached 89.2 per cent. The euro occupied the largest share in *intercompany loans* (92.6 per cent), and the smallest share in *the general government sector* (77.8 per cent).

## Private Non-guaranteed External Debt, January – April 2012

(million EUR)

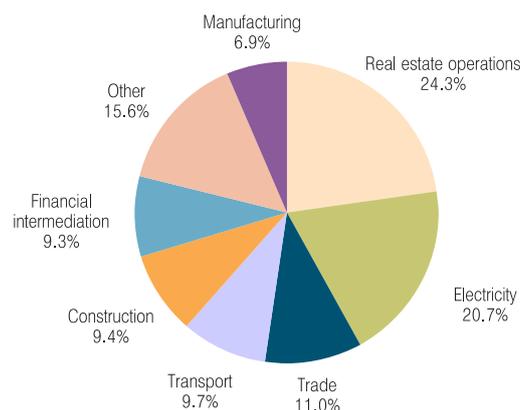
	Value	Change
Banks	5 622.7	-15.0
Other corporations	27 130.8	166.8
of which: <i>direct investment</i>	15 153.1	366.2
<b>Total</b>	<b>31 339.7</b>	<b>179.7</b>

Banks' obligations to foreign parent banks incurred in connection with financing their operations in Bulgaria occupied the largest share in banks' external debt (69.5 per cent in April 2012). The relatively high resident bank liquidity allowed them to reduce dependence on external financing by repaying their external obligations.<sup>6</sup>

The sectoral decomposition indicates that *real estate operations* retained their largest share in total private external debt of *other sectors*, with transport reporting an increase. At the same time, *financial intermediation* recorded the most significant decline.

<sup>6</sup> For further details on the banking system, see the Monetary Aggregates and Credit Aggregates Sub-sections.

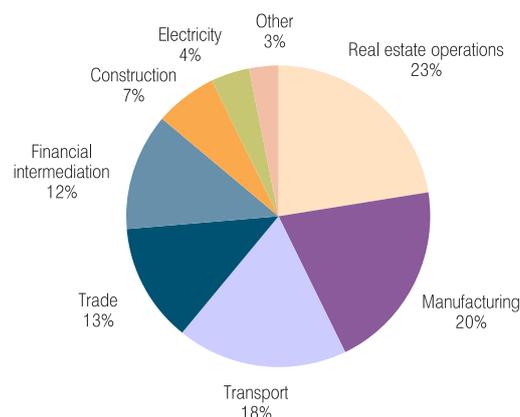
## Sectoral Structure of Gross External Debt of Other Sectors in March 2012



Source: BNB.

In the total volume of private external debt by *intercompany loans*, *real estate operations* and *financial intermediation* continued to occupy the largest shares. The *manufacturing* sector recorded the largest increase and the *agriculture* posted the most significant decline.

## Sectoral Structure of Gross External Debt by Intercompany Loans in March 2012



Source: BNB.

In the first four months of 2012 external debt of the *general government sector* decreased by EUR 49.3 million. Total public and publicly guaranteed external debt fell by EUR 77.1 million, occupying 11.7 per cent of Bulgaria's gross external debt. New loans and deposits disbursed to the *general government sector* amounted to EUR 127 million, up EUR 28 million on the previous year.

The average weighted interest rates on new loans declared between January and April 2012 suggest a decline (on an annual basis) in the cost of external borrowed funds in euro and US

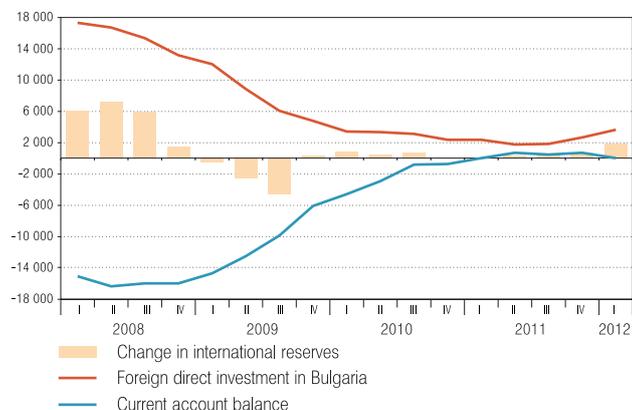
dollars: by 0.1 and 1.5 percentage points to 4.2 and 1.9 per cent respectively. At the same time, the average weighted maturity of new loans declared between January and April 2012 was six years and seven months against five years and two months in the same period of 2011 which indicates a sustainable extension of the average maturity.

Bulgaria's gross foreign assets increased by EUR 768.8 million between January and April 2012, with BNB international reserves rising by EUR 39.4 million and local banks' foreign assets growing by EUR 728.7 million. As a result of gross foreign asset and gross external debt dynamics, net external debt decreased by EUR 665.5 million, reaching EUR 15.1 billion, or 39.4 per cent of GDP for the last four quarters.

Between January and April 2012 the balance of payments current and capital account recorded a deficit of EUR 576.6 million. On an annual basis, this balance remained positive reaching a surplus of 1.2 per cent of GDP reported for the last four quarters against 0.9 per cent a year earlier.

#### Dynamics of International Reserves, Foreign Direct Investment in Bulgaria and Balance of Payments Current Account (on an Annual Basis)

(million BGN)

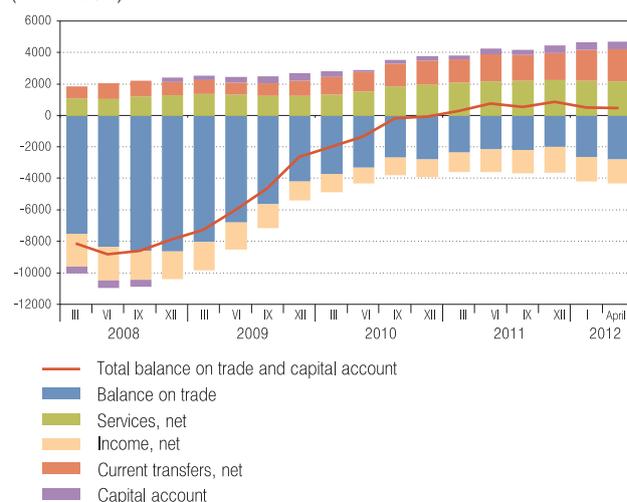


Source: BNB.

In the first quarter of the year the increase in trade deficit had a major effect on current account balance dynamics. This was partly offset by EU current transfer increases and the reduced deficit of the *income* balance.

#### Current and Capital Account Dynamics and Contribution by Component (on an Annual Basis)

(million EUR)



Source: BNB.

Between January and April the trade deficit rose by EUR 780.8 million to EUR 1214.9 million, reflecting the 1.7 per cent decline in nominal exports on an annual basis and the 9.8 per cent growth in nominal imports. The factors behind this dynamics include the lower growth in external demand reflecting the uncertainty in the euro area and declines in international metal, food and commodity prices along with the recovering domestic demand and positive growth in euro oil prices on an annual basis.<sup>7</sup>

Compared to the January to April 2011 period, the surplus in the services balance fell by EUR 51.8 million to reach EUR 147.2 million. The decline in the surplus was mainly a result of the increased imports of services (construction and business services).

Between January and April 2012 the deficit on the *income* balance amounted to EUR 309.4 million: down EUR 117.0 million on the corresponding period of 2011 (preliminary data). This deficit reflected primarily the repayment of income from foreign direct investment by corporations, though this income decreased in the first four months of 2012 compared with the same period of the previous year. Part of this income represents reinvested earnings reported in the balance of payments financial account as foreign direct investment.

Between January and April 2012 current transfers accounted for EUR 779.6 million, up

<sup>7</sup> More detailed analysis of exports and imports is presented in Section 3.

EUR 322.3 million on the corresponding period of the prior year. Government receipts from EU funds continued to be the most important component of the current transfers. Recovered agricultural subsidies by the European Commission in the first quarter of 2012 was the main reason for the increase in current transfer receipts. Other important sources of current transfers were the transfers to the *general government* sector other than EU funds and remittances by emigrants or workers permanently settled abroad.

The balance of payments capital account between January and April remained close to the level of the same period of 2011 at EUR 20.9 million. Receipts were mainly in the form of EU fund capital transfers.

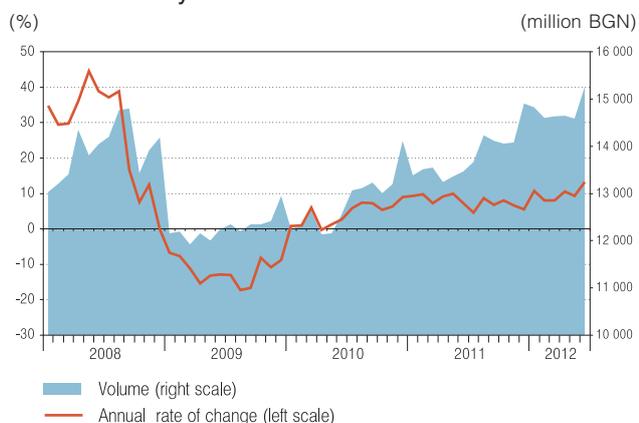
In 2012 the total current and capital account balance is expected to range between 1 and 2 per cent of GDP. Our projections show downside risks to the balance on current transactions mainly related to the trade deficit. They are based on the assumptions of external demand dynamics and international prices of major commodities. Bulgaria's external position remained sustainable, with last quarter's trends matching our expectations. Our estimate is based on both the structure of capital inflows, mainly in the form of foreign direct investment, and the structure of accumulated obligations, mainly in the form of intercompany loans.

## Monetary Aggregates

Residents' deposits continued to grow at a high rate. Dynamics of bank reserves with the BNB followed that of attracted funds, increasing in June by 18.6 per cent on an annual basis. At the end of June the annual growth rate of currency in circulation was 9.4 per cent. Our expectations are for a decrease in the growth rates of both currency in circulation and bank reserves with the BNB over the second half of 2012. As regards the interest rates on time deposits, we expect the trend of a slight decrease to continue over the projection horizon.

By the end of June 2012 reserve money rose by 13.3 per cent on an annual basis. The banks' reserves with the BNB, which increased by 18.6 per cent annually, contributed by 7.8 percentage points to this growth. Dynamics of banks' deposits with the BNB over the review period continued to reflect the significant volume of deposits attracted from residents and the comparatively large amount of maintained excess reserves.

### Reserve Money



Source: BNB.

The average daily volume of funds attracted from residents<sup>8</sup> continued to increase at high rates, with their growth, reaching BGN 744 million between April and June 2012 (against BGN 1749 million in the previous quarter). Over the same period the average daily volume of funds attracted from non-residents increased by BGN 529 million. Reflecting the developments and structure of attracted funds, the effective implicit rate of minimum required reserves maintained with the BNB was 8.94 per cent,<sup>9</sup> with banks' reserves with the BNB coming to 7.81 percentage points, and the remaining 1.13 percentage points formed by cash and funds on banks' settlement accounts in the TARGET2 national system component.<sup>10</sup> In the second quarter of 2012 banks continued to

<sup>8</sup> The definition of residents other than state and local government budgets under BNB Ordinance No 21 on the Minimum Required Reserves Maintained by Banks at the Bulgarian National Bank is used in the analysis.

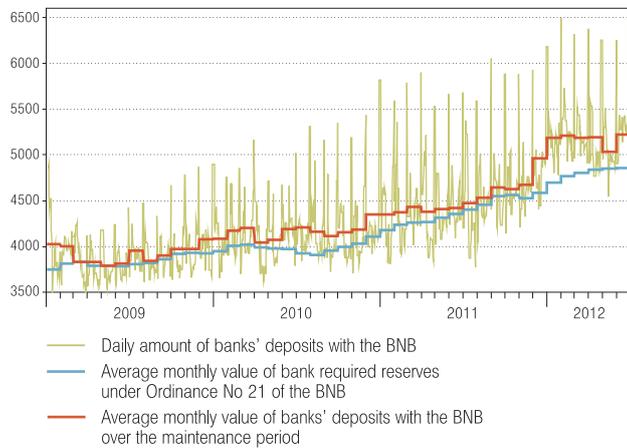
<sup>9</sup> According to Article 3, paragraph 1 of BNB Ordinance No 21, the rate of funds attracted from residents is 10 per cent, from non-residents 5 per cent and from the state and local government budgets 0 per cent.

<sup>10</sup> See Article 4 of Ordinance No 21 of the BNB.

maintain comparatively high excess reserves and their share in the total reserves maintained by banks was 6.2 per cent, down from 9.2 per cent on average in the first quarter of 2012.

### Bank Deposits with the BNB

(million BGN)



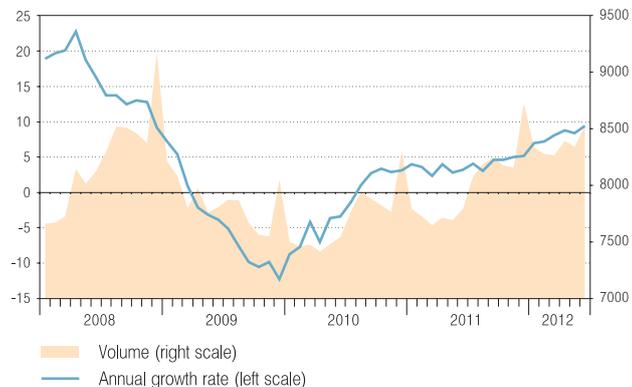
Source: BNB.

The upward dynamics of currency in circulation was sustained and by the end of June the annual growth rate reached 9.4 per cent. The annual growth rates of currency in circulation are expected to slow down over the second half of 2012.

As regards banks' reserves with the BNB, a gradual slowdown is expected in the third and fourth quarters, reflecting expectations of moderation in the growth rates of resident deposits. The savings rate of the private sector which reflects the expectations of the overall economic situation will exert a pressure on the risks to the projection. If it increases due to a possible worsening of expectations, a higher rate of growth in household deposits and hence in bank reserves may be expected.

### Currency in Circulation

(%) (million BGN)

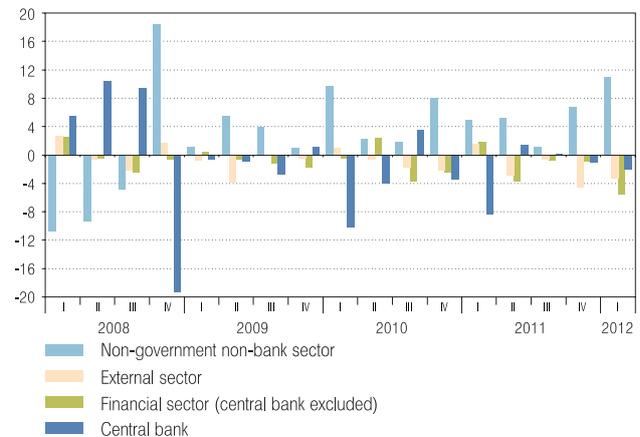


Source: BNB.

Fiscal policy affects the allocation of liquidity between economic sectors. In line with our expectations, over the first quarter of 2012 the government allotted, through its fiscal policy, liquid resources to the non-government non-bank sector, with the most significant funds withdrawn from the financial sector mainly as a result of the positive net government bond issue to the amount of BGN 320.6 million. The external sector was also a net source of liquidity given the March agricultural subsidies for direct payments refunded by the European Commission. Their value exceeded the interest paid on government external loans (BGN 205.4 million) in January and traditionally higher EU budget contributions in the first quarter of the year (BGN 306.8 million). Between January and March the larger portion of the budget deficit was financed by fiscal reserve funds and as a result, liquidity was withdrawn from the central bank. The government deposit with the BNB decreased by BGN 333.6 million, with this liquidity directed mainly to the non-government non-bank sector.

### Influence of Consolidated Budget on Other Sectors' Liquidity (Quarterly)

(share of GDP, %)



Sources: MF, BNB.

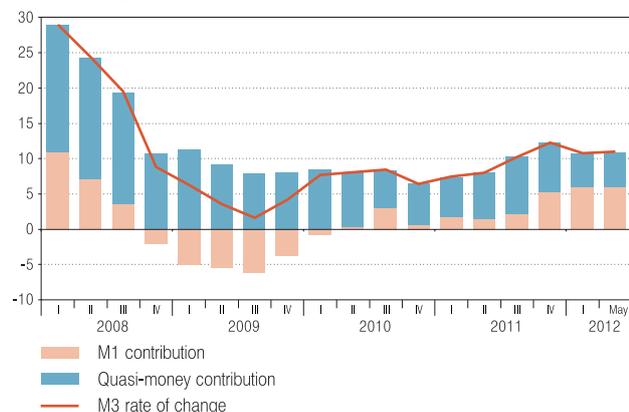
In the second quarter of 2012 the financial sector is expected to be a net receiver of liquidity. The withdrawal of funds from the financial sector through government securities placements (worth BGN 147.2 million nominally) and collected corporate income tax from financial corporations will be compensated to a great extent by principal repayments on maturing government bonds (BGN 80 million), interest payments on domestic government debt instruments and repayment of Agricultural State Fund's domestic government loan to the Bulgarian Development Bank (BGN 335.0 million). Given our expectations of a

budget surplus over the second quarter of the year and the transfer of privatisation and concession receipts<sup>11</sup> to the Silver Fund, the central bank will also be a net beneficiary of liquid funds.

If the expected better utilisation of EU structural funds and the Cohesion Fund is preserved in the third and fourth quarters, the role of the budget in redistributing resources from external to the non-government non-bank sector will also increase. In the third quarter one of the main factors which will determine the effect of fiscal policy on liquidity of the other sectors is the issuance of government bonds on the international markets to finance the maturing global bonds in 2013. Bonds issued with a payment date 9 July 2012 amounted to EUR 950 million.

### Annual M3 Growth Rate and M1 and Quasi-money Contribution (Quarterly)

(%; percentage points)



Source: BNB.

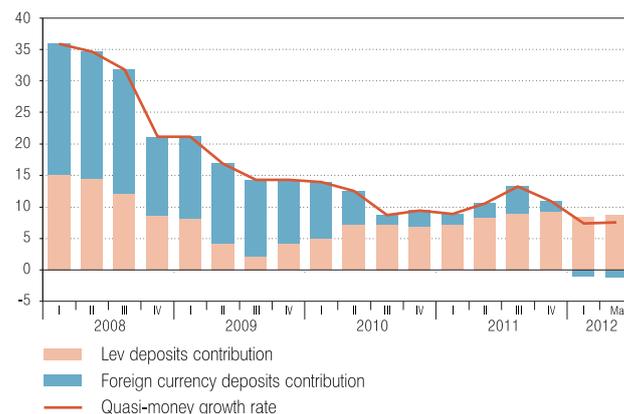
Broad money retained its relatively high growth rate, posting in May an increase of 10.9 per cent on an annual basis. Developments in the narrow aggregate, M1, and quasi-money remained broadly unchanged from the end of the first quarter. In May M1 growth was 17.2 per cent on an annual basis, with overnight deposits contributing 13.8 percentage points. Overnight deposits increased in all sectors, with those of financial and non-financial corporations contributing most to this with an annual growth rate of 10.3 and 7.4 percentage points respectively.

The growth rate of money outside banks was sustained at the level of the end of the first quarter, accelerating in May by 9.2 per cent on an annual basis.

<sup>11</sup> The total amount of Silver Fund's receipts in May was BGN 310.1 million, including revenue from privatisation of Bulgartabac Holding AD.

### Annual Quasi-money Growth Rate and Contribution Thereto of its Components (Quarterly)

(%; percentage points)



Source: BNB.

In May 2012 quasi-money grew by 7.6 per cent on an annual basis against 7.3 per cent at the end of March, with lev-denominated deposits still contributing most significantly to this by 8.7 percentage points. The contribution of foreign currency deposits remained negative at 1.1 percentage points in May. Their year-on-year dynamics continued to be driven largely by declines in foreign currency deposits of financial corporations. This trend reflected also on the share of lev-denominated deposits in quasi-money which continued to increase steadily to 50.8 per cent by end-May compared with 45.9 per cent a year earlier.

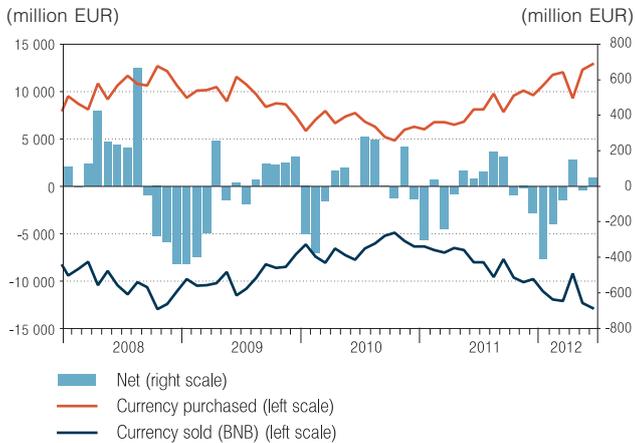
Deposits with agreed maturity of up to two years went up 6.2 per cent on an annual basis, thanks primarily to household deposits<sup>12</sup> (contributing by 8.3 percentage points) which continued to increase as a result of the high savings rate. By end-May household deposits in levs increased by 26.6 per cent on an annual basis and those in foreign currency by 2.5 per cent. The growth rate of non-financial corporations' deposits with agreed maturity of up to two years slowed down, with lev-denominated deposits rising by 1.3 per cent and foreign currency deposits falling by 0.9 per cent in May.

