

NBP

Narodowy Bank Polski

Monetary Policy Council

November 2014

Inflation Report



The Inflation Report presents the Monetary Policy Council's assessment of the current and future macroeconomic developments influencing inflation. The projection of inflation and GDP presented in Chapter 4 was prepared at the Economic Institute of Narodowy Bank Polski. In terms of the contents, works on the projection were supervised by Andrzej Sławiński, General Director of the Economic Institute. The projection was prepared with the use of the NECMOD macroeconomic model. The NBP Management Board approved the submission of the projection to the Monetary Policy Council. The inflation projection is one of the inputs to the Monetary Policy Council's decision-making process.

The time horizon of the analysis presented in the Report is conditioned by the availability of macroeconomic data. In turn, the periodisation of the analysis (breakdown into sub-periods) is conditioned by the development of particular variables. The cut-off date for the data in this Report was 23 October 2014.

This *Inflation Report* is a translation of Narodowy Bank Polski *Raport o inflacji* in Polish. In case of discrepancies, the original prevails.

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Summary

In 2014 Q2 and Q3, global economic activity remained moderate with rising divergence across countries and regions. United States were recovering, while the euro area, including Germany and France, remained in stagnation. Economic activity growth in the major emerging market economies was relatively low or decelerating, in particular in China and Russia. Slowdown in economic activity growth in the environment of Central and Eastern European economies affected GDP growth in this region.

Global inflation declined over recent months, driven by a drop in prices for energy and agricultural commodities worldwide. However, divergence in economic conditions was translating into different price developments across economies. In the United States, relatively sound economic conditions were supportive of moderate price growth. In the euro area, in turn, inflation had been declining for several quarters and came down to near zero in 2014 Q3. In many emerging market economies, inflation has been relatively low or falling. In Central and Eastern Europe, inflation remained near zero on average, but some countries in this region were experiencing deflation. At the same time, inflation remained elevated in emerging market economies whose currencies had depreciated sharply this year.

Monetary policy of the major central banks has been highly expansionary, yet with diverging perspectives, particularly between the Fed and the ECB, caused by differences in economic growth and inflation outlook. The Fed has left its interest rates unchanged near zero but at the same time concluded its asset purchase programme. According to the FOMC forecasts, the Fed is likely to increase its interest rates already in 2015. The ECB, in turn, continued to reduce its interest rates, including the rate on the main refinancing operations to 0.05% and the rate on the deposit facility to -0.20%. The ECB also resumed covered bond purchases and announced that it would buy ABS with underlying assets consisting of claims against the non-financial sector. Monetary policy easing by the ECB was conducive to depreciation of the euro and a fall in government bond yields in most euro area member states. In turn, the perspective of monetary policy tightening in the United States and worse global economic growth outlook in the euro area and major emerging market economies caused a decline in global stock market indices.

Annual growth in consumer prices in Poland turned negative in July 2014 and remained slightly negative over the following months. Decline in inflation was mainly due to a fall in food prices, lower energy prices and a lack of demand pressure as indicated by a fall in core inflation to historical lows. Also, producer price growth remained negative, which points to no cost pressure in the economy. At the same time, inflation expectations were declining gradually. All measures of inflation expectations have stayed positive, though some of them are close to zero.

Economic growth in Poland decelerated slightly in 2014 Q2. Similarly to some other countries in Central and Eastern Europe, the slowdown was caused mainly by a decline in demand growth in major trading partners, and slower increase in investment expenditures, while growth in inventories accelerated and consumer demand growth continued, supported by stable labour market conditions. In 2014 Q2, the employment in the enterprise sector, and in the entire economy, was still rising, albeit at a slower pace than in early 2014. Incoming data indicate that a slowdown in the Polish economy continued in 2014 Q3,

and employment growth remained moderate. In spite of stable labour market conditions, in 2014 Q2 and Q3 wages growth eased, but remained moderate, pointing to a lack of wage pressure in the economy.

As the economic growth has been slowing down and inflation fell below zero, the Monetary Policy Council reduced NBP reference rate by 0.50 percentage points to 2.00%. Lower interest rates, along with monetary policy easing carried out earlier by the ECB, was conducive to a fall in government bond yields and an increase in stock market indices. Nonetheless, in 2014 Q3 stock prices recorded a number of temporary setbacks caused by an increase in geopolitical risks, worse than expected data readings and deterioration in sentiment in the international financial markets. The zloty, however, has been relatively stable versus the euro and weakened against the United States dollar, which reflected appreciation of the latter in the global foreign exchange market. Relatively low mortgage loan interest rates and stable labour market conditions were supportive of further signs of recovery in the housing market in Poland.

Growth in loans, both to consumers and enterprises, was still moderate, supported by stable labour market conditions, relatively low loan interest rates and easing in credit standards for consumer loans for several quarters.

In 2014 Q2, current account deficit widened somewhat, which was mainly related to lower trade surplus in goods and services resulting from weaker external demand. As a consequence of the increase in current account deficit, several external imbalance indicators deteriorated slightly. Yet, the relation of the combined current and capital account balance to GDP remained stable and positive. At the same time, Polish direct investments abroad increased, while portfolio inflows – particularly into Polish government bond market – were sustained.

The Inflation Report is structured as follows: in Chapter 1 economic developments in the external environment of the Polish economy are presented in the context of their impact on inflationary developments in Poland. Those developments as well as domestic factors affecting them are discussed in Chapter 2. *Minutes of the Monetary Policy Council Decision-Making Meetings* held in July-October 2014, together with the *Information from the meeting of the Monetary Policy Council* in November 2014, are presented in Chapter 3. Minutes from the MPC meeting held in November will be published on 20 November 2014 and so will be included in the next *Report*. MPC voting records in the period June-September 2014 can be found in Chapter 5. This *Report* also includes three boxes: “Causes and consequences of low investment rate in Germany”, “Monetary policy easing by the ECB since the previous *Inflation Report*” and “Deflation – assessment of risk for Poland”, as well as an appendix “The impact of forward guidance on spot and future interest rates”.

Chapter 4 of the Report presents the projection of inflation and GDP based on the NECMOD model, which is one of the inputs into the Council's decision-making process on the NBP interest rates. In line with the November projection based on the NECMOD model – prepared under the assumption of unchanged NBP interest rates and taking into account data available until 20 October 2014 – there is a 50-per cent probability of inflation running in the range of 0.0-0.2% in 2014 (as compared to -0.1-0.4% in the July 2014 projection), 0.4-1.7% in 2015 (as against 0.5-2.1%) and 0.6-2.3% in 2016 (as against 1.3-3.1%). At the same time, the annual GDP growth – in line with the November projection – will be, with a 50-per cent probability, 2.9-3.5% in 2014 (as compared to 3.2-4.1% in the July 2014 projection), 2.0-3.7% in 2015 (as against 2.6-4.5%) and 1.9-4.2% in 2016 (as against 2.3-4.5%).

1 External environment of the Polish economy

1.1 Global economic activity

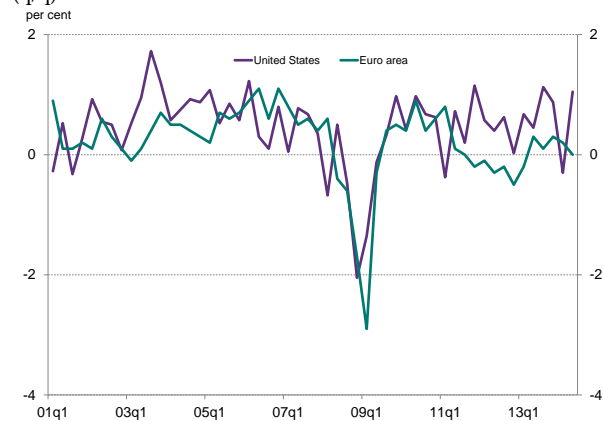
In 2014 Q2 and Q3, global economic activity remained moderate, with increasingly divergent growth rates across countries (Figure 1.1). In the United States, recovery continued, while the euro area stayed stagnant. In the largest emerging market economies, the pace of growth was relatively low or decelerating.

Following a decline observed at the beginning of the year due to unfavourable weather conditions, GDP in the United States increased by 1.0% q/q in 2014 Q2 (Figure 1.1).¹ The stronger GDP growth was driven primarily by a more robust rise in domestic demand, including consumption and investment. Economic growth was also substantially boosted by rising inventories, while the contribution of net exports to GDP growth remained negative.

The US recovery was sustained in 2014 Q3, amidst improving labour market conditions (including a further rise in employment and a decline in unemployment; Figure 1.3). Upbeat sentiment continued to prevail amongst consumers and the business, with retail sales and industrial output expanding at a relatively fast pace.²

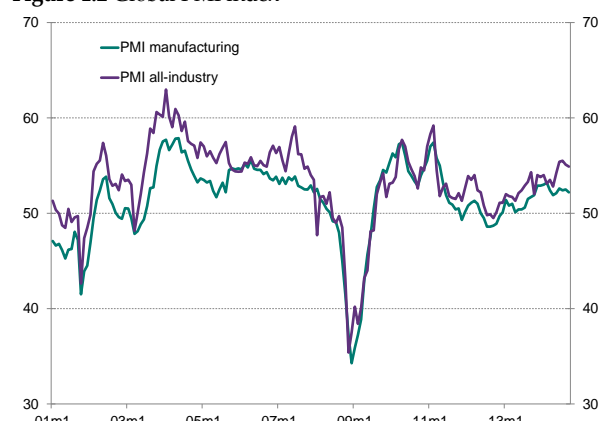
In turn, economic growth in the euro area had lost momentum, dragged down by structural problems in some of the member countries, persistently high unemployment and slow lending growth. Economic activity was also hampered by earlier appreciation of the euro³ as well as – in the case of some of the euro area countries – the Russian-

Figure 1.1 Economic growth in selected advanced economies (q/q)



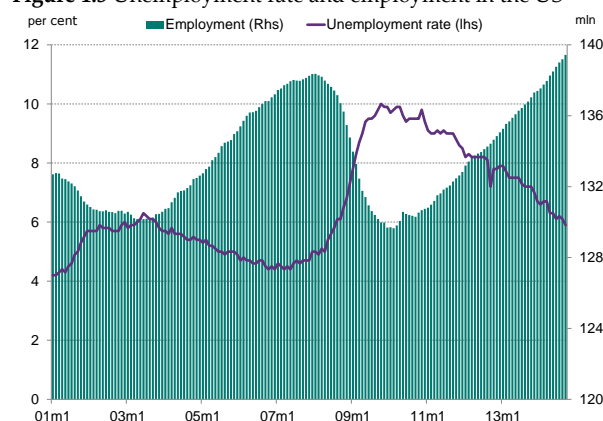
Source: Bloomberg data.

Figure 1.2 Global PMI index



Source: Bloomberg data.

Figure 1.3 Unemployment rate and employment in the US



Source: BLS data.

¹ The quarterly GDP growth figures presented in this chapter are seasonally adjusted.

² Although in September retail sales decreased by 0.4% m/m, its y/y growth remained relatively high (4.0% y/y).

³ From July 2012 to March 2014, the euro nominal effective exchange rate strengthened by 12.6%. In the subsequent months (from March to September), this rate weakened by 4.5%.

Ukrainian crisis, which had an adverse effect on exports and business sentiment.

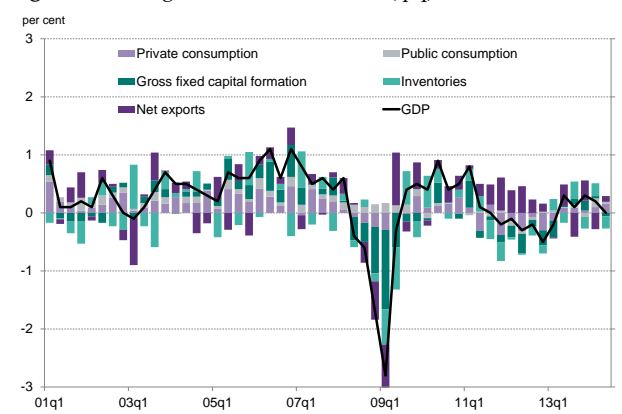
Consequently, after a few quarters of slight increase, in 2014 Q2 output growth in the euro area ground to a halt (0.0% q/q as compared to 0.2% in 2014 Q1; Figure 1.4). Among the major euro area countries, 2014 Q2 GDP did not change in France, while in Italy and Germany it decreased. The decline in Germany was partially attributable to a decline in investment, mainly in construction sector, after a prior increase at the beginning of the year, driven by a mild winter. Consumption growth dropped to near-zero levels in 2014 Q2. On the other hand, GDP growth was supported by a rise in inventories.

In 2014 Q3, economic activity in the euro area remained sluggish, which was reflected in a decline in consumer and business sentiment in this period (Figure 1.5).⁴ Furthermore, industrial output growth fell considerably at the beginning of 2014 Q3. The unemployment rate decreased slightly, which supported retail sales growth. Yet, the unemployment rate remained very high in comparison with the levels observed before the crisis (Figure 1.6).

Also in the Central and Eastern European countries economic activity slowed down in 2014 Q2 (Figure 1.7), which in most cases resulted from weaker exports growth. Moreover, a decline in investment and a major slowdown in consumption growth was observed in the Czech Republic, Estonia and Romania. In the Baltic countries – despite the Russian-Ukrainian conflict – economic growth picked up somewhat, yet the increase was driven largely by an upturn in inventories.

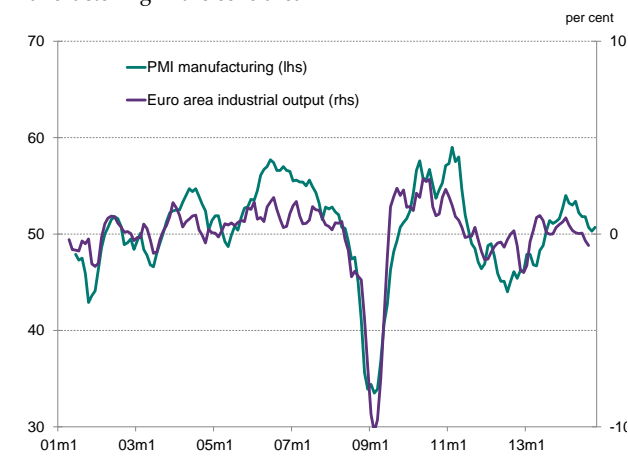
In the largest emerging economies, GDP growth in 2014 Q2 remained low as for these countries (Figure 1.8). In Russia, GDP growth continued to decelerate, dampened by economic aftermath of

Figure 1.4 GDP growth in the euro area (q/q)



Source: Eurostat data.

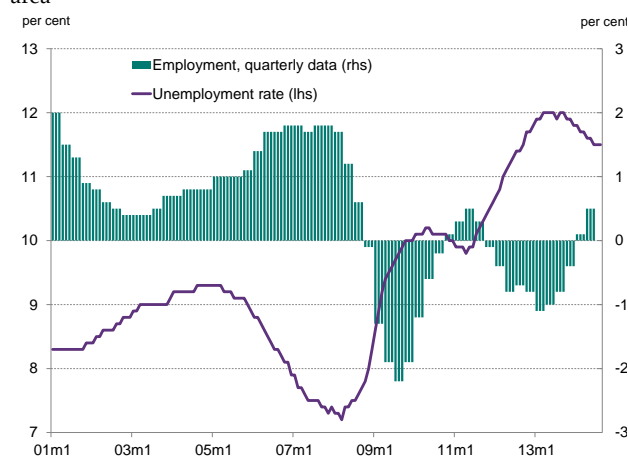
Figure 1.5 Industrial output growth* and PMI index in manufacturing in the euro area



Source: Eurostat data, Markit.

* Change in the three-month moving average of the industrial output as against the average of three months before.

Figure 1.6 Employment (y/y) and unemployment rate in the euro area

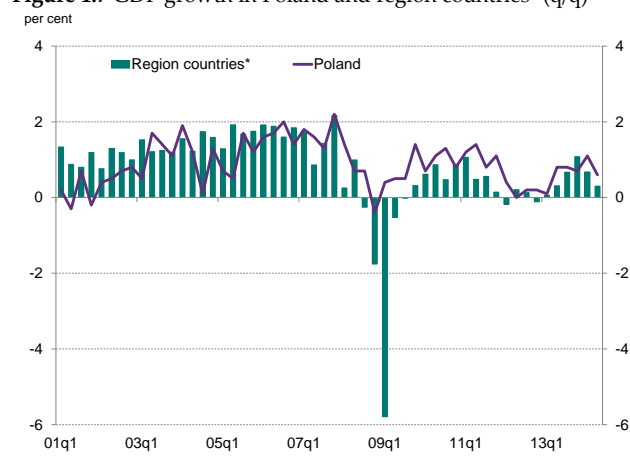


Source: Eurostat data.

⁴ In September business sentiment stabilised, which was indicated by a small rise in PMI index (from 52.0 in August to 52.2 in September).

the conflict with Ukraine and the slowdown in some of the country's major trading partners. In China, output growth slowed down in Q2 and Q3, which was accompanied by a deterioration in the housing market.

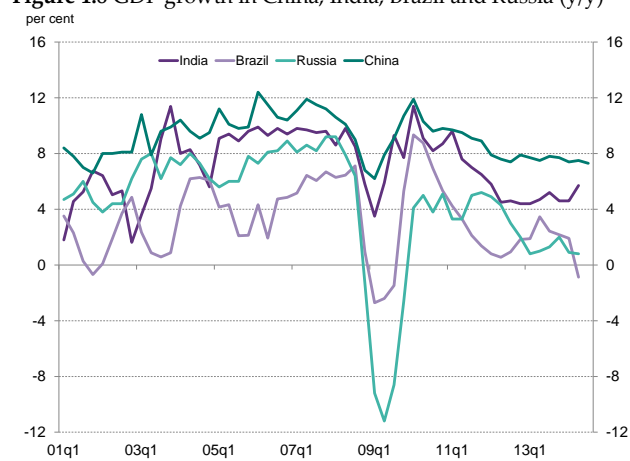
Figure 1.7 GDP growth in Poland and region countries* (q/q)



Source: Eurostat data.

* Region countries include: Czech Republic, Slovakia, Hungary, Lithuania, Romania, Latvia, Estonia, Bulgaria. The aggregate calculated as a weighted average (weights according to shares of the countries in Polish exports)

Figure 1.8 GDP growth in China, India, Brazil and Russia (y/y)



Source: Bloomberg data.

Box 1: Causes and consequences of low investment rate in Germany

Taking account of close links between Polish and German enterprises within the global supply chains (IMF, 2013), any decline in long-term economic activity growth in Germany may have negative consequences for potential GDP growth in Poland. One of the factors increasing this risk could have been the insufficient gross fixed capital formation in Germany impairing the structural competitiveness of this economy.

In the last two decades, the share of gross fixed capital formation in GDP in Germany has been steadily falling.⁵ From 2001 to 2013, the average investment rate in this country amounted to 19.9% as against 24.2% during the “unification boom” (1991-1995) and 22.7% in 1996-2000.⁶

⁵ Unless otherwise stated, the data on the investment rate in this Box is presented in accordance with ESA 2010 methodology. In 2014 most of the statistical offices across the EU Member States published revised national accounts in this methodology. An important change under ESA 2010 as compared to ESA 95 is a classification of some types of expenditure on research and development as gross fixed capital formation instead of intermediate consumption. Due to the high research and development expenditure in Germany, investment rate data compiled in line with ESA 95 classification may have been underestimated. According to Statistisches Bundesamt estimates, the investment rate in Germany in 1991-2013 compiled according to ESA 2010 methodology was higher on average by around 1.7 percentage points than when compiled according to ESA 95 classification.

In 2001-2008, the investment rate remained about 2-3 percentage points below the average rate for the euro area and the United States, which resulted primarily from lower expenditure on buildings and structures (Figure B.1.1). The analysis of the individual sectors of the German economy shows that the differences in investment levels between Germany and other euro area countries were particularly marked in sectors closely tied to the construction sector.

Figure B.1.1 Investment rate gap in Germany vis-a-vis other euro area countries (excluding Belgium, Cyprus, Greece, Ireland and Spain)



Source: Eurostat based on European Commission (2014), p. 44. The investment gap is defined as the difference between the investment rate in Germany and in the other euro area countries excluding Spain and Ireland, i.e. the economies that experienced the most pronounced housing boom before the crisis (see EC, 2014), and Belgium, Cyprus and Greece (because of the missing data on investment by type of assets in ESA 2010).

century: credit standards were stricter than in other euro area countries and the well-developed rental market for apartments made an attractive alternative to apartment purchase.

The decline in housing investment in the analysed period, as compared to 1995-2000, accounted for over a half of the drop in investment rate in Germany. However, its long-term consequences for the country's economic growth should be regarded as limited. This is because flats and houses first of all fulfil the utility function (i.e. they are inhabited by their owners), playing only a minor role as productive capital. Therefore, the decline in housing investment had much less impact on the potential product than a fall in gross expenditure on public infrastructure and commercial properties.

Reduction in the gross fixed capital formation of the public sector by around 0.4% of GDP, as compared to the 1990s, widened the gap between public investment rate in Germany and in other euro area countries to around 1.2 percentage points in 2001-2013.⁷ Considering the high initial value of public capital, such a low level of investment proved insufficient to fully replace the tattered public infrastructure. The cumulated value of public capital that has depreciated since 1999 stands at around 20% of GDP, as estimated by DIW (2013). The challenge of this period was to maintain high standards of public infrastructure in the Western part of the country, while expanding it in East German *Länder*.

A factor that limited corporate investment demand in Germany in 2001-2008 was the difficult economic situation: slow economic growth and high unemployment. This also translated into lower expectations of

Causes of low investment rate in Germany in 2001-2012

One of the causes of low activity in Germany in the first decade of the 21st century was very high residential construction investment in the 1990s, supported by a rise in demand related to migration to West German *Länder* from the regions of the former German Democratic Republic. In the first decade of the 21st century demand for housing declined markedly, which was associated with the aging of the society and the slow growth of household incomes. In 2000-2010, the population of persons aged 20-40, i.e. comprising the majority of flat and house buyers, dropped by almost 4 million (i.e. over 16%). At the same time, wages in this age group compared to the average wage in the economy were lower in Germany than in France, Spain and Italy. This was – among other factors – due to a growing number of persons working part time or in low-paid positions. Institutional factors also contributed to low demand for housing in Germany in the first decade of the 21st

⁶ According to the estimates based on the IMF data, the investment rate in Western Germany in the 1980s averaged 24.6%. However, due to the differences both in methodology and geographic area, this number is not fully comparable with the data since 1991.

⁷ Data in line with ESA 95 classification.

corporates regarding the rate of return on domestic investment and into low corporate profit growth, which accelerated only during the export boom of 2004-2007. Higher corporate profit growth in that period was associated with a lower wage growth driven by labour market reforms (the so called Hartz reforms, followed by other reforms aimed at reducing social security expenditure) and an increase in the use of intermediate goods produced in Central and Eastern European Countries.

Challenges of the insufficient investment rate in Germany

Due to strong export orientation and a long period of slow wage and domestic investment growth, economic activity in Germany has become very vulnerable to external demand fluctuations. Low investment rate combined with a high savings rate translate into weaker domestic demand in Germany. This in turn, given low demand from the euro area and the anticipated decline in growth in the developing countries, which are significant recipients of German goods, reduces GDP growth and is conducive to a high current account surplus (amounting to 7.5% of GDP in 2013). The strategy of investing German trade surpluses abroad, which was preferred in the previous decade, translated into a considerable improvement in the country's positive net international investment position (from 3% of GDP in 2000 to 42% in 2012). It turned out, however, that the strategy was costly for the German economy. The losses incurred by German financial and non-financial institutions, as a result of the decline in the prices of financial assets purchased abroad, have amounted to almost 20% of Germany's GDP (EC, 2014).

Recently, the German economy has been shifting towards the domestic market, which gives it a chance to increase the investment rate. From 2013 Q2, the annual growth of gross fixed capital formation has been positive, primarily due to the improvement in the housing market and higher than in the previous year expenditure on infrastructure.⁸ The need to counteract further depreciation of public capital was taken into account in the CDU/CSU and SPD coalition agreement of the end of 2013, which provides for increasing public investment at the federal level by a total of EUR 23 billion in 2014-2017, i.e. on average by around 0.2% of GDP per year. More than half of the funds are to be used to improve transport infrastructure, research and development as well as education and childcare facilities. In the opinion of the International Monetary Fund (IMF, 2014), this decision is a step in the right direction. However, according to the IMF, infrastructure spending by an additional EUR 50 billion annually (around 0.5% of GDP) might (and should) increase, without violating the adopted fiscal rules. Also the agenda to revive investment in the EU, suggested by the members of the new European Commission, could help to lift the investment rate in Germany.

The growth rate of investment in machinery and equipment over the last years was significantly lower than in case of investment in buildings in structures. That was due to remaining uncertainty about the growth prospects in the euro area and the rest of the world. Since the beginning of 2014 there has been some recovery in expenditure on machinery and equipment. However, the stagnation in the euro area, as well as deteriorating business sentiment in Germany due to the conflict between Russia and Ukraine pose risks to its further growth.

To sum up, the decline in the investment rate in Germany in the previous decade was mainly driven by a fall in housing demand. Yet, insufficient public and corporate sector investment proved more important for the growth outlook. Its negative consequences include excessive dependence of the German economy on the economic conditions abroad and the risk of diminishing structural competitiveness of the country as a result of depreciation of its productive capital. At the same time, the stable public finance position and very low cost of capital acquisition leave a wide margin for correcting the deficiencies identified in public infrastructure, accelerate GDP growth and reduce current account surplus, regarded as a macroeconomic imbalance by the European Commission (2014). Moreover, as the geopolitical risks diminish and the world and euro area economies recover, one may also expect a rise in gross corporate capital formation in machinery and equipment.

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⁸ However, higher investment expenditure on buildings and structures in 2013 Q4 and 2014 Q1 was partly due to mild winter.

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1.2 Inflation developments abroad

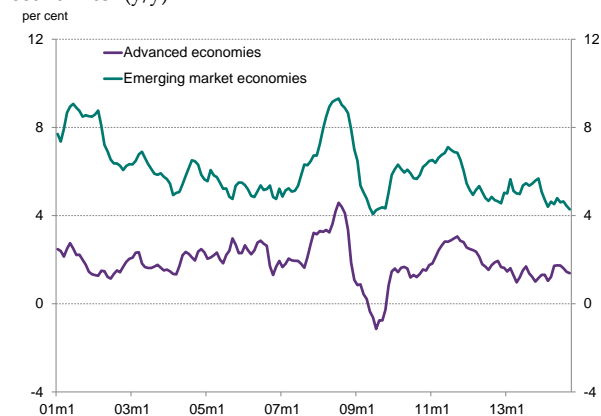
In 2014 Q3, global inflation decreased, and was below long-term average (Figure 1.9). At the same time, inflation trends varied across the countries.

In the United States, the CPI inflation declined somewhat in the past few months, mostly due to a fall in the prices of energy carriers. However, relatively favourable business climate helped keep the inflation rate close to 2%.

In the euro area, in turn, HICP inflation fell close to zero, dragged down by a continued drop in energy prices, a negative annual food price growth and a decline in core inflation amid stagnation in economic activity. The decrease in inflation was observed in most euro area countries including Germany. At the same time, in majority of countries most heavily affected by the debt crisis, price growth have remained negative. This has a positive impact on their competitiveness, while dragging down deleveraging in real terms.

In the past few months, inflation has declined also in China, reaching in September the lowest level since nearly four years. The decline in inflation was related to weaker growth in food prices, fall in energy prices and subdued – in terms of this country – economic activity (Figure 1.11). In many other emerging market economies inflation has been running low – considering their past record – or continued to decrease. At the same time, in some emerging market economies which had experienced a considerable depreciation of their

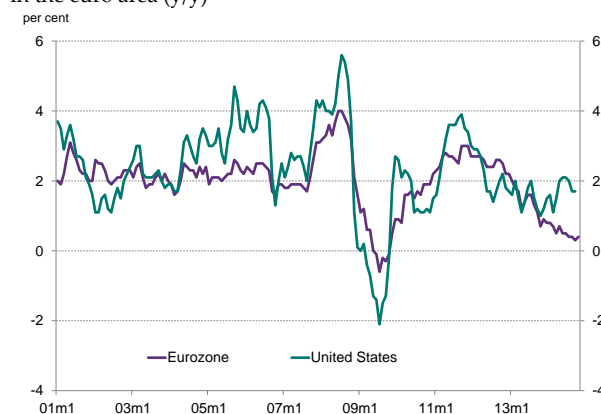
Figure 1.9 Inflation in major advanced and emerging market economies* (y/y)



Source: Bloomberg data, NBP calculations.

* GDP-weighted average of advanced and emerging market economies (EMEs of 80% of EME GDP in 2012). Country groups in line with the IMF classification.

Figure 1.10 CPI inflation in the United States and HICP inflation in the euro area (y/y)



Source: Bloomberg data.

currency this year, including Russia, inflation remained elevated.

In Central and Eastern European countries, inflation continued to hover around zero, and in some of them it was negative (Figure 1.12). In the recent period, there has been a slight rise in inflation in the Czech Republic, yet it remains markedly below central banks' inflation targets.

