# **Annual Report 2013**

Banking Sector Liquidity Monetary Policy Instruments of Narodowy Bank Polski



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# Introduction



#### Introduction

In 2013, the monetary policy of Narodowy Bank Polski was pursued in accordance with the *Monetary Policy Guidelines for 2013.* The key objective of the policy, similarly to the previous years, was to maintain inflation at 2.5% in a mid-term horizon while supporting sustainable economic growth.

The primary instrument of monetary policy is the interest rate. By setting the NBP basic interest rates, the Monetary Policy Council determines the yields on the monetary policy instruments. Changes in the NBP reference rate set the course of the monetary policy and affect the market rates. The deposit rate and the lombard rate determine the fluctuation band for overnight interest rates in the interbank market, symmetric to the reference rate.

In 2013, the Monetary Policy Council changed the basic NBP interest rates six times, including the reference rate, within the corridor for fluctuations in short-term market rates of +/-1.5 percentage point. As at the end of 2013, the reference rate stood at 2.50%, the deposit rate at 1.00%, and the lombard rate at 4.00%. Comparing to the end of the previous year, the interest rates were reduced by 1.75 percentage point.

NBP manages the banking sector liquidity and implements the adopted monetary policy guidelines by carrying out open market operations. In 2013, the main open market operations involved the issuance of 7-day NBP bills, on a regular basis, while fine-tuning operations consisted in the regular (on the last working day of the reserve maintenance period) and ad-hoc issuance of the NBP bills with shorter maturities. The yield on those securities was determined at the level of the NBP reference rate.

Access to all main and fine-tuning open market operations was granted to the banks complying with the terms and conditions set by NBP, whereas access to main operations was also granted to the Bank Guarantee Fund.

At the beginning of 2013, fifteen commercial banks, the most active in the money market and foreign currency markets, had the status of a Money Market Dealer. Four banks lost this status during the year.

In 2013, commercial banks made use of standing facilities put at their disposal by NBP, which facilitated current liquidity management. Banks were able to cover liquidity shortages via marginal lending facility and to deposit excess funds with NBP via overnight deposit facility.

In 2013, NBP did not carry out any structural operations targeted at long-term change in the banking sector liquidity.

A very intense increase of banking sector liquidity at the turn of 2012 and 2013 (by nearly PLN 22 billion in the period November 2012 – January 2013, of which PLN 21.2 billion as a result of purchase of foreign currency by NBP in this period) caused that the average annual value of short-term liquidity of the banking sector in 2013 amounted to PLN 126,541 million, which means the increase of PLN 30,235 million, i.e. by 31.4% compared to the previous year. On the other hand, throughout 2013, the level of short-term liquidity underwent

**Table I.** Open market operations, repo operations, FX swaps and standing facilities in the years 2001–2013 (in PLN million)

			Standing facilities				
Period	NBP bills	Repos	FX swaps	deposit facility	marginal lending facility	balance (deposit - credit)	
2013	126 078	0	0	463	0	463	
2012	95 913	0	0	393	0	393	
2011	95 217	0	0	711	0	711	
2010	74 968	5 097	0	1 036	0	1 036	
2009	31 873	11 456	1 076	2 461	14	2 447	
2008	11 530	2 135	162	1 421	14	1 407	
2007	19 302	-	-	530	18	512	
2006	19 758	_	-	150	50	100	
2005	16 699	-	-	162	29	133	
2004	5 275	_	-	310	22	288	
2003	6 251	-	-	167	34	133	
2002	10 565	_	-	80	170	-90	
2001	14 701	-	-	715	234	481	

Note: the values are quoted in annualized terms in the reserve maintenance periods. Source: NBP.

**Table II.** Market rates in the years 2001–2013

Period	Average reference	Deviation of rates from reference rate in basis points (annual average)**					
	rate (in %)*	O/N	SW	2W	1M	POLONIA	
2013	2.94	8	5	5	7	18	
2012	4.61	10	3	5	11	21	
2011	4.22	21	3	3	9	43	
2010	3.50	49	17	10	7	69	
2009	3.77	69	23	14	11	89	
2008	5.72	30	16	19	30	32	
2007	4.40	19	9	11	16	23	
2006	4.06	10	6	6	7	16	
2005	5.34	21	6	6	9	29	
2004	5.79	40	11	10	15	_	
2003	5.67	28	8	7	9	-	
2002	8.82	90	60	_	32	_	
2001	16.13	142	-	-	42	-	

<sup>\*</sup> Average reference rate was weighted by its duration.

slight fluctuations (in the range of PLN 123.5–129.0 billion) and its growth December 2013 to December 2012 amounted to PLN 6.6 billion.