The annual growth of quasi-money and broad money is expected to gradually slow down in the second half of 2012, reflecting the projected recovery in private consumption. This acceleration is possible if the household savings rate increases over the year under the pressure of rising uncertainty around future household income.

<sup>12</sup> Thus indicated data on deposits and loans of households include also deposits and loans of NPISHs in line with the classification used in monetary and interest rate statistics.

Banks' reserve currency (euro) transactions with the BNB serve as the main lev liquidity management tool. It is used to perform the main function of the Currency Board: purchases and sales of national currency against euro on demand.

### Currency Sales and Purchases between the BNB and Banks (on a Monthly Basis)

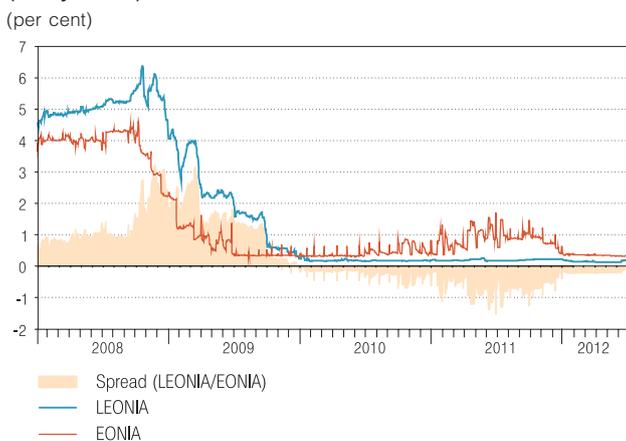


Source: BNB.

Between April and June 2012 the average daily volume of euro purchases and sales between banks and the BNB came to EUR 1129 million against EUR 1071 million in the first quarter of 2012. Over the same period bank net sales of euro amounted to EUR 171 million (compared to net purchases of EUR 698 million in the previous quarter).

As a result of the sustained ample liquidity in the Bulgarian banking system over the April to June 2012 period, interbank money market interest rates remained unchanged from the end of the previous quarter. The average interest rate on concluded transactions was 0.17 per cent.

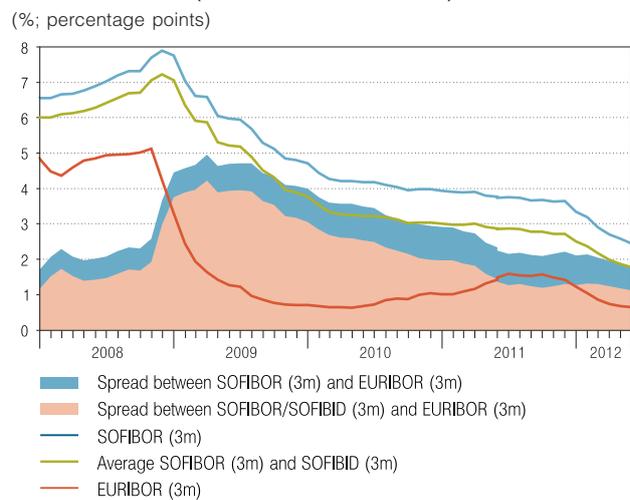
### LEONIA and EONIA, and Spread between Them (Daily Data)



Source: BNB.

The LEONIA index increased marginally by 0.16 per cent in June, up 1 basis point on March 2012. The average value of the negative spread between LEONIA and EONIA narrowed further to 17 basis points in June compared to the negative spread of 21 basis points in March 2012. This narrowing is a result mainly of the ECB policy to provide longer-term liquidity to European banks which led to further EONIA decreases.<sup>13</sup> Since early 2012 interest rates in both euro area and Bulgaria have been characterised by very low volatility. The factors behind this dynamics relate to the banks' ample liquidity as a result of deposit growth and cautious lending policy.

### SOFIBOR, EURIBOR and Average SOFIBOR/SOFIBID Index (Three-month Horizon)



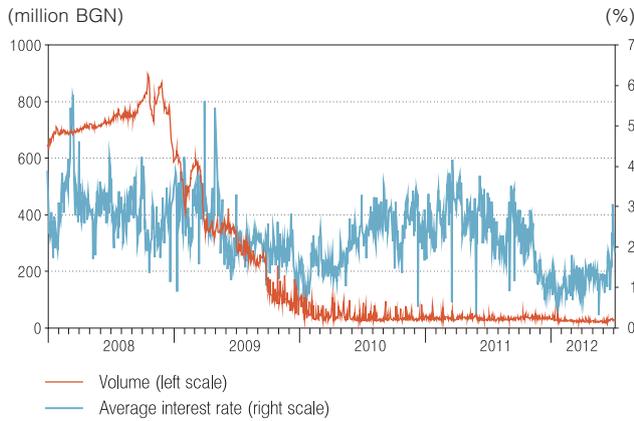
Source: BNB.

At the end of the second quarter of 2012 the SOFIBOR reference rate (3m) used as an indicator of short-term interest rate dynamics fell by 46 basis points to 2.45 per cent. Over the same period, the spread between the three-month SOFIBOR and the three-month EURIBOR fluctuated within a narrow range, coming to 179 basis points by June: down 26 basis points from its March level. The spread contraction resulted from the more significant decline (by 20 basis points) in SOFIBOR compared with EURIBOR over the same period. The average value between SOFIBOR and SOFIBID gives a better picture of the market interest rate level in Bulgaria. Correspondingly, it is more correctly to compare this value with EURIBOR which is the closest rate to the actual market price at which

<sup>13</sup> See the Euro Area Sub-section in Section 1.

transactions are concluded.<sup>14</sup> In June the average SOFIBOR/SOFIBID reference rate in the interbank market in Bulgaria over the three-month horizon declined by 39 basis points on March.

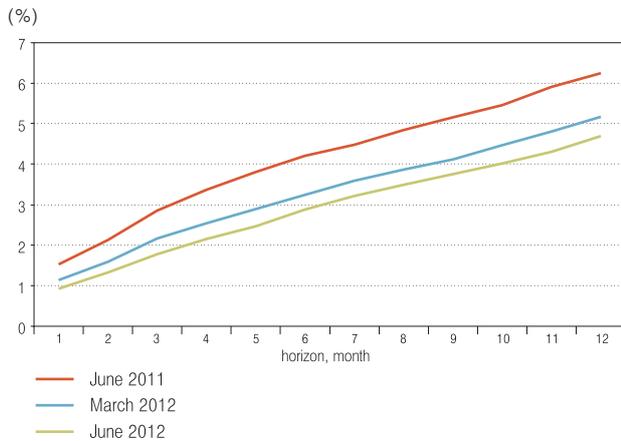
### Trade Volume and Interbank Money Market Interest Rates



Source: BNB.

Between April and June 2012 the average daily volumes traded in the interbank market amounted to BGN 189 million, an increase of 30.8 per cent on the previous quarter.

### Interbank Money Market Yield Curve (Based on Average SOFIBOR/SOFIBID Quotations)



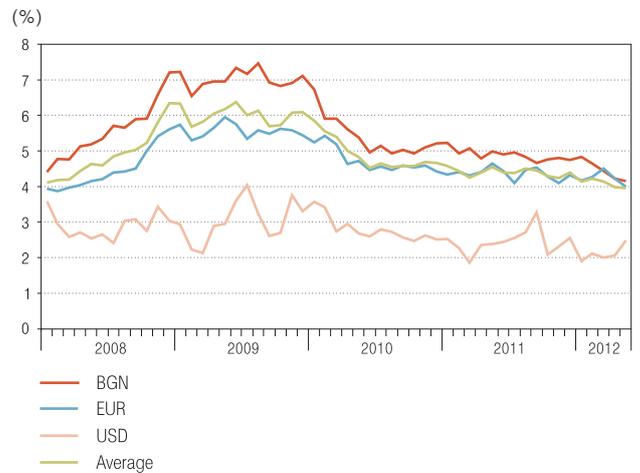
Source: BNB.

The previous quarter's trend to a decline in all maturity sectors of the interbank market yield curve was retained between April and June. In June a year-on-year 154 basis point decline was reported in the 12-month horizon along with a 60 basis point decrease in the one-month horizon.

<sup>14</sup> For further methodological notes, see the box *Differences between the Methodology for Calculating Money Market Indices in the Euro Area and in the New EU Member States*, Economic Review, 2/2010, p. 27–28.

In May the average weighted interest rate on new<sup>15</sup> time deposits fell by 18 basis points from March to 3.95 per cent.

### Interest Rates on New Time Deposits in Relevant Currencies



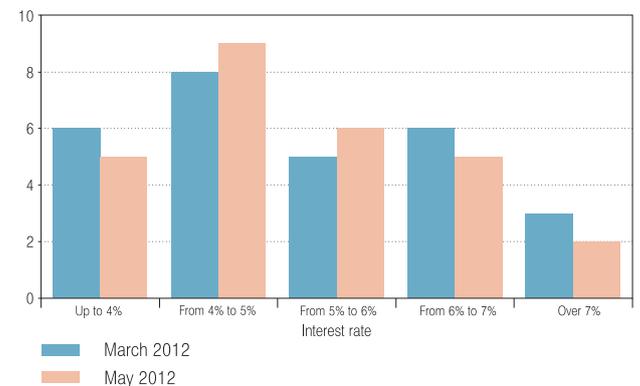
Note: The average interest rate is calculated using the interest rates in all sectors, maturities and currencies weighted at their respective new deposit volumes.

Source: BNB (interest rate statistics: interest rates and volumes of new business on time deposits of the non-financial corporation and household sectors).

Interest rates on lev-denominated deposits declined by 29 basis points to 4.15 per cent and those on euro-denominated deposits by 51 basis points to 3.99 per cent respectively. Interest rate levels of USD deposits rose by 49 basis points to 2.49 per cent. In May the average weighted deposit rate declined by 60 basis points on an annual basis. Downward trends in interest rates were associated with the ample liquidity in the banking system and relatively low demand for bank loans.

### Distribution of Interest Rates on New Household Time Lev Deposits

(frequency – number of banks)



Source: BNB.

<sup>15</sup> The terms 'newly agreed', 'new loans and deposits' and 'new' refer to the new business statistical category.

In May the breakdown of interest rates on household time lev deposits by bank shows that the number of banks offering rates in the four to five and five to six per cent band increased and those offering rates within the up to four, six to seven and over seven per cent band decreased. The average interest rate level in May decreased by 7 basis points on March to 5.04 per cent, while the dispersion ratio rose by 7 basis points to 1.75 percentage points.

The slightly declining trend of interest rates on time deposits is expected to persist in the third and fourth quarters of 2012. These expectations are underpinned by the increase in private sector's deposits and high banking system liquidity<sup>16</sup> in the context of low demand for loans.

<sup>16</sup> The liquid assets to liabilities ratio retained its high levels reaching 25.71 per cent in May.

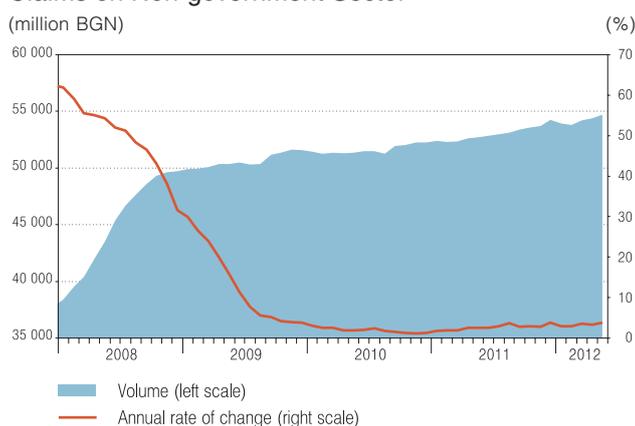
## Credit Aggregates

Strengthened investment activity of corporations in the first quarter of the year had a positive effect on demand for financial resources. However, demand for loans by households continued to be driven by the uncertainty about their future income, reflecting the persistent unfavourable trends in the labour market. Banks' liquidity remained high between April and May 2012. This allowed them to moderately increase the volume of new loans and to continue to decrease their net foreign liabilities. In May the average interest rates on both loans to households and non-financial corporations decreased on March 2012. In the second half of 2012 the slightly declining trend in lending interest rates is expected to continue in line with our expectations of the dynamics of the cost of financing in the banking system, the bulk of which comprised of deposits of individuals and households and institutions other than credit.

Between April and May 2012 claims on the non-government sector rose by BGN 501.7 million (up BGN 355.5 million over the same period in 2011) with their annual growth rate accelerating in May to reach the end-2011 level of 3.8 per cent.

In April and May of 2012 net sales of bank loans reached BGN 75.3 million (most of the sales directed to residents).

### Claims on Non-government Sector

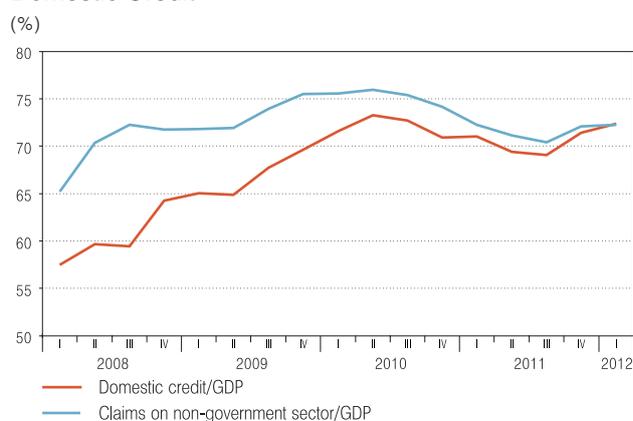


Source: BNB (monetary statistics: monetary survey).

In the first quarter of 2012 the claims on non-government sector to GDP ratio increased to 72.3 per cent.<sup>17</sup> A slight 0.2 percentage point

increase was reported *vis-à-vis* the previous quarter, reflecting mostly the lower nominal GDP.

### Domestic Credit



Source: BNB.

Bank liquidity remained high in April and May 2012 as a result of the continued inflow of funds attracted from residents (up BGN 1183.6 million).<sup>18</sup> Banks used the attracted resources to increase the volume of new loans and to reduce their net foreign liabilities. Over the review period bank funds attracted from non-residents decreased by BGN 366.0 million, while their foreign assets grew by BGN 246.1 million. As a result, banks' net foreign liabilities declined by BGN 612.1 million. In the second half of 2012 banks

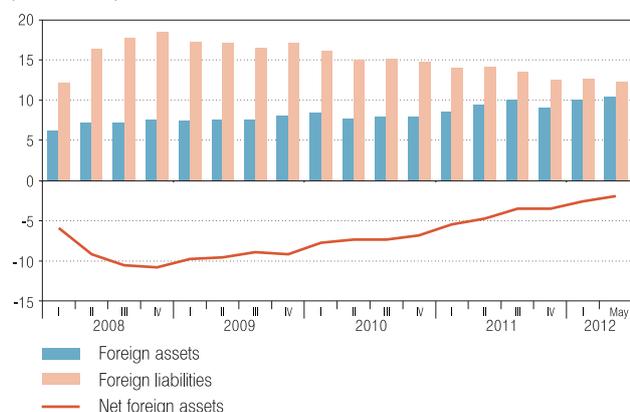
<sup>18</sup> See Section 2, Monetary Aggregates Sub-section.

<sup>17</sup> The ratio is calculated using the annual GDP.

are expected to continue reducing their net foreign liabilities. Despite the expected moderation in the growth rate of residents' deposit base, its growth is projected to provide enough resources to the banks for moderately increasing the volume of domestic credit.

### Foreign Assets and Liabilities of Banks

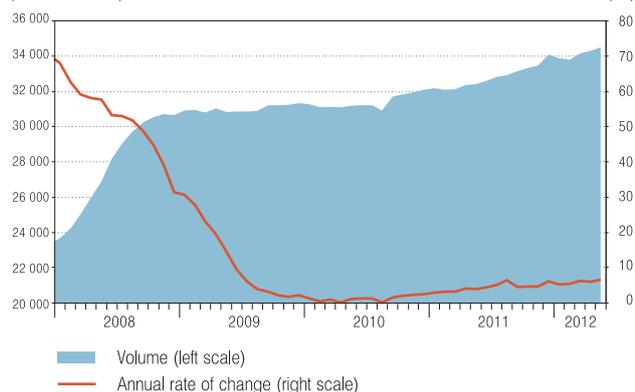
(billion BGN)



Source: BNB (monetary statistics: analytical reporting of other MFIs).

### Claims on Non-financial Corporations

(million BGN)

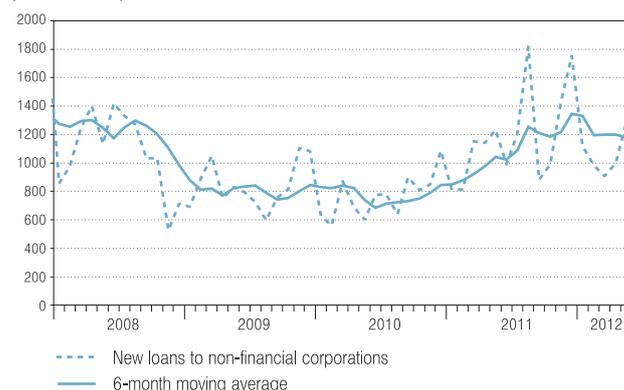


Source: BNB (monetary statistics: monetary survey).

The annual growth of claims on non-financial corporations was sustained, their rate accelerating to 6.5 per cent by end-May (6.3 per cent at the end of March). The demand for loans was affected by the increase in investment activity and firms' expectations about their future business situation. In April and May 2012 banks' claims on non-financial corporations rose by BGN 378.1 million (BGN 291.6 million in the same period of the previous year).

### New Loans to Non-financial Corporations (Monthly Volumes)

(million BGN)

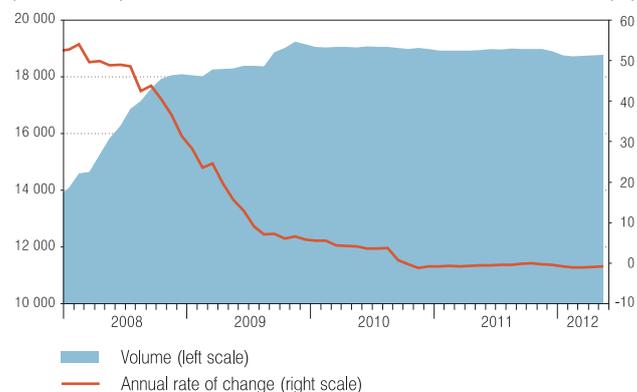


Source: BNB (interest rate statistics: interest rates and volumes of new business: breakdown of loans to the non-financial corporation and household sectors by original maturity).

In the April – May period new loans<sup>19</sup> to non-financial corporations totalled BGN 2294.6 million (BGN 2373.2 million in the corresponding period of 2011).<sup>20</sup> The high monthly volatility of new loans to corporations was retained, though the six-month moving average of these volumes showed a tendency of recovering to the pre-crisis levels notwithstanding the higher lending standards.

### Claims on Households

(million BGN)



Source: BNB (monetary statistics: monetary survey).

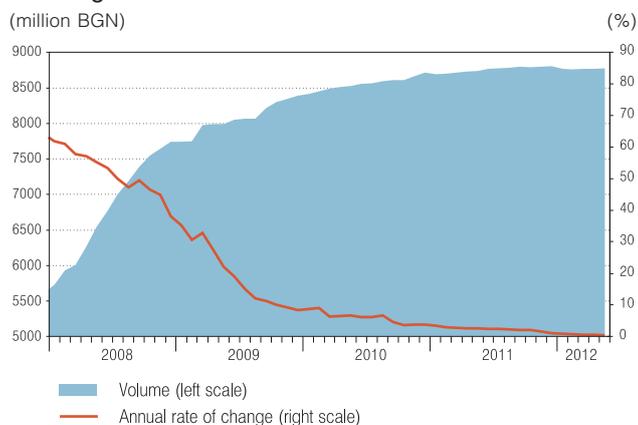
The downward trend in household lending persisted in the April to May period, and at the end of May the total volume of banks' claims on households fell by 0.8 per cent on an annual basis. Despite the increase in consumption over the first quarter of 2012, its volatile rates of change continued to reflect the overall uncertain-

<sup>19</sup> Renegotiation of loans to corporations and households continued to affect the dynamics of interest rates on new bank loans.

<sup>20</sup> Some of these volumes are renegotiated loans which shows that the banking system has reacted adequately to the difficulties experienced by corporations and households.

ty of households surrounding the relatively high level of unemployment and the pessimism about their future financial situation. Households remained cautious to new liabilities and preferred to repay their old obligations and to save.