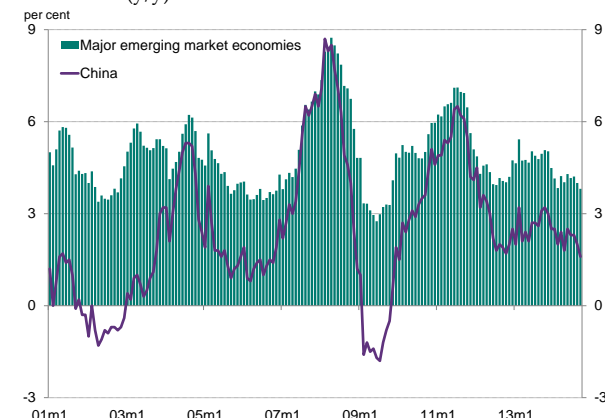
1.3 Monetary policy abroad and international financial markets

Since the publication of the previous *Report*, the monetary policy of major central banks has remained highly expansionary. Nonetheless, the prospects for monetary policy of the Federal Reserve and the ECB have been diverging (Figure 1.13, Figure 1.14) due to differences in the outlook for economic growth and inflation (see Chapter 1.1 *Global economic activity* and Chapter 1.2 *Inflation developments abroad*). This has been reflected in a divergence in the interest and exchange rate developments across the markets.

The Fed has kept its interest rates close to zero (0.00%-0.25%). This central bank has also concluded its asset purchase programme⁹ but reiterated that the interest rates were likely to stay close to zero, particularly if the inflation forecasts were below the Fed's goal of 2% over longer run and inflation expectations in longer term were well anchored. However, according to the FOMC forecasts, the US interest rates are likely to be raised as early as 2015.

The ECB has lowered interest rates again, including the rate on the main refinancing operations to 0.05% and the rate on the deposit

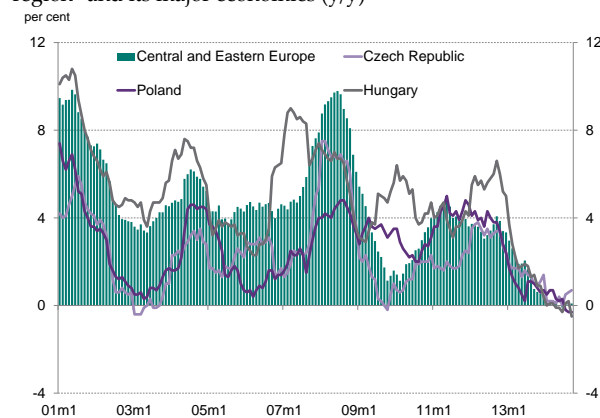
Figure 1.11 CPI inflation in the major emerging market economies* (y/y)



Source: Bloomberg data.

* GDP-weighted average in Brazil, China, India, Russia and South Africa.

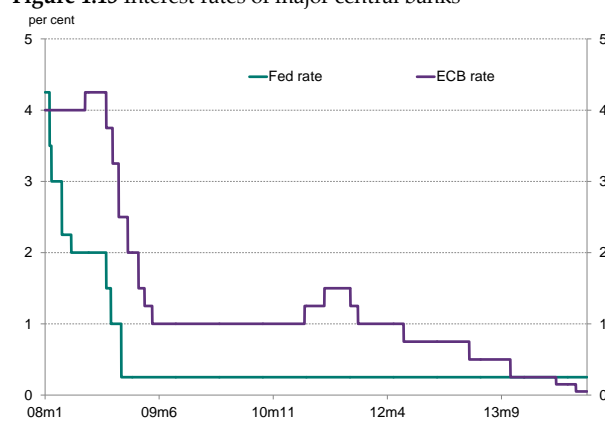
Figure 1.12 CPI inflation in the Central and Eastern Europe region* and its major economies (y/y)



Source: Bloomberg data.

* The average of inflation indices in Bulgaria, the Czech Republic, Estonia, Hungary, Latvia, Lithuania, Poland, Romania and Slovakia.

Figure 1.13 Interest rates of major central banks



Source: Bloomberg data.

⁹ Although the Fed concluded its asset purchase programme, it announced that it would maintain its policy of reinvesting principal payments from its holdings of debt securities, which implies that its balance sheet might be increasing further, albeit at a much slower pace.

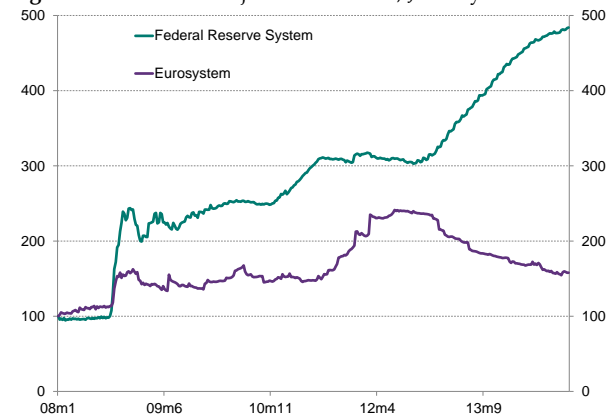
facility to -0.20%. The ECB has also started to purchase covered bonds and announced the launch of ABS purchases with underlying assets consisting of claims against the non-financial sector. Moreover, the ECB conducted first targeted LTRO, yet the amount of the transaction was well below expectations (see also Box 2 *Monetary policy easing by the ECB since the previous Inflation Report*). At the same time, the ECB has also emphasised that monetary policy could be eased further to address risks of too long period of low inflation.¹⁰

Over the past few months, sovereign bond yields have been falling in many countries due to lower growth and inflation outlook. However, because of the divergence in the prospects for monetary policy across the major advanced economies, the extent of the decline was far smaller in the United States than in the euro area (Figure 1.15, Figure 1.16).

Sovereign bond yields have fallen in most euro area member states, including the countries most severely affected by the sovereign debt crisis. Yet, recently the yields have rebounded somewhat in some of these countries due to signs of slower adjustment of the fiscal imbalances in these countries.

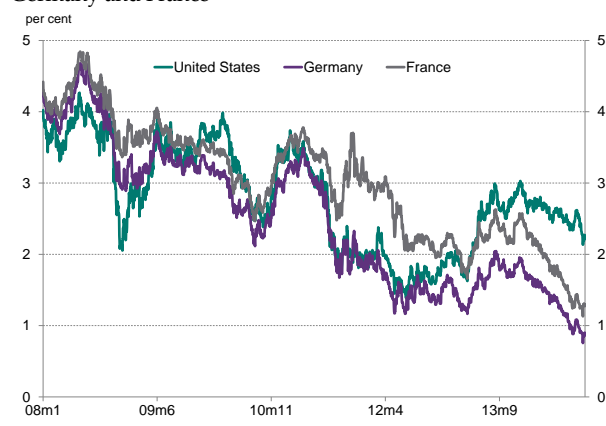
After the monetary policy easing by the ECB, central banks in some economies with strong economic ties to the euro area (the Czech Republic¹¹, Sweden, Romania, Hungary, Israel and Turkey) also reduced their interest rates. On the other hand, countries with elevated inflation (among others, Russia and Ukraine, see 1.2 *Inflation developments abroad*) have seen increases in central bank interest rates.

Figure 1.14 Assets of major central banks, January 2008 = 100



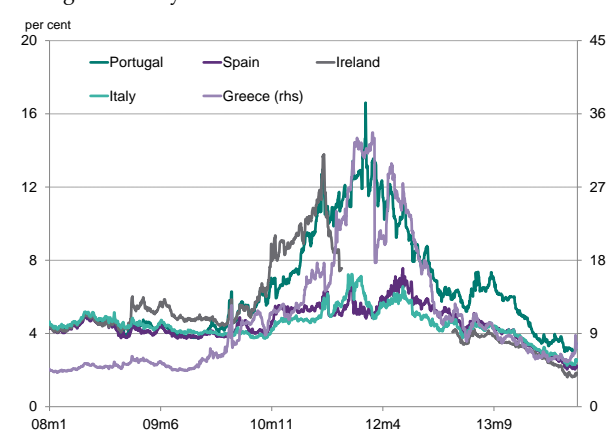
Source: Bloomberg data, NBP calculations.

Figure 1.15 10-year government bond yields in United States, Germany and France



Source: Bloomberg data.

Figure 1.16 10-year bond yields of Greece, Spain, Ireland, Portugal and Italy



Source: Bloomberg data.

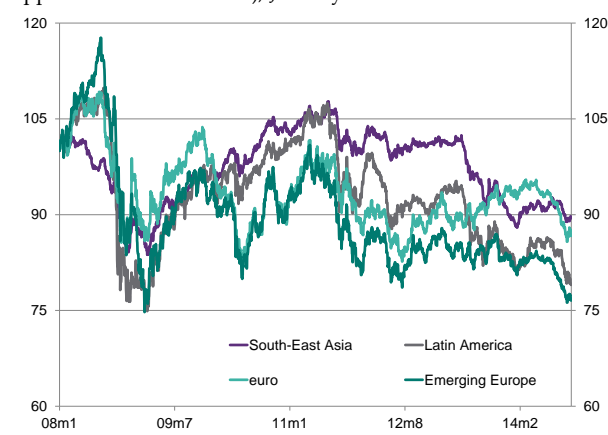
¹⁰ Also Bank of Japan has recently eased its monetary policy i.a by increasing its target for annual increase in monetary base from JPY 60-70 tn to JPY 80 tn and the annual scale of net government bond purchases from JPY 50 tn to 80 JPY tn.

¹¹ Since the publication of the previous *Report*, the Bank of the Czech Republic has kept its interest rates unchanged, including the rate on 2-week repo operations at 0.05%. Yet, the horizon for keeping the minimum EUR/CZK exchange rate at 27 korunas was shifted from mid-2015 to early 2016.

Given the perspective of a monetary tightening in the United States and an increase in geopolitical risks, the US dollar has strengthened in recent months against most currencies with a floating exchange rate regime. The appreciation of the dollar was against the euro and the currencies of countries with close economic links with the euro area was particularly strong (Figure 1.16).

Weaker economic outlook in the euro area and major developing economies (notably China, see Chapter 1.1 *Global economic activity*) caused a decline in equity prices in many countries (Figure 1.17). Particularly in the United States, stock price declines were also driven by uncertainty about the prospect of a monetary tightening in this country.

Figure 1.17 Exchange rate of the United States dollar against the euro and emerging market currencies (decrease denotes appreciation of the dollar), January 2008=100



Source: Bloomberg data, NBP calculations.

Currency indices weighted by GDP. Emerging Europe – Czech Republic, Hungary, Israel, Poland, Romania and Turkey; South-East Asia – Indonesia, Malaysia, Philippines and Thailand; Latin America – Brazil, Chile, Colombia, Mexico and Peru.

Figure 1.18 Global stock indices, January 2008 = 100



Source: Bloomberg data.

Box 2: Monetary policy easing by the ECB since the previous *Inflation Report*

In June 2014, the European Central Bank reduced interest rates and indicated it was ready to start outright asset purchases. This was related to signs of some euro area member states returning to stagnation (see also Chapter 1.1 *Global economic activity*), which might lead to a decrease in inflation in these countries. Moreover, inflation rate in the euro area continued to decline, remaining well below the ECB's definition of price stability (below, but close to 2%; see also Chapter 1.2 *Inflation developments abroad*).

As probability of inflation remaining low over an extended period of time has been rising, the ECB decided to ease monetary policy further. In September the ECB decreased interest rates again. The rate on the main refinancing operations was lowered near zero (0.05%). The ECB also indicated that its balance sheet could be increased to level of early 2012, i.e. by 900 bn EUR, to boost lending in the euro area by improving the liquidity position of banks. These targets are to be met with a help of two new asset purchase programmes:

- *ABS purchase programme* (ABSPP), under which the ECB intends to purchase a portfolio of simple and transparent asset-backed securities with underlying liabilities of euro-area non-financial entities.¹² This programme is meant to help stimulate the ABS market, which in turn – according to the ECB – should contribute to an increase in lending to the non-financial sector;

¹² Entities with 95% share owned by the euro area residents.

- *Covered Bond Purchase Programme (CBPP3)*, which is a continuation of the covered bond purchase programmes of 2009-2010 and 2011-2012. According to the ECB, in the past, purchases of covered bonds had a positive impact on credit terms for corporates and the volume of lending (ECB 2011).

The CBPP3 was launched on 20 October and the ABSPP is to start in November 2014. The purchases will be conducted for at least two years, in both primary and secondary markets, and will involve, in principle, instruments with ratings of at least BBB¹³.

In September 2014, the ECB also conducted its first targeted longer-term refinancing operation (*targeted LTRO*). However, the initial take-up by banks of EUR 82.6bn was over twice smaller than expected. This could be related to a weak demand for loans in the euro area, which stems, on the one hand, from ongoing deleveraging in the euro area economy, and – on the other hand – from lower lending offered by banks because of the asset quality review concluded in October 2014. Also, banks are discouraged from accumulating excess reserves by the negative interest rate on deposits held with the ECB.

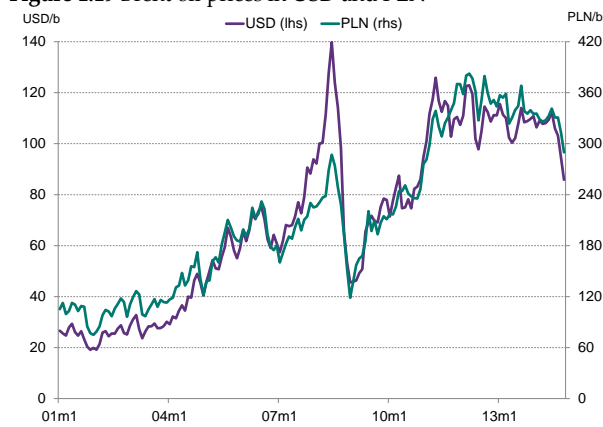
1.4 Global commodity markets

In 2014 Q3 and early Q4, most energy and agricultural commodity prices dropped. This was driven by an improvement in supply conditions amidst weakening expectations of a rise in demand for commodities.

The prices of Brent crude oil have been falling steadily since June 2014, to reach the lowest level from nearly four years (Figure 1.19). The drop in prices was driven, on the one hand, by signals of a weaker-than-expected global economic recovery, particularly in the euro area and China. On the other hand, disturbances in OPEC oil production have decreased. In particular, deliveries from Libya have been partially resumed and the fall in oil output associated with the conflict in Iraq has been less pronounced than expected. Among the OPEC countries, there has been a further growth in production in Brazil, United States and Canada.

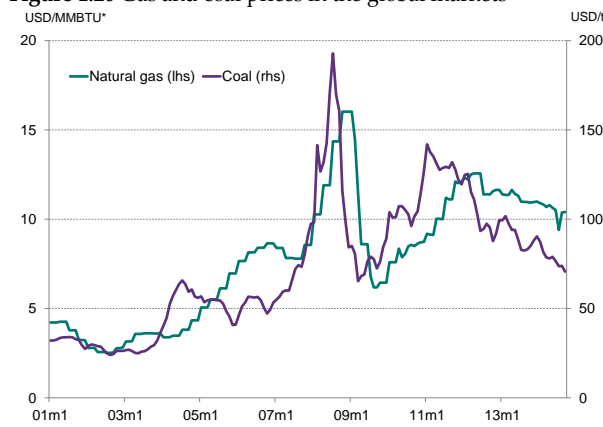
Natural gas prices dropped significantly in July due to the high stocks of this commodity following a very mild winter. In August, natural gas prices increased as a result of the escalation of tensions between Russia and Ukraine, remaining, however, lower than at the beginning of the third quarter. At the same time, the decline in coal

Figure 1.19 Brent oil prices in USD and PLN



Source: Bloomberg data.

Figure 1.20 Gas and coal prices in the global markets



Source: IMF data.

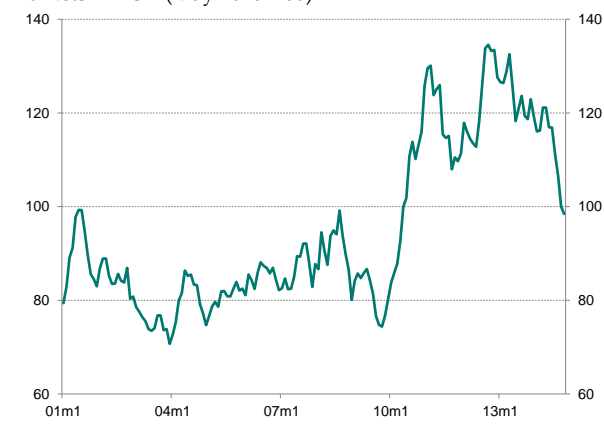
* MMBTU - Million British Thermal Unit; 1 BTU is the amount of energy needed to raise the temperature of one pound of water by one degree Fahrenheit.

¹³ Although the ratings for Greece and Cyprus are below BBB-, covered bonds issued by entities domiciled in the two countries and ABSs backed by claims of these entities will also be purchased under the programmes, provided the securities are guaranteed by the government of Greece or Cyprus.

prices continued, which was associated with the rising use of shale gas in energy production (Figure 1.20).

Still falling was also the food price index, driven by dropping prices of almost all agricultural commodities included (Figure 1.21). The decline in agricultural commodity prices, notably wheat, milk, sugar and oilseeds was associated mainly with an increase in their supply, driven by favourable weather conditions. Moreover, weaker demand from China and Russia was conducive to the fall in milk prices¹⁴. In turn, the fall in demand indirectly related to the Russia-Ukraine conflict and a deterioration in business conditions in Russia led to a decline in meat prices.

Figure 1.21 Index of agricultural commodity prices in the global markets in EUR (May 2010=100)*



Source: Bloomberg, Reuters data, NBP calculations.

* The index comprises prices of: wheat, rape, pork, potatoes, sugar, cocoa, coffee, skimmed milk powder, butter, frozen orange juice concentrate. The system of weights used in the IACP reflects the consumption structure of Polish households.

¹⁴ The decline in the demand for milk from China results from a gradual restoration of the domestic market after the collapse following the 2008 discovery of melamine in powdered milk for infants. The demand from Russia, in turn, has decreased due to the embargo imposed by this country on dairy imports from some developed countries and the European Union in response to the economic sanctions launched in 2014 Q3 and related to the Russian-Ukrainian crisis.

2 Domestic economy

2.1 Inflation developments

2.1.1 Consumer prices

The annual growth in the prices of consumer goods and services in Poland has weakened, turning negative in July (see Box 3: *Deflation – assessment of risk for Poland*). In September, it stood at -0,3% y/y (Figure 2.1, Table 2.1).

The flagging price growth was primarily driven by a decline in food prices related to good harvest of agricultural commodities at home and a drop in the global prices of agricultural produce (see Chapter 1.4 *Global commodity markets*). Additional factor pushing down food prices was the Russian embargo on agricultural and food imports from Poland.

Consumer price growth was further weakened by easing energy prices, which occurred due to a drop in global oil prices.

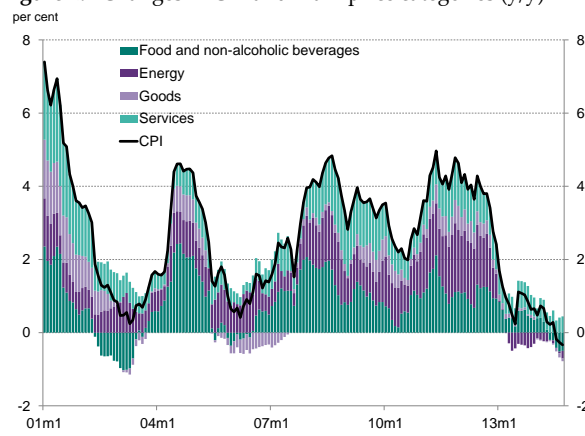
Another factor conducive to the lower inflation was the lack of demand and cost pressure, evidenced by falling prices of non-food products and a further decrease in industrial producer prices (see Chapter 2.1.2 *Core inflation* and Chapter 2.1.3 *Producer prices in industry*).

Weaker price growth at home was also driven by a decline in inflation in the external environment of the Polish economy, in particular in the euro area countries (see Chapter 1.2 *Inflation developments abroad*).

2.1.2 Core inflation

Since the publication of the previous *Report*, all measures of core inflation have decreased

Figure 2.1 Changes in CPI and main price categories (y/y)



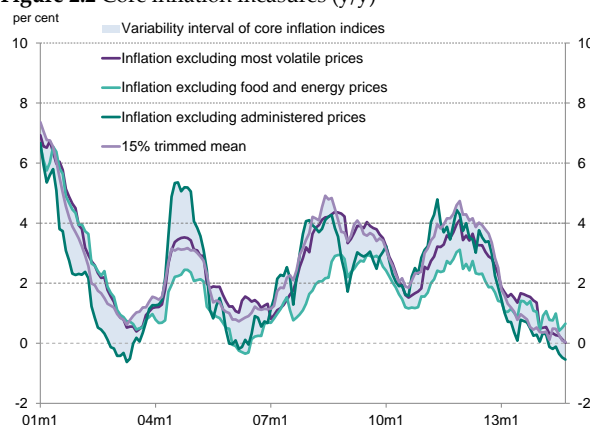
Source: GUS data, NBP calculations.

Table 2.1 Changes in CPI and main price categories (y/y)

	2014								
	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
CPI	0.5	0.7	0.7	0.3	0.2	0.3	-0.2	-0.3	-0.3
Food and non-alcohol beverages	1.6	1.6	1.2	0.3	-0.8	-0.9	-1.7	-2.1	-2.0
Energy	-0.8	-1.1	-1.3	-1.3	-0.1	-0.4	0.0	-0.2	-1.1
Goods	-0.1	-0.1	0.0	-0.1	-0.1	-0.1	-0.3	-0.4	-0.2
Services	1.0	2.0	2.2	1.7	1.7	2.2	1.2	1.5	1.6

Source: GUS data, NBP calculations.

Figure 2.2 Core inflation measures (y/y)



Source: GUS data, NBP calculations.

(Figure 2.2), largely reflecting the lack of demand and cost pressures in the economy.

Core inflation net of food and energy prices declined from 0.8% y/y in May to 0.4% y/y in July, to rebound to 0.7% y/y in September. These changes were mainly driven by fluctuations in the growth of services prices due to the statistical base effects.¹⁵

The remaining core inflation indices, in turn, sank to historical lows.¹⁶

2.1.3 Producer prices in industry

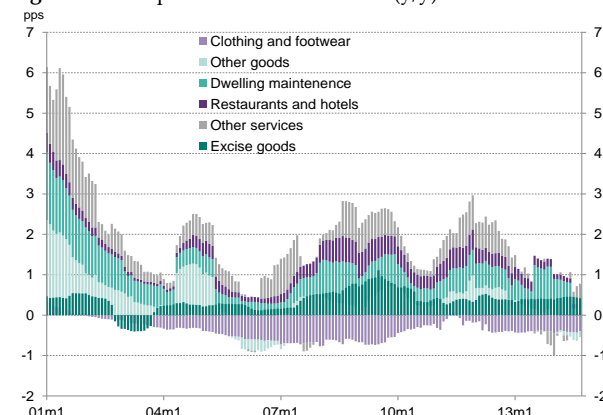
The annual growth of industrial producer prices (PPI) has been negative for two years. In 2014 Q3, PPI inflation sank to -1.7% y/y, from -1.2% y/y recorded in the previous quarter. The decline in PPI related to both the goods sold at home and those exported. This testifies to a sustained lack of cost pressure in the economy (Figure 2.4).

PPI growth remains negative as prices of industrial commodities decline, amidst the still low – despite a certain rise – unit labour cost growth in industry (see Chapter 2.4 *Labour market*).

2.1.4 Import prices

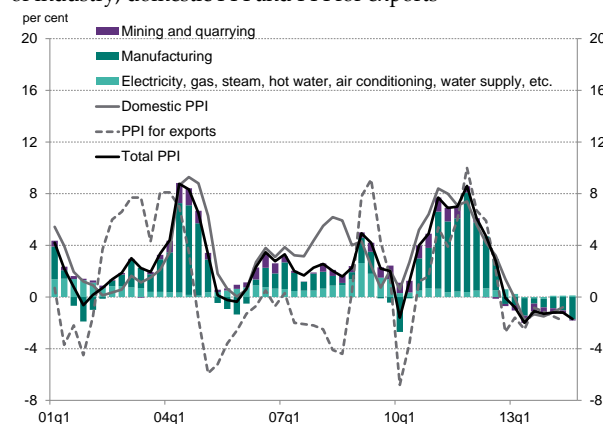
Prices of imports as expressed in PLN continued to decline in the first half of 2014 (Figure 2.5). Import prices fell by 1.8% y/y in 2014 Q1, and by 3.5% y/y in the following quarter. The decrease in import prices in that period was mainly attributable to the stronger than a year before zloty exchange rate against the dollar.

Figure 2.3 Composition of core inflation (y/y)



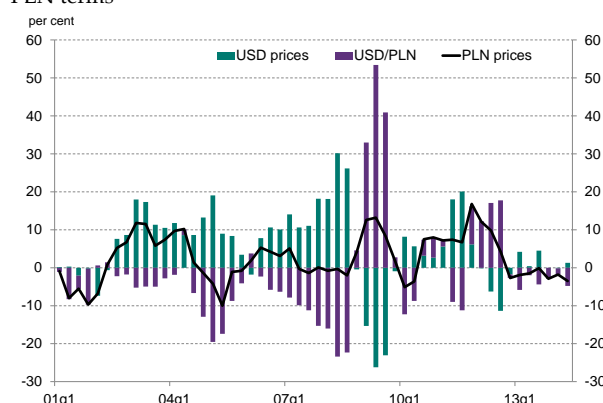
Source: GUS data, NBP calculations.

Figure 2.4 Composition of annual growth of total PPI by sections of industry, domestic PPI and PPI for exports



Source: GUS data.

Figure 2.5 Composition of annual growth of import prices in PLN terms



Source: GUS data, NBP calculations.

¹⁵ The statistical base effects in case of services prices were related to a considerable rise in the charges for waste disposal in July 2013 and the decrease in kindergarten fees in September 2013.

¹⁶ Core inflation net of administered prices declined to -0.5% y/y in September, i.e. a level close to the all-time low of -0.6% y/y recorded in April 2003.

2.1.5 Inflation expectations

In tandem with falling inflation rates, inflation expectations have gradually decreased over the past few quarters.

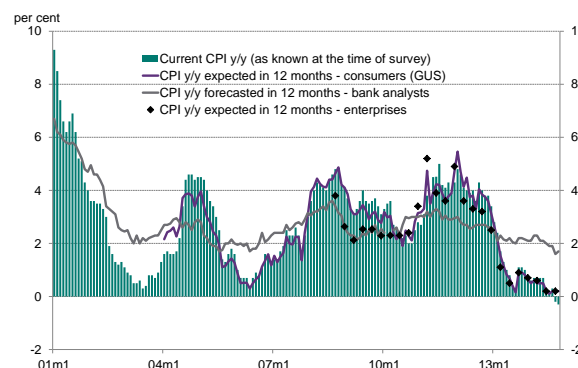
Since the publication of the previous *Report*, the analysts of the financial sector have revised their 12-month inflation expectations downwards, from 2.0% to 1.7% in October 2014. (Figure 2.6). At the same time, analysts' forecasts of average annual inflation in 2015 and 2016 have decreased.

According to the September *NBP Survey of Professional Forecasters*,¹⁷ the central forecast of average annual inflation for 2014 is at 0.2%, for 2015 at 1.2% and for 2016 at 2.1%. At the same time, the probability of inflation remaining within the band for deviations from the inflation target is 31% in 2015 and 70% in 2016 (Table 2.2).

Corporate 12-month inflation expectations dropped to 0.2% in 2014 Q3, from 0.6% in 2014 Q1.¹⁸ In terms of the structure of the responses of the surveyed businesses, comparing to 2014 Q1, the following quarters saw a significant rise in the percentage of businesses expecting prices to stabilise or to decline over the next 12 months.

Consumers' inflation expectations – like those of corporates – are hovering at near-zero levels; since mid-year, the objectified measure of these expectations has been close to zero.¹⁹ Since the

Figure 2.6 Inflation expectations of consumers and enterprises and inflation forecasts of bank analysts



Source: Ipsos, GUS, Reuters and NBP data.
For consumers and enterprises – objectified measure.

Table 2.2 Forecasts of CPI inflation derived from individual interval forecasts (in %)

Horizon	Central forecast	50% probability	90% probability	Probability of 1.5-3.5% range
2014	0.2	0.1 – 0.4	-0.2 – 1.6	7%
2015	1.2	0.8 – 1.7	-0.3 – 2.8	31%
2016	2.1	1.6 – 2.6	0.5 – 4.0	70%

Source: NBP Survey of Professional Forecasters, September 2014.

¹⁷ The *NBP Survey of Professional Forecasters* is conducted on a quarterly basis. It comprises experts from financial institutions, research centres and employer and employee organisations. Their forecasts are framed in terms of probability, which allows taking into account various economic scenarios and assessing the compatibility of forecasts. For a detailed description of the survey results – <http://amakro.nbp.pl/amakro-static/pages/about.nbp>

¹⁸ The survey question addressed to enterprises is framed with reference to current inflation: "In ... [the month of the latest available data] 2014 the CPI (inflation) amounted to ... % in year-on-year terms. In the opinion of your enterprise, within the nearest 12 months prices will: (1) rise faster than hitherto; (2) rise at the same pace; (3) rise more slowly; (4) remain unchanged; (5) fall; (6) I don't know." When current inflation is non-positive, the question additionally includes information about the average CPI inflation in a longer period preceding the survey, as well as more response choices for respondents expecting a decline in prices. In the survey launched in 2014 Q3, the question was as follows: "In July 2014 the CPI (inflation) amounted to -0.2% in year-on-year terms, and the average CPI index in the past 6 months amounted to 0.3%. In the opinion of your enterprise, within the nearest 12 months prices will: (1) rise faster than the average CPI index in the past 6 months; (2) rise at the same pace; (3) rise more slowly; (4) remain unchanged on the July level; (5) fall more slowly than in July; (6) fall at a similar pace as in July; (7) fall faster than in July; (8) I don't know".