The year 2013 saw the volatility of the POLONIA rate decrease compared to its level in 2012. As the result of basic open market operations as well as regular and irregular fine-tuning operations, used to stabilize market interest rates in periods of increased volatility, the average absolute deviation of the POLONIA rate from the reference rate in 2013 was 18 bps versus 21 bps in 2012, while its volatility (measured by standard deviation) declined to 20 bps from 21 bps in 2012.

<sup>\*\*</sup> Deviations of rates from the reference rate – an uniform basis of 365 days per year was used. Source: NBP.

The solution used by NBP, favouring the reduction of fluctuations in short-term interest rates and stabilisation of the banking sector liquidity is the required reserve system. In 2013, as in previous years, the banks were obliged in the required reserve period to maintain on the accounts with NBP funds at an average level not lower than the required reserve. In 2013, the basic required reserve rate did not change and amounted to 3.5%.

Changes in autonomous factors influencing the banking sector liquidity resulted in fluctuations in the level of the banking sector liquidity in the respective months of 2013.

In particular, liquidity was driven by factors such as purchase of foreign currencies by NBP and transfer of part of the NBP's profit to the State Budget.

Among factors conducive to reducing the level of liquidity, the increase in currency in circulation and the rise in the required reserve ratio were of prime significance.

# Banking sector liquidity



## Banking sector liquidity

#### 1.1. Liquidity developments in 2013

In 2013, monetary policy was conducted – as in previous years – in conditions of excess liquidity of the banking sector. Short-term liquidity of the banking sector (measured by the balance of issuance of the NBP bills and standing facilities) slightly fluctuated in the particular months of 2013 and ranged PLN 123.5–129.0 billion. Figure 1.1 shows the development of short-term liquidity in average monthly terms.

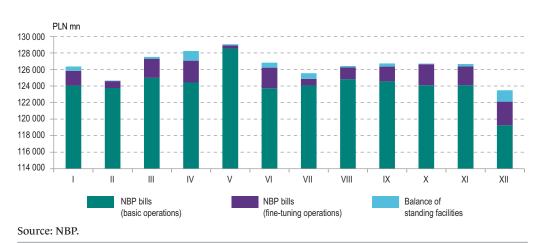


Figure 1.1. Short-term liquidity of the banking sector in 2013

In December 2013, the average level of short-term liquidity of the banking sector reached PLN 123,485 million and was higher by PLN 6,562 million, which is by 5.6%, comparing with December 2012.

Among the most important autonomous factors contributing to liquidity growth was the purchase of foreign currencies by NBP from the European Union funds (in particular structural funds and Common Agricultural Policy) and the purchase of foreign currencies from the Ministry of Finance's foreign currency account held with NBP. The total balance of the purchase and sale of foreign currencies increased the liquidity of the banking sector on average by PLN 12,077 million comparing December 2013 to December 2012. It should be mentioned that the purchase of foreign currencies by NBP was mainly observed in the first half of 2013, while in the second half of the year the purchase was relatively low. In the second half of the year (especially after consolidation of currency accounts), the Ministry of Finance converted foreign currencies mostly in the domestic money market, not at the central bank.

The increase in the banking sector liquidity was largely driven by the amount paid from the 2012 profit of Narodowy Bank Polski to the State Budget on 25 June 2013 amounted to PLN 5,264 million.