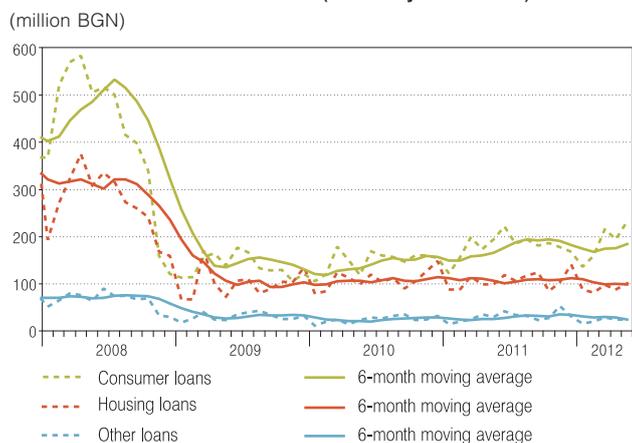
## Housing Loans



Source: BNB (monetary statistics: loans to non-financial corporations, households and NPISHs).

In April and May 2012 claims on households marked an increase of BGN 53.2 million against an increase of BGN 19.6 million in the same period of 2011. *Housing loans* and *other loans* increased by 0.4 per cent and 7.5 per cent on an annual basis respectively, while *overdraft* and *consumer loans* decreased by 8.9 per cent and 1.2 per cent respectively.

## New Loans to Households (Monthly Volumes)



Source: BNB (interest rate statistics: interest rates and volumes of new business: breakdown of loans to the non-financial corporation and household sectors by original maturity).

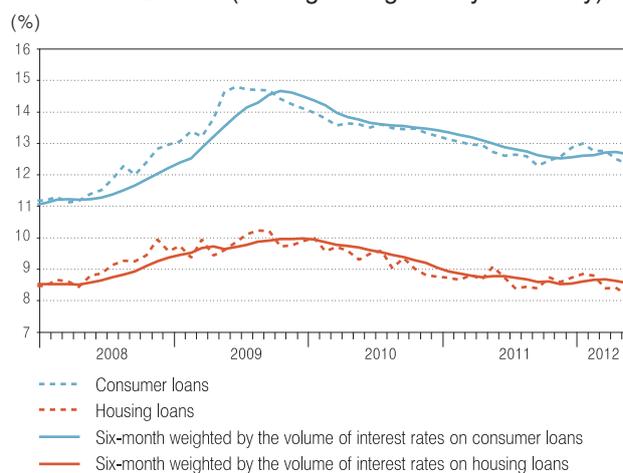
The statistics of new business loans <sup>21</sup> still reports higher agreed volumes of consumer loans compared to housing loans. In the April – May period of 2012 new *consumer loans* accounted for BGN 427.5 million: up 16.6 per cent on the

<sup>21</sup> See footnote 20.

corresponding period of the prior year. New *housing loans* totalled BGN189.5 million (down 4.1 per cent on an annual basis). Over the review period new loans to households amounted to BGN 665.9 million.

In May interest rates on new *consumer* and *housing loans* decreased on March. Similar developments were reported in the interest rates of *other loans*. These decreases led to a 0.2 percentage points drop in the average weighted interest rate on household loans to 9.9 per cent.

## The Annual Percentage Rate of Charges on New Household Loans\* (Average Weighted by Currency)



\* The term 'newly agreed' refers to the statistical category of new business.

Source: BNB (interest rate statistics: annual percentage rate of charges on new business: breakdown of loans to the household sector by original maturity).

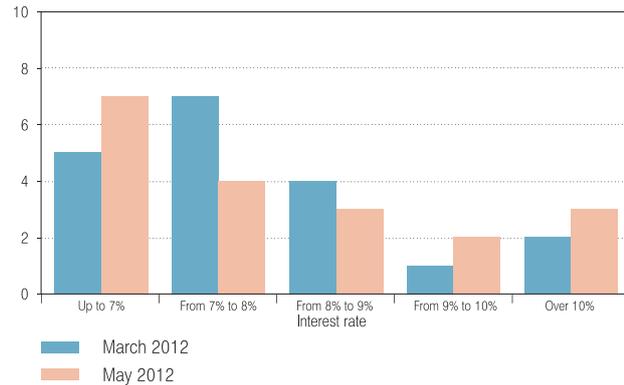
The average annual percentage rate of charges (APRC) on new consumer loans amounted to 12.53 per cent in May (against 12.82 per cent in March) and the average interest rate on these loans fell by 34 basis points on March to reach 10.97 per cent.<sup>22</sup>

In May the average annual percentage rate of charges on new housing loans declined by 35 basis points on the end of the first quarter to 8.32 per cent and the average interest rates on housing loans decreased to 7.62 per cent.

<sup>22</sup> The average annual percentage rate of charges is the total amount of credit to the credit borrower expressed as an annual per cent of the total sum of extended credit (Directive 87/102/EEC on Consumer Credit amended by Directive 90/88/EEC and Directive 98/7/EC).

## Distribution of Interest Rates on New Housing Loans in Euro

(frequency – number of banks)

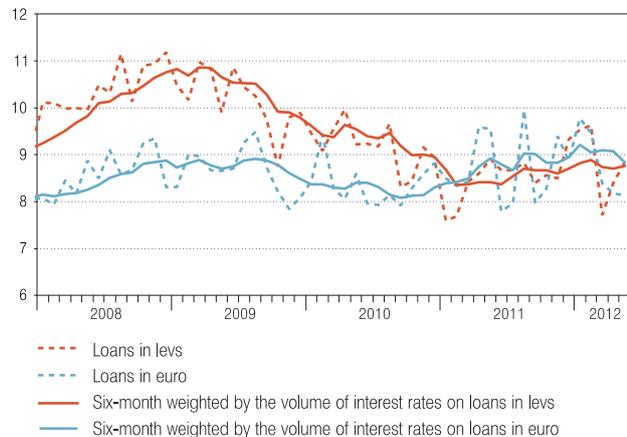


Source: BNB.

As regards the distribution of interest rates on housing loans in euro by bank, in May the number of banks offering rates within the up to 7 per cent, from 9 to 10 per cent and over 10 per cent band increased at the expense of those offering rates from 7 to 8 per cent and from 8 to 9 per cent band. Over the same period, the average interest rate level declined by 11 basis points, while the dispersion ratio rose by 26 basis points to 1.76.

## Interest Rates on New Loans in Levs and Euro to Non-financial Corporations

(%)



Sources: BNB (interest rate statistics: interest rates and volumes of new business on loans to non-financial corporation and household sectors by original maturity).

In May the average rate on new business bank loans to non-financial corporations declined by 88 basis points on March to reach 8.30 per cent. Interest rates on lev-, euro- and USD-denominated loans declined by 33 basis points, 109 basis points and 30 basis points respectively.

In the second half of 2012 the slightly declining trend of lending interest rates is expected to be sustained in line with our expectations of the cost of financing in the banking system, the bulk of which (81.9 per cent<sup>23</sup>) comprised of deposits of *individuals and households* and *institutions other than credit*. The risks to the projection are assessed as balanced: on the one hand, the significant liquidity provided by the ECB to euro area banks will exert a downward pressure along with ECB interest rate decreases as of 11 July, and on the other hand, the likely increase in instability and uncertainty in global financial markets and their effect on Bulgaria's risk premium will act in the upward direction.

<sup>23</sup> Ratio of the funds attracted from individuals and households and institutions other than credit to the total volume of attracted funds, calculated on the basis of Banking Supervision data for the January to May 2012 period on average.

# 3. Economic Activity

---

The worsening of international environment at the end of 2011 had an adverse effect on Bulgarian exports in the first quarter of 2012. The latter was offset by higher household consumption and enhanced investment activity, with real GDP remaining at its end-2011 level.

In the second half of 2012 economic growth is expected to gradually increase on a quarterly basis with a slow recovery in domestic demand and less pronounced negative effects of external environment on Bulgarian exports. Domestic demand will recover slowly due to the cautious behaviour of firms in launching investment projects and their staff reduction policy which will subdue the recovery of household consumption.

In the first quarter of 2012 real GDP remained at its previous quarter level.<sup>1</sup> Low economic activity affecting also the drop in euro area foreign trade of end-2011 and early 2012, had a negative effect on Bulgarian exports in the first quarter of 2012. On the other hand, household consumption and gross capital formation contributed positively to growth.

On a quarterly basis, investment in fixed assets increased by 0.4 per cent in the first quarter of 2012. While instability and uncertainty on international financial markets continued to push down investment demand since the start of the crisis, foreign direct investment in Bulgaria was a favourable factor behind investment growth. Although far below pre-crisis levels, foreign capital inflow in Bulgaria started to increase from the fourth quarter of 2011. The increase in investments in fixed assets was also attributable to the higher government's capital expenditure.

The increase in inventories in the economy added sizeably to GDP growth both in 2011 and in the first quarter of 2012. On the one hand, faster growth in inventories observed since 2011 reflected the recovery in their normal volumes adequate for this level of economic activity following the very slow growth during the crisis. On the other hand, it is possible that firms accumulated a high level of inventories due to the

fall in exports that they either did not expect or thought to be short-lived.

While the slowdown in EU economic growth started in the last quarter of 2011, the negative effect thereof on Bulgarian exports occurred in early 2012. Exports of goods and services dropped down in real terms by 2.9 per cent on a quarterly basis in the first quarter of 2012 following the increase of 2.8 per cent in the fourth quarter of 2011. Imports of goods and services in real terms also went down but more slowly compared to exports which resulted in a negative net exports contribution. On the one hand, the developments in imports were determined by the fall in the imports of certain raw materials used mainly in the production of export output. On the other hand, due to the positive dynamics in household consumption and the enhanced investment activity, imports of consumer and, in particular, of investment goods increased.

The situation on the labour market remains unfavourable, although signs of a moderate decline in the fall of employment were observed and as of April consumer expectations related to the change in unemployment level improved. In the first quarter of 2012 household consumption increased by 0.7 per cent on a quarterly basis, having declined by a total of 0.6 per cent in 2011. In parallel with the increase in consumption, the household savings rate decreased slightly from its relatively high 2011 levels.

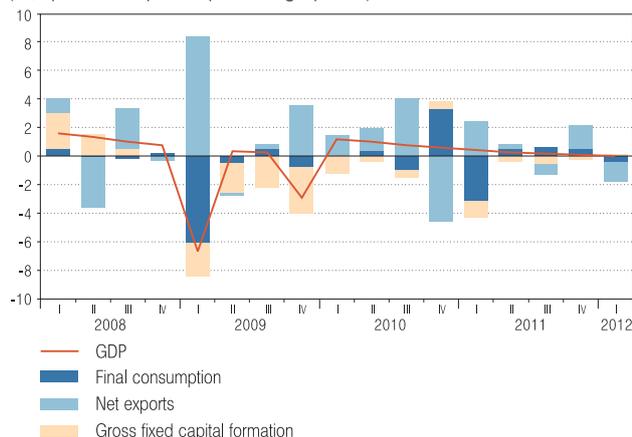
In the first quarter of 2012 government's final consumption declined by 0.5 per cent in real terms contributing negatively to growth.

---

<sup>1</sup> The quarter-on-quarter analysis in this section employs seasonally adjusted data, unless otherwise indicated. For indicators on which the NSI or Eurostat do not officially publish seasonally adjusted data, adjustment was made via the TRAMO SEATS programme by using automated set up for diagnostics and optimisation of adjustment parameters.

### Contribution to GDP Growth by Component of Final Use (Seasonally Adjusted Data)

(%, quarter-on-quarter percentage points)



Note: Non-additive data due to direct chain-linked volumes and seasonal adjustment of GDP and its components.

Sources: NSI, BNB.

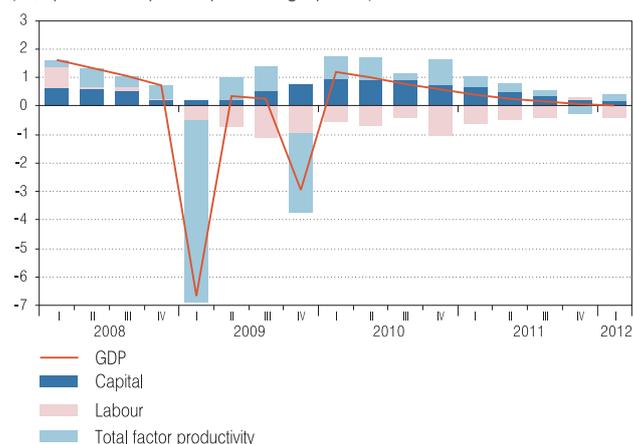
Based on the growth breakdown by production factor, the contribution of the used capital<sup>2</sup> remained positive in the first quarter of 2012, though retaining its downward trend. This was attributable to the negative investment dynamics until end-2011 which was not offset by the higher levels of capacity utilisation over the recent quarters. Over the past year the negative contribution of the labour factor<sup>3</sup> also declined gradually and in the fourth quarter of 2011 a positive contribution was reported due to the increase in the number of employed. In the first quarter of 2012 labour input declined again and was compensated by the higher total factor productivity.

<sup>2</sup> Calculations are based on the capital estimated through seasonally adjusted accumulated capital corrected for the capacity utilisation rate in manufacturing according to the business tendency survey in industry. The HP filter (parameter =10) is applied to the capacity utilisation indicator.

<sup>3</sup> The contribution of the labour factor is measured by total hours worked in economy.

### Contribution of Changes in Input Costs to GDP Growth

(%, quarter-on-quarter percentage points)

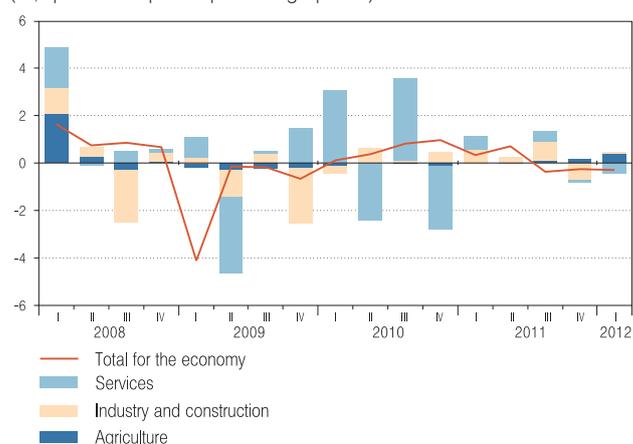


Sources: NSI, BNB.

Gross value added in the economy went down by 0.3 per cent on a quarterly basis in the first quarter of 2012. Most of services subsectors contributed negatively to this. Trade, transport, the hotel and restaurant sector, industry and agricultural sector reported growth.

### Value Added Growth and Contribution by Sector

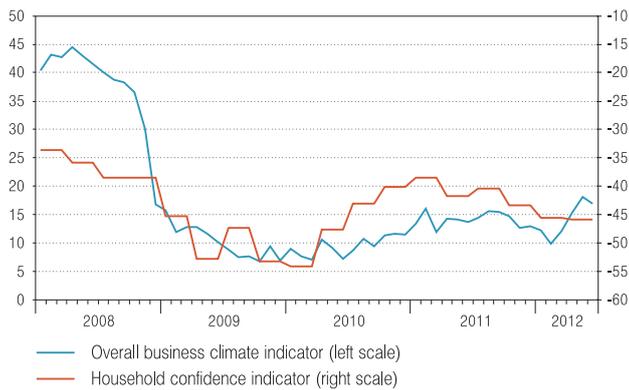
(%, quarter-on-quarter percentage points)



Note: Non-additive data due to direct chain-linked volumes and seasonal adjustment of GDP and its components.

Sources: NSI, BNB.

## Business Climate and Household Confidence Indicator



Sources: NSI, BNB.

In the second quarter of 2012 conjunctural indicators improved. After managers' expectations of their future business situation improved in all sectors in the first quarter, by June assessments of the current situation also improved. Although in the first five months of 2012 the uncertain economic environment remained the main factor impeding corporations' activity, insufficient demand was also discerned as a strong negative factor. In the second quarter firms' managers report enhanced competition compared with the first one and less financial problems for the firms in industry, trade and services. The consumer confidence indicator marked a slight decrease on its January level and among its components the employment expectations for the following 12 months improved.

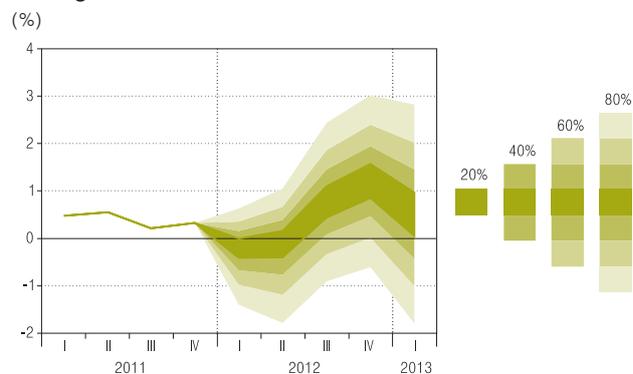
We expect less pronounced unfavourable effects of the worsened international environment in the second quarter. Export growth is likely to accelerate in the second half of 2012, provided that the sovereign debt crisis does not escalate and the expectations of EU economic growth recovery materialise.

Improved domestic economic environment in the second quarter and the foreseen better external conditions in the second half-year will have a positive effect on household expectations. Notwithstanding the ongoing fall in employment and provided that the positive household income dynamics continues and the saving rate stabilises slightly below the relatively high 2011 levels, household consumption will continue to recover slowly over the second half of 2012.

Investment demand dynamics will continue to depend on the international financial market developments and foreign direct investment inflow. Investment demand is expected to benefit if the relatively good current financial state of firms remains sustained and the capacity utilisation rate accelerates. However, it is likely gross fixed capital formation in 2012 to remain below its 2011 levels due to the high degree of uncertainty about the international economic environment.

Our expectations of the real GDP dynamics in the coming quarters and associated uncertainty are presented in the fan chart on the quarter-on-quarter GDP growth rate.<sup>4</sup>

## Fan Chart of the Expected Quarter-on-quarter Rate of Change of GDP



Note: The fan chart shows the expert views of the forecasters on the uncertainty around the projected value based on probability distribution. The middle band of the chart, depicted in the darkest colour, includes the central projection. Probability distribution assigns 20 per cent probability for the actual value to fall in this band in each of the quarters. If neighbouring bands (in the same brighter colour) are added to the middle band, there would be 40 per cent coverage of the probability mass. Thus, by adding each same colour couple of bands, the probability for the value to fall there would be increased by 20 percentage points to reach 80 per cent. The probability for the value to remain outside the coloured part of the chart is 20 per cent based on the distribution chosen.

Sources: NSI, BNB.

The real GDP in the second quarter of 2012 is projected to remain close to its previous quarter level and the negative effects of the worsened international environment on Bulgarian exports are expected to weaken. A gradual recovery of growth is expected to start by mid-year and the rates are likely to be between -0.4 per cent and 0.8 per cent in the third quarter and between -0.2 per cent and 1.2 per cent<sup>5</sup> in the fourth quarter of the year.

<sup>4</sup> For further details, see the box entitled *Measurement and Presentation of Uncertainty in Forecasting Economic Indicators*, Economic Review, 1/2012, p. 58.

<sup>5</sup> Thus presented ranges of the expected growth rate of real

## Gross Value Added Growth

(%, real growth on the previous quarter; seasonally adjusted data)

	2009				2010				2011				2012
	I	II	III	IV	I	II	III	IV	I	II	III	IV	I
Agriculture and forestry, hunting and fishing	-2.9	-4.5	-3.4	-3.7	-2.7	0.5	-0.4	-1.9	-1.0	0.5	2.4	2.9	6.4
Mining and quarrying, manufacturing production and distribution of electricity, gas and water	-0.9	-1.5	0.9	-1.8	-1.4	2.4	1.1	1.9	3.3	1.1	-0.6	1.3	0.1
Construction	5.2	-8.4	2.8	-22.4	0.0	1.1	-2.2	0.2	-3.0	-0.1	14.3	-14.1	0.8
Trade, cars and motorcycles repair; transport, storage and mail services; hotels and restaurants	1.8	-18.7	4.8	5.2	12.7	-7.8	18.6	-10.2	0.0	2.0	0.1	-0.4	0.9
Creation and dissemination of information and author products; communications	-1.5	1.9	-2.7	0.9	0.9	1.8	-0.9	-0.5	2.2	-2.3	1.8	0.0	-1.9
Finance and insurance activity	9.2	-2.7	-4.4	5.8	4.9	-8.8	4.6	-2.3	0.4	1.4	0.9	-0.1	-1.3
Real estate activities	0.8	-2.2	-3.5	-0.1	3.4	0.4	0.2	0.0	-1.2	1.7	0.7	1.2	-0.7
Professional activities and scientific research; administrative and ancillary activities	2.5	6.4	2.8	-1.7	-5.2	7.0	-2.8	1.4	9.2	-6.8	3.8	4.3	-3.2
General government; education; healthcare and social services	-2.8	4.3	1.2	-0.1	0.8	-1.6	-2.7	-0.7	0.7	-0.6	0.5	-1.2	0.0
Culture, sport and entertainment; other activity; activities of households as employers; non-identified activities of households producing goods and services for own use; activities of extraterritorial organisations and bodies	0.2	9.0	-4.2	1.0	-0.8	-2.3	-2.8	-0.7	-0.2	-5.7	-1.2	-6.2	-7.5
<b>Gross value added, total for the economy</b>	<b>-4.1</b>	<b>-0.1</b>	<b>-0.2</b>	<b>-0.7</b>	<b>0.1</b>	<b>0.4</b>	<b>0.8</b>	<b>0.9</b>	<b>0.3</b>	<b>0.7</b>	<b>-0.4</b>	<b>-0.3</b>	<b>-0.3</b>

Sources: NSI.