¹⁹ The survey question about the expected price changes in the GUS consumer survey is as follows: "In comparison to the past 12 months, what changes do you expect in consumer prices in the next 12 months? (1) they will rise faster than hitherto; (2) they will rise at a similar pace; (3) they will rise more slowly; (4) they will remain roughly unchanged; (5) they will fall; (6) don't know." The objectified measure of inflation expectations is

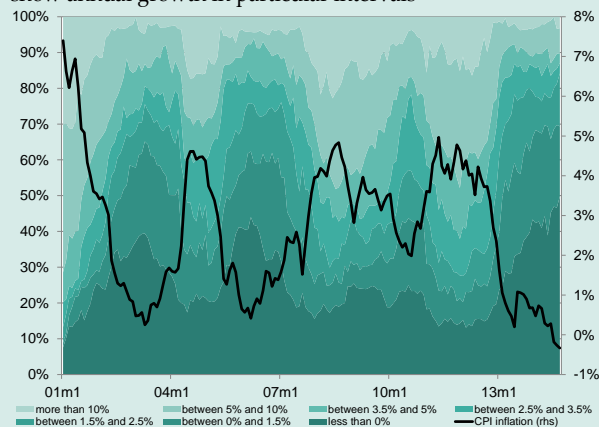
beginning of 2014, in similarity to corporates, the percentage of consumers expecting prices to stabilise over the next 12 months has risen considerably. The percentage of consumers expecting prices to fall, in turn, continues to be negligible.

Box 3: Deflation – assessment of risk for Poland

Since December 2012, CPI inflation in Poland has been below NBP inflation target (2.5%), and since February 2014 – also below the lower limit for deviations from the target (1.5%). Starting from July 2014, the annual price growth has been negative. Most core inflation indices have also declined (see Chapter 2.1 *Inflation developments*).

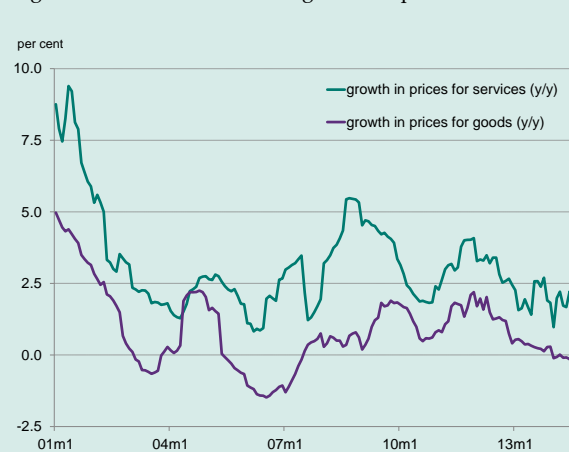
A negative price growth is often referred to as *deflation*. The weight and significance of deflation in a given economy may be different depending on the roots and effects of a fall in price level.

Figure B.3.1. CPI weight for basket components whose prices show annual growth in particular intervals



Source: NBP data, own calculations.

Figure B.3.2. CPI inflation and growth in prices for services



Source: NBP data.

Historical record indicates that a decline in the general level of prices has often been related to the impact of positive supply shocks (an increase in productivity at the times of industrial revolutions), which justified the absence of a simultaneous fall in output or employment. Deflation may affect the economy if it originates from persistently weak aggregate demand leading to a long-term decline in wage growth, wage growth expectations, and with time, also inflation expectations. Coupled with permanently low wage growth, deflation may lead to an increase in the real debt, which adversely impacts the financial position of economic agents (including sovereigns) and, in consequence, might affect consumption and aggregate demand.²⁰

obtained under the assumption that consumers evaluate current price changes in accordance with the readings of the CPI index as published by the GUS. Where price growth, construed as approximation of prices perceived by respondents, is non-positive, the interpretation of survey results becomes uncertain, and the quantification method must be modified. In such periods, the quantification procedure substitutes the non-positive inflation rate with the latest positive current inflation rate, which allows to avoid contradiction with the response options assuming a price growth. The technical nature of this operation renders the objectivized assessment of inflation expectations more uncertain in periods of non-positive current inflation, hence this assessment should be treated as an approximation.

²⁰ Detrimental nature of inflation may be reflected in Japan's experience of fall in price level between 1999 and 2013 (with positive inflation on and off). The main reason for this was a fall in domestic demand caused by deleveraging in Japanese private sector. However, to some extent it was also a result of a fall in investment deflator due to technological improvements, deregulation of selected branches of the economy and appreciation of the yen. The fall in price level could have distorted deleveraging of the Japanese economy following the burst of asset price bubble and thereby weakening economic growth. According to some research, deleveraging in Japan could have also been distorted by credit policy of Japanese banks (see for example BIS Working Paper No. 188/2005).

Deflation may pose a risk to economic growth when a drop in prices of consumer goods and services:

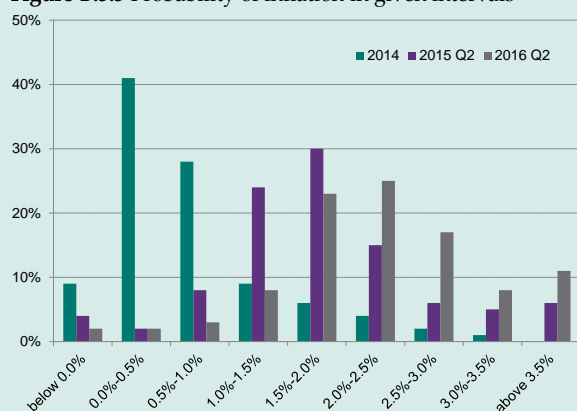
- has a general and long-term nature;
- goes together with a prolonged decline in asset prices;
- is accompanied with recession or stagnation alongside a deterioration of labour market conditions;
- comes with a significant decline in wage growth expectations and inflation expectations.

This box discusses in greater detail the reasons for low inflation in Poland and its immediate environment, showing that in the case of Poland deflation should prove relatively short-lived and unlikely to pose a threat to domestic economic growth.

Sources of low inflation worldwide

Poland is not the only country where inflation has fallen markedly in recent years. Inflation remains much below the inflation targets in many countries, notably in the majority of advanced and related emerging market economies (see Chapter 1.2 *Inflation developments abroad*). At present, there are three major factors that contribute to low inflation in the world.

Figure B.3.3 Probability of inflation in given intervals



Source: own calculations based on NBP Survey of Professional Forecasters – September 2014.

Firstly, larger extraction of shale oil and gas in recent years has vastly increased the supply of these commodities, especially in the US market, which was conducive to a decline in energy commodity prices in the global markets. Economic growth deceleration in China has also been supportive of the fall in energy commodity prices. Secondly, favourable weather conditions have contributed in recent quarters to higher supply of food commodities in the global markets and a decline in their prices. Thirdly, limited demand pressure related to the ongoing deleveraging processes in many advanced economies and the absence of evident improvement in their labour market conditions are also conducive to a fall in inflation worldwide. The latter factor is of particular

importance to the developments in the euro area, where persistent weakness of demand is the main factor curbing inflationary pressure.

In the majority of advanced economies, core inflation fell less than the CPI inflation. This indicates that supply-side factors are at the roots of particularly low inflation in advanced economies. Generally, deflationary trends in the global economy seem to be temporary, as indicated by stabilizing inflation expectations in most countries, rising asset prices and low IMF deflation risk index (IMF World Economic Outlook April-October 2014).²¹ However, the situation is different in the euro area, where a relatively high unemployment and demand stagnation are accompanied by low core inflation.

Deflation risk in Poland

In Poland, a significant fall in inflation and the current deflation are related mainly to external factors, such as fall in food and energy prices on the back of drop in commodity prices in the global markets. The fall in food prices was reinforced by favourable domestic supply conditions and the embargo imposed by Russia on

²¹ IMF Index of Deflation Vulnerability accounts for changes in prices, the size of demand gap, developments in the financial markets and shifts in the monetary and credit aggregates (see Kumar et al, 2003, IMF WEO, April and October 2014).

Poland's agricultural and food products. Additional factor pulling down inflation in Poland was falling inflation in the euro area amid relatively stable exchange rate.

The nature of the sources of deflation in Poland indicates that it should not pose any risks to economic growth.

Firstly, in spite of the broad-based price fall in Poland (Figure B.3.1), it was mainly due to developments in prices of goods, with the growth in prices of services decelerating at a much slower pace and remaining positive (Figure B.3.2). Bearing in mind that services are to a large extent non-tradables, this indicates that domestic factors might have been of less importance for disinflationary developments in Poland.

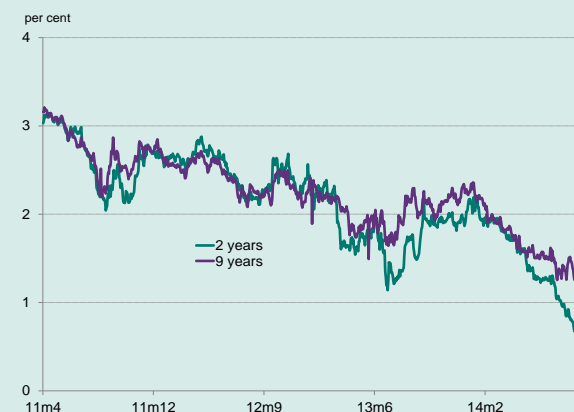
Secondly, the risk of deflation in Poland is contained by stable – despite some slowdown – economic growth (see Chapter 2.2 *Demand and output*), which – unlike in some euro area member states – is not constrained by the deleveraging processes or unfavourable labour market conditions that would lower wage growth (see Chapter 2.4 *Labour market*). Moreover, financial asset prices in Poland are still trending upwards despite the economic slowdown and geopolitical risks. Also real property prices remain stable, and in primary market in some cities – have been posting modest increases (see Chapter 2.5.3 *Asset markets*). The indicator that combines all the factors of deflation probability is the deflation vulnerability index developed by the IMF. For Poland, this index has been low.

Figure B.3.4. Percentage of entities expecting growth, stabilization or fall of prices over the next 12 months



Source: own calculations based on GUS and NBP data.

Figure B.3.5. Inflation expectations implied by yields on inflation-indexed T-bonds



Source: own calculations based on Bloomberg data.

Thirdly, deflation is not expected to continue over the long-term horizon by analysts, economic agents or market participants. This points to a limited risk of prolonged deflation. In particular, according to the probability forecast derived from the latest *NBP Survey of Professional Forecasters*, the probability of a deflation scenario is rather low in the opinion of the surveyed analysts (Figure B.3.3). This probability peaks this year and then falls to near zero, which confirms that according to these analysts deflation might prove temporary. Inflation expectations of economic agents point to a similar scenario. Although for several quarters the percentage of consumers and enterprises expecting price increases in the next 12 months has been falling, respondents expecting price stabilization markedly outweighs those expecting price decreases for both consumers and enterprises (Figure B.3.4). In 2014 Q2, a mere 1% of consumers and 12% of enterprises expected a decline in prices over the coming 12 months. However, inflation expectations estimated from yields on inflation-indexed government bonds have fallen in recent months and remain significantly below NBP inflation target (Figure B.3.5).²²

To recapitulate the above, the probability of deflation in Poland lasting longer than until the end of 2014 is currently limited, but the risk of inflation remaining positive but low and away from NBP inflation target has increased. To contain the risk of inflation staying below the target over the medium term, the Monetary Policy Council has recently reduced the interest rates (see Chapter 2.5 *Financial markets and asset prices*).

²² The data may be disturbed to some extent due to limited liquidity in the inflation-indexed T-bonds market at the beginning of this year.

2.2 Demand and output

In 2014 Q2, GDP growth in Poland decelerated slightly – to 3.3% y/y from 3.4% y/y in 2014 Q1 (Figure 2.7, Table 2.3). That was due to both a significant drop in the contribution of net exports and a slowdown in investment. The smaller contribution of net exports resulted from subdued growth in external demand amid rising growth in imports. Alongside that, a steady consumer demand growth continued. At the same time, there was a marked rise in the contribution of inventories to GDP growth.

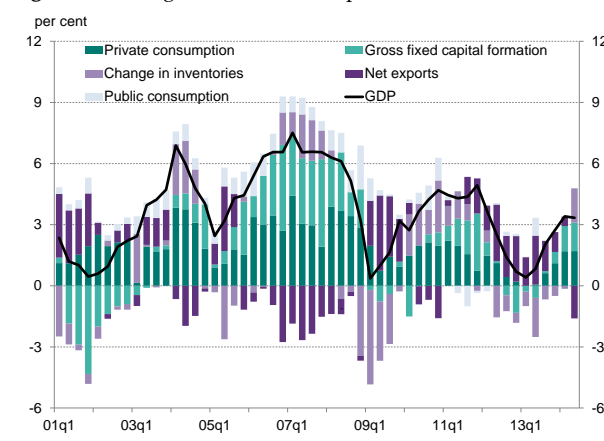
Similar trends – i.e. decelerating exports growth and rising inventories – were observed in other CEE countries (see Chapter 1.1 *Global economic activity*). They may point to a mismatch between firms' output and slowing demand, in particular from abroad, in 2014 Q2.

2.2.1 Consumption demand

In 2014 Q2, a rise in private consumption accelerated slightly in annual terms (from 2.6% y/y in 2014 Q1 to 2.8% y/y, Figure 2.8) and was close to the multi-year average. Consumer demand in 2014 Q2 was supported by a growth in real wages amidst steadily rising employment. At the same time, lending for households increased (see Chapter 2.6 *Credit and money*).

Despite a slight acceleration increase in consumption, 2014 Q2 saw a decline in the growth of retail sales in all major categories.²³ The deceleration in the sales of goods could stem from increased propensity to save and weaker propensity

Figure 2.7 GDP growth and its components



Source: GUS data.

Table 2.3 Growth of GDP and its selected components (y/y) and contribution of inventories and net export to GDP

	2009	2010	2011	2012	2013				2014	
					q1	q2	q3	q4	q1	q2
GDP (%)	1.6	3.9	4.5	1.9	0.5	0.8	1.9	2.7	3.4	3.3
Private cons. (%)	2.1	3.2	2.6	1.2	0.0	0.2	1.0	2.1	2.6	2.8
Public cons. (%)	2.1	4.1	-1.7	0.2	-0.1	4.3	1.7	2.1	0.7	0.8
Gross fixed capital formation (%)	-1.2	-0.4	8.5	-1.7	-2.1	-3.2	0.6	1.3	10.7	8.4
Change in inventories (pps)	-2.4	2.0	0.6	-0.6	-0.5	-2.0	-0.5	-0.7	-0.1	1.7
Net exports (pps)	2.7	-0.7	0.9	2.0	1.3	2.5	1.4	1.5	0.5	-1.6

Source: GUS data.

²³ Moreover, retail sales data refer mainly to the sales of goods, while private consumption data from national accounts also include spending on services, which are characterized by smaller cyclicity. What is more, data on retail sales published on a monthly basis refer to sales by firms with a workforce of more than nine persons, i.e. to a sample with overrepresented large retail outlets distinguished by lower level of prices than shops overall. This may trigger a larger volatility of retail sales data in comparison with data on household consumption. More about retail sales and private consumption in: *Statistical Yearbook of the Republic of Poland*, GUS, Warsaw 2013, pp. 551 and 692.

to make major purchases as declared in GUS surveys from 2014 Q2.

In 2014 Q3, the fall in annual growth of retail sales was more pronounced. At the same time, however, consumer sentiment remained favourable (Figure 2.9), propped up by stable labour market conditions and a persistent wage growth in the economy (see Chapter 2.4 *Labour market*). This points to a possibility of continued steady growth of consumer demand in 2014 Q3.

2.2.2 Investment demand

In 2014 Q2, investment growth in the economy slowed down slightly. In the opinion of the surveyed enterprises, the prospects for investment activity in 2014 Q3 remained favourable, yet for 2014 Q4 the outlook is expected to deteriorate.

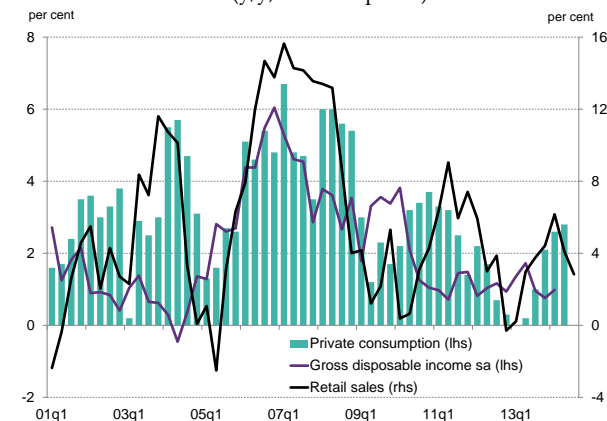
The annual growth rate of gross fixed capital formation in 2014 Q2 amounted to 8.4% y/y as compared to 10.7% y/y in 2014 Q1. The slowdown was mainly driven by weaker growth in investment expenditure on means of transport after expiration of regulations allowing for VAT deduction on the purchase of cars with LCV type approval (Figure 2.10). Moreover, 2014 Q2 brought a slight deceleration in corporate outlays on machinery and equipment. In contrast, growth in investment expenditure on buildings and structures accelerated (see Chapter 2.5.3 *Home prices*).

Weaker pace in corporate investment was observed among exporters, while investment outlays of non-exporting enterprises gained momentum (Figure 2.11).

Despite some slowdown, corporate investment in 2014 Q2 continued at relatively high pace and remained the main driving force of investment demand in the economy.

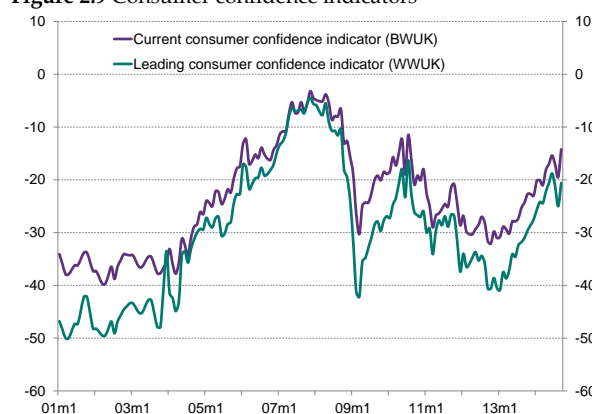
The decline in corporate investment in 2014 Q2 was accompanied by an upswing in public sector

Figure 2.8 Growth of private consumption, gross disposable income and retail sales (y/y, constant prices)



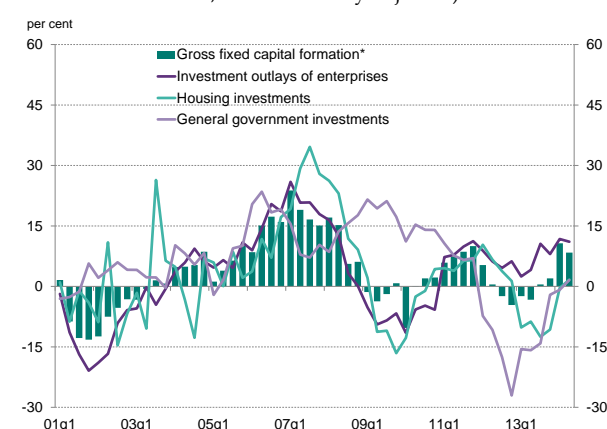
Source: GUS data, NBP calculations.

Figure 2.9 Consumer confidence indicators



Source: GUS data.

Figure 2.10 Investment in the economy (y/y, NBP estimates for the NECMOD model; data seasonally adjusted)



Source: NBP data.

*GUS data (non seasonally adjusted).

investment, largely driven by growing capital expenditure of local government units. At the same time, housing investment also posted a rise. The increase in household's expenditures on residential investment was fuelled by high availability of mortgage loans, associated with a stable labour market conditions (see Chapter 2.4 *Labour market*), decreasing prices of real estate in the secondary market (see Chapter 2.5.3. *Home prices*), as well as a historically low interest rate on mortgage loans²⁴ (see Chapter 2.6 *Credit and money*).

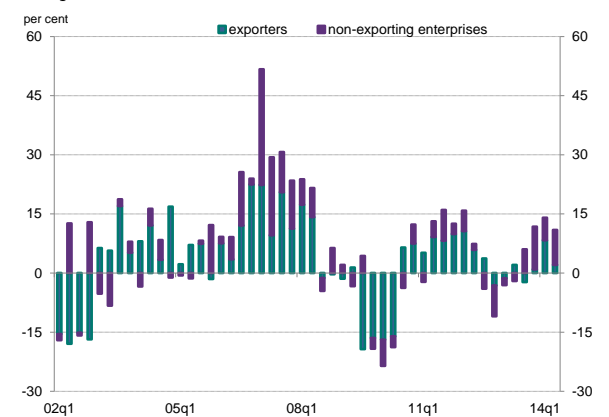
According to the NBP business climate survey, corporations expect a decline in investment growth in 2014 Q4, following a rise seen in 2014 Q3.²⁵ Deteriorating investment outlook is indicated by a falling share of companies planning new investment and a declining balance of planned changes in investment outlays in the coming quarter (Figure 2.12).²⁶ A possible slowdown in corporate investment is also signaled by a decline in the estimated value of new investment projects in the first half of 2014. Falling enterprises' propensity to invest could have been driven by the deteriorating sentiment in the corporate sector amid weaker economic activity at home and worse economic conditions abroad.

Despite a significantly lower growth in industrial output (see Chapter 2.2.5 *Output*), capacity utilization in industry and in the corporate sector in 2014 Q3 remained relatively high (Figure 2.13).

2.2.3 Government demand

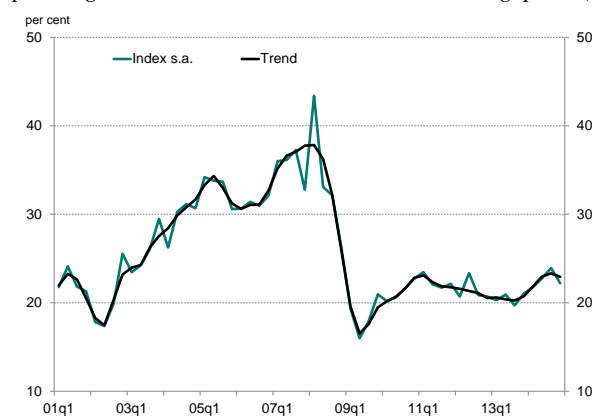
In January-September 2014, the central budget deficit totalled PLN 22.4 billion, which represents

Figure 2.11 Investment outlays of exporting and non-exporting enterprises



Source: NBP economic climate survey.

Figure 2.12 Index of new investments (percentage of enterprises planning to start new investments within the coming quarter)



Source: NBP economic climate survey.

²⁴ An additional factor boosting housing investment to a certain extent is availability of government-subsidized housing scheme „Flat for the Young” for some borrowers (see Chapter 2.5.3 *Home prices*).

²⁵ NBP Quick Monitoring Survey. Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4, NBP.

²⁶ Deterioration in investment activity outlook for 2014 Q4 concerned all enterprises regardless of the degree of their involvement in exports. The falling optimism among non-exporting companies is reflected in decreasing balance of planned changes in the quarterly investment outlays, while their plans to embark on new investment projects didn't change significantly. At the same time, exporters remain still more optimistic in their investment plans than the non-exporting companies, as indicated by both higher level of new investments index and higher balance of planned changes in the quarterly investment outlays.

47.1% of the amount envisaged for 2014 (Figure 2.14).²⁷

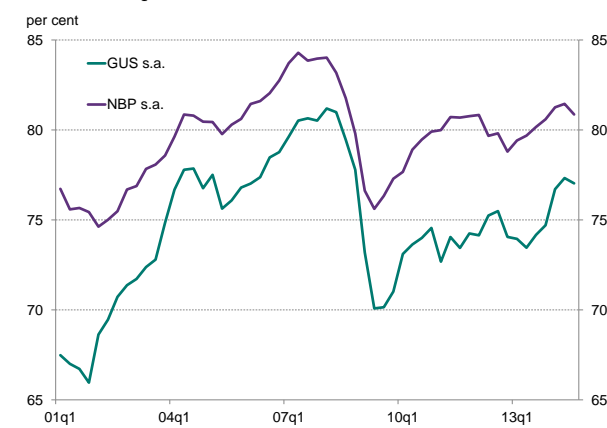
Overall central budget revenue in January-September was 2.4% higher than in the corresponding period of 2013, with tax receipts having risen by 6.8% y/y. The sizable increase in tax receipts was primarily associated with a significant rise in VAT income (by 11.4% y/y), driven by the acceleration of economic growth in 2014 Q1 and the implementation of legislative changes.²⁸

In the same period, central budget expenditure fell by 1.0% y/y, which was related to a decline in the costs of public debt service (by 19.8% y/y), mainly as a result of redeeming government bonds transferred by Open Pension Funds (OFE) to the Social Insurance Institution (ZUS). At the same time, the subsidy from the central budget for the Social Insurance Fund was significantly larger than in the corresponding period of 2013.²⁹

In 2014 H1, local government units registered a surplus of PLN 9.6 billion, i.e. PLN 1.6 billion more than in 2013 (Figure 2.15). The improvement was due to a substantial rise in private income tax receipts³⁰ and a limited growth in current spending (by 3.3% y/y). At the same time, there was a marked increase in local government capital expenditure (by 27.7% y/y), including spending financed with the EU funds.

Also the balance of the Social Insurance Fund improved in 2014 H1, compared with the corresponding period of 2013. This was driven by

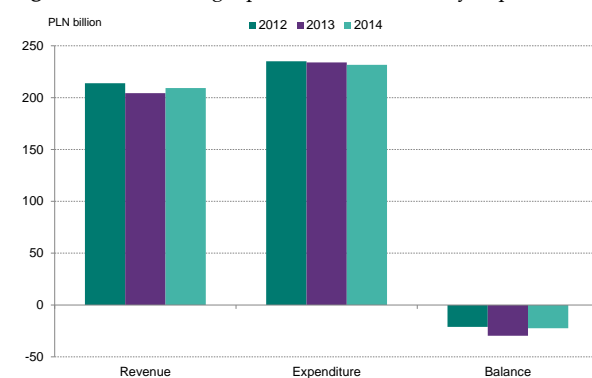
Figure 2.13 Production capacity utilisation in industry (GUS) and in the corporate sector (NBP)



Source: GUS data, NBP economic climate survey.

The degree of capacity utilisation based on GUS business tendency survey is significantly lower than quoted in NBP surveys. However, trends in both indicators are similar in both surveys. The difference in the data results from the difference in the enterprise sample on which surveys are based on. The difference may also stem from the fact that large enterprises are overrepresented in the NBP sample, while the GUS sample is representative in terms of the enterprise size.

Figure 2.14 State budget performance in January-September



Source: Ministry of Finance.

²⁷ After September 2013, the deficit amounted to 70.3% of the final outturn in 2013.

²⁸ At the end of 2013, new measures aimed at preventing VAT refund frauds were introduced - the reverse charge mechanism was extended and the rule of the buyer's joint and several liability was implemented. In addition, changes in tax rules for service cars led to a significant increase in the sale of this type of cars in 2014 Q1, which increased VAT income in this period.

²⁹ In January-September 2014, the shortfall in the Social Insurance Fund (FUS) was mainly financed with central budget subsidy amounting to PLN 28.0 billion as compared with PLN 24.8 billion transferred in the corresponding period of the previous year, when the Fund's shortfall was financed to a greater extent with a loan from the central budget. Throughout 2014 the subsidy from the central budget for FUS is to amount to PLN 30.4 billion, as compared to PLN 37.1 billion transferred in 2013.

³⁰ In 2014 H1, the increase in private income tax revenues in local government units (9.4% y/y) was much higher than in the central budget (4.9% y/y), which was driven by a decline in lump-sum tax on bank deposit interest - the PIT tax category supplying only central budget, and by an increase in the ratio of local governments' share in income tax revenues.

providing the Fund with a higher subsidy from the central budget in 2014 H1 and additional funds resulting from the transfer of OFE assets to ZUS. In 2014 H1, the financial position of the Labour Fund improved as compared with 2013, which was mainly due to a significant fall in spending on unemployment benefits (by 18.9% y/y). The balance of the National Health Fund (NFZ) was comparable to last year's figure.

The real growth of public consumption in 2014 H1 remained low (0.7% y/y, according to ESA 95), primarily as a result of the wage freeze in the budgetary sector and limited growth of current spending in the general government sector.

Public investment, following two years of sizable decline, rose by 5.2% y/y in 2014 H1 (nominal growth, in line with ESA 2010), mostly due to significantly growing local government capital spending.

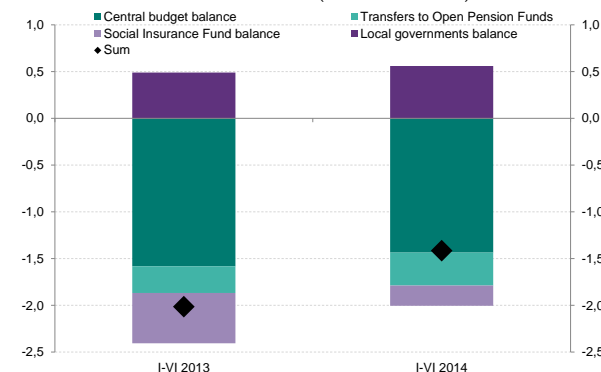
According to the estimates of the Ministry of Finance presented in the October fiscal notification, the balance of the general government sector in 2014 – according to ESA 2010 approach, effective from autumn 2014 – will decrease from 4.0% of GDP in 2013 to 3.3% of GDP in 2014.