**Table 1.1.** Absorption of short-term liquidity as part of operations executed by NBP in 2013 (in PLN million)

2013	Average level of 7-day NBP bills	Average level of 1-, 2-, 3-, 4-day NBP bills	Average level of overnight deposit	Average level of marginal lending facility	Average level of short-term banking sector liquidity
	(1)	(2)	(3)	(4)	(1) + (2) + (3) + (4)
- 1	124 048	1 789	526	0	126 363
II	123 761	837	58	-1	124 655
III	124 987	2 313	226	0	127 526
IV	124 424	2 646	1 157	0	128 227
V	128 538	371	143	-4	129 048
VI	123 736	2 484	604	0	126 824
VII	124 067	810	673	-1	125 549
VIII	124 829	1 430	167	0	126 426
IX	124 561	1 785	382	0	126 728
Χ	124 093	2 536	82	0	126 711
XI	124 085	2 282	295	0	126 662
XII	119 256	2 857	1 372	0	123 485
On average	124 232	1 846	463	0	126 541

Notes: average values over required reserve maintenance periods. Positive values denote the absorption of zloty liquidity from banking sector, while negative values denote the supply of zloty liquidity to the banking sector.

Source: NBP.

The payments made by NBP to the banking sector coming from the discount of the NBP bills and required reserve remuneration (these payments amounted to PLN 4,764 million in the year) caused the increase of banking sector liquidity.

The currency in circulation growth was one of the factors decreasing the liquidity surplus in 2013. The average increase comparing December 2013 to December 2012 was PLN 12,414 million. Its annual growth rate amounted to 10.9% in December 2013. A particularly rapid increase was recorded in May, July and December.

Another important factor reducing liquidity surplus was an increase in the level of banks' reserve requirement by PLN 1,850 million, resulting from the increase in the zloty and foreign currency deposits, which constituted the basis for the calculation of the required reserve.

The central bank absorbed the liquidity surplus by issuing the NBP bills with a maturity of 7 days as main open market operations (the average amount in 2013 was PLN 124,232 million), and the NBP bills with shorter maturities as fine-tuning operations (the average value in 2013 amounted to PLN 1,846 million). 25 fine-tuning open market operations were executed in 2013.

The excess funds, not invested in open market operations with NBP, were placed by commercial banks as overnight deposits. In 2013 an average deposit amounted to PLN 463 million.

In 2013, there were no significant changes in the structure of deposits on the interbank market. As in previous years, the vast majority of transactions on the interbank deposit market in 2013 was concluded for periods of several days (up to a week). In particular months, the share of O/N deposits in the total market turnover ranged from 75–86%, the share of deposits concluded for one day (T/N and S/N) was within the range of 4–7%, while the share of deposits concluded for a period of 2 to 7 days ranged between 9–15% of the total turnover.

#### 1.2. Impact of autonomous factors on changes in banking sector liquidity

#### 1.2.1. Purchase and sale of foreign currencies by NBP

As in the previous year, the purchase and sale of foreign currencies by NBP had the largest impact on the liquidity increase of the banking sector in 2013.

The purchase of foreign currencies by NBP was related to:

- the use of EU aid funds in the amount of PLN 20,993 million (foreign currency valued at PLN 38,139 million was purchased this way in 2012),
- servicing of foreign debt of the State Treasury in the amount of PLN 2,344 million (foreign currency valued at PLN 3,653 million was purchased this way in 2012),
- services provided to the central government entities whose accounts are held with NBP in the amount of PLN 2,410 million (foreign currency valued at PLN 721 million was purchased this way in 2012).

In 2013, the purchase of foreign currency by NBP took place irregularly and its size showed a downward trend (in Q1 – PLN 11,016 million, in Q2 – PLN 6,847 million, in Q3 – PLN 3,127 million and in Q4 – PLN 3 million). This situation was a result of a change in the management of foreign currency by the Ministry of Finance and converting a part of foreign currency to the domestic currency directly on the market.

The limited (compared to 2012) purchase of foreign currency by the central bank during the year supported the stabilisation of liquidity of the banking sector.

The sale of foreign currencies by NBP was a result of:

- the conversion to foreign currency of the membership fee paid to the account of the European Commission (EC) in the amount of PLN 17,752 million (compared to PLN 16,106 million in 2012),
- services provided to the central government entities, whose accounts are held with NBP in the amount of PLN 2,834 million.

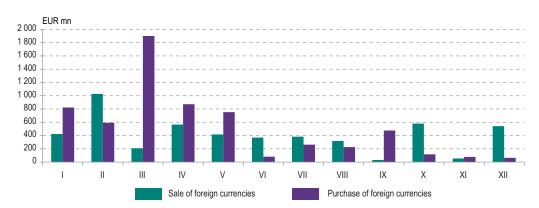


Figure 1.2. Purchase and sale of foreign currencies by NBP in 2013

Source: NBP.