## GDP Growth by Component of Final Use

(%, real growth on the previous quarter; seasonally adjusted data)

	2009				2010				2011				2012
	I	II	III	IV	I	II	III	IV	I	II	III	IV	I
Consumption incl.	-7.2	-0.5	0.6	-0.8	0.0	0.4	-1.2	4.1	-3.7	0.7	0.7	0.6	-0.5
Household consumption	-6.8	-0.8	0.3	-0.6	0.2	0.4	-1.0	1.1	-1.3	0.7	0.7	-0.3	0.7
Final government consumption expenditure	-12.0	1.6	2.4	-0.8	2.1	0.9	1.6	1.0	2.2	-1.1	-1.1	-0.2	0.2
Collective consumption	-0.8	0.6	-0.6	-13.2	12.6	-1.5	-0.4	-1.8	-0.1	0.0	-0.6	0.6	-2.1
Gross fixed capital formation	-7.1	-6.5	-7.0	-11.5	-4.9	-1.7	-2.2	2.2	-5.0	-2.0	-2.7	-1.2	0.4
Exports of goods and non-factor services	-5.9	-2.5	0.2	6.7	1.2	6.8	8.4	-3.2	8.8	-0.6	0.5	2.8	-2.9
Imports of goods and non-factor services	-15.7	-1.7	-0.3	-0.2	-1.2	3.4	1.3	3.8	4.3	-0.9	1.5	0.2	-0.8
<b>Real GDP growth</b>	<b>-6.7</b>	<b>0.3</b>	<b>0.3</b>	<b>-2.9</b>	<b>1.2</b>	<b>1.0</b>	<b>0.8</b>	<b>0.6</b>	<b>0.4</b>	<b>0.3</b>	<b>0.1</b>	<b>0.1</b>	<b>0.0</b>

Sources: NSI.

The risks to the projection are assessed as balanced, although factors pushing both up or down are likely to occur. Faster recovery of domestic demand is possible if the plans of the government for a marked acceleration of the utilisation of the EU structural and cohesion fund materialise which will result in higher investment activity. More favourable developments of the external environment are also possible and will contribute to the growth of exports at rates high-

GDP correspond to 40 per cent probability according to our expert specification of the probability distribution for the relevant quarter.

er than expected. In such a case, the growth rate of real GDP may approach the upper limit of the projection for the second half-year.

Meanwhile, in case of a potential escalation of the sovereign debt crisis in the euro area, exports and investment activity might prove factors hampering economic growth over the period. If, concurrently, the expected improvement in the labour market does not materialise or if it does but at slower rates, this may result in a lower consumer demand and in a stronger fall in GDP below the floor of the range.

## Household Behaviour

In the first quarter of 2012 household consumption increased by 0.7 per cent on a quarterly basis after having declined slightly over the last quarter of 2011. In the second half of 2012 it is likely to recover slowly driven by the still unfavourable labour market developments and households' pessimism concerning the general economic situation and their financial performance in the coming months.

Household consumption in the first quarter of 2012 increased by 0.7 per cent on a quarter-on-quarter basis after a fall of -0.3 per cent in the last quarter of 2011. Fluctuations in the rate of change in consumption and the fact that it remained at relatively low levels reflect the overall household uncertainty. The ongoing decline in employment and households' pessimism regarding the general economic situation and their financial situation over the following 12 months still limit consumer expenditure. On the other hand, the slower decline in overall employment and the increase in some sectors probably contribute to an improvement in households' unemployment expectations. This perception and the stabilisation in their savings rate at a slightly lower than 2011 levels against the background of a slight increase in the wage bill are expected to continue to contribute to the slow recovery in consumption in the second half of 2012. On the other hand, given the unfavourable expectations of firms regarding the number of staff and the foreseen slow recovery of economic activity, employment is likely to continue to decline in 2012, albeit at a slower pace than in 2011.

According to national accounts data, household consumption in the non-food group continued to improve in the first quarter of 2012. Food and catering expenditure also contributed positively to consumption dynamics. Expenditure on non-production services marked a decrease.<sup>6</sup> Data on retail trade also showed signs of recovery. From the second quarter of 2011 until April 2012 the recovery in the retail trade volumes of pharmaceutical and medical products and cosmetics continued. In the first quarter of 2012 and in the beginning of the second quarter food and computer and communication equipment groups also reported high retail trade volumes.

Employment dynamics reflected on household propensity to consume. In the first quarter of

2012 employment declined further following the temporary slight quarter-on-quarter growth in the fourth quarter of 2011, although at a slower pace than that observed in 2011. Firms' employment expectations formed in early 2012 continued to be pessimistic, affected by uncertainty around the international situation and the speed of economic activity recovery in Bulgaria. The decrease in employment in the first quarter of 2012 reflected mainly the lower number of employed in agriculture, industry and trade and to a lower extent to the smaller number of self-employed. The Labour Force Survey showed that unemployment of individuals at and above the age of 15 continued to increase in the first quarter of 2012 reaching 12.1 per cent according to seasonally adjusted data and 12.9 per cent according to not seasonally adjusted data. Employment Agency data point to a continuous increase in the level of seasonally adjusted unemployment in the second quarter of 2012 and in May reached 11 per cent both according to seasonally adjusted and not seasonally adjusted data for this month. This coupled with the still negative employment expectations of firms also suggest postponement in employment recovery.

According to the Labour Force Survey, the number of shorter-term unemployed increased more sizeably than in most of 2011 when longer-term unemployed (for a period of over two years) contributed most significantly to the rise in unemployment. As a result, the share of longer-term unemployed in the total number of jobless people went down for a second consecutive quarter reaching 54 per cent. One of the reasons behind employment termination is the rising number of closed temporary or seasonal jobs, but in contrast to previous quarters, lay-offs and dismissals posted an increase.

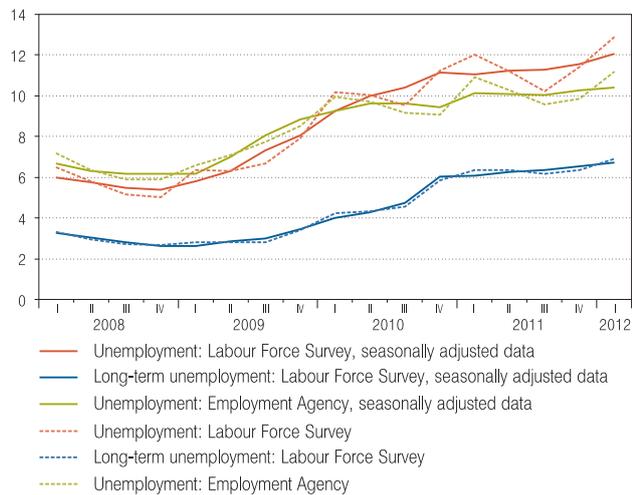
Employment dynamics in some sectors affected household behaviour in terms of labour supply. The increasing number of discouraged people indicates potential problems in labour supply. In the first quarter of 2012 their number remained

<sup>6</sup> Purchased non-production services include services other than public catering, water supply, heat energy and electricity, transportation and communications.

relatively high and the economic activity rate remained around 66 per cent according to seasonally adjusted data. The recovery of active labour supply will depend on the increasing labour demand which is likely to remain low mainly due to pessimistic expectations of firms in most sectors regarding the number of personnel.

### Unemployment

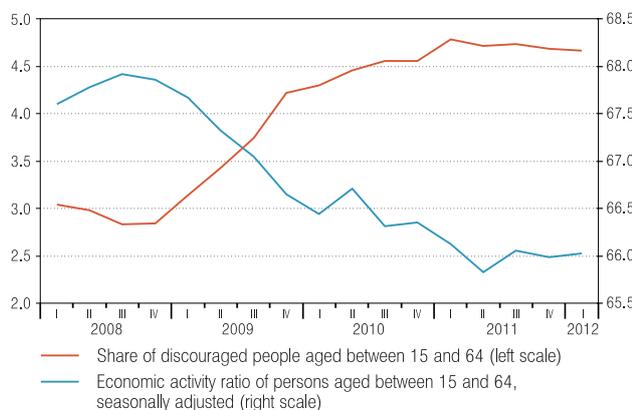
(%, share of labour force; seasonally adjusted data)



Sources: NSI, Employment Agency, BNB.

### Economic Activity and Share of Discouraged Persons

(%)



Sources: NSI, BNB.

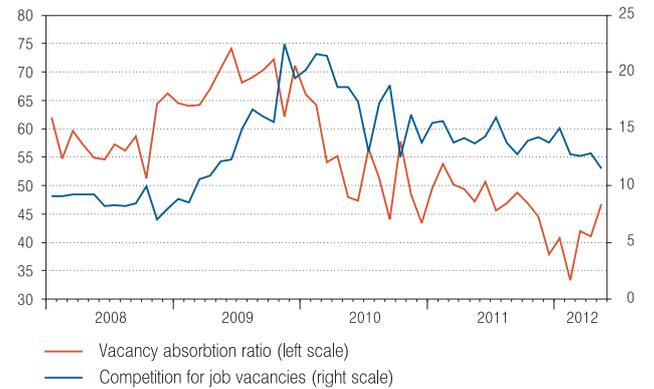
Labour supply may be also assessed on the basis of the competition for occupying vacancies indicator. Based on the Employment Agency data, in early 2012 the competition for occupying a vacancy declined slightly from its average of 14 persons *per* vacancy, reaching 10 persons *per* vacancy in May. On the other hand, the job-filling rate of vacant positions offered by the

Employment Agency<sup>7</sup> as an intermediary still remains relatively low. Regardless of the improvement in this rate in May compared to early 2012, it remains relatively low compared to its 2009 levels which signals more pronounced labour demand/supply imbalances.

### Competition and Vacancy Ratio

(%, seasonally adjusted data)

(number of persons)



Sources: Employment Agency, BNB.

Both labour supply and household consumption reflect income dynamics. According to national accounts data, nominal wage growth *per* employee continued to decline on an annual basis coming to 4.3 per cent in the first quarter of 2012 compared to 8.5 and 6.3 per cent in the third and fourth quarters of 2011 respectively. In real terms, the wage bill also reported a decline in its annual growth rate to 2.4 per cent in the first quarter of 2012 compared to 5.2 and 3.7 per cent in the third and fourth quarters of 2011 respectively.

According to the NSI household budget survey data, the average household income from wages increased to 8.8 per cent nominally on an annual basis compared to 6.7 and 5.7 per cent in the third and fourth quarters of 2011 respectively.

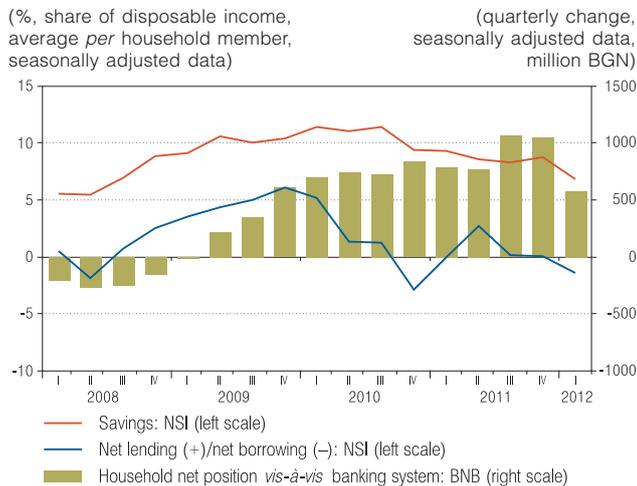
In the context of an ongoing fall in employment and low wage growth rates *per* employee in the first quarter of 2012, the wage bill in total economy also retained moderate quarter-on-quarter growth rates both in real and nominal terms.

Another factor reflected in household consumption is their savings rate. According to some

<sup>7</sup> The job vacancy rate is the percentage ratio between the number of vacancies occupied in a given month and the sum of vacancies in the reference month (unoccupied positions in the previous month and positions offered in the current one).

indicators, in the first quarter of 2012 this rate reported a slight decline on 2011. According to the NSI household budget survey<sup>8</sup>, the share of savings in disposable income contracted and the ratio between net lending and net borrowing declined. Furthermore, households' net assets in the banking system increased more slowly (BNB monetary statistics).

### Household Propensity to Save



Sources: NSI Household Budget Survey, BNB.

Current and future household investment demand may be assessed by the available statistics of the housing market. Data on the average market house prices and the residential building permits statistics still do not show signs of recovery in investment demand. Following the low increase of the third and fourth quarters of 2011, this indicator declined again in the first quarter of 2012. The number of flats in the residential building permits issued also remained low. In addition, the average market prices of dwellings continued to decline, albeit at a lower rate of -4.3 per cent after an average BNB decline of -6.1 per cent for 2011.

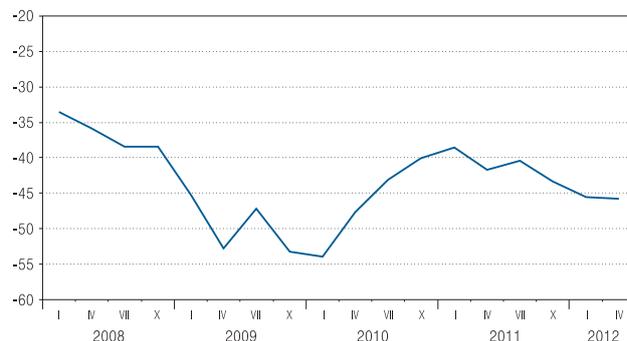
According to the NSI consumer survey data, following a deterioration in October 2011 and January 2012, the overall household confidence indicator declined slightly on its January levels and only unemployment expectations showed signs of a slight improvement. Households remained pessimistic about the general economic

<sup>8</sup> This indicator is based on NSI household budget survey data as a difference, on the one hand, between deposit amounts, foreign currency and bond purchases and repaid debt and granted loans, and, on the other hand, the amount of withdrawn savings, loans and credits.

situation and about their financial situation for the following 12 months.

### Household Confidence Indicator

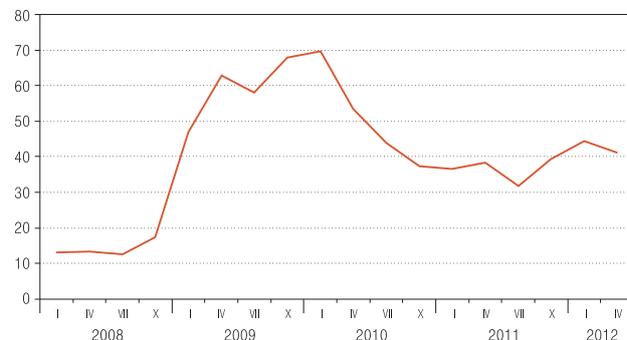
(balance of opinions; %)



Source: NSI Consumer Survey.

### Unemployment Expectations in the Next 12 Months

(balance of opinions; %)

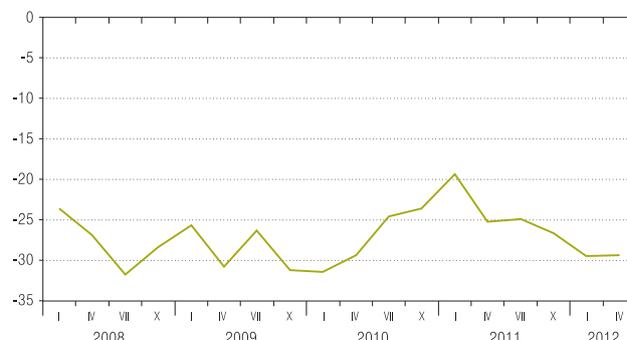


Source: NSI Consumer Survey.

Based on the business situation survey, firms' employment expectations also remained negative in the beginning of the year. Still negative values of this indicator, its instability and our economic activity projection give grounds to expect that only in 2013 a trend to employment recovery may be formed. In 2012 the rates of decrease in this indicator are expected to gradually moderate.

### Expectations of Households' Financial Performance in the Next 12 Months

(balance of opinions; %)



Source: NSI Consumer Survey.

## Retail Trade Turnover

(% on the previous quarter; seasonally adjusted data at constant prices)

	2009				2010				2011				2012	
	I	II	III	IV	I	II	III	IV	I	II	III	IV	I	април
Retail trade turnover (excluding cars and motorcycles) incl.	-3.0	-3.4	-2.0	-1.6	-5.6	-0.4	0.9	-0.4	-3.0	-0.7	-1.3	-1.1	-1.2	0.0
Foods, drinks and tobacco	6.8	-0.4	0.8	0.1	0.8	0.9	0.0	0.1	-1.5	-0.5	0.1	-0.1	1.0	0.4
Textile, clothing, footwear and leather	-6.4	-2.4	-3.3	1.2	6.9	0.2	1.3	-0.2	-1.0	-2.9	-3.7	1.0	-17.4	0.4
Household goods and home appliances	-16.1	-4.6	-4.9	-3.8	-11.1	0.5	-0.3	-2.1	-2.9	-1.4	-2.4	-2.5	-5.4	1.9
Computers and communication equipment, etc.	-23.4	-1.9	-2.5	-2.7	-1.7	-0.8	8.2	1.5	-8.7	0.5	0.3	-0.9	0.4	0.4
Pharmaceutical and medical goods, cosmetics and toiletries	6.3	-0.9	2.2	1.8	3.3	1.4	1.1	1.7	-1.4	3.1	2.4	3.0	0.9	0.9
Unspecialised shops with different kinds of goods	52.4	-0.3	-0.5	0.1	16.9	1.8	3.4	2.3	1.6	-0.2	-2.1	0.0	-6.6	-1.4
Automobile fuels and lubricants	-2.6	-3.7	0.1	-0.1	-30.2	1.2	2.7	-0.4	1.1	-0.8	-1.8	-1.4	-2.0	-0.3

Source: NSI Domestic Trade Survey.

## Employment and Income Dynamics

(% on the previous quarter; seasonally adjusted data unless otherwise indicated)

	2009				2010				2011				2012
	I	II	III	IV	I	II	III	IV	I	II	III	IV	I
Employed	-0.7	-1.1	-1.9	-1.5	-0.9	-1.3	-0.3	-1.9	-1.2	-0.7	-0.9	0.3	-0.6
Nominal wage <i>per</i> employee	1.8	2.3	2.4	-2.7	16.1	-2.6	-0.8	2.2	2.9	2.4	0.5	0.9	0.6
Real* wage <i>per</i> employee	1.0	3.1	3.3	0.0	6.3	-0.6	1.3	0.9	-1.1	2.3	0.4	0.2	1.1
Wage bill, nominal terms	2.7	2.5	1.8	-8.2	13.3	-1.2	-0.2	-0.3	0.2	1.8	1.0	0.6	0.7
Wage bill, real terms*	1.4	3.4	2.2	-11.3	16.0	-3.6	-1.3	-1.3	-1.2	1.6	0.3	-0.6	1.0
Unemployment (15+), average for the period, % of the labour force	5.8	6.3	7.3	8.1	9.3	10.0	10.4	11.1	11.0	11.2	11.3	11.6	12.1

\* Data deflated by HICP.

Sources: NSI – SNA, NSI – Labour Force Survey, BNB own calculations, Eurostat.

In the third quarter of 2012 the rate of decline in employment is expected to be between -0.9 and -0.2 per cent and between -0.6 and 0.2 per cent in the fourth quarter on a quarterly basis. These rates may be beyond the intervals mentioned above provided that a sizeable change occurs in the expectations of euro area crisis developments and economic activity which are likely to affect firms' requirements and capability to employ staff.

Expectations of a continuous fall in employment in 2012 and a comparatively high level of unemployment will probably result in a more moderate increase in nominal wages in the review year, with the strong link between real wage growth and labour productivity being sustained.

In line with these developments, the gradual recovery of consumer and investment demand of households is likely to continue smoothly.

## Government Finance and Consumption

In the first quarter of 2012 the consolidated fiscal programme deficit reached BGN -691.0 million (-0.9 per cent of the projected GDP for the year). According to preliminary monthly data of the Ministry of Finance, the consolidated fiscal programme balance improved to a surplus of BGN 67.4 million as of the end of May 2012.

On 22 June the Economic and Financial Affairs Council decided to abrogate the excessive deficit procedure for Bulgaria.