In 2015, the government expects a further reduction of the deficit/GDP ratio – below 3%, in line with the European Commission requirements in respect of Excessive Deficit Procedure. This would be mainly supported by changes in OFE, wage freeze in the budgetary sector, including the lack of wage rises for teachers³¹, as well a lack of PIT scale indexation.

2.2.4 Exports and imports

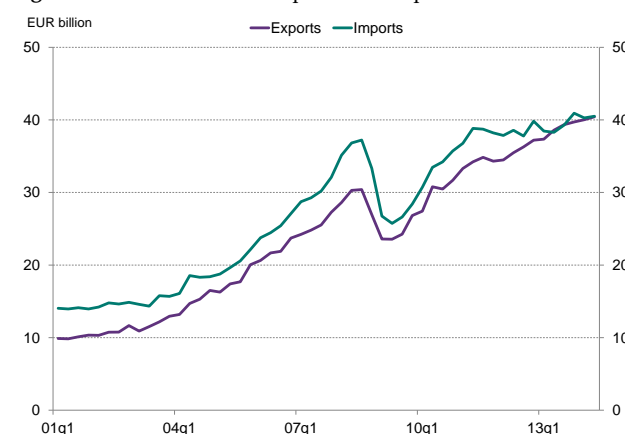
Given weaker economic conditions abroad, in 2014 Q2 exports growth decelerated (to 4.8% y/y from

Figure 2.15 Selected components of general government balance in the first half of 2013 and 2014 (to annual GDP)



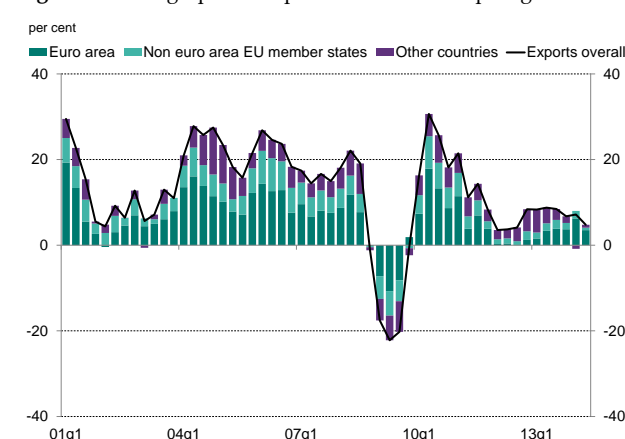
Source: Ministry of Finance and ZUS (Social Insurance Institution).

Figure 2.16 Value of Polish exports and imports



Source: GUS data.

Figure 2.17 Geographic composition of Polish export growth



Source: NBP calculations based on GUS data.

³¹ This does not apply to academic teachers, whose wages are to increase by 30% through years 2013-2015.

7.1% y/y in 2014 Q1; Figure 2.16).³² This was accompanied by a further acceleration in imports (to 5.8% y/y from 4.7% y/y in 2014 Q1).³³

A fall in exports growth in 2014 Q2 was attributable to a deceleration in Polish exports to the euro area (to 6.9% y/y as compared with 12.0% y/y in 2014 Q1) and to other EU countries (to 2.4% y/y from 7.6% y/y in 2014 Q1; Figure 2.17).

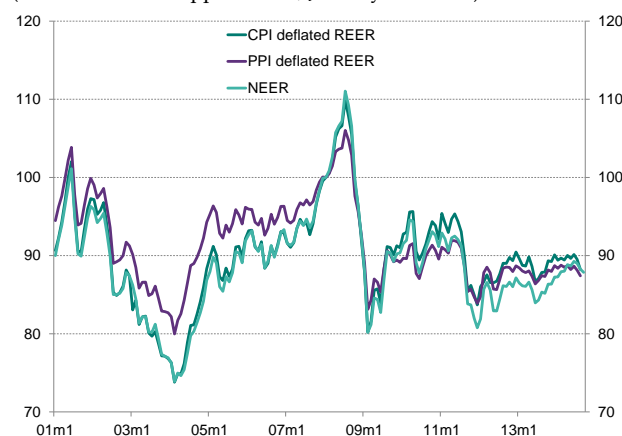
A slowdown in Polish exports to the euro area – which affected all the major goods categories – was driven by a deceleration in both economic growth and foreign sales of the single currency area (see Chapter 1.1 *Global economic activity*). Weaker economic activity in the euro area may have also contributed – through slackening demand for goods produced in global supply chains – to a deceleration in Polish exports to other EU countries.

Lower growth in Polish exports to the EU countries was accompanied by a further drop in Polish sales to Russia and Ukraine on the back of an increase in geopolitical tensions and further deterioration of business conditions in both countries. Despite smaller sales of Polish goods to Russia and Ukraine, the growth of exports to non-EU countries has increased, driven mostly by higher growth in sales to non-European developing countries.

In 2014 Q2, import growth accelerated, supported by faster rise in domestic demand. Additionally, imports were fuelled by continued – though lower compared to the previous quarter – upturn in export production.

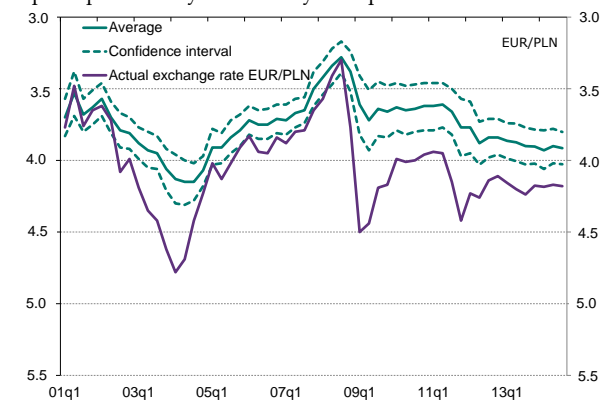
In 2014 Q2, the nominal effective exchange rate of the zloty still appreciated, while in 2014 Q3 it depreciated slightly (Figure 2.18). According to NBP business climate survey, in 2014 Q2 and Q3 the

Figure 2.18 Zloty real and nominal effective exchange rate (increase denotes appreciation; January 2008=100)



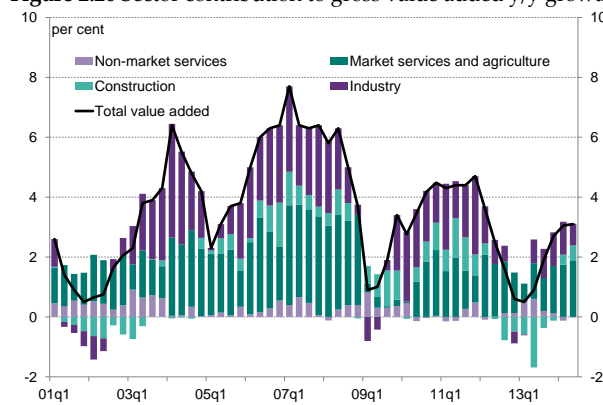
Source: NBP and the European Commission data.

Figure 2.19 Average threshold exchange rate (EUR/PLN) of exports profitability declared by enterprises



Source: NBP data and estimates.

Figure 2.20 Sector contribution to gross value added y/y growth



Source: GUS data, NBP calculations.

³² The growth rates cited in this chapter relate to non seasonally adjusted GUS data.

³³ In July-August 2014, Poland's foreign trade activity declined. A decrease in exports (by 0.6% y/y) was accompanied by a deceleration in imports growth (to -0.1% y/y). A fall in exports was primarily driven by a decrease in sales to Eastern European countries, including Russia and Ukraine, related to mounting political tensions which resulted, among others, in sanctions imposed on trade with Russia. At the same time, exports growth to EU countries weakened. The decrease in Polish exports, combined with a slower pace of economic activity, contributed to deceleration in imports growth in the analyzed period.

market rate of the zloty against the euro was still significantly weaker than the threshold exchange rate of export profitability as declared by enterprises (Figure 2.19)³⁴. As a result, price competitiveness of Polish exports remained high and the percentage of businesses quoting the exchange rate as a barrier to their growth was very low³⁵.

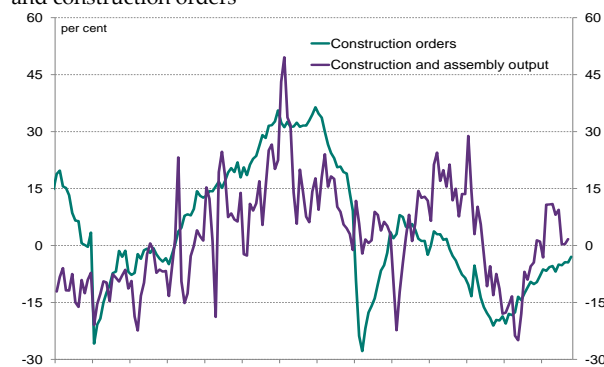
2.2.5 Output

In 2014 Q2, the annual growth in gross value added increased slightly (to 3.1%, as compared to 3.0% in 2014 Q1), which was related to a further rise in value added in construction and services. At the same time, the growth in gross value added in industry decelerated markedly (Figure 2.20).³⁶ In 2014 Q3, in turn, broad-based signs of a slowdown were observed.

Still positive business climate in services in 2014 Q2 predominantly resulted from the accelerating growth in sales of transportation services (up to 5.7% y/y as compared to 5.3% y/y in 2014 Q1). On the other hand, both retail sales and wholesale turnover saw some signs of weakening. Retail sales growth slowed down (see Chapter 2.2.2 *Consumption demand*)³⁷, while nominal growth in wholesale turnover decreased to 2.5% y/y in 2014 Q2 (as compared to 5.7% y/y in 2014 Q1). In 2014 Q3, retail sales growth decelerated further (to 3.0% y/y on average), while wholesale turnover fell in nominal terms by 1.1% y/y on average. At the same time, transportation services growth accelerated and reached 7.5% y/y in the first three quarters of 2014.

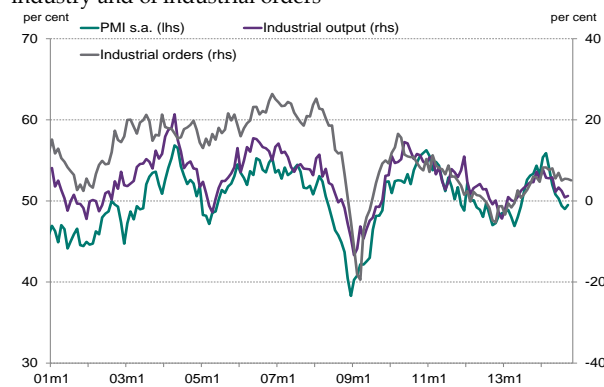
Also construction data point to weakening

Figure 2.21 Annual growth of construction and assembly output and construction orders



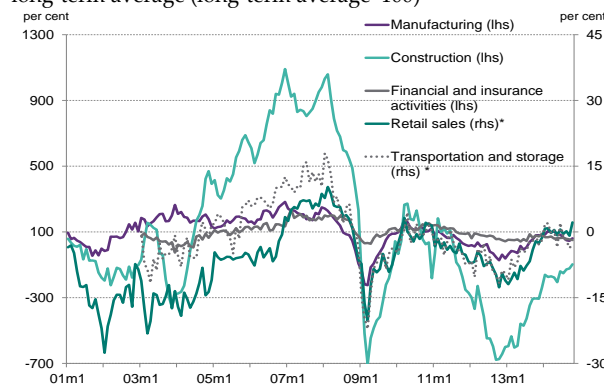
Source: GUS data. NBP calculations (seasonally adjusted).

Figure 2.22 PMI and annual growth of sold production of industry and of industrial orders



Source: GUS data (seasonally adjusted), NBP calculations.

Figure 2.23 Forecast of economic conditions in relation to the long-term average (long-term average=100)



Source: GUS business tendency survey, NBP calculations.

*As the value of the indicators of transportation and storage and retail sales are close to zero, the Figure presents their level instead of its changes against its long-term average.

³⁴ The export profitability threshold exchange rate is determined as the average of values quoted in response to the relevant question of the NBP business climate survey. The survey question is as follows: "What is the threshold exchange level, in terms of PLN, at which exports are (will become) unprofitable?"; *NBP Quick Monitoring Survey. Economic climate in the enterprise sector in 2014 Q2 and forecasts for 2014 Q3*, NBP.

³⁵ High profitability of Polish exports was also reflected in a low share of unprofitable exports in revenue from foreign sales and a small percentage of businesses reporting unprofitable exports.

³⁶ In this chapter, data on industrial output, orders, the PMI index, construction and assembly output and orders in construction are based on seasonally adjusted data (NBP calculations).

³⁷ Data on retail sales presented in this chapter refer to retail sales by businesses employing more than nine people, which are published by GUS on a monthly basis. The data do not fully reflect total retail sales growth. See footnote 23.

conditions in the sector over 2014 Q3, following their slight improvement in 2014 Q2. In 2014 Q3, growth in construction and assembly output decelerated amid still falling number of orders in the construction sector (Figure 2.21).

Deterioration of business climate in industry, which was observed in 2014 Q2, worsened further in 2014 Q3. This is indicated by a further decline in the growth of industrial output and orders in 2014 Q2, continued in July and August 2014.

Decelerating growth of economic activity is also corroborated by business climate indicators, the majority of which was running in 2014 Q3 below their long-term averages (Figure 2.22, Figure 2.23).

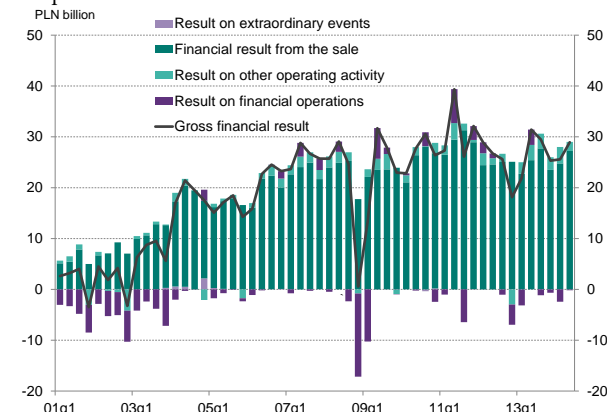
2.3 Financial situation in the enterprise sector

In 2014 Q2, the financial position of the enterprise sector remained sound. However, the gross financial result of enterprises decreased on annual basis, which was mainly the result of a fall in the profit on financial operations, mostly associated with a loss on revaluation of investment of one of the largest manufacturing companies.

In turn, the result on sales rose again in 2014 Q2 (Figure 2.22) and profitability ratios increased further as compared with the corresponding period of 2013 (Table 2.4). A growth in operating profits was observed in the majority of sectors, which was driven by a rise in demand and low cost and wage pressure, as declared by enterprises.³⁸

The liquidity position of companies in 2014 Q2 remained sound, as indicated by a slight rise in the cash ratio in annual terms and a reduction in the percentage of enterprises reporting payment delays as a barrier to development.³⁹

Figure 2.24 Gross financial result of enterprises and its components



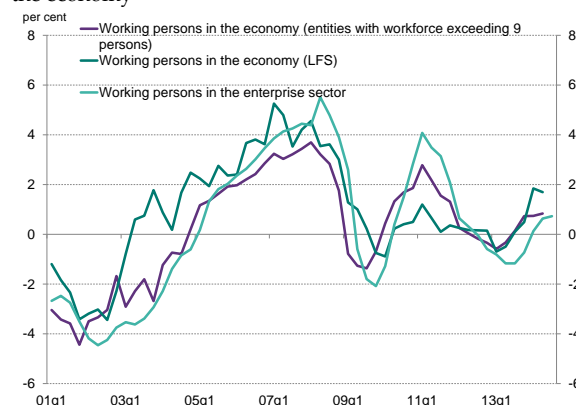
Source: GUS data based on F-01/I-01 forms. NBP calculations.

Table 2.4 Selected financial efficiency ratios in the enterprise sector

per cent	2009	2010	2011	2012	2013				2014	
					q1	q2	q3	q4	q1	q2
Sales profitability ratio	5.0	5.2	5.3	4.3	4.3	4.5	4.6	3.8	4.5	4.7
Net turnover profitability ratio	4.1	4.4	4.5	3.4	3.2	4.7	4.1	3.4	3.8	4.1
Percentage of profitable enterprises	77.3	78.4	78.0	76.8	61.6	68.8	73.4	79.6	67.6	73.9
End of period data										
Liquidity ratio of the first degree	0.39	0.40	0.38	0.34	0.33	0.33	0.33	0.35	0.34	0.35

Source: GUS data.

Figure 2.25 Change (y/y) in the number of persons working in the economy



Source: GUS data, NBP calculations.

LFS data adjustment for the findings of the 2011 National Census in GUS publications refers to the period starting in 2010 Q1. In order to preserve data comparability, earlier data in the graphs presented in this chapter have been corrected by the NBP.

³⁸ NBP Quick Monitoring Survey. Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4, NBP.

³⁹ NBP Quick Monitoring Survey. Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4, NBP.

2.4 Labour market

2.4.1 Employment and unemployment

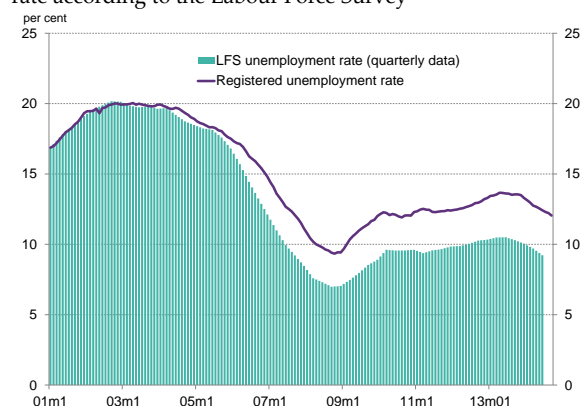
The number of working persons in the economy continued to grow in 2014 Q2, although somewhat slower than at the beginning of the year. Data for 2014 Q3 from the enterprise sector indicate a continued modest growth in employment.

According to the Labour Force Survey data, in 2014 Q2 an increase in the number of working persons in the economy amounted to 1.7% y/y and was only slightly lower than in 2014 Q1 (1.8% y/y⁴⁰). The slight slowdown in the rise in the number of persons employed in the economy was primarily the result of the decline in employment growth in industry (down to 1.5% y/y from 2.5% y/y in 2014 Q1), related to a decrease in output growth in this sector. At the same time, the growth in the number of persons employed in services increased (to 2.8% y/y from 2.1% y/y in 2014 Q1), which in turn may be related to the acceleration in value added growth in this sector.

In 2014 Q2, growth in employment in the enterprise sector accelerated, although it remained lower than in the economy as a whole (0.6% y/y compared to 0.1% y/y in 2014 Q1). In 2014 Q3, the growth in employment in enterprises stayed moderate (0.7% y/y).

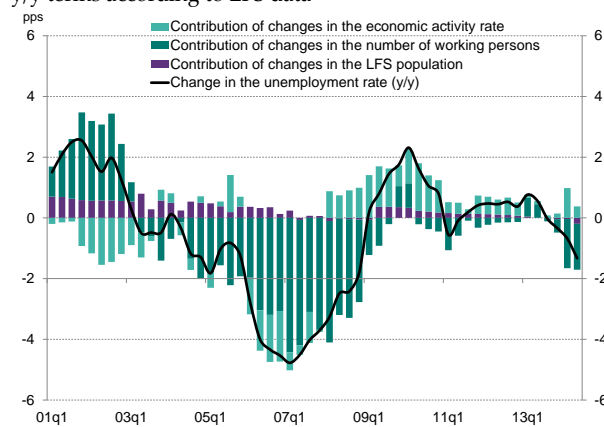
According to NBP business climate survey of 2014 Q3, the number of enterprises that declare their intention to increase employment is still higher than those that intend to reduce it in 2014 Q4. However, the predominance of enterprises planning to increase employment has declined in comparison to

Figure 2.26 Registered unemployment rate and unemployment rate according to the Labour Force Survey



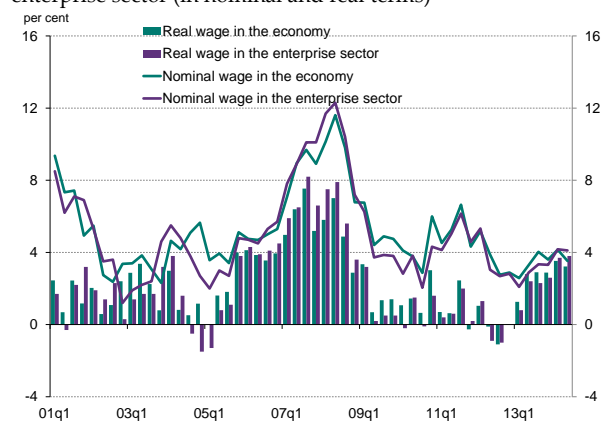
Source: GUS data (seasonally adjusted).

Figure 2.27 Breakdown of change in the unemployment rate in y/y terms according to LFS data



Source: GUS data, NBP calculations.

Figure 2.28 Annual wage growth in the economy and in the enterprise sector (in nominal and real terms)



Source: GUS data.

⁴⁰ The extension of maternity leave from six to twelve months, which was introduced last year, has had a significant impact on the annual employment growth. This extension has led to an increase in the number of persons on maternity leave (who are classified as employed persons) and has reduced the number of persons on childcare leave (who are classified as economically inactive if the leave lasts longer than 3 months). The extension of maternity leave may also encourage some employers to increase employment of replacement employees.

the previous quarter, which indicates that the rate of employment growth in 2014 Q4 could once more fall.⁴¹

The LFS unemployment rate in 2014 Q2 amounted to 9.2% (seasonally adjusted) and was lower than in the previous quarter (9.7%; Figure 2.26), i.e. it was lower than a year before (10.5%; Figure 2.27). This was primarily the result of the continued rise in the number of persons working in the economy.⁴²

Data from labour offices indicate a further gradual decline in unemployment in 2014 Q3. In September, the registered unemployment rate after seasonal adjustments stood at 12.0% (compared to 12.4% in June).⁴³ At the same time, according to NBP estimates, in recent months the likelihood of finding job has increased, while the likelihood of job loss has remained stable.

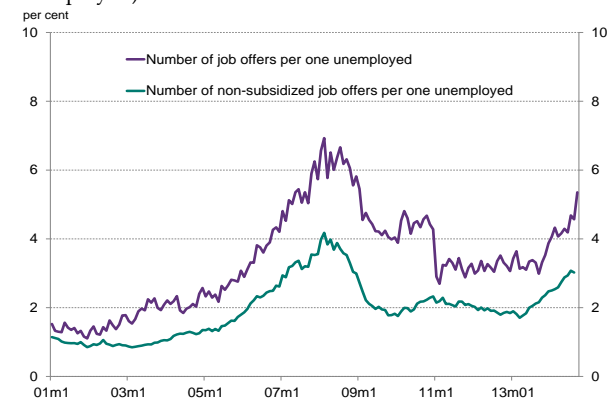
2.4.2 Wages and labour productivity

Data on wages and unit labour costs indicate a continued lack of wage pressure.

In 2014 Q2, wage growth in the economy slowed down to 3.5% y/y (compared to 4.2% y/y in 2014 Q1). While wage growth in the enterprise sector in this period declined only slightly (to 4.1% y/y from 4.2% y/y in 2014 Q1.; Figure 2.28), monthly data for the next quarter point to a further fall (in 2014 Q3, monthly growth amounted to 3.5% y/y on average).

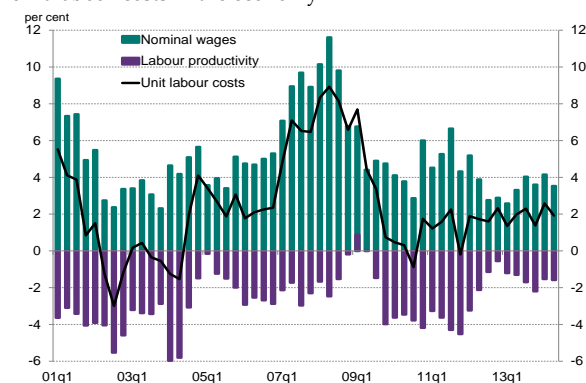
A gradual increase in the index of labour market tensions that has been observed for over a year (Figure 2.29)⁴⁴ has not had an impact up to now on the rate of wage growth, nor on the plans of enterprises regarding wage increases. In 2014 Q3, there was a decline in the percentage of employees

Figure 2.29 Labour market tension index (vacancies per unemployed)



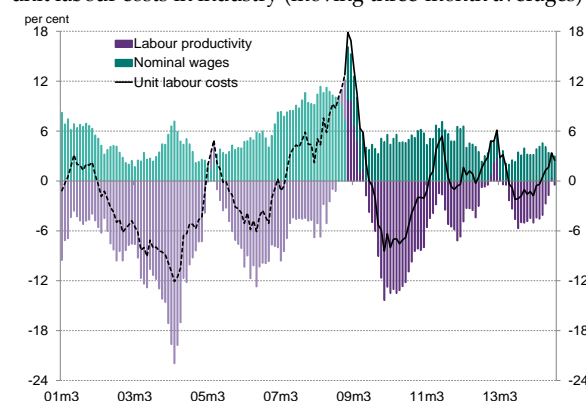
Source: GUS data, NBP calculations.

Figure 2.30 Annual growth in labour productivity, wages and unit labour costs in the economy



Source: GUS data, NBP calculations.

Figure 2.31 Annual growth in labour productivity, wages and unit labour costs in industry (moving three-month averages)



Source: GUS data, NBP calculations.

Due to new PKD classification, wage and industry employment growth rates from December 2008 (in brighter colours) are not fully comparable with earlier data.

⁴¹ NBP Quick Monitoring. *Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4*, NBP.

⁴² Change in the unemployment rate can be further broken down in: 1) change in the size of working age population (in LFS terms, as in the graph), 2) change in economic activity of productive-age persons (change in the economic activity rate), 3) change in labour demand in LFS terms. Change in the population in LFS terms may depend on demographic trends or migration.

⁴³ There are two reasons for the difference between the LFS unemployment rate and the registered unemployment rate: (1) the definition of an unemployed person is different, (2) the definition of population to which the number of unemployed person is referred is different.

⁴⁴ The index of labour market tensions is calculated as the number of nonsubsidised job offers per one unemployed person.

for whom a wage rise was planned. The size of the average planned wage rise also fell.⁴⁵

The growth in unit labour costs in the economy in 2014 Q2 decreased, which was related to a certain slowdown in wage growth, accompanied by a stabilisation in labour productivity growth (Figure 2.30). In recent months, however, the growth in unit labour costs in industry has increased, primarily due to the significant slowdown in labour productivity growth, which took place alongside the deceleration in the growth of industrial output (Figure 2.31).

2.5 Financial markets and asset prices

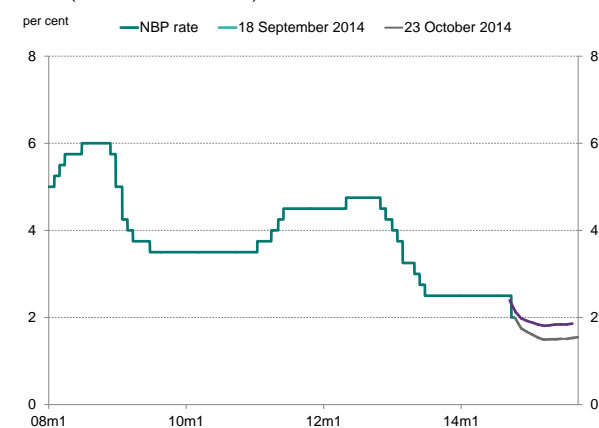
In recent months, the prices of Polish financial assets have increased, while the exchange rate of the zloty – as in the case of many emerging market currencies – has weakened against the US dollar, but remained stable against the euro. At the same time, the housing market has been showing further signs of recovery.

2.5.1 Interest rates and financial asset prices

At the October meeting, the Monetary Policy Council reduced the NBP reference rate by 0.5 percentage points to 2.0% and did not exclude further monetary policy adjustment.⁴⁶ After this decision, expectations regarding the reference rate in following quarters declined (Figure 2.32).

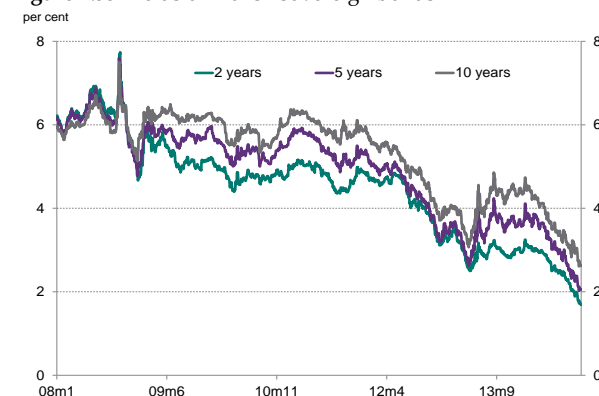
Polish government bonds yields fell to record lows (Figure 2.33). This was due to the monetary policy easing by the ECB, which was also conducive to a fall in bond yields in other European countries (see 1.3 *Monetary policy abroad and international financial markets*), as well as weaker than expected data pointing to a slowdown in economic activity in

Figure 2.32 NBP reference rate and 1M interest rate implied by FRAs (since October 2014)



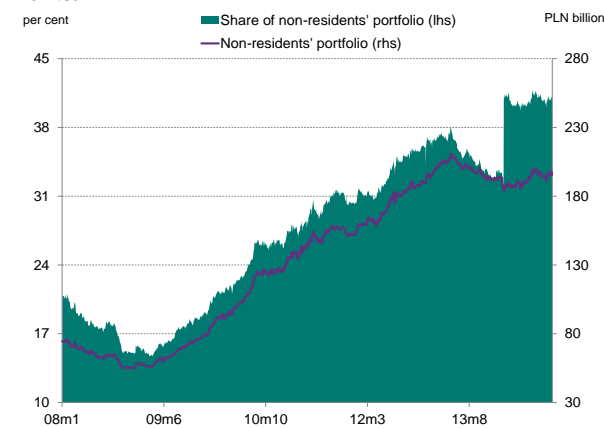
Source: Bloomberg data, NBP calculations.