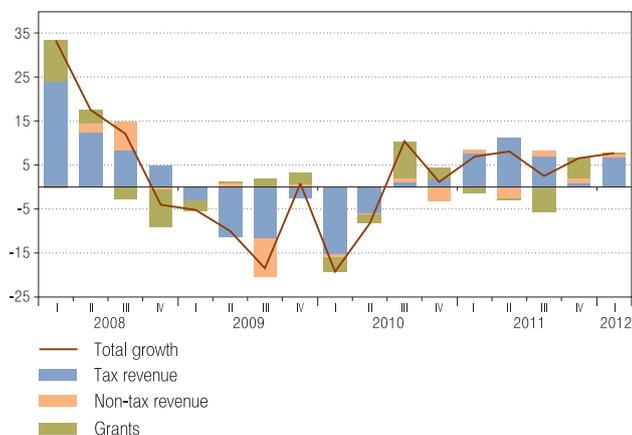
In the first quarter of 2012 government consumption had a slightly negative contribution (-0.2 percentage points) to the quarter-on-quarter GDP growth. A positive, but close to zero government consumption contribution to GDP growth is expected by the close of the year.

According to quarterly data on the implementation of the consolidated fiscal programme, the budget balance came to BGN -691.0 million by end-March: an improvement of more than BGN 50 million on the same period of the prior year.

Total budget revenue in the first quarter of 2012 went up by 7.7 per cent largely due to the sizeable increase in VAT receipts (up 33.4 per cent) and excise duties (up 6.3 per cent). According to the Ministry of Finance, this increase was underpinned by the higher fuel price in early 2012 and the boost in indirect tax collectability reflecting the launch of the remote connection between the National Revenue Agency and the fiscal printers of all traders which had to be established by the end of March 2012. The difference in the tax credit refund periods in 2011 and 2012 and the annual nominal increase in household consumption of 7.5 per cent also contributed to the higher indirect tax income (up 22 per cent) in the first quarter of 2012.

### Contribution of Major Groups of Revenue to Growth in Total Revenue and Grants (Quarterly, on an Annual Basis)

(%, percentage points)



Sources: MF, BNB.

The favourable effect of the sizeable increase in tax income on consumption was partially offset by the fall in direct tax receipts of 3.3 per cent. The decrease in revenue from profit tax by 9.7 per cent on an annual basis in the first quarter reflected the nominal change in the gross operating surplus (-10.3 per cent) and was entirely driven by the weaker performance of non-financial corporations' profit tax (down 11.3 per cent<sup>9</sup>). Lower corporate income tax revenue in the first quarter of 2012, the period when the largest share (40 per cent) of the revenue from this tax for the year is received after the submission of the annual tax declarations of firms, suggests that it will remain weak throughout the rest of the review year. On the other hand, the revenue from the personal income tax increased by 4.1 per cent largely due to the nominal growth in the compensation of employees in the economy (3.3 per cent).

The fall in budget receipts from social security contributions (down 3.2 per cent) in the January–March 2012 period was entirely due to the March 2011 one-off transfers of professional pension funds. If this one-off effect is removed, growth in the first three months of 2012 would approximate 5.5 per cent on an annual basis.

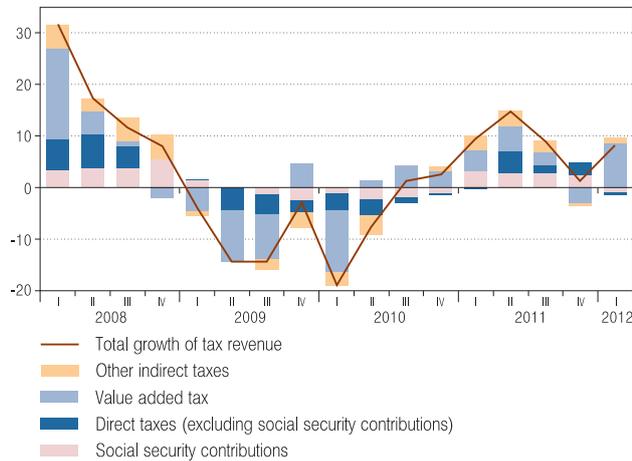
In the first quarter of 2012 the EU funds budget reported a deficit of BGN 257 million. Although revenues from grants increased by 9.1 per cent on an annual basis, their realisation rate by end-March 2012 was just 6.5 per cent of that projected in the 2012 State Budget Law of the Republic of Bulgaria.

<sup>9</sup> According to preliminary monthly data of the Ministry of Finance.

In the first quarter of 2012 the current and capital expenditure had almost equal contribution to the increase in total budget expenditure (including Bulgaria's contribution to the EU budget): up 6.0 per cent on the corresponding period of 2011.

### Contribution of Major Tax Groups to Tax Revenue Growth (Quarterly, on an Annual Basis)

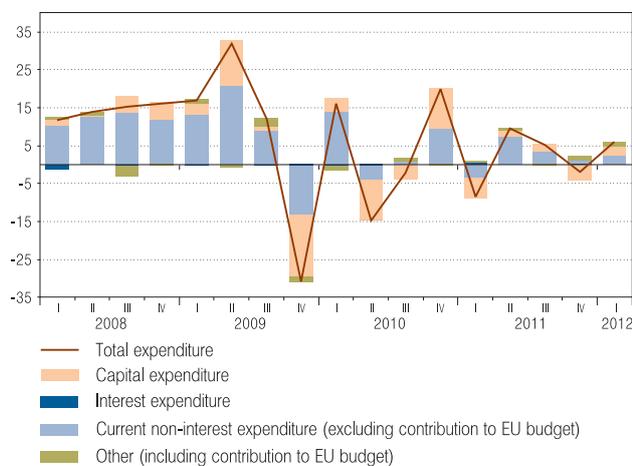
(%, percentage points)



Sources: MF, BNB.

### Contribution of Major Groups of Expenditure to Total Expenditure Growth (Quarterly, on an Annual Basis)

(%, percentage points)

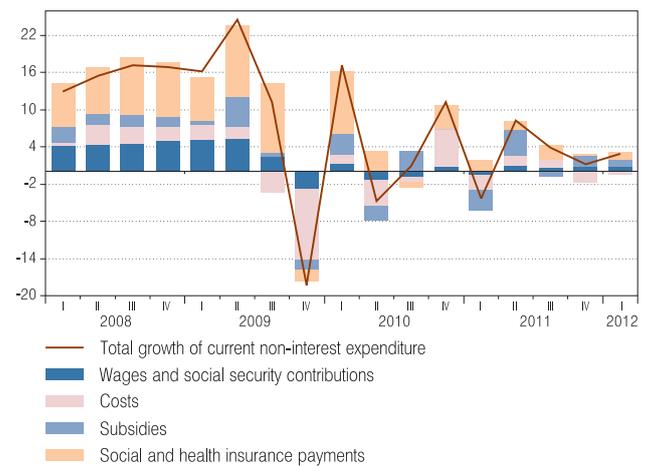


Sources: MF, BNB.

The increase in current expenditure on the corresponding period of the previous year was mainly driven by higher subsidy and social payments. The higher subsidy expenditure was due to the accelerated payment of national co-financing under the single payments scheme and of the grants to tobacco producers paid by March, while in 2011 the bulk of these subsidies was paid in March and April. Higher social security and care payments reflected higher pension expenditure.

### Contribution of Major Groups of Current Non-interest Expenditure to Total Expenditure Growth (Quarterly, on an Annual Basis)

(%, percentage points)



Sources: MF, BNB.

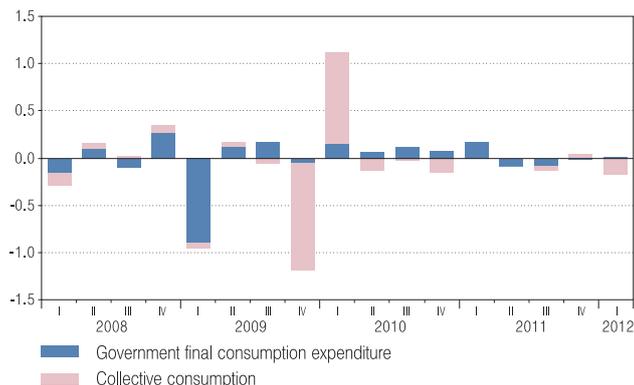
The higher contribution to the EU budget in the first quarter of 2012 (up 22.7 per cent) and the sizeable increase in capital expenditure by 38.3 per cent<sup>10</sup> added to the annual growth of total government expenditure. Most of the investment expenditure is related to EU programmes. Operating expenditure was the only group among major budget expenditure groups reporting a decline by 1.4 per cent on the first quarter of 2011.

The accumulated deficit on the consolidated fiscal programme over the first quarter of 2012 and the repayments on maturing government debt instruments were again financed mainly by drawing funds from the fiscal reserve which by end-March contracted by BGN 468.0 million on end-2011 to a level of BGN 4530.8 million. The remaining portion of the funds required to finance the budget were mostly raised by the realisation of a positive net issue of government securities on the domestic market (BGN 320.6 million) and positive net external financing to the amount of BGN 138.9 million.

<sup>10</sup> Including growth in government reserve.

### Contribution of Government Consumption to Economic Growth (Quarter-on-quarter Contribution to Seasonally Adjusted GDP Growth)

(percentage points)



Sources: NSI, BNB.

In the first quarter of 2012 government consumption had a slightly negative contribution (-0.2 percentage points) to the quarter-on-quarter GDP growth. The negative contribution reflected mainly lower collective consumption (-0.2 percentage point contribution), while the contribution of government final consumption expenditure remained unchanged from the previous quarter. A positive, but close to zero government consumption contribution to GDP growth is expected by the end of the year underpinned by the projected increase in government maintenance costs and social payments. The increase in minimum wage effective as of the beginning of May is also likely to affect wage expenditure in the public sector and government consumption growth.

In its Annual Report of 28 May 2012, Moody's confirmed Bulgaria's Baa2 rating and stability outlook. According to the Ministry of Finance, the Agency assesses the fiscal and financial position of Bulgaria as stable, highlighting the low budget deficit and government debt levels, as well as the stability of the currency board.

On 22 June, following the recommendation of the European Commission, the Economic and Financial Affairs Council of the EU (ECOFIN) decided to close the excessive deficit procedure for Bulgaria. The decision came after the confirmation from Eurostat of the data on the budget deficit for 2011 (2.1 per cent of GDP under ESA'95 methodology), and after the European Commission's spring forecast which envisage the deficit to decrease to -1.9 per cent of GDP in 2012 and to -1.7 per cent of GDP in 2013.

According to preliminary monthly data of the Ministry of Finance for the January–May period, the consolidated fiscal programme reported a surplus of BGN 67.4 million. The positive balance in the first five months of 2012 is a result of the surplus of the national budget of BGN 334.5 million and the deficit on the EU programmes of BGN 267.0 million.

Total budget revenue and grants in the first five months of 2012 were BGN 11,010 million: up 10.1 per cent on the same period of 2011. The annual growth of tax revenue (6.7 per cent) moderated further compared to the previous months as a result of the declining annual VAT revenue growth rate (15.7 per cent) and a decline in social insurance receipts by 0.6 per cent. By end-May corporate income tax receipts<sup>11</sup> marked a minimal increase of 1.1 per cent and the upward movement in receipts from personal income tax which started in early 2012 was sustained (6.2 per cent).

In May receipts from grants and non-tax revenue made a sizeable contribution to the increase in total budget revenue. The annual growth in non-tax revenue over the first five months of 2012 (by 12.2 per cent) was largely due to the sizeable revenue from dividends of firms with government participation: BGN 276.8 million in May, including the dividend of the Bulgarian Energy Holding AD and the State Consolidation Company which by end-2011 privatised the government shares in EVN Bulgaria Elektrorazpredelenie and EVN Bulgaria Elektrosnabdiavane.

Between January and May expenditure on the consolidated fiscal programme (including the contribution to the common EU budget) reached BGN 10,943 million: an increase of 3.3 per cent on the corresponding period of 2011. The slow down in the annual growth rate of expenditure over the period was driven by the lower subsidy expenditure and the lower operating expenditure. Total budget expenditure growth was driven mainly by capital expenditure (with a contribution of 18.4 percentage points to total expenditure growth) and social payments (1.56 percentage point contribution). Bulgaria's contribution to the common EU budget increased sizeably by over

<sup>11</sup> Including revenue from taxes on dividends and liquidation interests of resident and non-resident legal entities and income tax of the latter.

30 per cent largely due to the growth in gross national income (up around BGN 75 million).

Between January and May 2012 the net financing of the budget by government securities was positive amounting to BGN 367.9 million, in May alone it was BGN 50 million. Government securities repayments for the period came to BGN 344.8 million and bonds issued amounted to BGN 712.6 million (BGN 713.8 million nominal value). After the budget surplus reported in April and May, the fiscal reserve reached BGN 5046.6 million. By-end May the funds from the privatisation of Bulgartabac Holding AD and the budget receipts from other privatisation transactions and concessions were transferred to the account of the Silver Fund. The total amount of Silver Fund's receipts was BGN 310.1 million and total funds reached BGN 2086.9 million.

### Government Securities Market

On 2 July 2012 Bulgaria successfully issued new five-year Eurobonds on the international capital markets with a nominal value of EUR 950 million maturing on 9 July 2017. The annual coupon rate was 4.25 per cent and the total annual yield attained 4.436 per cent. The total value of bids submitted by investors exceeded six times the value of the offered government securities.

In the first half of 2012 the nominal value of government securities sold on the domestic market reached BGN 733.8 million: up BGN 276.7 million on the first six months of 2011. The bid-to-cover ratio decreased on the corresponding period of 2011 but remained relatively high: 2.43 per cent.

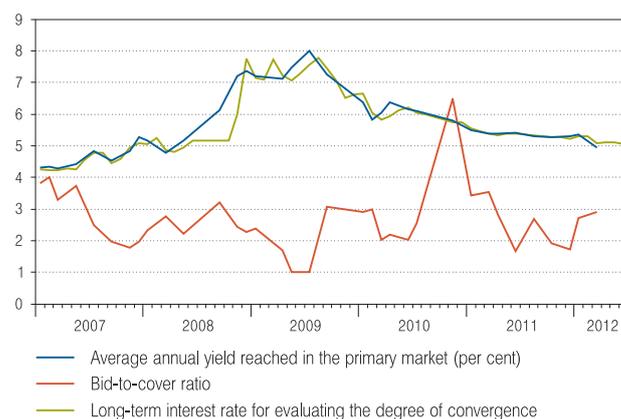
In the January–June period, a total of 16 auctions for the sale of government securities were conducted offering seven issues with different maturity and currency denomination worth BGN 826.8 million nominal value (including the lev equivalent of EUR 185 million). The residual maturity of the government securities sold at the primary market over the review period was between two years and 10 years and six months, with the two-year BGN-denominated issue of 2012 reporting four openings, followed by the five-year EUR-denominated issue of 2011 – three openings and the 10-year BGN-denominated issue – three openings.

Government securities sold on the domestic market over the second quarter of 2012 amounted

to BGN 147.2 million: a drastic drop compared to previous quarter's BGN 586.6 million. In addition to the large volume of government securities issued in the first quarter of the year, another possible reason behind the lower number of issues in the April–June period is the fact that in early July Bulgaria sold its Eurobond issue on the international markets.

In the first five months of the year the activity on the secondary market remained relatively low compared to the corresponding period of the previous year. One of the factors behind the lower volume was the issue of new Bulgarian Eurobonds on the international markets as part of the investors on the domestic government securities market preferred to wait and see the results from the Eurobond issue and only then to take investment decisions.

### Ten-Year-and-Six-Month Government Bond Primary and Secondary Market Dynamics



Source: BNB.

Despite the increasing uncertainty on European debt markets and the reported lower activity on the domestic government securities market, in May the yield on the long-term Bulgarian benchmark issue remained unchanged from its April levels (5.11 per cent) which is indicative of the sustained investor confidence in the Bulgarian government debt instruments.

According to the indicative issue calendar of the Ministry of Finance, in the third quarter of the year domestic government securities issues are projected to reach a total nominal value of BGN 228.9 million. Provided the issues in the calendar are sold, the nominal value of the gross issue for the January–September period will reach BGN 962.7 million.

## Behaviour of Firms and Competitiveness

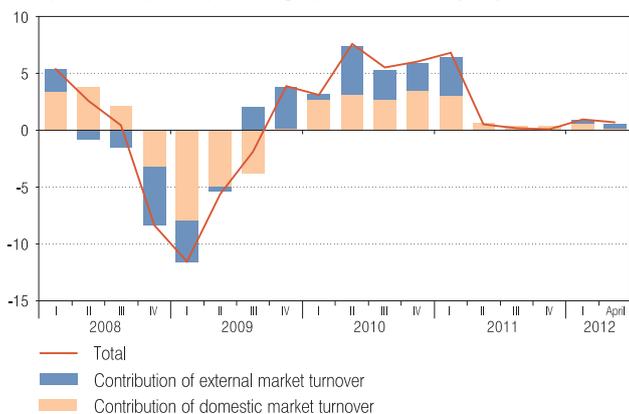
Against the background of contracting gross value added, firms continued to curb their labour costs, mostly by shedding staff. As a result, labour productivity increased on a quarterly basis, while nominal unit labour costs decreased. Firms' economic activity is expected to start to recover slowly in the third and fourth quarters of 2012 reflecting higher domestic demand and a more stable international economic environment.

The worsening of economic environment both internationally and in the EU, in particular, continued in the first quarter of 2012. As a result, the demand for Bulgarian goods and services contracted. Concurrently, household consumption and investment in fixed capital went up contributing to an increase in domestic demand. Nevertheless, gross value added for the economy decreased on a quarter-on-quarter basis by 0.3 per cent.

Reflecting the effect of the two opposite trends – a decrease in exports and an increase in domestic demand – in the first quarter of 2012 gross value added in industry rose slightly by 0.1 per cent on the fourth quarter of 2011.

### Industry Turnover Dynamics

(%, quarter-on-quarter percentage points, seasonally adjusted data)

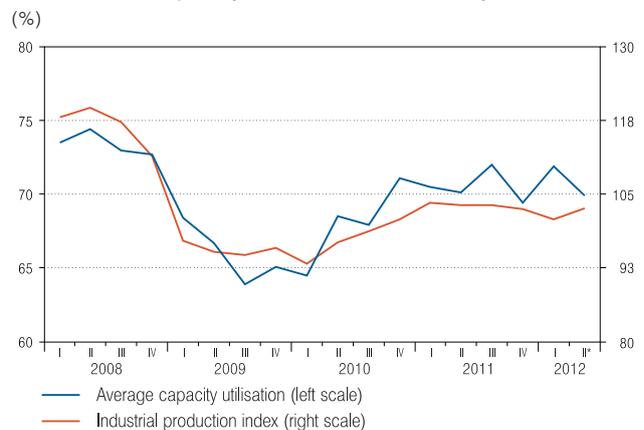


Note: Additive data on contributions due to multi-factor seasonal adjustment of the total amount and its components.  
Sources: NSI, BNB.

Data on industrial turnover show that the receipts from the sales of enterprises in this sector increased slightly on a quarter-on-quarter basis in the first quarter of 2012. Domestic market turnover went up due to the improved investment activity which resulted, though slightly, to an increase in the production of investment goods and, in particular, in the general and special purpose machines and equipment and in electricity and energy product consumption, probably due to the lower than usual temperatures in the first quarter of 2012. The sales of

basic metals and other intermediate consumption goods mostly intended for the external market reported a negative contribution. In the first quarter of 2012 the industrial production index in Bulgaria declined on a quarter-on-quarter basis but remained at levels close to those of 2011. Production capacity utilisation broadly followed industrial production developments.

### Production Capacity Utilisation in Industry



\* Industrial production index for April 2012.  
Sources: NSI, Industry Tendency Survey.

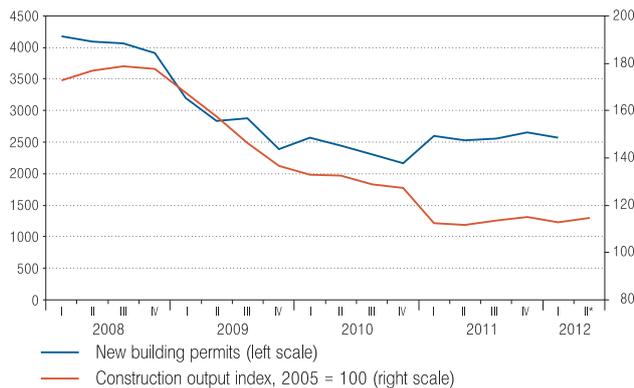
Gross value added in the construction sector improved slightly over the first quarter of 2012 by 0.8 per cent on a quarter-on-quarter basis. Conjunctural indicators show that the production in both building and civil-engineering construction contracted into the first quarter of 2012 compared to the fourth quarter of 2011. This was probably due to the worse than usual weather conditions over the respective period. Overall, slack in construction continued and in the first quarter of 2012 the number of building permits granted contracted.

Gross value added in the services sector contracted by 0.7 per cent on a quarter-on-quarter basis mainly due to the lower economic activity in information and communication, telecommunications and trade, repair of motor vehicles and motorcycles; transport, storage and mail services; hotels and restaurants. Data on the nominal

turnover in services support the assessment of contracting demand in information technology and communication services. Advertising activities and marketing saw the most pronounced fall in sales revenues among business services. According to the Business Tendency Survey data for the services sector, the lower demand and the uncertain economic environment were the major factors impeding corporations' activity.

### Construction Output Dynamics and New Buildings Permits Issued

(number of buildings; seasonally adjusted data)



Sources: NSI, BNB.

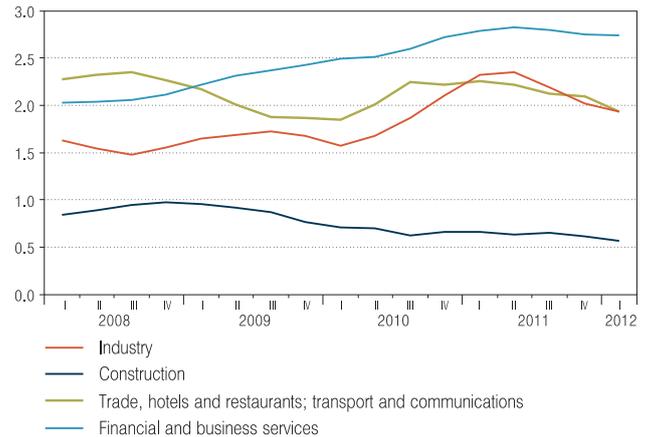
Gross value added in trade went up by 0.9 per cent on a quarter-on-quarter basis in the first quarter of 2012. Household demand focused mainly on foods, drinks and tobacco products, as well as on pharmaceutical and medical goods, cosmetics and toiletries. The most sizeable negative contribution to lower retail sales turnover was made by the products in the following groups: textile, clothing, footwear and leather, and home appliances, furniture and other household goods

Short-term business statistics data for the hotel and restaurants sector show that in the first quarter of 2012 the revenue in the sector continued to grow due to the increasing number of foreign tourists visiting Bulgaria compared to the corresponding period of 2011.

In the first quarter of 2012 the gross operating surplus, whose dynamics may serve as an estimate of firms' financial performance, decreased on the previous quarter mainly due to the industry item stemming from difficulties in domestic and external sales. In construction, gross operating surplus also went down, albeit at a lower rate compared with industry. In the financial and business services sector, the indicator remained close to the level of the fourth quarter of 2011.

### Gross Operating Surplus at Current Prices

(billion BGN; seasonally adjusted data)

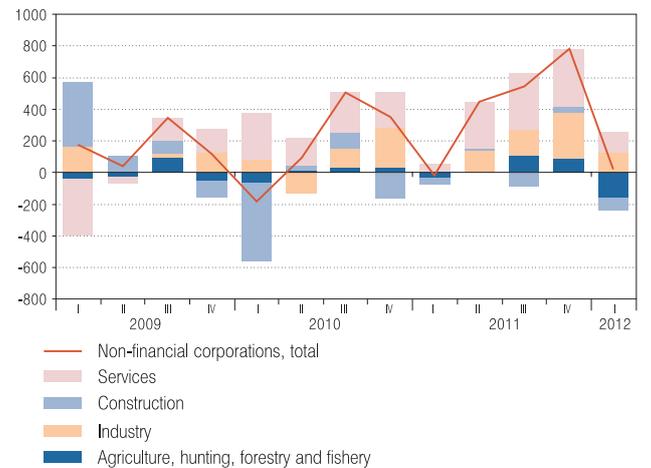


Sources: NSI, BNB.

Given the slower general economic activity of Bulgarian corporations by the close of 2011 and early 2012, bank loans to non-financial corporations remained almost unchanged in the first quarter of 2012 against the last quarter of 2011. Lending increased in services and industry, while the construction and agricultural sector exhibited a decline on a quarterly basis.

### Bank Loans to Non-financial Corporations

(million BGN, quarter-on-quarter stock change)

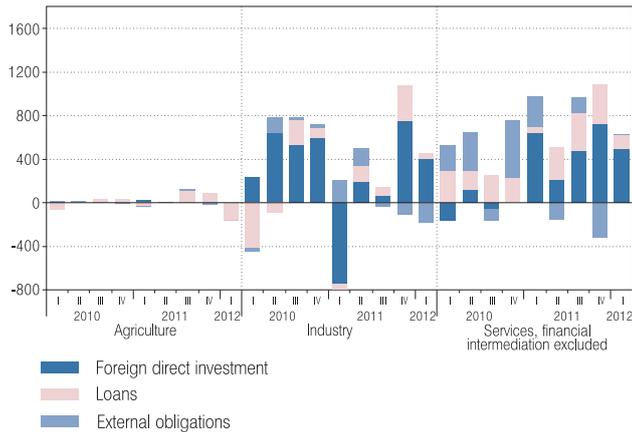


Source: BNB.

In addition to the gross operating surplus, an important additional source of financing corporations in the first quarter of 2012 was foreign direct investment flow. The steady inflow between January and March allowed the firms of various sectors to decrease their external obligations along with the decrease in the share of bank credit.

## Financing Sources

(million BGN, quarter-on-quarter volume change)

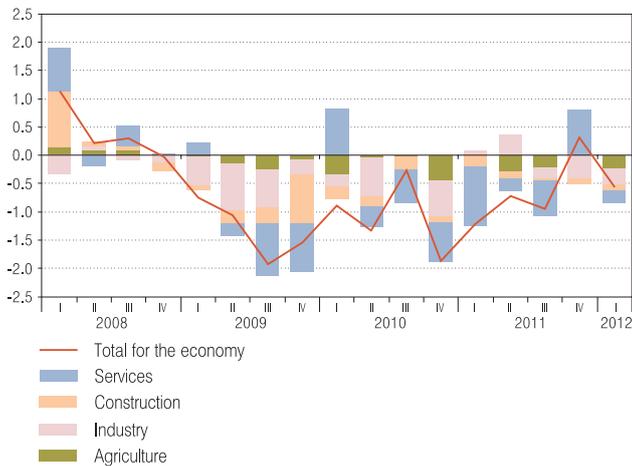


Sources: NSI, BNB.

Firms continued to improve their labour costs through job reductions in the first quarter of 2012. Industry and services contributed most significantly to the quarter-on-quarter decline in employment. Uncertain external economic conditions are likely to continue affecting the firms' propensity to hire personnel. According to business surveys, expectations for personnel remained pessimistic most probably due to the uncertain economic environment and insufficient demand.

## Contribution to Changes in the Number of Employed by Economic Sector

(%, quarter-on-quarter percentage points, seasonally adjusted data)



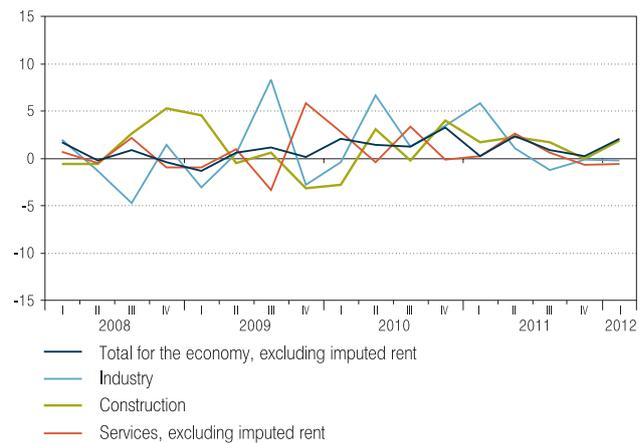
Note: Non-additive data on contributions due to direct seasonal adjustment of the total amount and its components.

Sources: NSI, BNB.

As a result of firms' policy of improving labour costs, the quarter-on-quarter real labour productivity in the total economy posted an increase in the first quarter of 2012. Construction contributed most significantly to this effect, while labour productivity in industry and services slightly decreased.

## Labour Productivity Developments (Value Added per Employee)

(%, quarter-on-quarter; seasonally adjusted data)

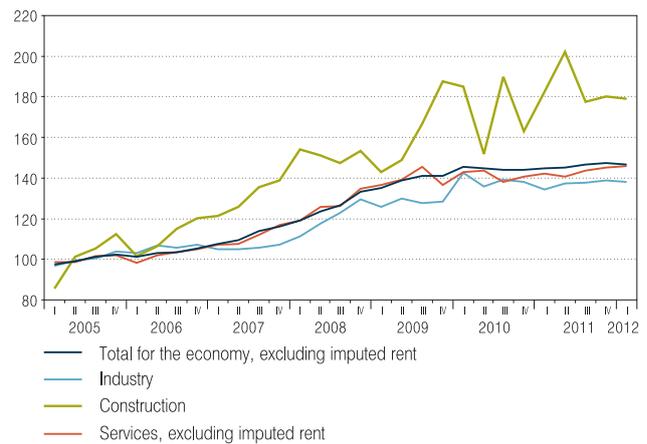


Sources: NSI, BNB.

The growth rate of labour productivity exceeded that of wages which in nominal terms resulted in a decline in unit labour costs in the economy and in real terms, they matched the 2011 last quarter's level.

## Nominal Unit Labour Costs

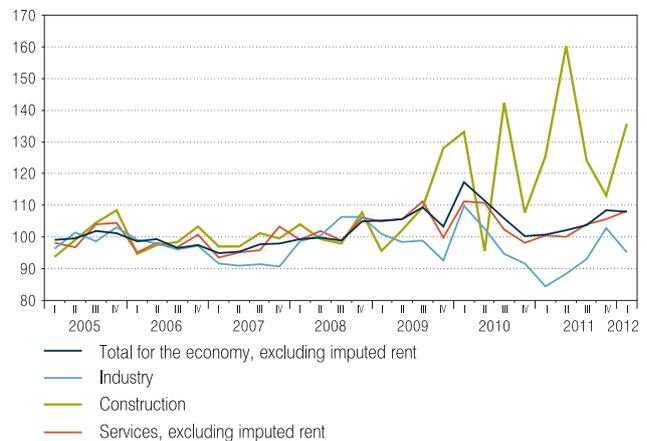
(2005 = 100; seasonally adjusted data)



Sources: NSI, BNB.

## Real Unit Labour Costs

(2005 = 100; seasonally adjusted data)

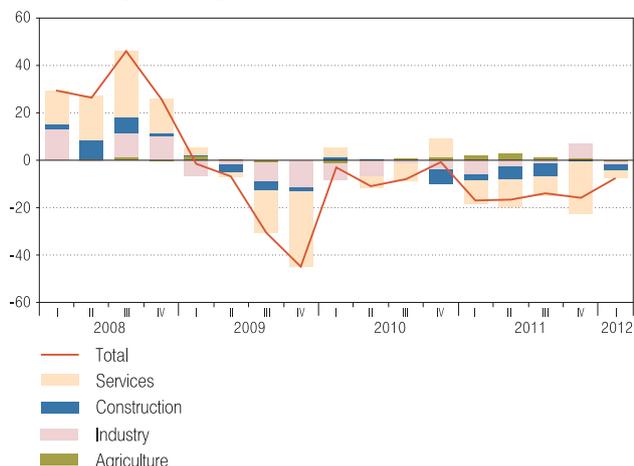


Sources: NSI, BNB.

Investment activity of corporations measured by expenditure on acquiring fixed assets at current prices continued to decrease in the first quarter of 2012 compared with the corresponding quarter of the previous year but at a strongly slowing rate.

### Contribution to the Annual Rate of Change in Expenditure on Acquiring Fixed Assets by Industry

(%, percentage points, growth on an annual basis)



Note: Due to the lack of final data, the quarterly data are preliminary. Sources: NSI, BNB.

Construction exhibited the strongest decline (by 31.7 per cent) in expenditure on acquiring fixed assets, while a positive trend occurred in the sub-sectors related to the provision of business services due to increased expectations for future economic activity. Based on the national account data in real terms, quarter-on-quarter gross fixed capital formation increased<sup>12</sup> by 0.4 per cent in the first quarter of 2012.

Investment activity of corporations is expected to remain strongly impacted by uncertain economic conditions. Provided the expected improvement in economic conditions materialises, by end-2012 the investment activity may start steadily increasing.

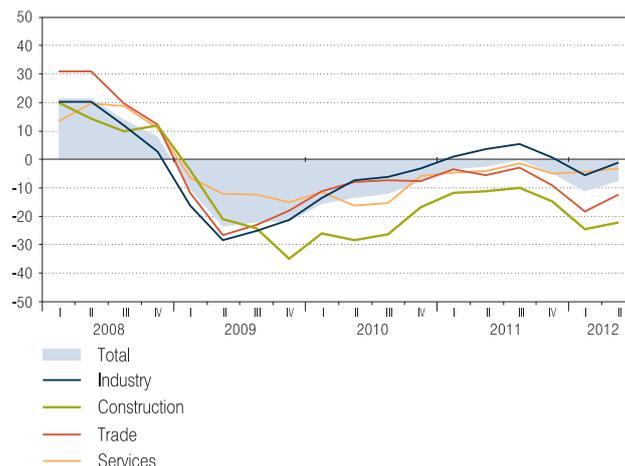
Worsened economic activity among Bulgaria's major trading partners is expected to have a depressing effect on Bulgaria's economic activity. On the other hand, short-term economic indicators point to a stabilisation of economic activity between April and May 2012. New orders from abroad to industrial corporations posted a slight

<sup>12</sup> The gross fixed capital formation deflator went down by 16.1 per cent on an annual basis which may be interpreted as a fall in investment goods prices.

increase in April 2012 which is expected to have a positive effect on the industrial production index and exports of goods and services. The index of construction output exhibited a quarter-on-quarter increase in April, with both building and engineering contributing to this growth. Data on trade volumes for April show that households continued to gradually increase their demand for goods.

### Current Economic Activity

(balance of opinions, %; seasonally adjusted data)

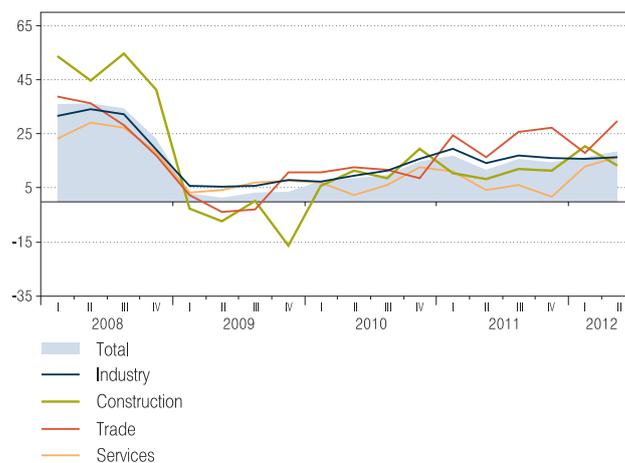


Sources: NSI, BNB.

Despite the lowered assessments on current economic activity, managers' expectations continued to improve. The gradual recovery of household consumption and a possible improvement of external environment are expected to contribute to the accelerated rate of economic growth in the third and fourth quarters of 2012.

### Expectations about Future Economic Activity

(balance of opinions, %; seasonally adjusted data)



Sources: NSI, BNB.

## Exports and Imports of Goods

Between January and April 2012 exports of goods declined in nominal terms mainly due to weaker external demand, while imports continued to increase on an annual basis driven by the improved domestic demand and higher import prices. Consequently, trade deficit rose to 7.2 per cent of GDP, from 6.0 per cent in April 2011.

In the third and fourth quarters of 2012 both imports and exports are expected to increase but at lower rates compared to those in the previous year. Trade balance deficit is expected to be between 4.5 and 6.5 per cent of GDP.

Between January and April 2012 nominal exports went down (by 1.7 per cent), while imports continued to increase (by 9.8 per cent). As a result, the trade balance deficit over the review period worsened by EUR 780.8 million compared with January–April 2011 and reached EUR 1214.9 million.<sup>13</sup> The difference in the rates of change in exports and imports in nominal terms was due both to their divergent dynamics in real terms (a 5.7 per cent fall in exports and 1.5 per cent growth in imports on an annual basis, not seasonally adjusted data) and worsened terms of trade.

The increase in the market share of Bulgarian goods in total EU imports (by 10 per cent on an annual basis by March 2012) evidences that the major factor behind the fall in exports was the slowdown in external demand but not a loss of competitive positions. A base effect related to high growth rates since early 2011 also contributed to the import decline.

Both imports and exports are expected to increase on an annual basis in the third and fourth quarters of 2012 albeit at a slower pace than in 2011. In nominal terms, exports will grow faster than imports. Export growth will reflect accelerated growth rates of external demand and imports will depend on the speed of domestic demand recovery. The recovery of growth in international prices of commodities also will contribute to the stronger nominal growth of exports and imports. Trade balance deficit is expected to be between 4.5 and 6.5 per cent of GDP.

The risk of higher-than-expected trade deficit is associated both with significant worsening of external environment in case of a new sharpening of euro area debt problems and faster recovery

<sup>13</sup> The analysis presented in this section is based on data on nominal exports and imports in euro. Data in real terms by commodity group are derived from deflators published by the NSI under the Standard International Trade Classification (SITC).

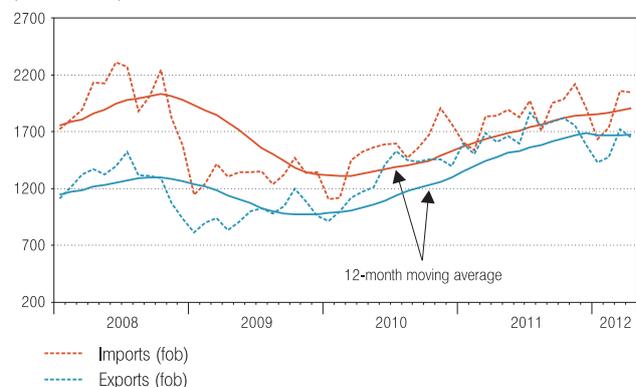
of domestic demand which will contribute to accelerated growth of imports.

Price dynamics of major commodities also implies risks. Stronger declines in prices of metals and raw materials and higher growth of petroleum prices would contribute to the increase in the trade deficit. Upon increase in these prices, the trade deficit would be lower than the projected one.

The widening of trade deficit in the first quarter of 2012 was mainly a result of the increased deficit on the balance of investment goods (EUR 319.5 million) and energy resources (EUR 236.2 million) and a lower surplus on balance of raw materials (BGN 152.3 million). The surplus in consumer goods rose by EUR 71.4 million.

### Dynamics of Exports and Imports

(million EUR)



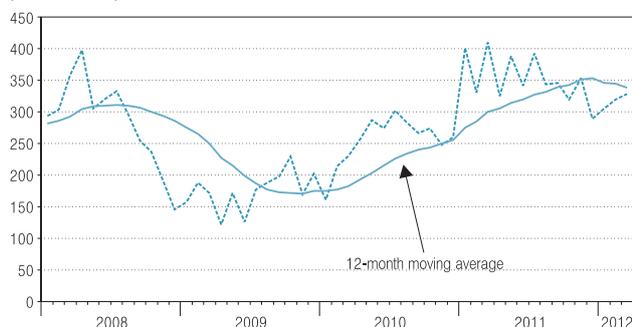
Source: BNB.

Base metals and base metal products (-4.0 percentage points), machines, transport facilities, appliances, instruments, weapons (-0.6 percentage points) had the largest contributions to export decline. The groups of animal and plant products, foods, drink and tobacco (0.8 percentage points), chemicals, plastics and rubber (0.8 percentage points) and mineral products and fuels (0.1 percentage points) had a positive contribution.

In 2012 exports of base metals and base metal products went down by 16.5 per cent on an annual basis to EUR 953.7 million. The items contributing mostly to this fall were copper and articles thereof (-10.7 percentage points) and cast iron, iron and steel (-3.3 percentage points). Factors responsible for the decline were the slower growth of external demand and the fall in international metal prices on an annual basis.<sup>14</sup> A base effect related to the high growth rate in the first quarter of 2011 also contributed to the negative dynamics. In the third and fourth quarters of 2012 the export growth rate of this group is expected to be positive underpinned by gradually accelerating external demand and a new increase in international metal prices by year-end.

### Exports of Base Metals and Base Metal Products

(million EUR)



Source: BNB.

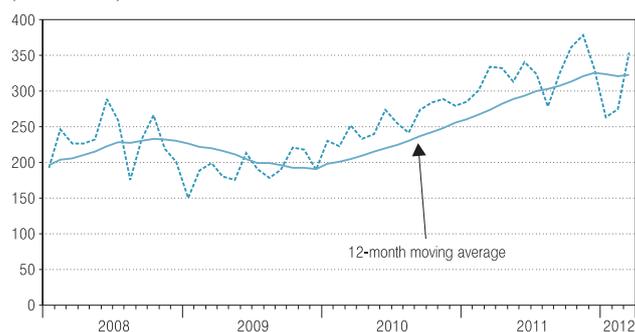
In the first quarter of 2012 exports of machines, transportation vehicles, appliances, instruments amounted to EUR 890.4 million: a decrease of 3.1 per cent on the corresponding quarter of the previous year. The electrical machinery and equipment item (4.3 percentage points) contributed mostly to the fall, while exports of nuclear reactors, boilers, machines, appliances and machinery continued to increase (3.1 percentage points). Dynamics of exports in this group was a result of the slowdown in external demand and price falls of the goods in the group on an annual basis.<sup>15</sup> In the third and fourth quarters of 2012 the export growth in the group is expected to recover as a result of improved external demand.