Figure 2.33 Yields on Polish sovereign bonds



Source: Bloomberg data.

Figure 2.34 Non-resident exposure in the Polish sovereign bond market



Source: National Depository for Securities (KDPW) data.

⁴⁵ NBP Quick Monitoring. *Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4*, NBP.

⁴⁶ At the October meeting, the Monetary Policy Council also reduced the lombard rate by 1.0 percentage point to 3.0% and left the deposit rate unchanged at 1.0%. As a result, the spread between the lombard rate and the deposit rate decreased from 3.0 to 2.0 percentage points.

Poland and the reduction of NBP interest rates.⁴⁷ The decline in yields was also driven by foreign capital inflow into the Polish government securities market, which decreased slightly only in July and August as the Russian-Ukrainian conflict was escalating (Figure 2.32).

In latest months, asset prices at the Warsaw Stock Exchange have risen modestly, supported by the still sound financial position of Polish enterprises, and recently also by monetary policy easing by the ECB and NBP. However, since the publication of the previous *Inflation Report*, the Warsaw Stock Exchange indices have recorded a number of temporary setbacks resulting from escalation of the war in eastern Ukraine, worse than expected economic data releases and deterioration in international market sentiment (see also Chapter 1.3 *Monetary policy abroad and international financial markets*, Figure 2.35).

2.5.2 Exchange rate

In recent months, the exchange rate of the zloty against the main currencies was largely determined by external factors, in particular by the divergence in monetary policy perspectives between the Fed and the ECB as well as the increase in geopolitical risks (see chapter 1.3 *Monetary policy abroad and international financial markets*). As a result, following sustained appreciation since June 2013, the zloty weakened against the US dollar from July to October 2014 and remained relatively stable to the euro (Figure 2.36).

2.5.3 Home prices⁴⁸

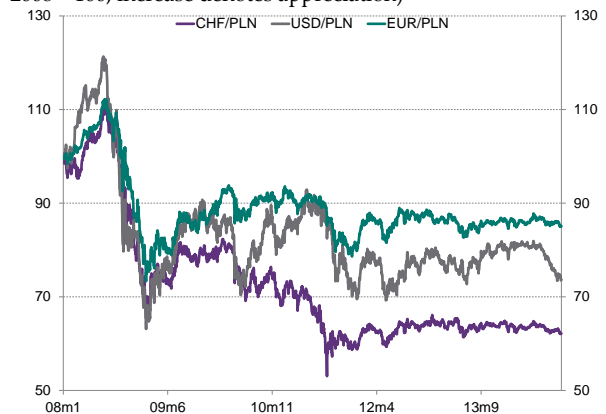
In 2014 Q2, the housing market in Poland was showing further signs of recovery. Despite a certain decline in relation to the previous quarter, sales

Figure 2.35 WIG, WIG 20 and WIG 30 stock exchange indices



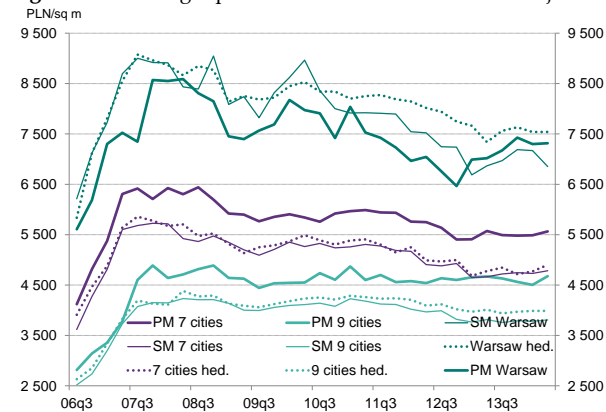
Source: Bloomberg data.

Figure 2.36 Nominal exchange rate of the Polish zloty (January 2008 = 100, increase denotes appreciation)



Source: Bloomberg data.

Figure 2.37 Average* prices of flats in seven and nine major cities



Source: NBP calculations on the basis of sale price data from the NBP survey and PONT Info Nieruchomości asking price data.

⁴⁷ The limited issue of government bonds could have intensified the reduction in Polish government bond yields in the summer months.

⁴⁸ More information on the Polish housing market can be found in the NBP publications *Information on home prices and the situation in the residential and commercial real estate market in Poland in 2014 Q2*, available at the NBP website www.nbp.pl.

remained at a high level, supported by an improvement in the labour market conditions and historically low interest rates on mortgage loans denominated in the zloty. In several cities, the increase in primary market sales was reinforced to some extent by the “Flat for the Young” scheme. This scheme contributed to a further divergence in price trends between the primary and secondary markets, and also between individual cities. While prices rose somewhat in the primary market in Warsaw and large cities, in the secondary market prices declined slightly, particularly in smaller towns (Figure 2.37)⁴⁹.

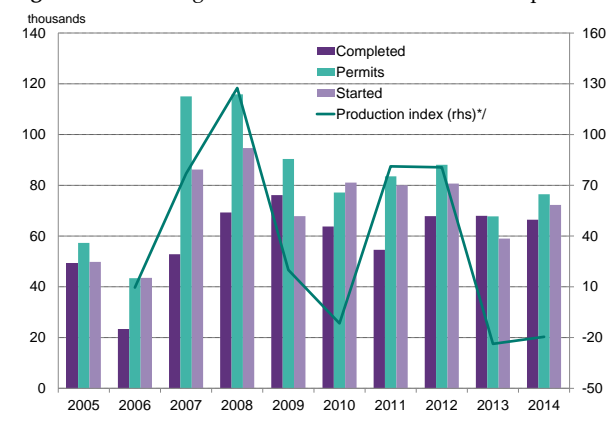
The increase in primary market prices in previous quarters, accompanied by a continued decline in the cost of new constructions, was conducive to a rise in the profitability of real estate development and, as a result, in housing starts (Figure 2.38). As a result, the primary market supply increased for the first time in two years. The building permits and housing starts were significantly higher in 2014 Q2 compared to the corresponding period of previous year.

2.6 Credit and money

A slight slowdown in economic activity in recent months was accompanied by the stabilization of lending growth at a moderate level, observed both in the corporate and household sector, particularly in 2014 Q3 (Figure 2.39).

Amidst a slight acceleration of growth in corporate and household deposits, the broad money in 2014 Q2 and Q3 accelerated, at a similar pace to that of total liabilities.

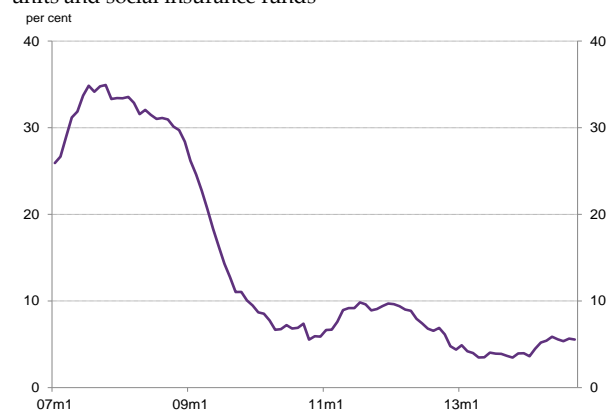
Figure 2.38 Housing construction in Poland in second quarters



Source: GUS data, NBP calculations.

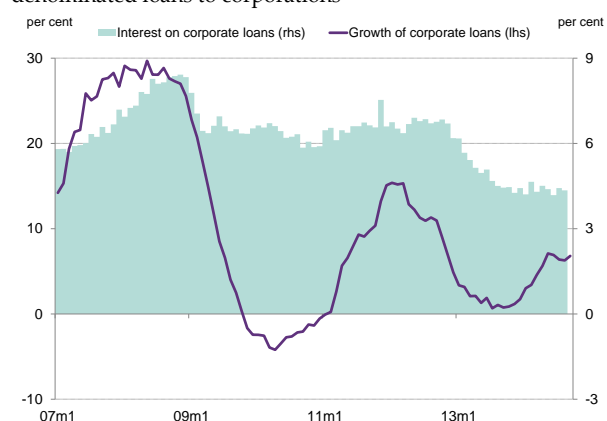
* Production index is a number of development projects started in the real estate market less introduced into the market (12-month moving value).

Figure 2.39 Annual growth of total liabilities of non-financial sector, non-monetary financial institutions, local government units and social insurance funds



Source: NBP data.

Figure 2.40 Annual growth and average interest on new zloty denominated loans to corporations



Source: NBP data.

⁴⁹ PM – primary market, SM – secondary market, hed. – hedonic price index. Sale prices in the primary market weighted with the share of the housing stock in a given city in the total housing stock of all cities. Sale prices in the secondary market adjusted for differences in the qualities of flats. The index for seven cities includes: Gdańsk, Gdynia, Kraków, Łódź, Poznań, Szczecin and Wrocław, and the index for nine cities – Białystok, Bydgoszcz, Katowice, Kielce, Lublin, Olsztyn, Opole, Rzeszów and Zielona Góra.

2.6.1 Corporate lending

Recovery in lending to the corporate sector observed since 2013 Q4 continued in 2014 Q2, whereas in 2014 Q3 the growth in corporate loans stabilised (Figure 2.40).

In 2014 Q2, annual growth in corporate loans amounted on average to 6.5% y/y (against 3.7% y/y in 2014 Q1). Within that, growth acceleration was seen both in short-term and investment loans. In 2014 Q3, a slight pickup in investment loans continued, while short-term loans slowed down. As a result, total growth in corporate loans remained at the level of 2014 Q2 (Figure 2.41).

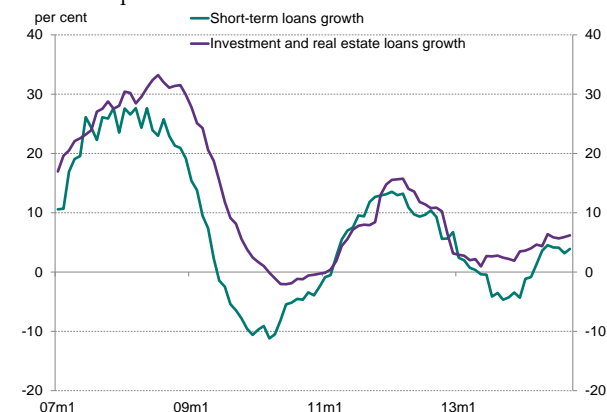
A factor contributing to a slowdown corporate debt growth in 2014 Q3 could be the worsening sentiment in the corporate sector at that time, accompanied by still good financial position of enterprises, which enabled them to fund their operations from own funds (see Chapter 2.3 *Financial situation in the enterprise sector*). In turn, lending to enterprises was supported by relatively low interest on loans and the easing of credit standards in most corporate loan categories as declared by banks (except for long-term loans to the SME sector; Figure 2.42).⁵⁰

In 2014 Q2, corporate foreign debt amounted to EUR 114.4 billion and was higher by EUR 2.3 billion than in the corresponding period of 2013 (Figure 2.43).⁵¹ This rise was mainly driven by increased liabilities to foreign direct investors⁵².

2.6.2 Loans to households

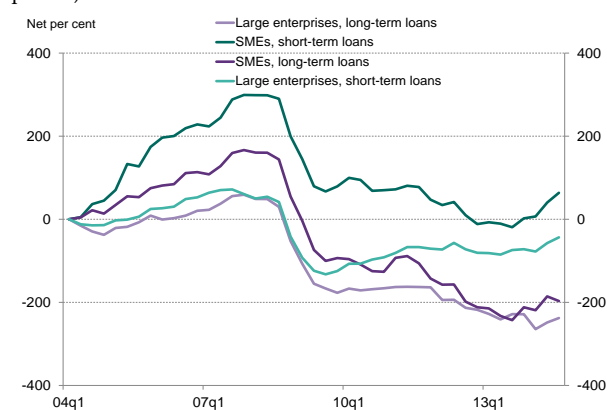
After some acceleration in 2014 Q2, the growth in household loans stabilised at a moderate level in 2014 Q3. Within that, a stable rise in housing loans was accompanied by a slight acceleration in the

Figure 2.41 Annual growth of short-term loans and investment loans to corporations



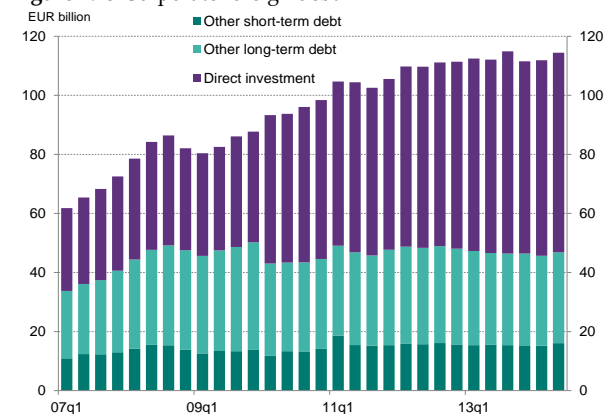
Source: NBP data.

Figure 2.42 Aggregate index of changes in banks' credit standards in the corporate loan segment (2004q1=0; rise in the value of index means an easing of credit standards in a given period)



Source: NBP data.

Figure 2.43 Corporate foreign debt



Source: NBP data.

⁵⁰ Senior loan officer opinion survey on bank lending practices and credit conditions (2014 Q4), NBP.

⁵¹ This edition of the *Report* is the first one to present data on corporate foreign debt based on the revised methodology that takes into account new standards outlined in the Balance of Payments and International Investment Position Manual (BPM6). According to this approach, data on direct investment comprise the volume of investment made in Polish banks. More information on this issue can be found on the NBP website: http://www.nbp.pl/home.aspx?f=/aktualnosci/wiadomosci_2014/info-ds.html.

⁵² Corporate foreign debt to non-fellow enterprises increased only slightly and resulted from small rise in short-term debt accompanied by drop in long-term debt.

consumer loans (Figure 2.44, Figure 2.45).

In 2014 Q2, annual growth of housing loans increased somewhat (from 3.9% y/y to 4.2% y/y) and in 2014 Q3 it stabilised (Figure 2.44). Factors supporting continued growth in lending in the housing loan segment were the interest on loans, persisting at a moderate level, stable labour market conditions (see Chapter 2.4 *Labour market*), as well as – to some extent – the “Flat for the Young” scheme (see Chapter 2.5.3 *Home prices*). The rise in housing loans could have been curbed by tight lending standards in this segment (Figure 2.46).⁵³

In 2014 Q2 and Q3, the acceleration in consumer loans continued, driven by a favourable labour market conditions and the easing of credit standards by banks over the last few quarters (Figure 2.46).⁵⁴ In 2014 Q3, the pickup in consumer loan growth was also supported by a minor reduction in spreads by banks, which translated into a slight fall in interest on loans (from 13.6% in June 2014 to 13.0% in August 2014).

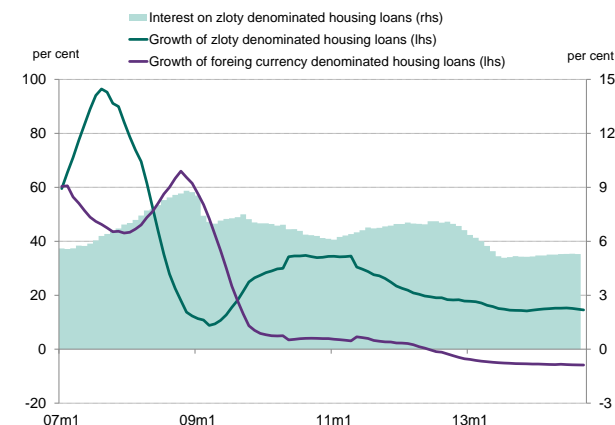
2.6.3 Deposits and monetary aggregates

Following a fall in 2014 Q2, the growth of M3 aggregate slightly accelerated in 2014 Q3 (to 7.2% y/y from 5.6% y/y in 2014 Q2; Figure 2.47). The rise in M3 growth was driven by a significant acceleration in term deposits, accompanied by a slowdown in current deposits.

The annual growth of corporate deposits increased both in 2014 Q2 and Q3 (Figure 2.48), which was driven by persisting sound financial position of enterprises (see Chapter 2.3 *Financial situation in the enterprise sector*). In 2014 Q2 and Q3, the growth of household deposits also accelerated, supported by stable labour market conditions (Figure 2.49).

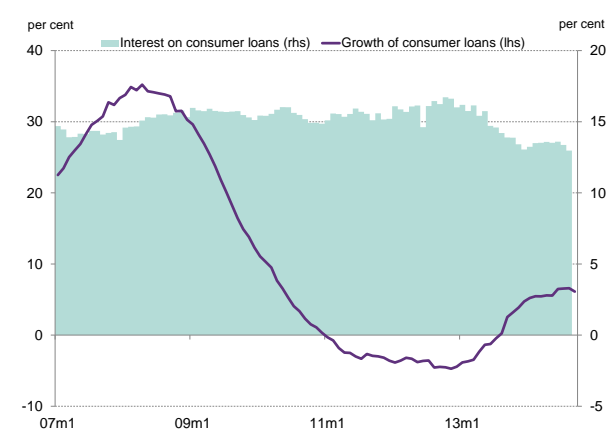
The growth of household deposits was the main factor behind the rise in the value of household

Figure 2.44 Annual growth and average interest on new housing loans to households



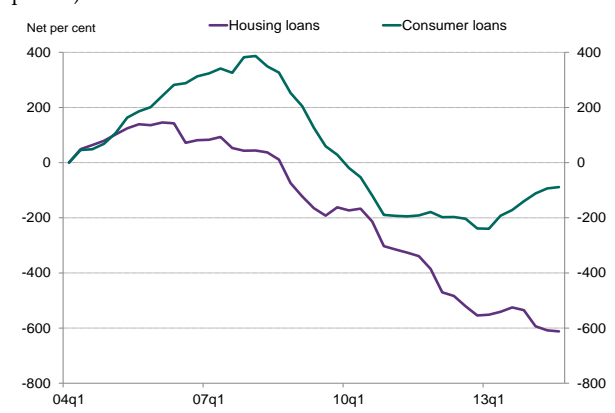
Source: NBP data.

Figure 2.45 Annual growth and average interest on new consumer loans to households



Source: NBP data.

Figure 2.46 Aggregate index of changes in banks' credit standards in the household loan segment (2004q1=0; rise in the value of index means an easing of credit standards in a given period)



Source: NBP data.

⁵³ Senior loan officer opinion survey-on bank lending practices and credit conditions (4th quarter 2014), NBP.

⁵⁴ Senior loan officer opinion surveys on bank lending practices and credit conditions (4th quarter 2014), NBP.

financial assets in 2014 3Q. Also the increase in the value of participation units and certificates of investment funds, resulting mainly from the inflow of funds,⁵⁵ as well as an increase in cash held by households significantly contributed to the rise in financial assets.

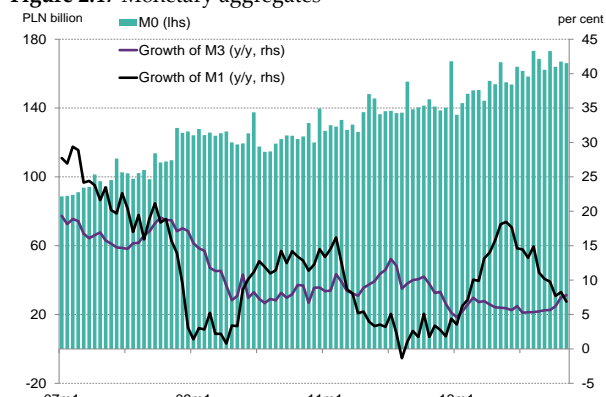
2.7 Balance of payments

In 2014 Q2, the current account deficit slightly widened while remaining at historical lows (EUR 0.6 billion as against EUR 0.4 billion in 2013 Q2). The increase in the deficit on the year before was related to lower surplus in the trade in goods and services as a result of imports growing faster than exports (see Chapter 2.2.4 *Exports and imports*). In turn, a reduction in the deficit on primary income – largely induced by lower dividends paid to foreign direct investors (see Chapter 2.3 *Financial situation in the enterprise sector*)⁵⁶ – was conducive to improvement in current account balance.

The surplus in capital account balance rose in 2014 Q2 (to EUR 3.7 billion as compared with EUR 3.3 billion in 2013 Q2). This was primarily driven by a surge in EU funds inflows.

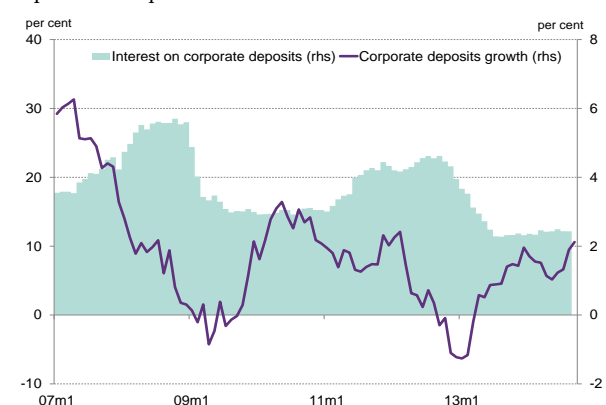
The outflow of capital in annual terms intensified in 2014 Q2 (to amount to EUR 0.9 billion as against EUR 0.6 billion in 2013 Q2), which was largely due to an increase in Polish direct investment abroad (to EUR 2.3 billion in 2014 Q2 as against -2.6 billion in 2013 Q2) and a rise in foreign assets of monetary financial institutions (to EUR 2.9 billion in 2014 Q2 as against 0.2 billion in 2013 Q2). Portfolio investment (mainly in equity) of Polish residents increased as well. At the same time, an inflow of

Figure 2.47 Monetary aggregates



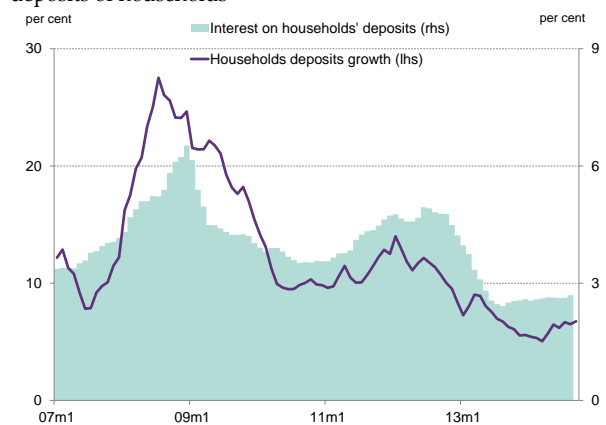
Source: NBP data.

Figure 2.48 Annual growth and average interest on bank deposits of corporations



Source: NBP data.

Figure 2.49 Annual growth and average interest on bank deposits of households



Source: NBP data.

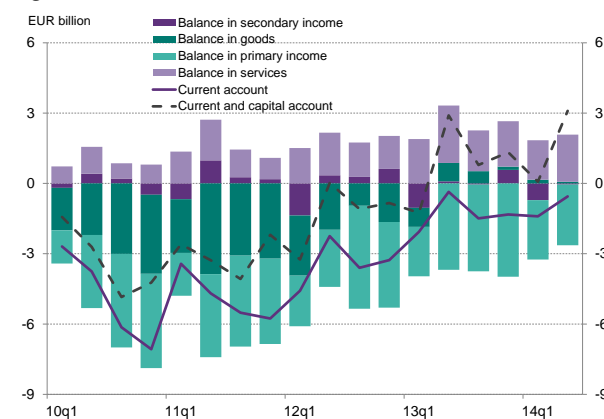
⁵⁵ There was also an increase in the value of other household financial asset categories, except for government bills and bonds.

⁵⁶ As from 30 September 2014, NBP has been publishing balance of payments and international investment position data compiled in line with the guidelines contained in the Balance of Payments Manual (BPM6). More detailed information on the manner of data presentation may be found at the NBP website: <http://nbp.pl/en/aktualnosci/2014/Revision-BoP-IIP-2014.pdf>

portfolio capital continued, notably in the debt securities market (see also Chapter 2.5 *Asset markets*), which was limiting the rise in the financial account balance.

As a result of a slight widening in current account deficit in 2014 Q2, some of Poland's external imbalance indicators have worsened a bit as compared to 2014 Q1. In particular, the current account deficit to GDP ratio rose somewhat, yet it remained at a historically low level (in terms of four-quarter moving average; Table 2.5). At the same time, the current and capital account balance to GDP ratio stayed positive.

Figure 2.50 Current account balance



Source: NBP data and estimates.

Table 2.5 Selected external stability indicators (four-quarter moving average, in % unless stated otherwise)⁵⁷

	2010	2011	2012	2013				2014	
				q1	q2	q3	q4	q1	q2
Current account balance (CAB)/GDP (w %)	-5.5	-5.2	-3.6	-2.9	-2.4	-1.9	-1.3	-1.1	-1.2
Current and capital account balance/GDP (%)	-3.7	-3.3	-1.3	-0.8	-0.1	0.4	1.0	1.3	1.3
Trade balance/GDP (%)	-2.9	-3.4	-1.9	-1.4	-0.7	-0.4	0.0	0.2	0.0
Official reserve assets (in monthly imports of goods and services)	5.5	5.4	5.7	5.9	5.7	5.5	5.3	5.1	5.0
Foreign debt/GDP (%)	67	68	73	73	71	73	71	70	70
Net international investment position/GDP (%)	-67	-60	-68	-66	-64	-68	-70	-69	-68
Official reserve assets/foreign debt (up to 1Y) plus estimated CAB (%)*	78	80	100	95	91	84	87	91	89
Official reserve assets/foreign debt (up to 1Y) (%)*	98	94	107	100	96	89	95	100	99

Source: NBP and Ministry of Finance data.

*Indicators include foreign debt and level of official reserves at the end of the period.

⁵⁷ Data in Table 2.5 differ from those reported in the NBP *Balance of Payments of the Republic of Poland for 2014 Q2* (Table XXVI) as they are presented in terms of four-quarter moving averages.

3 Monetary policy in July – November 2014

At the meetings in July and September 2014 the Monetary Policy Council decided to keep NBP interest rates unchanged. In October the Council decreased reference rate and rediscount rate by 0.5 percentage points and lombard rate by 1.0 percentage point, leaving deposit rate unchanged. As a result, the spread between lombard and deposit rate was narrowed from 3.0 to 2.0 percentage points. At the same meeting the Council also decided that required reserve funds would be remunerated at 0.9 of the NBP reference rate. In November the Council decided to keep NBP interest rates unchanged: reference rate at 2.00%, lombard rate at 3.00%, deposit rate at 1.00%, rediscount rate at 2.25%.

What follows in the next part of the chapter are the previously published *Minutes of the Monetary Policy Council decision-making meetings* held in July, September and October as well as the *Information from the meeting of the Monetary Policy Council* in November 2014. *Minutes of the Monetary Policy Council decision-making meeting in November 2014* will be published on 20 November, and thus included in the next *Report*.

Minutes from the Monetary Policy Council Decision Making Meeting held on 2 July 2014

At its meeting, members of the Monetary Policy Council discussed the current and future monetary policy decisions against the background of macroeconomic developments in Poland and abroad and the July projection of inflation and GDP.

While discussing business conditions abroad, Council members underlined that global activity growth remained moderate. It was emphasised that the recovery in the euro area continued at a slow pace, despite a certain improvement in the business climate in the peripheral economies of the monetary union. Some Council members also pointed out that following the data revision in the United States, 2014 Q1 GDP growth had been negative and weaker than originally estimated. Other Council members underlined, that the fall in GDP had been related to weather conditions and the second quarter should see a considerable rebound in GDP growth. With reference to the situation in major emerging economies, including Russia, it was indicated that economic activity growth in these countries remained

slow. However, it was emphasised that recovery continued in countries of Central and Eastern Europe.

At the meeting monetary policy in the external environment of the Polish economy was discussed. Attention was drawn to the easing of monetary policy by the European Central Bank (including interest rates cut and the introduction of a new liquidity provision to the banking system programme, conditional upon increased lending) and by some banks in emerging economies. It was emphasised that the ECB might announce further quantitative easing programmes in the subsequent quarters. Some Council members pointed out that the easing of monetary policy by the ECB increased the interest rate differential between Poland and majority of the countries in its environment as well as the importance of this differential for exchange rate developments.

While discussing the effectiveness of the non-standard measures undertaken by the major central banks, some Council members were of the opinion that those measures allowed to meet the rising

demand for liquidity from economic entities. It was argued that in the absence of those measures, the growth in economic activity in the largest economies would probably have been slower. Some Council members argued, however, that the effectiveness of the non-standard measures taken by the major central banks is low. Amidst still not fully restructured balance sheets in the banking sector and uncertainty persisting in the economy, these measures fail to boost lending and aggregate spending while producing an undesirable effect of excessive growth in the prices of some assets. Those members also pointed out that although quantitative easing provided liquidity to the economy and gave banks and enterprises time to restructure, the maintenance of interest rates close to zero undermined the incentives for restructuring.

Council members also observed that the strongly expansionary monetary policy of the major central banks had not, as yet, driven up inflation to any significant degree, and that inflation in Poland's immediate environment remained very low. A few members argued that low inflation in the global economy might persist for a longer time, considering the limited demand growth and the absence of commodity price growth in the global markets.