<sup>14</sup> The export deflator for the base metals and other non-ferrous metals and cast-iron and steel items under SITC was used to estimate the price effect in the first quarter of 2012.

<sup>15</sup> The export deflator for the machines, equipment and vehicles group under SITC was used to estimate the price effect in the first quarter of 2012.

### Exports of Machines, Transport Vehicles, Appliances, Instruments

(million EUR)

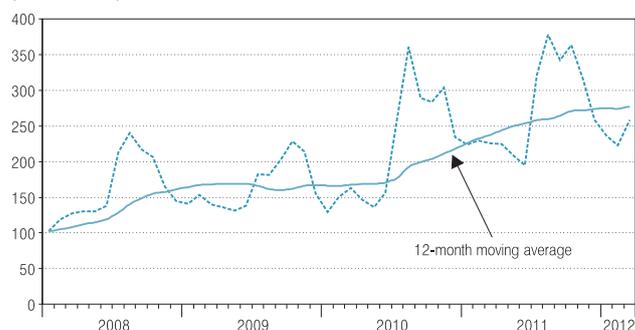


Source: BNB.

Between January and March 2012 exports of animal and plant products, foods, drink and tobacco came to EUR 717.7.9 million, up 5.8 per cent on an annual basis. The items contributing mostly to this growth were fats and oils (by 3.2 percentage points) and cereals (by 2.6 percentage points). Based on the estimate of the change, the real rates of growth are higher than nominal ones.<sup>16</sup> This is probably attributable to the good agricultural harvests in 2011. In the third and fourth quarters of 2012 exports of this group are expected to be positive due both to recovered external demand and higher international food prices.

### Exports of Animal and Vegetable Products, Foods, Drink and Tobacco

(million EUR)



Source: BNB.

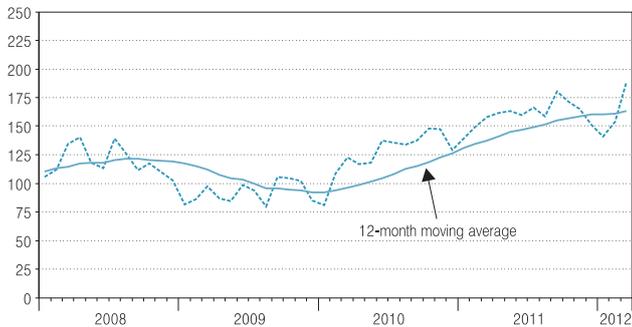
Exports of chemicals, plastics and rubber increased by 8.4 per cent in the first quarter of 2012 compared with the corresponding period of 2011 totalling EUR 483.7 million. Fertilizers had the largest contribution to the increase in the group (4.4 percentage points). The increase in

<sup>16</sup> The export deflator for the animal and vegetable oils, fats and waxes group under SITC was used to estimate the price effect for the animal and vegetable oils and fats item, and for the wheat item, the export deflator for the cereals and cereal preparations group is used under SITC in the first quarter of 2012.

exports was mainly due to the growth in physical volumes.<sup>17</sup> In the third and fourth quarters of 2012 exports are expected to be positive due to strengthening external demand.

### Exports of Chemical Products, Plastics, Rubber

(million EUR)



Source: BNB.

### Contribution of Commodity Groups to Trade Growth in the January–March 2012 Period

	Exports		Imports (CIF)	
	growth, %	contribution, p.p.	growth, %	contribution, p.p.
Consumer goods	9.0	2.0	2.5	0.5
Raw materials	-6.7	-3.2	0.0	0.0
Investment goods	-2.4	-0.4	28.5	5.7
Energy resources	-11.5	-1.6	13.5	3.1
<b>Growth, total</b>	<b>-3.1</b>		<b>9.3</b>	

Source: BNB.

In the first quarter of 2012 imports (CIF) reached EUR 5724.5 million: an increase by 9.3 per cent on an annual basis. The groups of investment goods (by 5.7 percentage points), energy resources (by 3.1 percentage points) and consumer goods (by 0.5 percentage points) contributed to this increase. Imports of raw materials rose insignificantly.

Imports of investment goods between January and March 2012 totalled EUR 1351.2 million: a 28.5 per cent increase on the same period of the previous year. Spare parts and equipment had the largest contribution (22.1 percentage points). In real terms, imports of goods from this group accelerated from the preceding quarters reflecting the positive trends in investment activity in the first quarter of the current year.<sup>18</sup> Over the projection horizon their growth rate is expected to be moderate, with the dynamics of

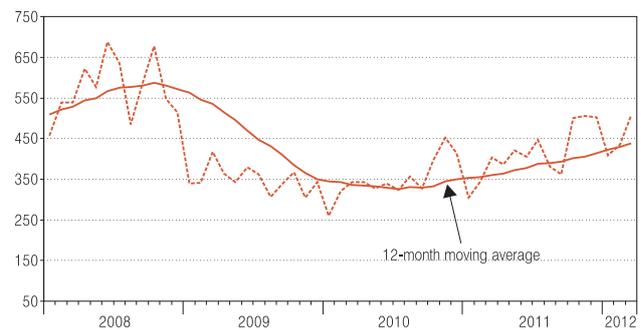
<sup>17</sup> The export deflator for the fertilizers item under SITC was used to estimate the price effect in first quarter of 2012.

<sup>18</sup> The export deflator for the machines, equipment and vehicles group under SITC was used to estimate the price effect in the first quarter of 2012.

investment activity in Bulgaria having a dampening effect.

### Imports of Investment Goods

(million EUR)

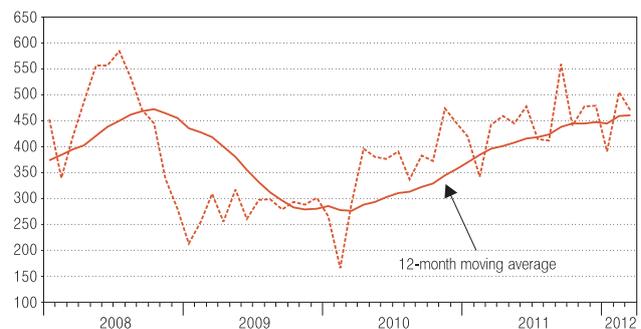


Source: BNB.

In the first quarter of 2012 imports of energy resources totalled EUR 1364.8 million, exhibiting an increase by 13.5 per cent on the corresponding quarter of the previous year. Crude oil and natural gas had the largest contribution (13.6 percentage points). The major factor behind the increase in imports of the group in the beginning of the year was the higher domestic demand due to unusually cold and long winter. In the third and fourth quarters of 2012 the nominal growth rate of imports in this group is expected to remain positive largely due to the gradual domestic demand and the expected hike in international energy product prices.

### Imports of Energy Resources

(million EUR)



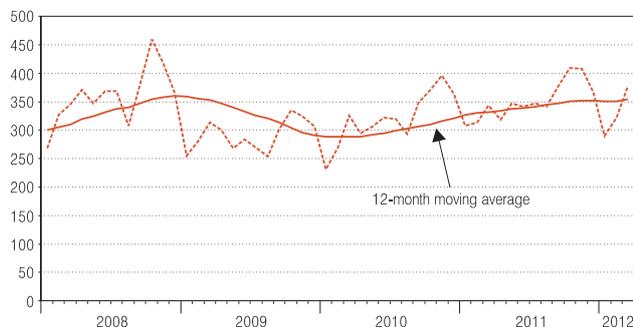
Source: BNB.

Imports of consumer goods recorded nominal growth of 2.5 per cent in the first quarter of 2012 on an annual basis, reaching EUR 989.9 million. Foods, drink and tobacco contributed most significantly to this growth (3.6 percentage points), while the decline in imports of furniture and home equipment had the largest negative contribution (-2.0 percentage points). The real dynamics of imports on these items was close

to the nominal one.<sup>19</sup> Over the projection horizon imports of consumer goods are expected to remain positive due to gradually increasing domestic demand.

### Imports of Consumer Goods

(million EUR)



Source: BNB.

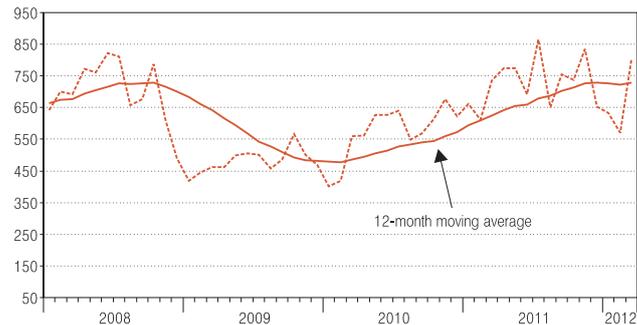
In the first quarter of 2012 imports of raw materials totalled EUR 2006.7 million, exhibiting a minimum increase by EUR 0.3 million on the corresponding quarter of the previous year. This was a result of the divergent dynamics of individual items in the group, with raw materials for food production having the largest positive contribution (1.6 percentage points), while cast iron, iron and steel, and ores having the largest negative contribution (-1.8 percentage points and -1.2 percentage points respectively). Only the price change in ores determined import dynamics.<sup>20</sup> In the third and fourth quarters of 2012 the growth rate of imports in this group is expected to remain positive due to the improving domestic demand and the gradual recovery in international price growth.

<sup>19</sup> To estimate the price effect for the foods, drink and tobacco item, the import deflator for the foods and live animals, soft and alcohol beverages, and tobacco groups is used and for the furniture and home equipment item, the import deflator for the furniture and parts thereof; bedding and similar stuffed furnishings item is used under SITC in the first quarter of 2012.

<sup>20</sup> The import deflators for the food and live animals chapter and metalliferous ores and metal scrap and cast iron and steel divisions under SITC are used to estimate the price effect in the first quarter of 2012.

### Imports of Raw Materials

(million EUR)



Source: BNB.

In the first quarter of 2012 Bulgarian exports to other EU Member States went down by 4.8 per cent on an annual basis, and exports to non-EU countries by 0.5 per cent. Imports from EU Member States increased by 4.9 per cent and imports from non-EU countries by 13.5 per cent.

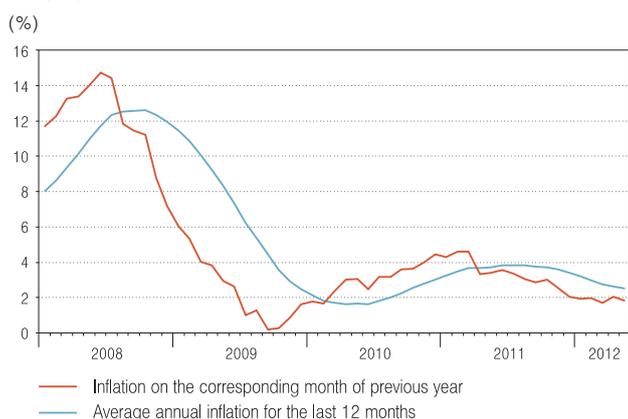
# 4. Inflation

Over the January–May 2012 period consumer price inflation remained at a relatively low level, with 1.8 per cent annual inflation reported in May compared to 2.0 per cent in December 2011.<sup>1</sup> Price dynamics over the review period reflected international commodity markets developments and the retained low core inflation level maintained in Bulgaria.

In the second half of the year inflation is likely to go slightly above its current levels driven by the moderate increase in core inflation in the context of a gradual improvement in domestic demand and higher electricity prices for households.

Between January and May 2012 inflation in consumer prices stayed at a relatively low level. By May 2012 the annual rate of inflation was 1.8 per cent (against 2 per cent in December 2011) and the average annual inflation by May decelerated to 2.5 per cent (against 3.4 per cent in December 2011).

## Inflation



Source: NSI.

The price dynamics since the beginning of the year reflected the international commodity market situation and the retained low level of core inflation (excluding prices of foods, energy products, goods and services with administratively controlled prices and tobacco). Petroleum price hike in early 2012 (following the stabilisation in the second half of 2011) was partly offset by the sharp drop between April and May, while the downward trend in international food prices which occurred in the second half of 2011 was sustained in the first five months of 2012.<sup>2</sup> Consistent with price developments in international

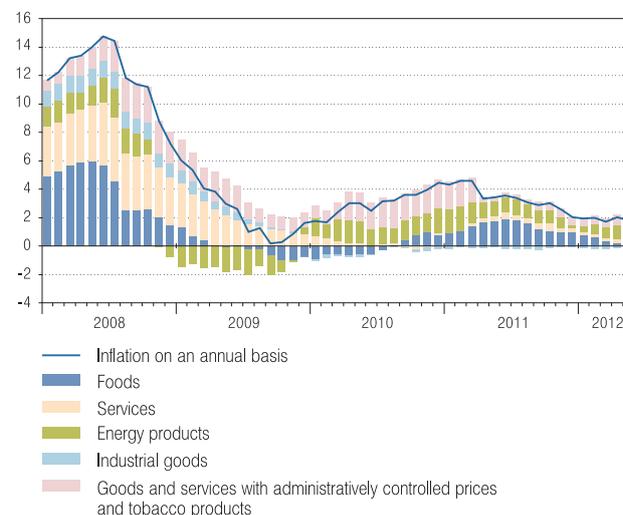
<sup>1</sup> The analysis in this section is based on NSI data on HICP.

<sup>2</sup> See Section 1.

commodity markets, the annual inflation of energy products accelerated in the first four months of the year which was followed by a significant slowdown in May. Inflation went down, with some commodity groups exhibiting a decline in price levels. Core inflation remained at a low level impacted by the sluggish economic activity in Bulgaria and increased uncertainty surrounding the external environment developments.

## Inflation Rate on Corresponding Month of Previous Year and Contribution of Major Goods and Services Groups to It

(%, percentage points)



Note: This structure corresponds to the Eurostat classification; tobacco products and goods and services with administratively controlled prices are presented separately. Administratively controlled prices are calculated on the basis of elementary aggregates in the consumer basket.

Sources: NSI, BNB.

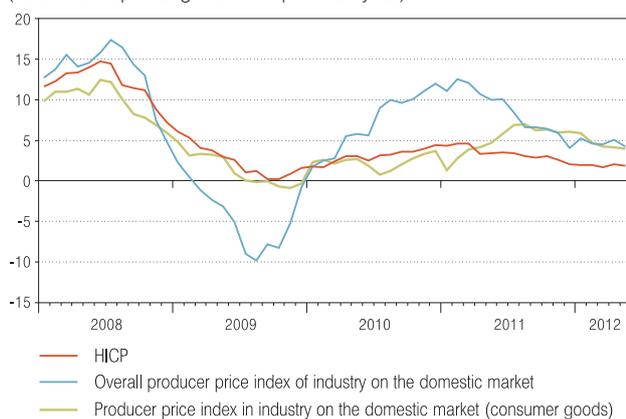
In May goods and services with administratively controlled prices (0.9 percentage point), energy products (0.5 percentage points) and foods (0.4 percentage point) contributed most

significantly to the annual inflation. In May the contribution of services and non-food goods (excluding energy products) accounted for 0.3 percentage points and -0.2 percentage points respectively.

The influence of external factors on the developments of consumer prices in Bulgaria may be tracked on the basis of import deflator data and producer price data on manufacturing for the domestic market. In the first quarter of 2012 the deflator of imported goods rose by 7.7 per cent on an annual basis and registered an acceleration compared with the fourth quarter of 2011 (6.8 per cent on an annual basis). Producer price index (PPI) in manufacturing for the domestic market, characterised by a downward inflation trend in the second half of 2011, reported a growth rate of 4.3 per cent by May 2012 (against 4.1 per cent in December 2011). Manufacturing and electricity, heating and gas production and distribution contributed most substantially to the annual inflation of producer prices in May. In manufacturing, monthly price increases in most sub-sectors moderated, with food production contributing most significantly to this effect. The growth rate of energy product prices posted a substantial slowdown in May compared with early 2012 consistent with the downward dynamics of petroleum prices.<sup>3</sup>

#### Rate of Change in PPI in Industry and HICP

(% on corresponding month of previous year)



Source: NSI.

<sup>3</sup> The Major Industrial Groupings classification was used covering the following sectors: intermediate consumption goods, energy products and water related activities, capital goods manufacturing and consumer goods production. The group of energy products is computed excluding the production and distribution of electricity and heating and gas and water supply, sewerage, waste management sectors (energy products excluding sectors E and F).

Core inflation, comprising the prices of industrial goods (excluding energy products) and services prices, remained relatively low in early 2012.<sup>4</sup> Between January and May core inflation accounted for 0.2 per cent on an annual basis against an average annual increase of 0.2 per cent in 2010 and 0.3 per cent in 2011. The low core inflation in 2012 reflected the continued 2011 trends in the price dynamics of its key components. Non-food prices continued to slightly depreciate on an annual basis reflecting durables' price developments. The annual growth rate of Services Price Index (excluding administratively controlled prices) accounted for 1.0 per cent on average between January and May 2012 against an average annual inflation rate in this group of 0.6 per cent and 1.1 per cent in 2010 and 2011 respectively.

Against the backdrop of uncertainty about economic environment developments and weak domestic demand, the comparatively cautious behaviour of firms as to recruitment employees and investment impacted firms' price policy. The latest data about unit labour costs and gross operating surplus of the total economy in the first quarter of 2012 evidenced of a policy intended to limit firms' costs and slower drop in the profit margins.<sup>5</sup> These factors counterbalanced total growth of consumer prices and were reflected in the low level of core inflation.

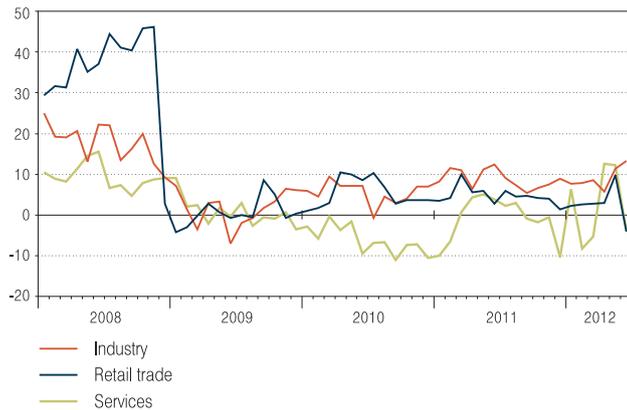
Survey data between January and June 2012 registered firms' uncertainty as to selling prices in the following months which is stronger pronounced in the trade and services. Irrespective of the improvement of expected demand for services and improved business climate in trade, fluctuations in firms' assessments about selling prices probably reflect uncertainty surrounding economic environment developments. In the following months additional information will be required to establish whether price expectations in these two sectors will result in a particular trend. The balance of entrepreneurs' opinions in industry yet tended to a price rise and in June it stayed at a level higher than at end-2011.

<sup>4</sup> In 2012 the weight of goods and services, the prices of which were reported in the core inflation, accounted for 45 per cent in the consumer basket (46 per cent in 2011).

<sup>5</sup> See Section 3.

## Selling Prices Expectations in Industry, Retail Trade and Services in the Following Three Months

(%, balance of opinions)



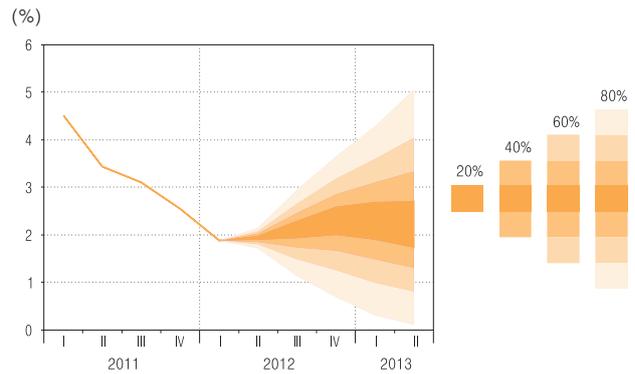
Source: NSI.

Our inflation expectations for the following quarters and the associated uncertainty are presented in the fan chart on the annual inflation rate.<sup>6</sup> We expect a slight increase in inflation on its current levels of between 1.7 and 2.5 per cent in the third quarter and 1.7 and 2.9 per cent in the fourth quarter of 2012.<sup>7</sup> The projected total inflation dynamics reflects a slow increase in core inflation on the back of a gradual improvement in domestic demand and higher electricity prices for households as of July. Growth rates of food prices are projected to slightly increase. Based on the assumption of a moderate increase in petroleum prices compared with the current levels, in the second half of the year the price dynamics of energy products is expected to follow a similar trend.

<sup>6</sup> For further details, see the box entitled *Measurement and Presentation of Uncertainty in Forecasting Economic Indicators*, Economic Review, issue 1/2012.

<sup>7</sup> Thus presented ranges of the expected annual growth rate of inflation correspond to 40 per cent probability distribution according to our expert projections of the probability distribution for the relevant quarter.