While discussing the economic situation in Poland, Council members emphasised that economic activity growth might have slowed down in the past few months, which might be partly – and in the assessment of a few Council members primarily – the effect of the conflict between Ukraine and Russia. The slowdown in economic activity growth was reflected in lower growth in industrial output, construction and assembly output as well as in retail sales. It was highlighted that some business climate indicators declined and employment growth in the corporate sector ground to a halt. The Council also underscored considerable uncertainty concerning the permanence of the recent slowdown in economic activity. A few Council members presented the view that the accelerating growth in lending suggested a

continuation of the recovery in domestic demand in the subsequent months. At the same time they emphasised that as economic recovery continues, lending might accelerate further and exceed nominal GDP growth markedly.

With reference to current inflation, it was observed that in May the annual consumer price growth had decreased again and was significantly below expectations. It was also emphasised that producer prices in industry in year-on-year terms continued to fall and that inflation expectations of households and enterprises remained low. It was argued that low inflation resulted not only from supply shocks (including the decline in fruit and vegetable prices), but also from moderate demand growth reflected in low levels of core inflation. Some members of the Council also pointed to a negative growth in import prices as an important source of low inflation in Poland. Some members of the Council noted that the lower than expected inflation was conducive to a rise in real interest rates.

While analyzing the July projection of inflation and GDP, members of the Council pointed out that, although in the subsequent quarters GDP growth was not likely to accelerate significantly, it might exceed potential GDP growth. As a result, the output gap, which is now negative, should be gradually closing within the projection horizon. Some Council members underlined, however, that at the end of the projection horizon GDP growth would be close to potential output growth. Council members also pointed out that – in line with the projection – all the components of domestic demand as well as exports were supposed to rise and that a certain slowdown in investment growth at the end of the projection horizon might be driven by a reduction in the EU-financed public investment. It was emphasized that in line with the projection, economic recovery in the coming quarters would, to a certain extent, boost wage growth in the economy, which should, however, remain below the long-term average. It was pointed out, however, that wage growth is expected

to outpace labour productivity growth, which would lead to a gradual increase in unit labour costs growth. Some Council members underlined that in the long-term projection horizon, the growth of unit labor costs could exceed the NBP inflation target.

While analyzing the inflation projection, members of the Council emphasized that in the coming quarters inflation would be lower than expected in the March projection. They indicated that inflation might fall below zero in the coming months, and in the subsequent few quarters would continue to be very low. It was pointed out that inflation would rise close to the target at the end of the projection horizon. It was argued that, in line with the projection, the increase in inflation would be supported by the projected improvement in the labour market as well as a certain rise in food and energy prices. A few Council members pointed out, however, that a growth in those two price categories should be – according to the projection – lower than long term average.

Referring to the possible effects of the expected temporary fall in inflation below zero in the coming months, a few members of the Council were of the opinion that it would boost the real purchasing power of consumers and expand consumer demand. Other members of the Council believed that the likely fall in inflation below zero could prompt households to postpone consumption. Those members were of the opinion, that present interest rates level under current macroeconomic developments could deepen deflation.

Members of the Council pointed to the risks associated with the projection of inflation. Some of them emphasized that the distribution of risks in the projection was asymmetric and the probability of inflation running below the central path was higher than the probability of inflation running above the path. However a few members of the Council were of the opinion that higher than assumed energy prices, possibly being the result of the Middle East conflict,

might be a risk factor for higher inflation. Other Council members argued that core inflation in the projection rose to a level which in the past had occurred only when CPI inflation had been higher than the upper limit for deviations from the inflation target.

The Council decided that the NBP interest rates should remain unchanged at the current meeting. The rationale for this decision was the ongoing economic recovery, which should contribute to inflation rising close to the NBP inflation target over the projection horizon. Yet, Council members were of the opinion that there persisted uncertainty regarding a possible deterioration in the business climate and the pace of return of inflation to the target. Therefore, a few Council members pointed out that interest rate decrease could be necessary in the near future. The Council was of the opinion, that decisions in the coming months should depend on the assessment of incoming data from the point of view of the prospects for further economic recovery and inflation developments in the medium term.

Minutes from the Monetary Policy Council Decision Making Meeting held on 3 September 2014

Members of the Monetary Policy Council discussed the current and future monetary policy decisions against the background of macroeconomic developments in Poland and abroad.

While discussing the economic conditions abroad, Council members emphasized that since the previous meeting the uncertainty in the environment of the Polish economy had increased significantly. The growth in uncertainty was driven by an escalation of the conflict in the East and signs of the euro area returning to stagnation. It was pointed out that growing uncertainty about unfolding military crisis in the East as well as economic sanctions would have an adverse impact on economic conditions in Poland and Europe. Attention was drawn to a deepening

recession in Ukraine and an ongoing economic downturn in Russia, accompanied by a depreciation in currencies of both countries. These factors have a negative impact on Polish exports and – in consequence – on domestic economic activity.

Some Council members, on the other hand, expressed an opinion that economic sanctions, though severe for some industries, would probably have a limited impact on Poland's trade and domestic economy. Moreover, it was noted that – despite elevated uncertainty driven by growing geopolitical risk in the recent period – the zloty had been relatively stable. A few Council members, however, pointed to a slight depreciation in the zloty since the previous meeting. Furthermore, they were of the opinion that the likelihood of a sharp fall in financial asset prices in the event of a sudden increase in risk aversion had recently increased, especially amidst limited volatility and low turnover in the financial markets.

Council members emphasized that developments in the euro area were an important source of external risk for the economic growth in Poland. In 2014 Q2, the euro area returned to stagnation, which was mainly due to economic conditions in the largest economies of this region. In particular, GDP remained unchanged for the second quarter in a row in France and fell in Italy and Germany. Council members also pointed to a decline in industrial activity indicators in the euro area. At the same time, a few Council members were of the opinion that a rebound in economic activity in the United States since 2014 Q2 might translate into global economic recovery, including in the emerging market economies. As a result, this could have a positive impact on activity of the German economy, and consequently on activity of the Polish economy.

It was pointed out at the meeting that inflation in the euro area had declined near zero. A few Council members expressed a view that low inflation would – through lower indexation of household incomes –

affect demand growth and contribute to extending the period of stagnation in the euro area. Council members pointed out that since the Council's previous meeting, expectations of additional monetary easing by the European Central Bank had increased. Attention was also drawn to interest rate cuts in economies having strong links to the euro area, as well as rising interest rate differential between Poland and its immediate environment.

While discussing the economic conditions in Poland, it was emphasized that incoming data point to a decline in economic growth. Although the annual growth rate of GDP in 2014 Q2 decreased slightly, it was supported to a large extent by a built-up in inventories amidst a decline in net exports and growth in investment. According to some Council members, this may indicate a risk of adjustment in production in the coming quarters to a decrease in sales growth. Weakening economic activity is also confirmed by the data on industrial production and leading industrial indicators, which in the recent months were significantly lower than a few months ago. Moreover, it was stressed that consumer sentiment had declined in the recent period and construction and assembly output growth was almost to a halt in July. Some Council members also indicated that the pace of recovery in the labour market slowed down as well, as shown by a decrease in employment growth, wage growth and unit labour costs in 2014 Q2.

A few Council members, however, expressed the opinion that elevated uncertainty associated with the escalation of the crisis in Ukraine could have been a major factor behind weakening investment growth in 2012 Q2 and deterioration in economic indicators in the recent period. Therefore, the persistence of the weakening in economic indicators and investment growth is hard to assess. Some Council members assessed that the economic growth could stay close to previous quarters. They indicated that a slight acceleration in private consumption growth in 2014 Q2 and a certain increase in retail sales in July

pointed to a continued increase in consumer demand. The rise in consumer demand is supported by the ongoing recovery in the labour market and a steady increase in real wages amidst very low price growth. A few Council members also pointed to a certain growth in industrial production in July.

Referring to the current price developments, it was pointed out that annual inflation had fallen below zero in July, which had been in line with the July projection, although clearly below the expectations formed several quarters earlier. It was emphasized that the decline in inflation below zero was due to a negative growth of food prices amidst stagnant energy prices. At the same time, attention was drawn to the lack of demand pressure confirmed by historically low values of all core inflation measures and the persistence of negative growth of retail sales deflator. It was also indicated that despite recovery in the labour market, there was no wage pressure in the economy. Neither were there any cost pressures, as confirmed by a two-year decline in producer prices. It was pointed out that a significant decline in inflation and inflation expectations was conducive to rising real interest rates, despite a stabilization of nominal interest rates.

With regard to the economic growth outlook, Council members assessed that, similarly to 2014 Q2, economic growth in the coming quarters is likely to be lower than expected in the July projection, although – as pointed by a few Council members – will remain close to early 2014. Lower GDP growth than in the July projection is indicated mainly by weaker economic conditions in the environment of the Polish economy. Council members also emphasized that declining sentiment of domestic economic agents driven by growing uncertainty about developments in Ukraine might limit domestic activity.

While analyzing the outlook for inflation in the coming months, it was pointed out that in the following months it would probably be slightly

lower than in the July projection. Lower inflation than expected in July will most likely be driven by a stronger decline in food prices (due to embargo imposed on Polish fruit and vegetables and reduced food commodity prices in the international markets), as well as weaker demand pressure associated with slower economic growth than expected in July. Some Council members also indicated that the expected persistence of very low inflation in the euro area would – through strong trade ties with the euro area – add to a reduction in price pressure in Poland. At the same time it was pointed out that – in line with available forecasts – inflation would rise above zero already in 2014, probably on the back of a higher growth rate of energy prices and food price growth rate turning positive.

While discussing decision on interest rates, the majority of Council members assessed that in the near future it would probably be justified to adjust the level of NBP interest rates. In their opinion, signs of economic slowdown in Poland and abroad, an absence of price pressure and increased risk of inflation remaining below the target in the medium term, as well as monetary policy easing in the euro area, are factors in favour of lowering interest rates. These members also assessed that, given moderate economic growth and persisting uncertainty, a risk of macroeconomic imbalances build-up following a probable decrease in interest rates was small. Some Council members considered that NBP interest rates should be reduced already at the current meeting. They argued that – considering a rise in risk of economic slowdown and inflation remaining well below the target in Poland in the coming quarters – it was justified to lower interest rates as soon as possible. Other Council members pointed to uncertainty about the persistence of economic slowdown and developments in the East, which justified – in their opinion – keeping interest rates unchanged at the current meeting. They also noted that in previous meetings the Council had signalled a stabilization of the interest rates till the end of 2014

Q3. At the same time, they emphasized that if the incoming data failed to alter significantly the assessment of economic conditions and inflation developments, it would be justified to begin monetary policy adjustment at the following meeting.

Yet, some Council members assessed that the adjustment of monetary policy in Poland was not currently justified. In their opinion, despite signs of economic slowdown, it is possible that the economic growth will remain stable in the coming quarters. They pointed out that given high uncertainty, the impact of interest rate changes on decision-taking by economic agents was limited. In their view, given limited demand for corporate loans, additional monetary stimulus would have little impact on corporate lending. In addition, they argued that any exchange rate depreciation – accompanying interest rate cuts – would affect purchasing power of households with liabilities denominated in foreign currencies. They also pointed out that should the uncertainty diminish, a reduction in interest rates might be conducive to emergence of macroeconomic imbalances.

At the meeting a motion was submitted to lower NBP interest rates by 0.50 percentage points. The motion did not pass. A motion was also submitted to lower NBP interest rates by 0.25 percentage points. The motion did not pass. The Council decided to keep NBP interest rates at the following levels: the reference rate at 2.50%, the lombard rate at 4.00%, the deposit rate at 1.00%, the rediscount rate at 2.75%.

Minutes from the Monetary Policy Council Decision Making Meeting held on 8 October 2014

Members of the Monetary Policy Council discussed the current and future monetary policy decisions against the background of macroeconomic developments at home and abroad.

While discussing business conditions in Poland's external environment, Council members pointed out

that global activity growth remained moderate and varied considerably across the regions. They emphasised that recovery continued in the United States, although its pace remained slower than in the previous business cycles. Council members observed that GDP growth in the euro area had been weak and that business climate indicators had deteriorated recently. Some Council members also drew attention to the downward revisions of growth forecasts for the euro area by international institutions. Council members also pointed to deteriorating business conditions in Germany, Poland's main trading partner, reflected in the declining levels of the PMI and IFO indices in the past few months, and in the sharp fall in industrial output and new orders in August. Council members indicated that in other large euro area economies, including Italy and France, economic activity growth remained slow and hampered by structural problems of these countries.

While discussing economic situation in the largest emerging economies, it was observed that the Russian economy might be in recession in 2014 Q3, while growth in China had probably slowed down. It was argued that the deteriorating economic situation of these countries would adversely impact Germany's exports, which in turn might subsequently weigh on the growth of Polish exports.

Council members highlighted a significant decline in the prices of commodities over the recent months, which supported a decrease in inflation in Poland and in its environment, including the euro area. It was observed that the euro area inflation had been gradually trending down towards zero.

While discussing monetary policy abroad, Council members underlined that the tapering of quantitative easing by the Federal Reserve was occurring against the background of the ECB stepping up its monetary expansion. It was pointed out that due to the divergence between monetary policy of the Federal Reserve and the ECB, the euro has recently weakened against the dollar, which would boost the euro area's

price competitiveness vis-a-vis the US economy. The euro weakening was also accompanied by the zloty depreciation against the dollar.

It was indicated that the ECB launched the first conditional liquidity provision operations to banks in September and announced the start of asset purchases in 2014 Q4. Some Council members assessed that the ECB's strongly expansionary monetary policy – given the structural nature of weak economic growth and sluggish demand for credit – would prove ineffective in boosting economic growth in the euro area. Other Council members highlighted that although the scale of further quantitative easing by the ECB was unknown, it would last – according to the announcements of the ECB – for at least 2 years. Thus – they argued – the monetary policy in Poland's environment would remain highly expansionary for an extended period, which, assuming unchanged NBP interest rates, might be conducive to the inflow of short-term capital to Poland. However, a few Council members judged that the anticipated monetary policy tightening by the Federal Reserve could have more significant impact on financial markets – including the prices of Polish assets – than the monetary policy loosening by the ECB. Those members also underscored that in some emerging economies and developed economies which had been only slightly affected by the financial crisis, interest rates remained higher than in Poland.

While discussing economic situation in Poland, Council members pointed out that economic growth had slowed down in recent months. Some Council members emphasised that economic activity had proved weaker than forecasted in the July projection of NPB. At the same time, those members pointed to the flagging industrial output growth, stagnant construction and assembly output as well as the PMI index running below 50 points. They also observed that economic activity growth in Poland had been dragged down by a strong fall in exports to the former Soviet Union countries and a marked

weakening in exports growth to the euro area. They argued that while retail sales continued to rise, the pace of this growth was below that observed in the first half of 2014. They also expressed the opinion that the weakening of GDP growth might not be temporary, and a few of them believed that there was a risk of further decrease in GDP growth in subsequent quarters.

In contrast, some Council members argued that economic growth had decelerated only slightly and its pace was currently close to potential output growth. They pointed to the gradually improving situation in the labour market, including a decline in the unemployment rate and further steady wage growth, which supported retail sales growth. They also argued that relatively robust economic activity was accompanied with sound financial situation of enterprises. A few of those Council members observed that both economic growth and domestic demand growth in Poland remained higher than forecasted a few quarters ago, when the Council had decided about the last interest rates cut. They also underlined that – according to the forecasts – GDP growth next year might be higher than this year.

Some members of the Council pointed out that GDP growth in the coming year would be affected by fiscal policy. A few members of the Council were of the opinion that the increase in social spending announced by the government suggested that the coming year might bring greater than previously planned rise in public expenditures. A few Council members pointed also to a possible increase in expenditures co-financed with the European Union funds. Some Council members believed, however, that the government-announced increase in social spending would be small (about 0.2% of GDP), and the deficit in 2015 would remain close to its 2014 level. Moreover, part of the public expenditures would be related to a repayment of liabilities incurred a few years ago. They also argued that the possibility of fiscal policy easing was limited due to the excessive deficit procedure being in force. A few

Council members assessed, however, that budget deficit in 2014 will be probably markedly lower than it was planned in the budget act, which will mean easing of fiscal policy in the next year.

While analyzing the inflationary developments, members of the Council highlighted the fact that CPI inflation continued to run below zero. The majority of the Council members emphasized that no cost pressure had been seen in the economy, as evidenced by the negative growth in producer prices and persistently low wage growth. They also argued that there were no signs of demand pressure, as indicated by the negative retail sales deflator and core inflation persisting close to zero. They also pointed to continuing decline in inflation expectations. They drew attention to increase in risk of longer than previously expected period of inflation remaining below the target, as suggested by the revisions of inflation forecasts.

According to some members of the Council, such a sharp decline in CPI inflation is largely supply driven, as evidenced by the deepening decline in food prices. They argued that the observed positive supply shocks improved the financial situation of enterprises and enhanced debt service capacity of economic agents. A few of them also pointed out that August brought a slight increase in one of the core inflation measures.

While discussing NBP interest rates level, the majority of Council members believed that due to the sluggish economic activity, the risk of further weakening of economic growth, the deepening of the negative output gap and, consequently, higher risk of inflation remaining below target in the medium term, it was justified to cut interest rates significantly. They pointed to the signs of economic slowdown in Poland and its environment, further decline in prices and inflation expectations and the absence of wage pressure. At the same time, they emphasized that interest rate adjustment was necessary due to the increase in real interest rates resulting from the

decline in inflation and inflation expectations observed in the past few quarters. In this context, they stressed that the current real interest rates had become relatively high as compared with those in the recent years. They also pointed out the lack of inflationary risks in the Poland's environment and the growing scale of monetary expansion in the euro area, leading to an increase in the disparity of interest rates in Poland as compared with its environment. Those members also emphasized that a moderate level of credit growth in the economy and the absence of signs of imbalance in the housing market limited risks to financial stability. These members also believed that due to lags in the transmission mechanism of monetary policy, the adjustment of NBP interest rates should be rather quick and significant. In this context, a few Council members assessed, that a significant interest rates cut would be justified if it was accompanied with the statement, that this decision denoted the one-off adjustment in the interest rates to the current economic forecasts.

Some Council members believed, however, that NBP interest rates should remain unchanged. They pointed out that the slowdown in economic activity in the recent period was driven by factors beyond the impact of domestic monetary policy, namely external shocks and persistent uncertainty. Accordingly, in the current situation, monetary policy instruments might prove ineffective in stimulating economic activity. They argued that low inflation resulted mainly from supply shocks, which boosted real incomes of households and enterprises, and thus should not be offset by monetary policy. A few of those Council members also believed that lower interest rates were likely to slow down the process of corporate restructuring. Other Council members assessed, that interest rates cut would be justified only in the case of a considerable slowdown in economic growth.

A few members of the Council additionally argued that interest rates cuts, through stimulating domestic demand, amidst weak demand abroad, could bring

deterioration of the current account balance. Other members of the Council pointed out, however, that in the recent quarters Poland had experienced a trade surplus, and the current account deficit had been so far financed by foreign direct investment and the inflow of EU funds.

A few Council members also underlined that interest rate cuts may contribute to the fall in deposits in the banking sector. Other Council members pointed out, however, that the sharp decline in deposits, and consequently, an increase in currency in circulation, would be a rather unlikely development in response to NBP interest rates cuts. They also emphasized that the possible conversion of deposits into cash by economic agents would not negatively affect the stability of the banking sector considering the persistently high liquidity surplus in the Polish banking sector. They underlined that deposits withdrawn from the banking sector could be spent on consumption and investments.

The Council also discussed the width of the interest rate corridor of standing facilities. It was pointed out that should the reference rate be lowered, the current width of the corridor would be very large in relation to the basic interest rate level. It was also emphasized that the resulting reduction in the lombard rate would have an impact on the ceiling for the so-called maximum interest. The Council members also noted that should the reference rate and the rediscount rate be lowered, the interest on the required reserve – assuming it was computed using the current method – would be higher than the interest rate of basic open market operations.

At the meeting a motion was submitted to lower NBP reference rate and NBP rediscount rate by 0.5 percentage points as well as a motion to lower NBP lombard rate by 1.0 percentage point. The motions passed. The motion was also submitted to change the remuneration on the required reserve funds to 0.9 of the reference rate. The motion passed.

The Council set the NBP interest rates at the following levels: the reference rate at 2.00%, the lombard rate at 3.00%, the deposit rate at 1.00%, the rediscount rate at 2.25%.

Information from the meeting of the Monetary Policy Council held on 4-5 November 2014

The Council decided to keep NBP interest rates unchanged: reference rate at 2.00% on an annual basis; lombard rate at 3.00% on an annual basis; deposit rate at 1.00% on an annual basis; rediscount rate at 2.25% on an annual basis.

Growth in global economic activity remains moderate, although the economic situation varies across countries. In the United States, economic growth in 2013 Q3 remained relatively robust. In the euro area, economic activity is still low and the projections for economic growth in the euro area have been revised downwards. At the same time, the economic growth in the euro area next year is expected to be higher than this year. This is accompanied by a slowdown in GDP growth in China and growth in economic activity in Russia coming to a halt.

Commodity prices, including for crude oil, have been recently falling. Along with moderate global economic growth, this contributes to low inflation in many countries. In Poland's immediate environment – including the euro area and Central and Eastern Europe – inflation remains close to zero.

Major central banks continue their expansionary monetary policy. However, as the economic situation varies across major economies, monetary policies in these economies are also diverging. While the Federal Reserve has concluded its asset purchases, the European Central Bank has started purchasing assets and the Bank of Japan increased asset purchase programme significantly.

In Poland, data on economic activity point to deceleration in economic growth in 2014 Q3. Growth

in industrial production, construction and retail sales was lower in 2014 Q3 than in the previous quarter. This was accompanied by a deceleration of exports growth driven by economic slowdown in Poland's major trading partners.

Despite lower economic activity growth, employment in the corporate sector continues to rise, which is conducive to a gradual decline in unemployment. Yet, the unemployment rate remains elevated, which continues to contain wage pressure. As a result, wages increase in a pace close to real GDP growth. At the same time, expansion in lending to households has been stable, while the growth in lending to the corporate sector has been increasing gradually.

In September, CPI inflation remained negative at -0.3% y/y. The decline in prices, in annual terms, was mostly due to falling fuel prices, which resulted from a fall in oil prices in the global markets. Core inflation remained close to zero, which confirms the absence of demand pressure in the economy. The continued decline in producer prices points, in turn, to a lack of cost pressure. This is accompanied by very low inflation expectations of enterprises and households.

The Council got acquainted with the inflation and GDP projection prepared by the Economic Institute. In line with the November projection based on the NECMOD model – prepared under the assumption of unchanged NBP interest rates and taking into

account data available until 20 October 2014 – there is a 50-per cent probability of inflation running in the range of 0.0-0.2% in 2014 (as compared to -0.1-0.4% in the July 2014 projection), 0.4-1.7% in 2015 (as against 0.5-2.1%) and 0.6-2.3% in 2016 (as against 1.3-3.1%). At the same time, the annual GDP growth – in line with the November projection – will be, with a 50-per cent probability, 2.9-3.5% in 2014 (as compared to 3.2-4.1% in the July 2014 projection), 2.0-3.7% in 2015 (as against 2.6-4.5%) and 1.9-4.2% in 2016 (as against 2.3-4.5%). The economic growth and inflation risk distribution points to a greater probability of these variables remaining below the central projection throughout the whole projection horizon than above the central projection.

In the opinion of the Council, the October adjustment of monetary policy and the stable, despite some slowdown, economic growth limit the risk of inflation remaining below the target in the medium term. Therefore, the Council decided to keep NBP interest rates unchanged. However, the Council highlights that uncertainty regarding the economic conditions in the environment of the Polish economy persists. Therefore, the Council does not rule out further adjustment of monetary policy, should the incoming data point to a risk of deterioration in economic growth outlook.

The Council adopted the *Inflation Report – November 2014*.

4 Projection of inflation and GDP

This projection of inflation and GDP was prepared by the Economic Institute of the National Bank of Poland and presents a forecast of economic developments under the assumption of constant NBP interest rates. In terms of the contents, work involved in the creation of this projection was supervised by Andrzej Sławiński, Director of the Economic Institute. The process was coordinated by the Bureau of Macroeconomic Forecasts of the Economic Institute. Using the macroeconomic model NECMOD⁵⁸, the projection was prepared as the outcome of an iterative process, in the course of which the paths of some variables were adjusted if they diverged from NBP experts' economic intuition based on their knowledge of economic processes. The Management Board of the NBP approved the projection to be submitted to the Monetary Policy Council. The projection constitutes one of the inputs to the Monetary Policy Council's decision making process concerning NBP interest rates.

The November projection based on the NECMOD model covers the period from 2014 Q4 to 2016 Q4. The starting point for the projection is 2014 Q3.

The projection was prepared under an assumption of unchanged NBP interest rates. The cut-off date for the projection was 20 October 2014.

⁵⁸ Current version of the documentation of the model is available at the NBP website.

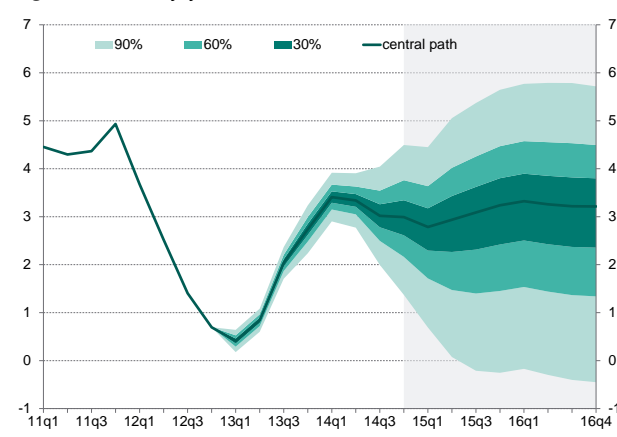
4.1 Summary

Since the work on the July projection was finalized, the economic conditions in Poland's environment have weakened considerably. The growth in the euro area came to a halt in 2014 Q2, and although it partly resulted from the Russian-Ukrainian crisis, incoming data indicate that structural problems of some of the euro area member states might be larger than previously assessed. Weakening conditions abroad are affecting domestic economic activity, both directly through the trade channel, causing a substantial decline in the demand for exports of Polish goods, and indirectly – through weakening sentiment in the domestic corporate sector, particularly in industry. As a consequence of these adverse changes abroad, Poland has entered a slowdown phase following a period of relatively strong growth in the first half of 2014, when GDP increased by 3.4% y/y (Figure 4.1). Meanwhile, the slowdown abroad translated particularly into weaker exports and private investment growth in Poland.

However, weaker growth in domestic economic conditions is accompanied by relatively sound labour market conditions. Employment is gradually expanding, while the unemployment rate is falling and the moderate wage growth has continued. Given that households' income from contract employment is rising and inflation remains low, private consumption should alleviate the pace of the current slowdown.

Low current inflation (-0.3% y/y in 2014 Q3) results from both weaker conditions at home and abroad, as well as a number of supply-side factors. The sharp decline in food prices was largely caused by the Russian embargo on Polish food imports and the exceptionally short and mild winter, which had increased the supply of fruit and vegetables. On

Figure 4.1 GDP (y/y, %)



Source: NBP (if not otherwise stated, this concerns all the figures and tables in this Chapter).

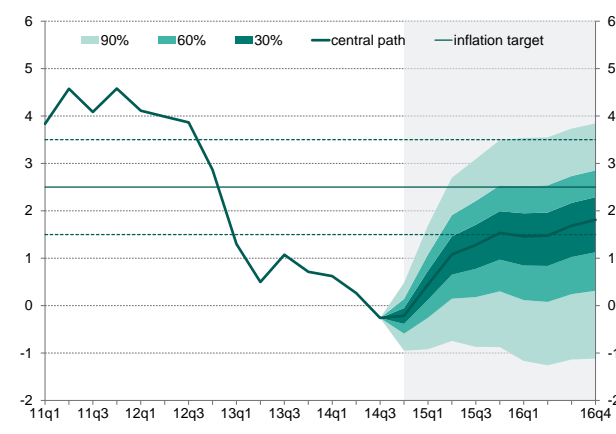
the other hand, low global prices of energy commodities were conducive to a decline in energy prices.

In the longer projection horizon, GDP growth will pick up insignificantly, but remain substantially below the long-term average from before the global financial crisis. Domestic recovery will be contained by the anticipated weakness in growth in the euro area. Domestic demand recovery will, on the other hand, be supported by falling real interest rates over the projection horizon, which will reduce the cost of financing investment and consumption with loans. Thus the current, balanced structure of GDP growth will stay unchanged, encompassing an increase in private consumption, gross capital formation and public consumption. In contrast, net exports will continue to detract from GDP growth.

The moderate recovery in the Polish economy will gradually push up the prices of the main components of the consumer goods and services basket (core inflation, food prices, energy prices). Yet, CPI inflation will stay well below NBP inflation target over the entire projection horizon. Besides low demand pressure, indicated by the negative output gap over the whole projection horizon, factors conducive to low inflationary pressure will also include stable global commodity prices and the gradually increasing supply of shale oil and gas.

The main source of uncertainty to the inflation and GDP forecast are the future developments in the euro area, and in particular, the sustainability and the extent of the recovery in this economy which started last year. It is assessed that owing to structural problems, the current weakening in the region's economic activity may stretch further ahead in time. A major uncertainty is related to the future behaviour of investment demand in this economy. At the same time, further monetary

Figure 4.2 CPI inflation (y/y, %)



policy easing by the ECB aimed at stimulating domestic demand is significantly constrained by the fact that no more interest rate cuts are possible as nominal interest rates have reached the zero lower bound. Owing to unfavourable external conditions, both GDP and inflation are more likely to run below the path envisaged by the baseline scenario. This is reflected in the "downward asymmetry" of fan-charts for these variables (Figures 4.1 and 4.2).

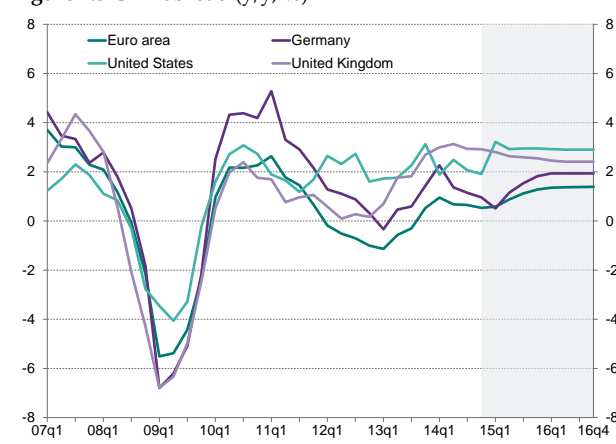
4.2 External environment

Current forecasts suggest that the pace of growth in Poland's economic environment⁵⁹ will gradually rise, yet it will remain below its long-term average in the projection period. Owing to the inflow of worse than expected data from the euro area, the assumptions of economic activity abroad in 2014-2015 have been revised downwards vis-a-vis the July projection.

Among Poland's main trading partners directly included in the projection, the United States and the United Kingdom enjoy the best outlook for growth over the projection horizon. It has been assumed that in both those economies GDP growth will be relatively robust, judging by the consistently strong consumer and corporate sentiment in the recent period as well as the expected continuation of improvement in the labour market (see Chapter 1.1 *Global economic activity*).

In the euro area, a only moderate recovery may be expected in 2015-2016, with GDP growth averaging 1.3% y/y. This will result from the structural problems experienced by some euro area economies and their poor competitive performance in global trade. These circumstances, along with

Figure 4.3 GDP abroad (y/y, %)



⁵⁹ In the NECMOD model, the external environment is represented by the euro area, the United Kingdom and the United States.

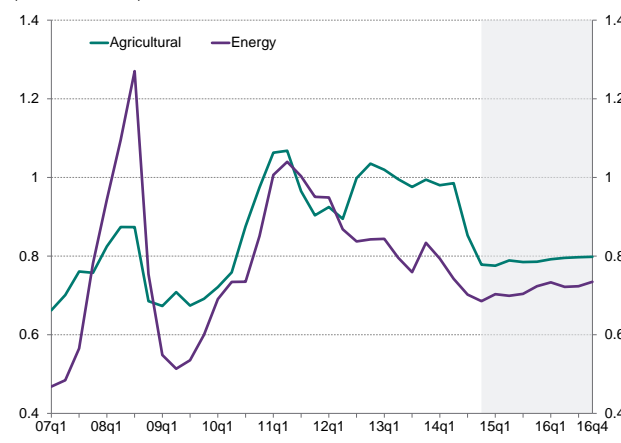
low expected demand, constrain corporate investment activity, despite a gradual improvement in credit availability.

Given worse than expected 2014 Q2 GDP readings in Germany, France and Italy, the forecast for the euro area economic growth has been reduced versus the July 2014 projection. Moreover, the recently observed declines in some business climate indicators point to lower output growth in the euro area than previously assumed. These indices reflect deterioration in sentiment concerning the future economic conditions as anticipated by consumers and producers, which results, among others, from an increase in geopolitical risks related to the Russian-Ukrainian crisis. However, the extent of the revision is limited by better-than-expected outlook for the euro area member states most affected by the sovereign debt crisis, as well as the anticipated lower than envisaged prices of agricultural and energy commodities, translating into lower inflation and, in consequence, a rise in household income in real terms.

It is expected that the index of energy commodity prices (Figure 4.4) will be lower than the July forecast round in the entire projection period. This adjustment comes as a consequence of weaker outlook for global economic activity, in particular slower than expected growth in China. The downward revision of the forecast for oil prices is further supported by the anticipated expansion in the supply of this commodity due to, on the one hand, increased deliveries from Libya, and, on the other hand, rising extraction in the United States.

The forecast of the agricultural commodity price index (Figure 4.4) has decreased substantially in the entire projection period compared to the assumptions of the July projection, which is largely driven by the excess supply of agricultural commodities observed in the global markets. This

Figure 4.4 Index of commodity prices in the global markets (USD, 2011=1)



phenomenon can be attributed to the weather conditions, which were conducive to the production of most of the agricultural commodities comprised in the agricultural commodity price index (see Chapter 1.4 *Global commodity markets*). The Russian embargo on agricultural crops and products, introduced in August 2014 and encompassing the EU countries, the United States, Australia, Canada and Norway, is contributing to a fall in food prices. On the other hand, the downward revision of the index of agricultural commodity prices is limited by the somewhat higher prices of coffee and cocoa than expected in the July projection, which is related to unfavourable weather conditions for these particular crops.

The downward revision of the forecasts of energy and commodity prices contributes to a reduction in the headline inflation forecast in Poland's economic environment, notably in the United States and in the euro area, compared with the July forecasting round (Figure 4.5). In the case of the euro area, the downward revision of the expected price growth is additionally driven by lower inflation expectations of businesses and consumers than in July, reflecting worse economic growth outlook for the euro area economy. As a result, inflation abroad is low throughout the projection horizon, especially in the euro area, reflecting a slower rate of the euro area's exit from recession.

Since low inflation and moderate growth in the euro area are projected, the current scenario assumes the ECB will continue to conduct an accommodative monetary policy. In particular, it is assumed that by the end of the projection horizon, there will be no interest rate increases in the euro area (Figure 4.6, see Chapter 1.3 *Monetary policy abroad and international financial markets*). In the case of the US economy, in light of the forecasted acceleration in economic growth, it is expected that monetary policy tightening will start earlier than in

Figure 4.5 Inflation abroad (y/y, %)

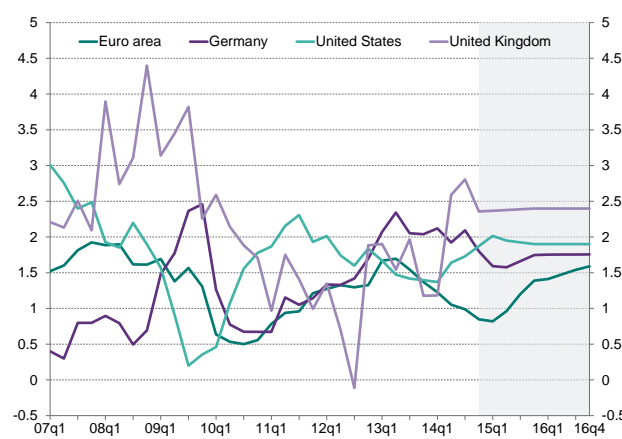
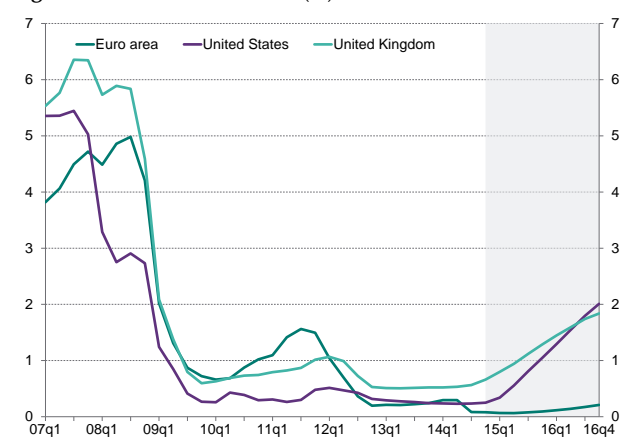


Figure 4.6 Interest rate abroad (%)



the euro area. Monetary policy tightening, due to low expected energy prices and a worsening outlook for global growth, will however, start in the second half of 2015.

Economic growth expected to be lower in the euro area than in the United States, as well as the increasing divergence between monetary policies of the Federal Reserve and by the ECB, point to a possibility of a moderate depreciation of the euro against the United States dollar – to 1.23 in the medium- and longer-term projection horizon.

4.3 Polish economy in the years 2014-2016

Aggregate demand

In the first half of 2014, GDP growth stood at 3.4% y/y, which was due to high growth in gross fixed capital formation, amidst moderate growth in private consumption and a negative contribution of net exports. In the coming quarters, due to unfavorable economic conditions in the environment of the Polish economy – economic slowdown in the euro area and escalation of the conflict between Ukraine and Russia – the GDP growth rate will decelerate temporarily (Figure 4.7).

Worsening economic conditions abroad will have the strongest impact on exports and gross fixed capital formation. In the longer-term projection horizon, on account of the gradual revival in demand in the euro area, the domestic economy will also post a moderate improvement. However, the recovery in Poland will be contained by declining inflow of capital transfers from the EU, which will result from the end of the EU financial perspective for 2007-2013 (Figure 4.11).

Figure 4.7 Economic growth

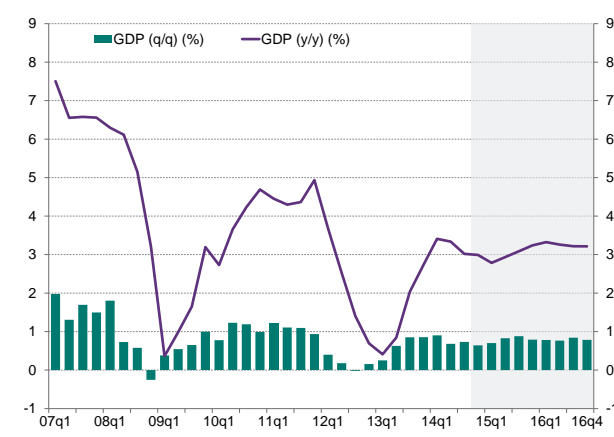
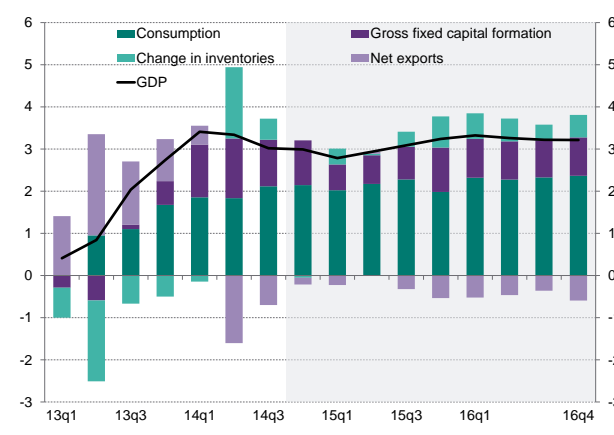


Figure 4.8 GDP growth (y/y, %) – breakdown



Over the projection horizon, consumption growth will stabilize at a moderate level, close to that seen in the first half of 2014 (Figure 4.9). A gradual increase in real households' income from paid employment (representing the largest share of their disposable income) will be supporting consumption growth. Faster growth in private consumption will also be driven by accelerating growth of income from self-employment, supported by the improvement of economic conditions in the longer-term projection horizon. The increase in expenditure on the purchase of consumer goods and services by households will be limited by their currently low savings rate. This is because it translates into lower propensity of households to finance consumption with bank loans, despite historically low NBP's interest rates.

By the end of 2015, public consumption growth will remain at slightly lower than in 2013. This will be largely driven by another year of wage freeze in the central government sector. Then, in line with the projection assumptions, wage growth in the government sector will resume to increase, followed by accelerating growth in public consumption. Yet, it will continue to be lower than the GDP growth rate.

After fast growth in gross fixed capital formation in the first half of 2014 (9.3% y/y), investment growth will decline, to reach an average of 4.3% y/y in 2015-2016 (Figure 4.10). Investment in the economy will be affected by economic slowdown and an only moderate rebound in growth abroad in the longer-term projection horizon. The level of the EU capital transfers use (Figure 4.11) will have the same impact. Throughout the projection horizon, growth in gross fixed capital formation will be supported by falling real interest rates.

In the short- and medium-term projection horizon growth in corporate investment will decline significantly in response to economic slowdown in

Figure 4.9 Private and public consumption

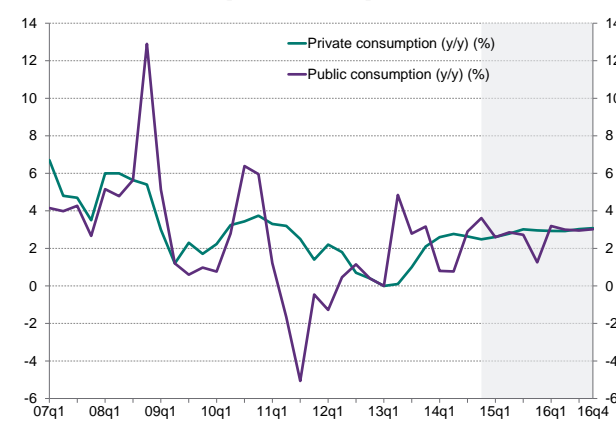


Figure 4.10 Gross fixed capital formation (y/y, %) - breakdown

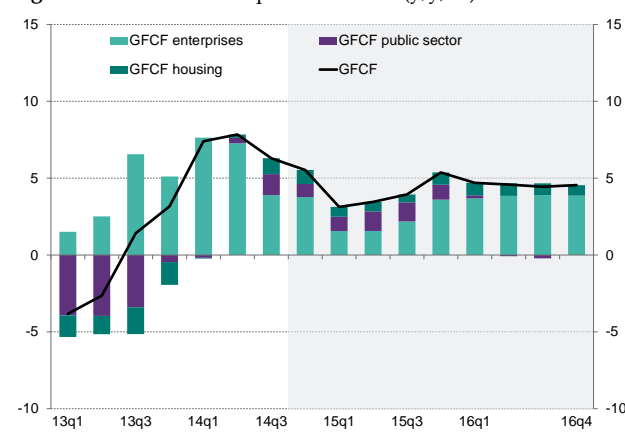
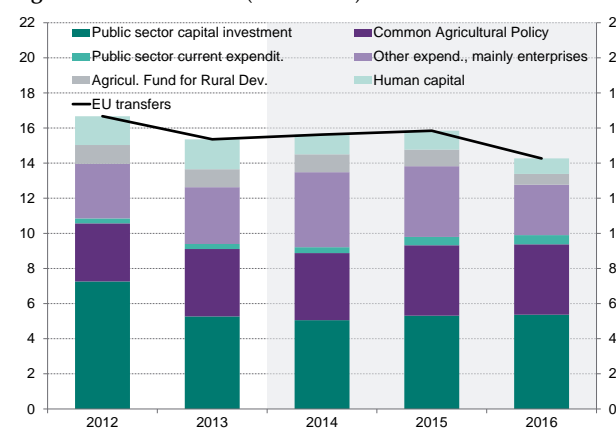


Figure 4.11 EU transfers (in bn. EUR) – breakdown



the euro area and elevated uncertainty in this region due to the escalation of the conflict between Russia and Ukraine. Unfavorable external conditions directly affect the economic conditions in Poland – through declining demand for Polish exports, but also exert a negative impact on corporate sentiment. In particular, NBP business surveys highlight a downward revision in the forecasts for demand, orders, and production among Polish companies.⁶⁰ In response to the worsening conditions at home and abroad, enterprises limit growth in the estimated value of newly commenced investment⁶¹, which will, with a certain delay, affect the level of their investment outlays.

Although the negative signs coming from the external environment of the Polish economy bring about a significant reduction in corporate investment, the gross fixed capital formation in this sector will remain positive throughout the projection horizon. Enterprises are currently in a fairly good financial condition, which allows them to fund investment with their own funds. Moreover, interest rates remaining at the current historically low levels (which results from the constant NBP reference rate assumed in the projection), help to finance investment with bank loans. In turn, higher than the long-term average level of capacity utilization⁶² points to a growing need for replacement investments.

In the longer-term projection horizon, amidst moderate economic recovery at home and abroad, corporate investment growth will accelerate. Yet, the scale of this acceleration will be limited, as the inflow of funds under the EU financial perspective 2007-2013 coming to an end, which results in a

⁶⁰ NBP Quick Monitoring. *Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4*, NBP.

⁶¹ *Financial situation in the enterprise sector in 2014 Q2*, NBP.

⁶² NBP Quick Monitoring. *Economic climate in the enterprise sector in 2014 Q3 and forecasts for 2014 Q4*, NBP.

marked decline in the use of the EU transfers allocated to capital expenditure of the private sector (Figure 4.11).

In the first half of 2014, after more than two years of decline, the growth rate in public investment turned positive, primarily due to growing local government expenditures on transport infrastructure, co-financed with EU funds. These trends will continue in the coming quarters.

By the end of 2015, when the funds under the current EU financial perspective 2007-2013 are used and when the absorption of funds under the new financial perspective (2014-2020) is to begin, moderate growth in investment expenditure by the public finance sector will continue. Yet, the currently available information suggests that, similarly to the current financial perspective, the use of funds under the new perspective will be gradual. As a result, in the longer-term projection horizon when the absorption of funds under the financial perspective for the years 2007-2013 ends, there will be a temporary drop in the use of EU structural transfers and a slowdown in public finance sector investment.

In the first half of 2014, following a year of declines, residential investment also picked up. This was driven by an improvement in financial condition of households and reduction in NBP interest rate rates historically lows in 2013. The coming quarters are expected to bring further improvement in housing construction, as indicated by an increase in the value of newly signed mortgage contracts⁶³, growing number of dwellings under construction and higher number of permits issued for residential construction.⁶⁴ The rise in housing demand throughout the projection horizon will be supported by: a stable positive

⁶³ Information on home prices and situation in the residential and commercial real estate market in Poland in 2014 Q2.

⁶⁴ Information on home prices and situation in the residential and commercial real estate market in Poland in 2014 Q2.

growth in real disposable income of households, the government-subsidized housing scheme "Housing for the Young" effective since 2014, and historically low interest rate levels. Tightening of mortgage lending criteria and amendment to the S-Recommendation in early 2014 will work in the opposite direction.

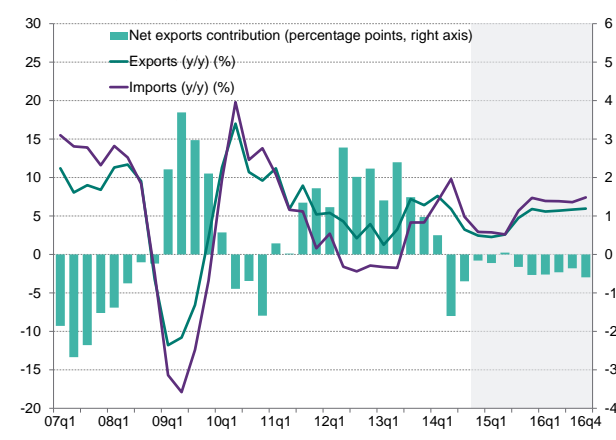
In the short- and mid-term projection horizon, as a result of deteriorating economic conditions at home and unfavorable conditions abroad, the external trade is to experience a marked slowdown. Decline will be significant especially in the case of exports to Russia and Ukraine. Yet, because of its high share in Polish foreign trade, limited growth in the sales to the euro area will have the greatest impact on total exports. The slowdown in exports will be particularly significant for goods produced in global value chains.

In the coming quarters, following a decline in domestic demand growth, imports will also decelerate significantly. However, due to the relatively strong decrease in export growth, the contribution of net exports to growth will be lower than the GDP growth rate, unlike in the previous periods of economic downturn (Figure 4.12). In the longer-term projection horizon, in response to economic upturn at home, the volume of foreign trade will grow, albeit to a significantly lesser degree than in the previous periods of economic recovery.

Macroeconomic equilibrium

Since the outbreak of the global financial crisis, potential output growth in Poland has decreased significantly. Over the projection horizon, potential GDP growth is expected to accelerate somewhat, yet it will remain below the long-term average. In view of the expected slowdown in the Polish economy, GDP will grow only slightly faster than

Figure 4.12 Foreign trade



potential output. Consequently, the output gap remaining negative since the second half of 2012 will, over the projection horizon, narrow only partially, to remain negative till the end of the projection horizon, running in 2016 at -0.6% of the potential output (Figure 4.13).

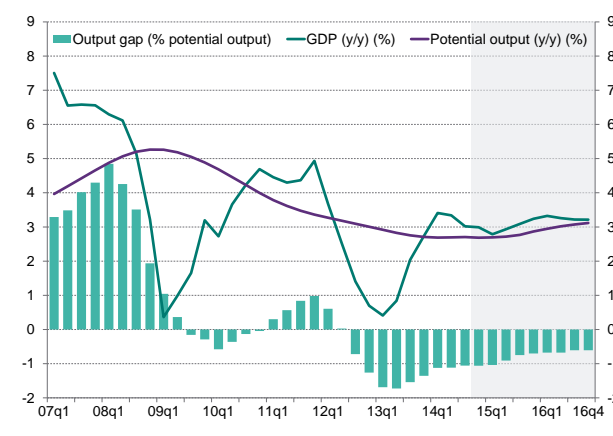
A slight acceleration in potential output growth will be driven by two factors. First, the moderate upward trend in the currently low total factor productivity (TFP), first observed in the second half of 2013, will be continued. Yet, the TFP will not return to the level from before the global financial crisis by the end of the projection horizon.

Second, the currently observed positive trends in the labour market, reflected in the declining unemployment equilibrium rate (NAWRU, Figure 4.16) and an increase in the labour participation rate will positively impact the potential output growth.

The decline in the unemployment rate will be driven by the expiry of the negative hysteresis effect (until now contributing to an increase in the equilibrium unemployment rate) following the decline in the current rate of unemployment. The drop in the unemployment rate will also be supported by a relatively high flexibility of the domestic labour market. Compared with other EU countries, fixed-term contracts and – especially in the service sector – civil law contracts are a more common form of employment in Poland.⁶⁵ The indexation of wages, which facilitates wages adjustment to market conditions is used less frequently.⁶⁶

A gradual increase in the labour force participation rate over the projection horizon (which, however, is clearly slower than in the recent years) will be largely a result of a further increase in the activity

Figure 4.13 Output gap.



⁶⁵ Labour market survey. Report 2013, NBP and Labour market survey. Report 2014, NBP.

⁶⁶ Labour market survey. Report 2012, NBP.

of persons aged over 44 years, among others, due to a rise in the retirement age as at the beginning of 2013. The scale of the growth in the labour participation rate will be limited by the adverse change in the age structure of the population, due to rising share of persons at post-productive age.

In the projection horizon, potential output growth will be negatively affected by declining population resulting from emigration, mostly affecting the economically active persons (Figure 4.14), weakening the positive impact of the previously mentioned factors.

Yet, the growth rate of capital will have a neutral impact on potential output growth due to the relatively stable investment growth.

The first half of 2014 posted a significant increase in the number of employed persons (LFS), which was driven by the Polish economy having entered a recovery phase during this period. Such a high growth largely resulted from impact of the statistical effect associated with the extension of maternity leave from 6 to 12 months for parents of children born after 31 December 2012.⁶⁷ In the longer-term projection horizon – amidst stabilization of GDP growth and expiration of the statistical effect – growth in the number of the employed will decrease, yet will remain positive (Figure 4.15). The increase in the number of the employed is currently observed amidst GDP growth below its historical level, which may be a structural development and may result from the entry of the Polish economy into the phase of lower labour productivity growth. This is because the capability to increase labour productivity easily by restructuring of Polish economy in the initial period of transition have already been exhausted. Along with rising relative performance in relation

Figure 4.14 Potential output (y/y, %) - breakdown

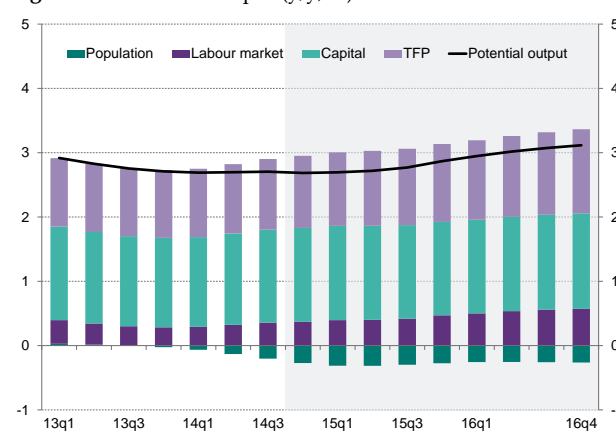
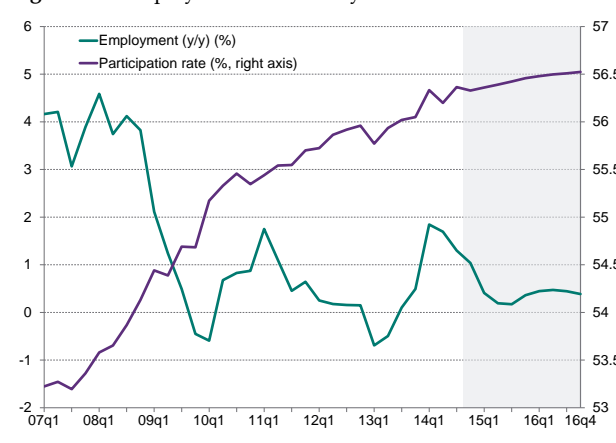


Figure 4.15 Employment and activity in the labour market



⁶⁷ According to the LFS methodology, persons on maternity leave are considered to be economically active and working. On the other hand, persons on child-care leave exceeding 3 months - and their number has decreased as a result of the extension of maternity leave - are among the economically inactive.

to the developed countries, the real convergence process is slowing down. These developments are reflected in lower total factor productivity (TFP) as compared to the 1990s and 2000. The pick-up in employment is additionally supported by high flexibility of the domestic labour market and the accompanying low cost of staff turnover.

In total, the rising number of the employed amidst population decline and only slightly growing labour productivity will translate – despite the economic downturn – into LFS unemployment rate declining to 8.3% in 2016 (Figure 4.16). However, due to a simultaneous decline in the equilibrium unemployment rate (Figure 4.16), the increase in wage pressure will be moderate – the growth rate of real wages in 2014-2016 will slightly exceed the labour productivity growth (Figure 4.17). Thus, growth in unit labor costs over the projection horizon will remain at a moderate, stable level close to 2% y/y.

The current and capital account balance in the first half of 2014 stood at a historically high level. This was largely driven by improving balance of trade in goods and services, which was reflected in a positive contribution of net exports to growth observed between 2011 Q2 and 2013 Q1. The improvement in the trade balance in the recent years was also supported by an increase in the terms of trade, caused by falling import prices, including, among other things, appreciation of the zloty against the dollar amidst a concurrent reduction in commodity prices in the United States dollar terms. The increase in the current and capital account balance was also driven by a slight improvement in the income balance, caused by a decline in income of non-residents resulting from direct investment, and improved balance of the transfers account, resulting from increased inflow of funds from the European Union. In the longer term, the current and capital account balance will gradually decrease, although will still remain

Figure 4.16 Unemployment

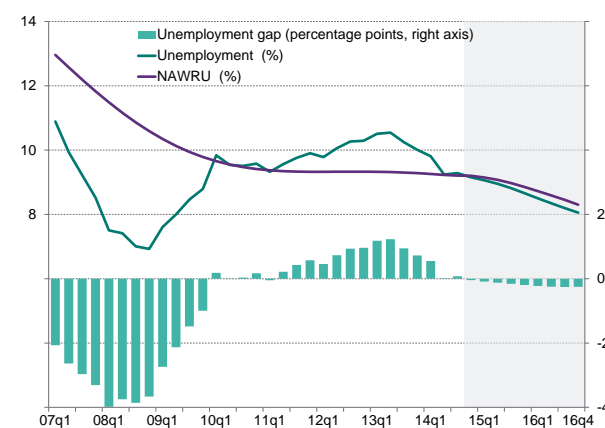
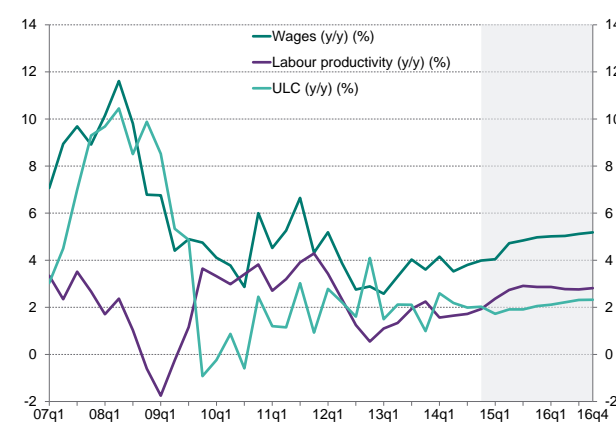


Figure 4.17 Unit labour costs



positive in 2015 (Table 4.3). The current and capital account balance will be negatively affected by the balance of trade deteriorating throughout the projection horizon (due to negative contribution of net exports to growth observed since 2014 Q2). 2016 will bring about further reduction in the inflow of EU funds, which will be driven by the settlement under the EU financial perspective 2007-2013 coming to an end. Remaining components of the current and capital account balance – strongly negative income balance and positive balance of wages and remittances that counterbalances the former – will remain stable throughout the projection horizon.

Exchange rate

Over the projection horizon, factors working towards an appreciation or depreciation of the zloty will balance one another. The present, record high current and capital account balance supports zloty appreciation. Another factor conducive to strengthening of the Polish currency is ongoing real convergence of the Polish economy, which is reflected in a higher potential GDP growth rate envisaged in the projection as compared to the growth potential of Poland's key trading partners. However, the impact of the above factors will largely be balanced by interest rate disparity narrowing as a result of constant NBP reference rate and a gradual increase of interest rates abroad, assumed in the projection. An appreciation of the zloty will also be mitigated by a persistently elevated risk in the global financial markets related to concerns that recessionary trends may deepen in some advanced economies. Over the longer-term projection horizon, the appreciation of the zloty will be contained by the deterioration of the current and capital account balance.