## Fan Chart of the Expected Annual Inflation Rate



Note: The fan chart shows the expert views of the forecasters on the uncertainty around the projected value based on probability distribution. The middle band of the chart, depicted in the darkest colour, includes the central projection. Probability distribution assigns 20 per cent probability for the actual value to fall in this band in each of the quarters. If neighbouring bands (in the same brighter colour) are added to the middle band, there would be 40 per cent coverage of the probability mass. Thus, by adding each same colour couple of bands, the probability for the value to fall there would be increased by 20 percentage points to reach 80 per cent. The probability for the value to remain outside the coloured part of the chart is 20 per cent based on the distribution chosen.

Sources: NSI, BNB.

Major risks to the expected inflation dynamics in the second half of 2012 stem from uncertainty around euro area debt crisis developments and petroleum prices. In addition to higher prices of electricity for households, domestic factors such as the state of economic activity in Bulgaria, weather conditions for agricultural harvest and possible increases in administratively controlled prices are considered to have weaker effect.

The sustainable depreciation of petroleum and significantly decreased international prices of commodities could affect the relatively low overall inflation of consumer prices in Bulgaria, including to a value which is under the floor of the forecast range. Low inflation may be also impacted by keeping the core inflation at levels close to current ones. The upward dynamics of petroleum prices, increases in international food prices and stronger rises in some administratively controlled prices in Bulgaria in the second half of the year may contribute to higher inflation close to the upper bound of the forecast range. The situation in international commodity markets by June gives grounds to assess the risks to the inflation outlook in the third and fourth quarters of 2012 as slightly shifted downward.

## Growth Rates of Major Goods and Services Groups Prices and Their Contribution to Accumulated Inflation

Inflation (%)	Annual inflation rate as of May 2011 (December 2010 = 100)		Annual inflation rate as of May 2012 (December 2011 = 100)		Annual inflation rate as of May 2012 (May 2011 = 100)	
	Inflation rate by group, %	Contribution, p.p.	Inflation rate by group, %	Contribution, p.p.	Inflation rate by group, %	Contribution, p.p.
	1.4		1.2		1.8	
<b>Foods</b>	4.3	1.03	1.9	0.49	1.6	0.42
Processed foods	4.1	0.64	-0.1	-0.02	1.2	0.19
Unprocessed foods	4.7	0.39	6.0	0.51	2.5	0.22
<b>Services</b>	-0.4	-0.09	-0.2	-0.06	1.2	0.30
Catering services	1.7	0.08	0.7	0.03	2.8	0.14
Transport services	3.7	0.13	2.8	0.12	4.1	0.17
Telecommunication services	-0.9	-0.04	-0.4	-0.02	-1.3	-0.06
Other services	-2.2	-0.27	-1.8	-0.19	0.3	0.06
<b>Energy products</b>	5.7	0.42	7.0	0.60	5.2	0.48
Transport fuels	6.1	0.42	7.1	0.58	5.1	0.41
<b>Industrial goods</b>	-0.2	-0.05	-0.9	-0.18	-1.1	-0.21
<b>Goods and services with administratively controlled prices</b>	0.8	0.12	2.2	0.35	5.5	0.85
<b>Tobacco products</b>	-0.2	-0.01	0.0	0.00	-0.1	-0.01

\* Administratively controlled prices are calculated at an elementary aggregates level in the consumer basket.

Note: To compare the structure of consumer basket in the 2010–2012 period, see Economic Review, issue 1/2012.

Sources: NSI, BNB.

### Food Prices

Between January and April 2012 the downward trend in annual inflation of foods, started in the second half of 2011, was sustained and in April the inflation rate accounted for 0.7 per cent. Food price dynamics largely matched international markets developments with the slower growth rates of domestic producer prices. May saw a slight acceleration in the annual growth rate of food prices to 1.6 per cent, mainly a result of the price dynamics of unprocessed foods.

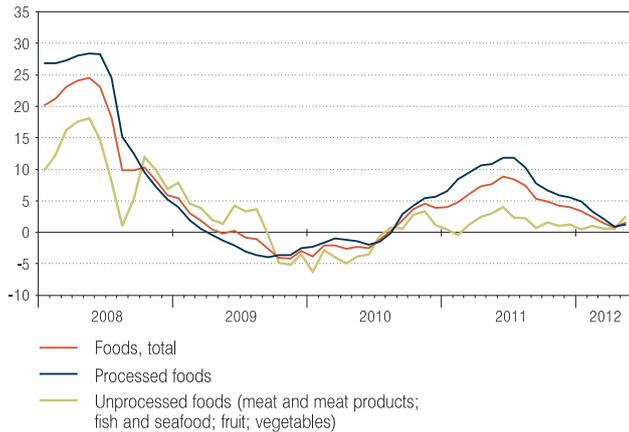
The annual inflation of unprocessed foods (meat and meat products, fruit, vegetables and fish), which was relatively stable in the first four months of the year posted an increase to 2.5 per cent by May (1.2 per cent in December 2011). This trend reflects mainly the price falls of vegetables retaining the growth rates in the prices of meat and meat products group stable.

Processed foods played a key role for the overall food price dynamics. The annual food price growth reached 1.2 per cent by May, down 4.3 percentage points on December 2011. The appreciation of sugar, jams, honey, chocolate and sugar confectionery, bread and cereals and animal and vegetable oil and fats contributed most significantly to the inflation decline of processed foods. Data on price dynamics in the last two groups between 2007 and 2012 suggest its relatively high dependence on the external market general conditions.<sup>8</sup> Following the acceleration of the annual inflation of milk, dairy products and eggs in February and March, caused by the significant appreciation of eggs, in the second quarter the decline in egg prices led to a slowdown of inflation in this group.

<sup>8</sup> See the box *Food and Fuel Price Dynamics between 2007 and 2010*, Economic Review, issue 3/2010.

### Rate of Change of Food Price Index

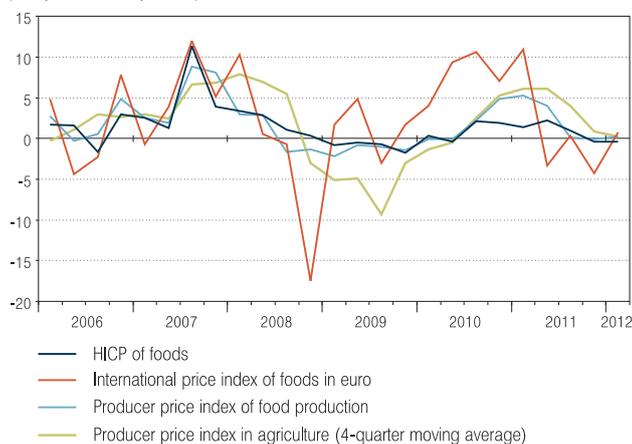
(%, on corresponding month of previous year)



Sources: NSI, BNB.

### Dynamics of Producer Prices in Agriculture, International Food Prices, Producer Prices of Food Production and Consumer Prices of Food

(% quarter-on-quarter)



Note: Data are seasonally adjusted via the TRAMO SEATS programme by using automated set up for diagnostics and optimisation of adjustment.

Sources: NSI, ECB, BNB.

The total contribution of food prices to the annual inflation rate of consumer prices in May accounted for 0.4 percentage points, with meat and meat products (0.3 percentage points), milk, dairy products and eggs (0.1 percentage points) and mineral water and soft drinks (0.1 percentage points) contributing most significantly, while vegetables had the largest negative contribution (-0.1 percentage points).

The current international food price dynamics gives no signs of pro-inflationary pressure on total inflation of foods in the second half of 2012.<sup>9</sup> The quality of the harvest in Bulgaria could also affect food prices in the review period. The ef-

<sup>9</sup> See Section 1, Monetary Aggregates Sub-section.

fect of this factor may be seen in some groups of unprocessed foods in May which allows to suppose that food products inflation is likely to accelerate further in the third quarter of 2012.

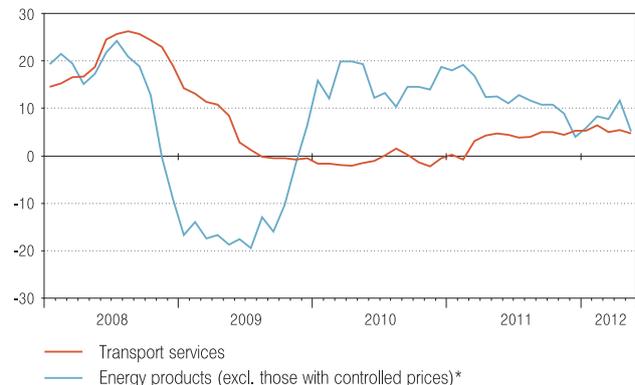
### Energy Product Prices

Over the first four months of 2012 the annual inflation rate of transport fuels accelerated reaching 11.9 per cent in April (against 4.0 per cent in December 2011). The group of energy products contributed by 1 percentage point to total inflation in April.<sup>10</sup>

In May the inflation rate of fuels slowed down significantly to 5.1 per cent on an annual basis. Strong fluctuations in the prices of transport fuels from early 2012 largely followed the movements of international market petroleum prices (taking into account the movements in the EUR/USD exchange rate). Consumer prices of fuels in Bulgaria responded with a one-month lag to the depreciation of petroleum, started in April.

### Rate of Change of Energy Product Price Index and of Transport Services Price Index

(%, on corresponding month of previous year)

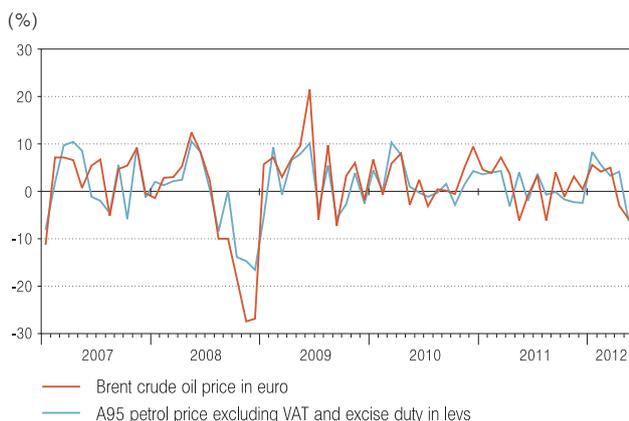


\* Energy products, excluding those with controlled prices, include fuels and lubricants for personal transportation vehicles, and solid, fluid and gaseous fuels for households.

Sources: NSI, BNB.

<sup>10</sup> Transport fuels have the largest share in the group of energy products (excluding administratively controlled prices of electricity and heating); hence, their price developments determine the overall price dynamics of energy products.

## Monthly Rate of Change in the Prices of Brent Crude Oil and A95 Petrol



Sources: ECB, NSI, BNB.

The latest data about fuel prices suggest that in June goods in this group may depreciate by about 2.5 per cent on a monthly basis (compared with the price fall of 3.8 per cent in May).<sup>11</sup> Based on the assumption of a moderate increase in petroleum prices compared with the current levels, in the second half of the year the price dynamics of energy products is expected to follow a similar trend. Major risks to the projection stemmed from the possible strong fluctuations in petroleum prices over the review period which may result in an analogous dynamics in the rate of change of end-use fuel prices in Bulgaria.

## Administratively Controlled Prices and Tobacco Product Prices

Between January and May 2012 administratively controlled prices picked up by 4.4 per cent on average compared with the corresponding period of the prior year. As of May the annual inflation rate of these goods and services accounted for 5.5 per cent, contributing most substantially to overall inflation (0.9 percentage points).

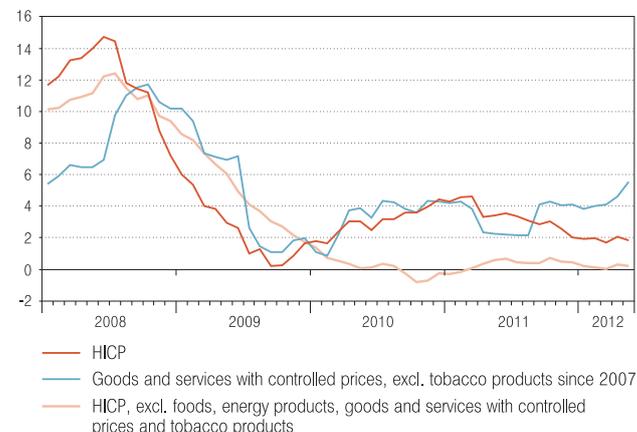
Price hikes in healthcare services and heating had a comparatively high contribution to total inflation. Higher healthcare services reflect the increased minimum wage in May and accounted for 7.4 per cent for prices of hospital services and fees for visits to GPs. The heating price went up by 7.8 per cent in April. The increase in water supply services prices, higher railway and urban public transport fares, higher refuse collection levies and price hikes in central gas sup-

<sup>11</sup> For retail prices of transport fuels in June, the information provided by Lukoil Bulgaria Company was used.

ply due to increased prices of natural gas in the first and second quarters had a comparatively lower contribution to overall inflation in the first and second quarters.

## Rate of Change in the Overall CPI, Administratively Controlled Price Index and Core Inflation

(%, on corresponding month of previous year)



Note: Given the fact that tobacco product prices are largely dependent on administratively controlled excise rates, tobacco products are discussed separately from the group of goods and services with non-controlled prices, regardless of the liberalisation of the market of tobacco products in early 2007. Administratively controlled prices are calculated at the elementary aggregates level in the consumer basket.

Sources: NSI, BNB.

If the decision of the State Energy and Water Regulatory Commission for an increase in electricity prices for households by about 13 per cent as of 1 July 2012 is taken into account, administratively controlled prices are likely to continue to exert an upward pressure on overall inflation in the third quarter of 2012.

The announced increase in the price of natural gas for households by about 5 per cent as of 1 July 2012 and the lack of final information about adjustments in other administratively controlled prices formed the expectations for an annual growth rate of regulated prices by approximately 7.5 per cent in the third quarter.<sup>12</sup> This will push up mainly the price of electricity for households. The forecast for the rate of change in the fourth quarter is for about 6 per cent and may be explained by a base effect resulting from higher prices of hospital services and fees for visits to GPs in 2011.

<sup>12</sup> As of 1 July 2012 a decision of the State Energy and Water Regulatory Commission adopting ceiling prices of heating by region is in force. Due to lack of information about the average price change of heating in Bulgaria, the change has not been reflected in the inflation forecast of goods and services with administratively controlled prices.

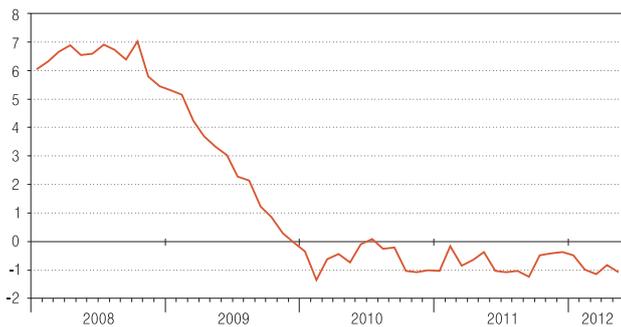
The prices of tobacco products, whose excise duties remained unchanged in 2012, decreased slightly on an annual basis between January and May (-0.3 per cent on average for the period) contributing insignificantly to the overall inflation. Price developments in this group are expected to be sustained in the third and fourth quarters of 2012.

### Non-energy Industrial Goods Prices

During the first five months of 2012, the trend of the previous two years towards a minimum deceleration in the non-food price index (excluding fuels) was sustained. As of May the annual rate of change in the prices of industrial goods was -1.1 per cent (against -0.4 per cent in December 2011), contributing by -0.2 percentage points to overall inflation. Between January and May industrial goods went down by 0.9 per cent on an annual basis.

#### Rate of Change of Industrial Goods Price Index Excluding Energy Products and Goods with Administratively Controlled Prices

(%, on corresponding month of previous year)



Sources: NSI, BNB.

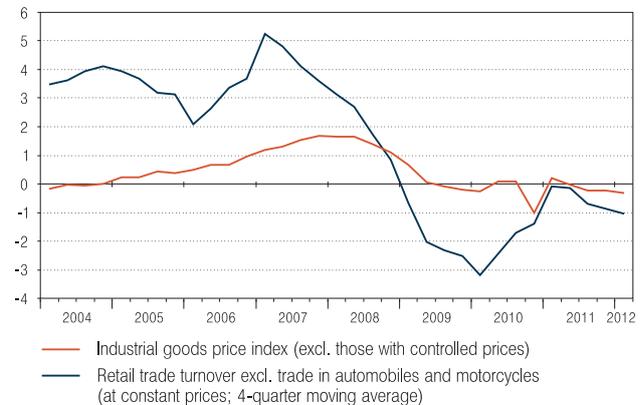
The negative increase in the overall price index in this group over the review period was driven, as in the previous year, mainly by the depreciation of durable goods such as automobiles, computers and TV-sets. A possible reason behind the negative dynamics was the increase in the market shares of chain stores, a process recently observed in the new EU Member States. This process leads to economies of scale associated with lower production costs and higher market efficiency.<sup>13</sup> The overall price index of non-durable goods was characterised by low

<sup>13</sup> To analyse the trends in trade in the new EU-Member States, see *Structural Features of Distributive Trades and Their Impact on Prices in the Euro Area*, ECB Occasional Paper Series, No 128, September 2011, the box *The distributive Trades in the New Member States*, pp. 55–59.

positive inflation which did not offset the price falls of durable goods.

#### Quarter-on-quarter Growth Rate of Turnover in Retail Trade (at Constant Prices) and Prices of Industrial Goods

(% change on previous quarter)



Note: Data are seasonally adjusted via the TRAMO SEATS programme by using automated set up for diagnostics and optimisation of adjustment.

Sources: NSI, BNB.

Between January and May 2012 consumer demand based on data about retail trade volumes at current prices remained weak. This is another potential factor behind the sustained downward trend in non-food products prices.

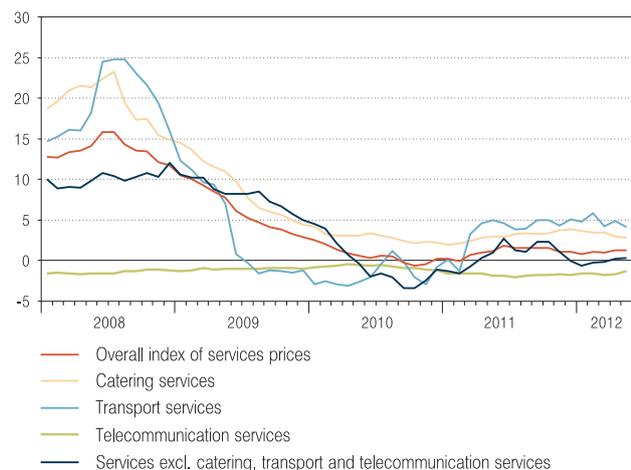
The expected gradual recovery of consumer demand in the third and fourth quarters of 2012 is likely to have a positive effect on the price dynamics of this group of goods.

### Services Prices

Between January and May 2012 prices of services (excluding those with administratively controlled prices) posted a low annual rate of growth, a trend formed in the 2010–2011 period. By May the rate of change in the services price index was 1.2 per cent compared with the corresponding period of 2011 (against 1.1 per cent in December 2011); thereby, this group contributed by 0.4 percentage points to overall inflation of consumer prices. Between January and May 2012 services prices reported an increase by 1 per cent on the corresponding period of 2011.

## Rates of Change of Services Price Index Excluding Those with Controlled Prices

(%, on corresponding month of previous year)



Sources: NSI, BNB.

Inflation of transport services (excluding railway and urban public transport) has been kept at a relatively permanent annual rate of change since mid-2011. Between January and May prices of transport services registered an increase by 4.8 per cent compared with 4.5 per cent on average (on an annual basis) in the third and fourth quarters of the previous year. As of May this group had a 0.2 percentage point contribution to overall inflation. Relatively higher inflation in transport services compared with overall inflation of services may be explained by the prevailing influence of external factors (as petroleum prices). Internal factors (such as demand conditions, competition, *etc.*) had a stronger importance for the price dynamics of the remaining services.

Over the first five months of 2012 the annual inflation rate of catering slightly decreased to 2.8 per cent in May (against 3.8 per cent in December 2011) contributing by 0.1 percentage points to overall inflation. Projected gradual recovery of consumer demand in the second half of the year is a factor for a possible increase in inflation in this services group.

The index of telecommunication services prices (telephone services, apparatus, internet services), following a downward trend over the recent years, reported a decline of 1.6 per cent on average between January and May 2012 compared to an average annual decline of 1.8 per cent in 2011.

Services prices inflation excluding catering, transport and communication services went up by 0.3 per cent on an annual basis by May (-0.1 by end-2011). The high negative contribution of package holidays played a crucial role for this relatively low price dynamics, though the decline in prices of this group slowed down on a monthly basis. Since early 2012 the rates of decline of accommodation services moderated. The services price index (excluding accommodation and package holiday services) indicates a low positive inflation of 1.5 per cent in the first five months of 2012 (compared with 1.7 per cent in December 2011 and an average annual growth rate of 2.3 per cent in 2011).

The gradual recovery of domestic demand in the second half of 2012 is expected to slightly push up overall inflation in services prices over the review period.