Inflation

In 2014 Q3, the consumer price index decreased by 0.3% y/y. A negative growth of CPI inflation index was the combined effect of a low level of core inflation and a drop of food and energy prices in year-on-year terms. Despite a gradual rise in subsequent quarters, inflation will run markedly below the NBP inflation target (Figure 4.18) until the end of the projection horizon, partly driven by low demand and cost pressures. Food and energy price growth (Figure 4.21) will additionally be curbed by stable commodity prices in the global markets. Under the assumption of the NBP reference rate remaining unchanged, the probability of inflation running in the range of 1.5%-3.5%, which currently is close to zero, will be rising in the projection horizon, yet it will not exceed 50% (Table 4.2).

Over the entire projection horizon, core inflation will remain low – amounting to 1.2% y/y on average in 2015-2016 – driven by both domestic and external factors (Figure 4.18). The projected low demand pressure in the economy is still the main source of low core inflation, which is corroborated by a negative output gap, the shape of which is aligned to the expected temporary decrease in GDP growth in 2015, and its subsequent marginal acceleration. Also, a lack of a substantial cost pressure will help to keep core inflation at a low level. On the one hand, a moderate nature of labour market improvement will translate into a low, within the projection horizon, growth of unit labour costs. On the other hand, the scale of import prices increase (Figure 4.19) will be constrained by weakening business conditions and low inflation abroad.

In the short-term, food prices will be the component with the strongest dampening impact on consumer price growth (Figure 4.21) and will remain on a downward trend until 2015 Q1 (Figure

Figure 4.18 CPI and core inflation (y/y, %)

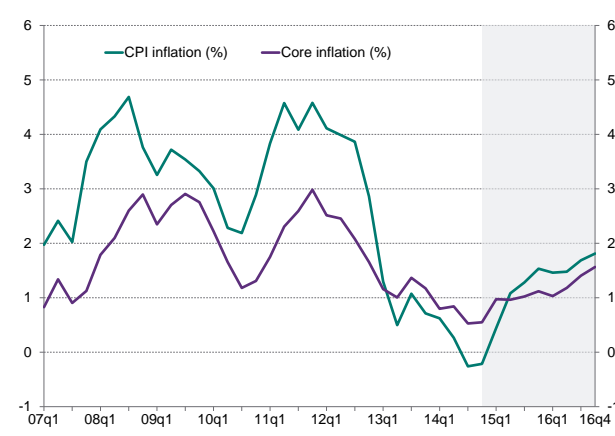


Figure 4.19 Terms-of-trade

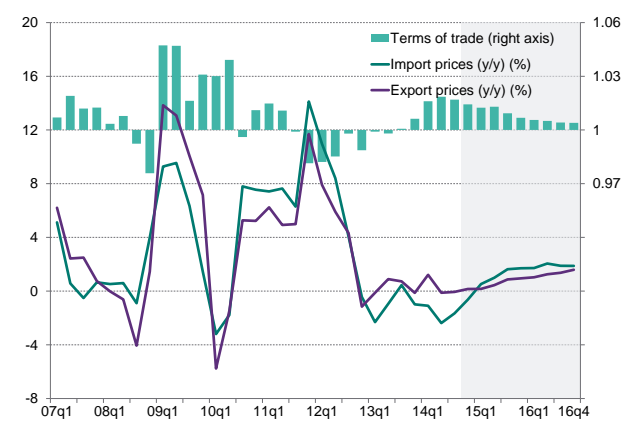
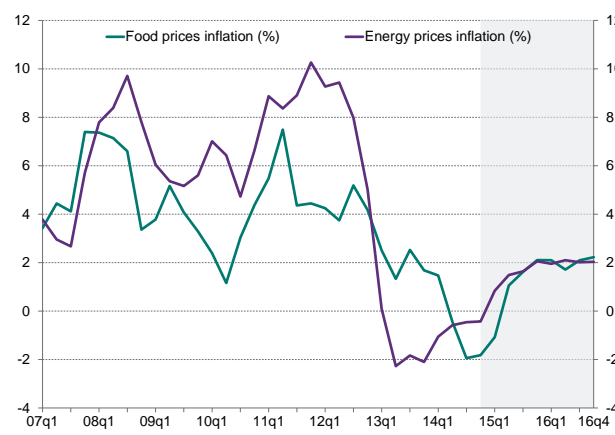


Figure 4.20 Inflation of food and energy prices (y/y, %)



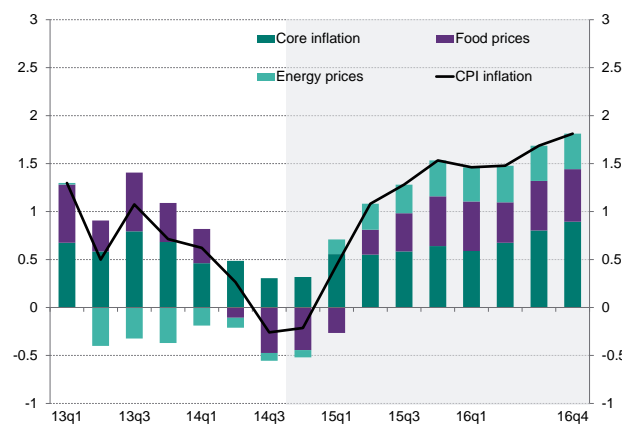
4.20). Such a significant decline in food prices is a result of weaker economic conditions and larger supply of agricultural commodities. Fruit, vegetable, meat, fish, milk and dairy product markets report excess supply, mainly owing to the Russian embargo on imports of these commodities. Furthermore, following an exceptionally short and mild winter, fruit and vegetable crops in Poland and Southern Europe were unusually high. In the longer-term, with the assumption that the positive supply shocks will be fading out, food price inflation will gradually rise. Yet, this rise will be moderated by low demand pressure in the domestic market and stable agricultural commodity prices in the global markets throughout the projection horizon (Figure 4.4).

In the projection horizon, the projected low inflation stems also from a weak growth of energy prices. As in 2013, the average growth of energy prices will be negative and will amount to -0.6% in 2014. This will be partly driven by a decrease in electricity prices for households, starting from 1 January 2014, and lower fuel prices as a result of falling prices of oil in the global markets. In 2015-2016, energy price growth will go up, yet it will remain subdued, markedly below the long-term average. Only a slow rise of energy commodity prices in the global markets will be working towards lower inflation, reducing the scale of potential increases in electric energy and natural gas rates for households, which are subject to approval by the Energy Regulatory Office (URE).

4.4 Current versus previous projection

In the current projection round both the expected GDP growth and the future CPI inflation path have been revised downwards as compared with the July projection (Table 4.1).

Figure 4.21 CPI inflation (y/y, %) - breakdown



The downward shift of the economic growth rate, by 0.5 percentage points on average, mainly relates to 2014-2015. The revision is driven by unfavourable economic developments in Poland's external environment and a decline in forecasted inflow of EU funds. A lagged effect of lower economic activity will have that will translate into meagre inflationary pressure. A decline in commodity prices in the global markets will also be conducive to lower inflation forecast. In the longer term, the impact of these factors on CPI inflation is gradually increasing, to -0.7 percentage points in 2016.

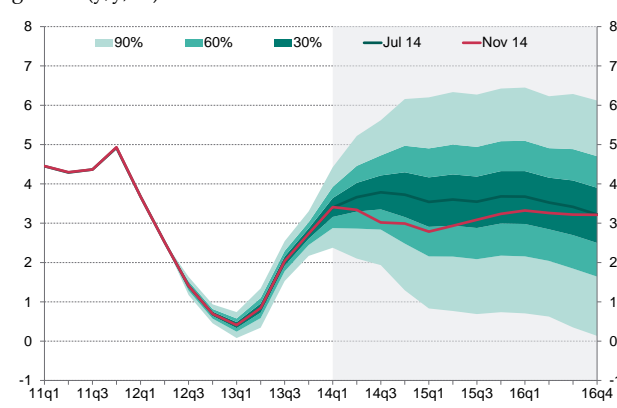
GDP

Information released after the July projection had been completed, points to a deterioration of the economic conditions in Poland's environment, which translates into a lower GDP growth forecast, particularly in the projection's short- and medium-term horizon. After the recent months data were released, the GDP growth projection was revised downwards, most significantly for 2014-2015. The data point to greater structural problems of some of the euro area economies, as compared to earlier analyses. In addition, corporate and household sentiment deteriorated in the euro area, which is partly associated with the escalation of the Ukraine-Russia conflict. Due to trade links, the escalation of the conflict has a relatively stronger impact on Polish economy. Apart from the direct trading channel, the economic conditions abroad also adversely affects sentiment in the Polish corporate sector, notably in industry, which leads to a decline in investment demand. The impact of lower domestic investment, due to a high contribution of imports in this category, is partly offset by higher net exports (Figure 4.23). A rise in uncertainty and worsening corporate sentiment will also translate into decisions taken by firms regarding employment and wages. A worse labour market situation arising from the above has, in

Table 4.1 November projection versus July projection

	2014	2015	2016
GDP (y/y, %)			
XI 2014	3.2	3.0	3.3
VII 2014	3.6	3.6	3.5
CPI inflation (y/y, %)			
XI 2014	0.1	1.0	1.6
VII 2014	0.2	1.4	2.3

Figure 4.22 November projection versus July projection: GDP growth (y/y, %)



turn, an impact on the forecasted private consumption growth rate.

The change in the assumptions in respect of the inflow of EU funds increases the scale of downward revision of economic growth forecasts in 2014 and 2015. The present projection assumes that some projects from the EU 2014-2020 financial perspective will be postponed due to changes in the Plan for National Road Construction and delays in the approval of programme documentation vis-à-vis July 2014 expectations. Reduced absorption of EU funds will have the greatest impact on public investment growth in the current and next year (Figure 4.23).

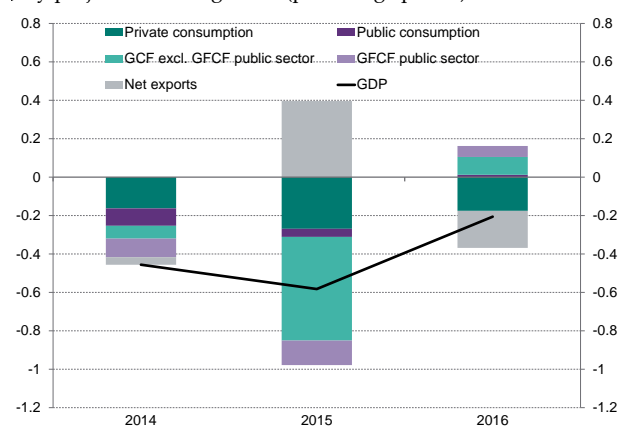
In a longer term, the impact of the above-mentioned factors – the external environment and lower inflow of EU funds – will fade off and GDP growth will be only slightly below expectations from the previous projection round. The return to the path forecasted in July 2014 will be supported by monetary policy easing reflected in the reduction of NBP reference rate by 0.50 percentage points.

Inflation

Data released since the July projection point to lower CPI inflation throughout the projection horizon. In the short-term horizon, this will be due to a stronger fall in food and energy prices, which is connected with a high supply of unprocessed food, a decline in agricultural commodity and oil prices in the global markets and regulatory changes. In a longer projection horizon, the downward revision of the inflation forecast will, to a greater extent, be driven by lower economic activity, which translates into meagre demand and cost pressure in the Polish economy.

The lower CPI inflation projection in the current

Figure 4.23 Decomposition of deviations between November and July projection: GDP growth (percentage points)⁶⁸



⁶⁸ The data presented in the chart may vary slightly from those in Table 4.1, due to rounding of numbers to one decimal place.

and next year results, to a great extent, from the decline in expectations of fuel price rises due to the fall in oil prices in global markets. A lower rise in energy prices next year will also be driven by lower increases of electric energy and natural gas prices for households, vis-à-vis earlier assumptions. Contrary to expectations of July 2014, electric energy tariffs for 2015 will not account for the cost related to the purchase of certificates designed to fund the cogeneration process. A lower increase in natural gas prices in 2015 results, in turn, from delays in gas deliveries from Qatar (which is more expensive than the gas imported from Russia) and the expected reduction in the price of gas imported from Russia following negotiations of the contract with Gazprom.

Lower inflation in 2014 also results from the fall in food prices driven by favourable supply conditions in agricultural markets in Poland and Europe. High supply of agricultural commodities in these markets has resulted from favourable agricultural and weather conditions, as well as the introduction of the Russian embargo on fruit, vegetables, fish and dairy products on 7 August 2014. The impact of these factors on food price inflation in annual terms will be gradually fading off in the forecast horizon.

Lower economic activity has a negative impact on CPI inflation throughout the whole projection horizon. As a consequence of a decline in GDP growth forecasts, negative output gap, which is a comprehensive measure of inflationary pressure in the economy, is lower in the projection horizon by 0.6 percentage points, on average. Decline in inflation results both from weaker demand pressure as compared to the July projection and a lower rise in wages, which reduces labour unit costs. Due to the nature of price adjustments in the economy and the lagged response of inflation to

Figure 4.24 November projection versus July projection: CPI inflation (y/y, %).

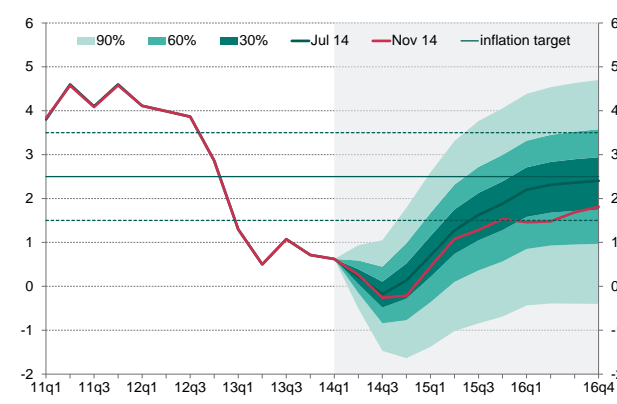
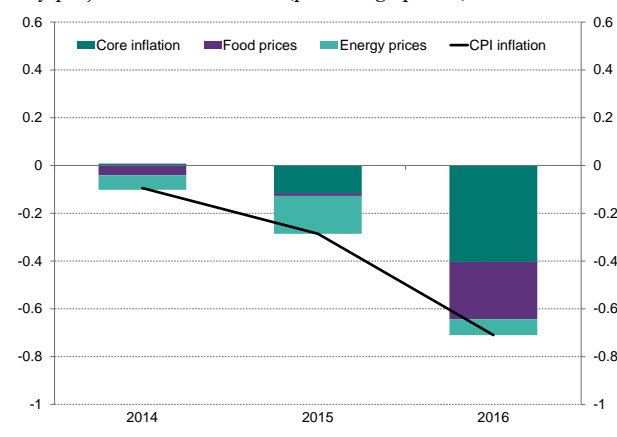


Figure 4.25 Decomposition of deviations between November and July projection: CPI inflation (percentage points).⁶⁹



⁶⁹ The data presented in the chart may vary slightly from those in table 4.1, due to rounding of numbers to one decimal place.

economic slowdown, the impact of these factors on the forecast revision gradually increases as the time of the projection horizon becomes longer. Given that such components as core inflation and food price inflation are the ones that respond to the level of the output gap to the greatest extent, their revision for 2016 has been the most significant.

The weaker economic climate abroad, which turned out to be worse than expected in July, also translates into a decline in CPI inflation forecasts due to lower import prices. While lower prices of agricultural commodities and crude oil influence mainly domestic food and energy prices, lower inflationary pressure abroad regarding the remaining products and services has the greatest impact on the downward revision of domestic core inflation.

A factor containing the scale of inflation forecast revisions in a longer horizon is, similarly as in the GDP forecast, the reduction of NBP interest rates as compared to the previous forecasting round.

4.5 Forecast uncertainty sources

The balance of risks for the projection of inflation points to the possibility that both inflation and GDP growth will be below the central projection (Table 4.2). The key sources of projection uncertainty are presented below.

Scale and sustainability of recovery in the euro area

The external environment, in particular the scale and sustainability of the economic recovery in the euro area, poses the most important source of uncertainty for the inflation and GDP projection and is also responsible to the greatest extent for the asymmetry in the downside risk distribution in these categories.

A slowdown in the recovery of the euro area is most likely the expression of both the structural weaknesses of the economy and the result of a lack of sufficient structural reforms aimed at improving competitiveness. However, if the structural problems of the euro area turned out to be deeper than current assessments, lower than expected economic growth in this economy could persist for a longer period. Heightened concerns about the future economic conditions may result in a deterioration in business sentiment in Europe and an exacerbation of the decline in investment. Consequently, it could pose a threat to the return of the European economies to the path of stable growth. An increase in geopolitical risk associated with the conflict between Russia and Ukraine, or its persistence at elevated levels, may also lead to a decline in producer and consumer sentiment in Europe, and thus weaken domestic demand. Internal demand in the euro area may also be weakened by lower than expected growth in lending by European banks, despite a fall in uncertainty associated with the publication of the results of Asset Quality Review and stress tests in the banking sector as well as the recent actions of the European Central Bank (see Box 2: *The ECB's easing of monetary policy since the previous Inflation Report*). Moreover, further easing of monetary policy in the euro area aimed at stimulating internal demand is difficult, largely due to a lack of possibility of further reductions in interest rates, since they have reached the zero lower bound for interest rates. Together with the growing stagnation tendencies, the risk of a de-anchoring of inflation expectations might increase and deflation could emerge.

Protraction of the conflict between Russia and Ukraine

Another source of uncertainty for the projection of economic conditions in Poland is the further development of the Russian-Ukrainian crisis and

Table 4.2 Probability of inflation running:

	below 1.5%	below 2.50%	below 3.50%	below the central projection	In the range (1.5-3.5%)
14q4	1.00	1.00	1.00	0.52	0.00
15q1	0.92	1.00	1.00	0.52	0.08
15q2	0.69	0.93	0.99	0.53	0.31
15q3	0.61	0.88	0.98	0.54	0.37
15q4	0.54	0.81	0.96	0.55	0.41
16q1	0.57	0.82	0.95	0.56	0.38
16q2	0.58	0.82	0.95	0.57	0.38
16q3	0.53	0.78	0.94	0.58	0.41
16q4	0.51	0.76	0.93	0.59	0.42

its impact on trade, food prices and business sentiment. The extension of sanctions imposed on Russia could be of crucial importance. Apart from the adverse repercussions for economic growth in Poland and its main trade partners, it could lead to an increase in the price of oil and natural gas on the global markets.

Food and energy prices in Poland

Other sources of uncertainty for the projection result from factors which have a particularly significant impact on food and energy prices. The most important of these are the following: the tariff policy of the Energy Regulatory Office (URE), meteorological conditions and the developments in the global commodity markets.

The future tariff policy of the URE, including the possible liberalisation of the gas and electrical energy market, will have a significant impact on domestic energy prices. There is also uncertainty surrounding the impact on prices of the possible renegotiation of the agreement between Polish Oil and Gas Company (PGNiG) and Gazprom as well as the commencement of the Qatar contract. The Climate and Energy Package, aimed at reducing CO₂ emissions, could also have an impact on energy prices. Currently, the price of CO₂ emission allowances is very low and does not cause cost pressures; however, the potential for growth in these prices still constitutes a risk for development of energy prices in Poland. Agrometeorological conditions are, in turn, the greatest risk not only for domestic food prices, but also for prices abroad, translating into agricultural commodity prices in global markets.

The developments in global commodity markets will also remain heavily influenced by demand from the emerging market economies, which – against relatively stable consumption in developed

countries – to the largest extent determines changes in global demand.

Furthermore, a risk factor for future energy commodity prices is the scale of extraction and export of shale gas and oil by the United States, as well as supply disruptions caused by political instability in some oil-producing countries. In addition, a risk factor for the growth of energy commodity prices in Europe is possible weakening of the euro against the US dollar as a result of divergences in the economic conditions and monetary policy in the euro area and the United States.

Table 4.3 Central path of inflation and GDP projection

	2012	2013	2014	2015	2016
Consumer Price Index CPI (% y/y)	3.7	0.9	0.1	1.1	1.6
Food prices (% y/y)	4.3	2.0	-0.7	0.9	2.0
Energy prices (% y/y)	7.9	-1.5	-0.6	1.5	2.0
Core inflation net of food and energy prices (% y/y)	2.2	1.2	0.7	1.0	1.3
GDP (% y/y)	2.0	1.6	3.2	3.0	3.3
Domestic demand (% y/y)	-0.1	0.0	3.7	3.3	3.8
Individual consumption (% y/y)	1.3	0.8	2.6	2.8	3.0
Public consumption (% y/y)	0.2	2.7	2.2	2.3	3.0
Gross fixed capital formation (% y/y)	-1.6	-0.2	6.8	4.0	4.6
Contribution of net exports (percentage point y/y)	2.1	1.5	-0.4	-0.3	-0.5
Exports(% y/y)	3.9	4.6	4.5	3.9	5.8
Imports (% y/y)	-0.7	1.3	5.6	4.6	7.0
Gross wages (% y/y)	3.7	3.4	3.9	4.6	5.1
Total employment (% y/y)	0.2	-0.2	1.5	0.3	0.4
Unemployment rate (%)	10.1	10.3	9.4	8.9	8.3
NAWRU (%)	9.3	9.3	9.2	9.0	8.5
Labour force participation rate (%)	55.9	55.9	56.3	56.4	56.5
Labour productivity (% y/y)	1.9	1.7	1.7	2.7	2.8
Unit labour costs (% y/y)	2.7	1.7	2.2	1.9	2.2
Potential output (% y/y)	3.1	2.8	2.7	2.8	3.0
Output gap (% of potential GDP)	-0.3	-1.6	-1.1	-0.8	-0.6
Index of agricultural commodity prices (USD; 2011=1.00)	0.96	1.00	0.90	0.78	0.80
Index of energy commodity prices (USD; 2011=1.00)	0.87	0.81	0.73	0.71	0.73
Price level abroad (% y/y)	1.3	1.6	1.2	1.2	1.6
GDP abroad (% y/y)	0.0	0.2	1.1	1.3	1.7
Current and capital account balance (% GDP)	-1.5	0.9	1.4	0.6	-0.9
WIBOR 3M (%)	4.91	3.03	2.48	2.21	2.21

Source: LFS data is the data source for total employment labour force, participation rate and unemployment rate. Index of agricultural commodity prices is based on futures quoted mainly on European stock exchanges. Index includes prices of wheat, oilseed, pork, potatoes, sugar, cocoa, coffee, skimmed milk powder, butter and frozen concentrated orange juice allowing for weights reflecting the consumption structure of Polish households. The index of the prices of energy commodities includes the prices of crude oil, coal and natural gas allowing for the consumption structure of these commodities in Poland.

5 The voting of the Monetary Policy Council members in June – September 2014

■ Date: 3 September 2014 r.

Subject matter of motion or resolution:

Motion to lower the NBP interest rates by 0.5 percentage points.

MPC decision:

Motion did not pass.

Voting of the MPC members:

For: E. Chojna-Duch
E.J.Osiatyński

Against: M. Belka
A. Bratkowski
A. Glapiński
J. Hausner
A. Kaźmierczak
A. Rzońca
A. Zielińska-Głębocka

J. Winiecki was absent.

■ Date: 3 September 2014 r.

Subject matter of motion or resolution:

Motion to lower the NBP interest rates by 0.25 percentage points.

MPC decision:

Motion did not pass.

Voting of the MPC members:

For: E. Chojna-Duch
E.J.Osiatyński
A. Zielińska-Głębocka

Against: M. Belka
A. Bratkowski
A. Glapiński
J. Hausner
A. Kaźmierczak
A. Rzońca

J. Winiecki was absent.

■ Date: 16 September 2014 r.

Subject matter of motion or resolution:

Resolution No. 5/2014 on adopting Monetary Policy Guidelines for 2015.

Voting of the MPC members:

For: M. Belka

A. Bratkowski

E. Chojna-Duch

A. Glapiński

J. Hausner

A. Kaźmierczak

E.J. Osiatyński

A. Rzońca

J. Winiecki

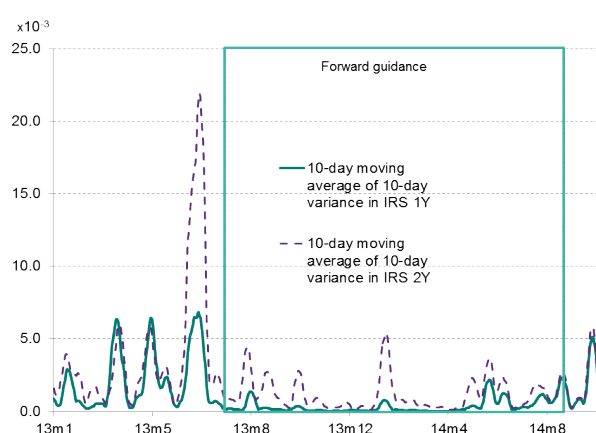
A. Zielińska-Głębocka was absent.

Against:

Appendix: the impact of forward guidance on spot and future interest rates

Between Q3 2013 and Q3 2014 the Monetary Policy Council (MPC) resorted to so-called forward guidance, i.e. they communicated to the public what interest rate policy it would intend to pursue within a horizon beyond the next decision-making meeting (see *Forward guidance – new monetary policy communication tool*, *Inflation Report – November 2013*). Following a series of interest rate cuts initiated in November 2012, at the conference following the MPC meeting in July 2013 the President of NBP hinted that NBP interest rates could remain unchanged until at least the end of 2013. The message was included in the press release following the MPC meeting in September. During the time when forward guidance was applied, the likely period of keeping interest rates unchanged was extended twice. In November 2013, the MPC press release suggested that the interest rates would probably stay unchanged at least until the end of the first half of 2014, and in March 2014 forward guidance was extended at least to the end of 2014 Q3. The aim for introducing forward guidance was to enhance the market consensus on NBP interest rates remaining unchanged in the following quarters.

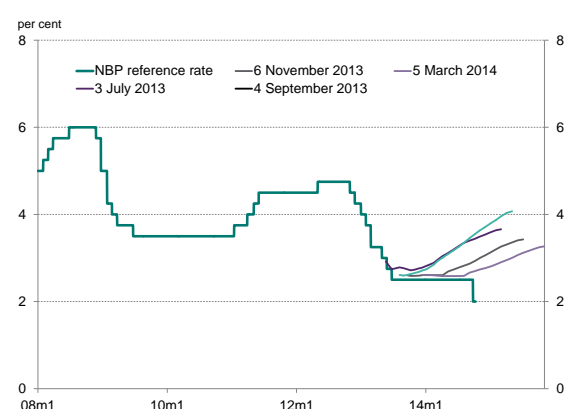
Figure A.1 Variance of IRS 1Y and IRS 2Y



Source: Bloomberg, NBP calculations.

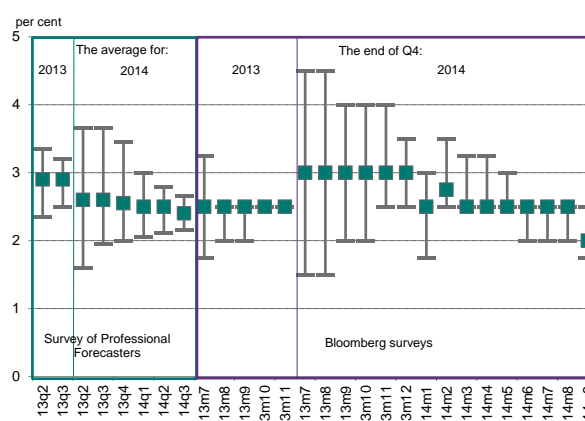
An immediate consequence of implementing forward guidance in July 2013 was a decline in the expectations of market participants that NBP interest rates would be reduced in the remaining of 2013. As a result, the path of future short-term interest rates over the 2-year horizon implied from FRAs went up slightly (Figure A.1), as the uncertainty about the level of NBP reference rate declined significantly. Lower uncertainty was reflected in reduced dispersion of interest rate forecasts of analysts, as well as a considerable decrease in the variance of IRS 1Y and IRS 2Y (Figure A.2). Following both MPC communicates extending the forward guidance, the short-term interest rates paths expected by the surveyed analysts and implied from FRAs was declining.

Figure A.2 Changes in the path of future short-term interest rates (implied from FRA contracts, left panel) and in forecasts of NBP reference rate (according to NBP Survey of Professional Forecasters and the Bloomberg surveys, right panel) at the individual stages of forward guidance (percentage points).



Source: Bloomberg and NBP data, NBP calculations.

Note: dispersion in forecasts for Survey of Professional Forecasters is equivalent to 90-percent probability of aggregated predictions, while dispersion in forecasts for Bloomberg survey is a difference between maximum and minimum forecasts.



The above indicates that forward guidance was a useful tool for stabilising interest rates. By reducing uncertainty about the level of NBP interest rates over the next few quarters, forward guidance contributed to a

decline in interest rate volatility in the short- and medium term, which in turn was conducive to lower longer-term interest rates.

As incoming data started to point to slowdown in economic activity growth in Poland and an increase in risk of inflation remaining below the target in the medium term, the MPC did not extend the period over which the interest rates should remain unchanged. As a result, expectations of a reduction in NBP reference rate emerged and uncertainty about its level increased. In October the MPC reduced the reference rate by 0.5 percentage points.

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