In 2013, the sale of foreign currency by NBP developed relatively evenly. The largest amount of currencies was sold in February. This was the result of conversion into euro of a substantial part of the membership fee paid to the budget of the European Union by Poland. In 2013 Q1, the European Commission may convert into euro funds received in the domestic currency of a country up to the amount of 5/12 of the country's annual fee.

## FX operations carried out by the central bank as part of its currency purchase and sale activities in 2013

#### Transactions connected with the membership in the European Union

The aid funds coming from the EU remain at the disposal of the Ministry of Finance. Such funds are earmarked for programmes and projects relating to the reduction of differences in the economic development of particular regions in Poland. The majority of funds are used by the final beneficiary in the domestic currency, following a prior conversion to PLN.

In 2013, funds received by Poland as a part of the Common Agricultural Policy (CAP) and structural funds were converted into PLN at NBP. The conversion of EUR into the domestic currency to be allocated for the development of agriculture amounted to PLN 6,412 million and was performed mainly in January, March and April. Operations related to the use of structural funds were performed in NBP until the consolidation of currency funds of the Ministry of Finance, i.e. to 25 September 2013. Until that day the value of conversions in NBP amounted to PLN 14,581 million.

The sale of foreign currencies by NBP was connected with the conversion of the membership fee paid to the account of the European Union budget in PLN. In 2013, the conversion of the membership fee to EUR amounted to the equivalent of PLN 17,752 million.

#### Foreign operations of the State Treasury

The purchase and sale of foreign currencies by NBP related to servicing of the Treasury's foreign liabilities and receivables also influence the banking sector liquidity. In 2013, as in the previous year, NBP did not sell foreign currencies to the Ministry of Finance because all the Treasury's foreign liabilities were settled with the funds from the Ministry's foreign currency account with the central bank. Funds on this account came from the issuance of the Treasury bonds by the Ministry of Finance on foreign markets (in the amount equal to EUR 2,434 million) and loans incurred at international financial institutions (in the amount equal to EUR 2,670 million).

Payments made from funds on the foreign currency account related to liabilities due to holders of international Treasury bonds (EUR 5,361 million) and repayments of incurred foreign loans, payment of shares and other transactions (EUR 1,228 million).

In 2013, the purchase by NBP of foreign currencies from the Ministry of Finance related to:

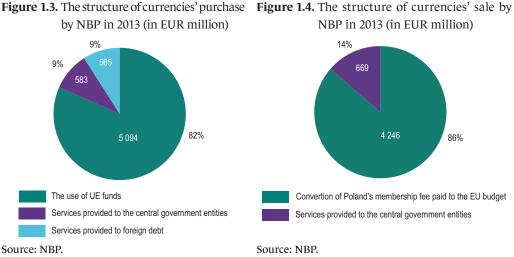
- loans received from international monetary institutions and extended to other states,
- the issuance of bonds on the international markets,

- the use of a part of funds from the MF currency account with NBP to finance the current budgetary needs.

The total volume of these transactions in 2013 amounted to the equivalent of EUR 565 million.

#### Services to central government entities

Apart from foreign currency operations related to servicing foreign liabilities and receivables of the State Treasury and transactions involving the use of EU funds, the central bank carried out foreign currency operations with entities authorised to purchase or sell foreign currencies at the central bank under bank account agreements. In 2013, the value of transactions consisting in the purchase of foreign currencies by NBP amounted to the equivalent of PLN 2,410 million while the sale of foreign currencies by the central bank under this category of agreements amounted to the equivalent of PLN 2,834 million.



#### 1.2.2. Currency in circulation

In 2013, the average level of currency in circulation came to PLN 120,049 million, which represents an increase of PLN 7,777 million (that is 6.93%) year-on-year. In 2013, currency in circulation reflected the reductions in interest rates to the lowest levels in history. The higherthan-usual average increase in currency in circulation observed in the period of March-July fell within the range from PLN 2,104 million (April) to PLN 2,786 million (July). The total increase of currency in circulation in this period amounted to PLN 12,079 million. In the corresponding period of the previous year this increase was two times lower and reached PLN 5,579 million.

The level of currency in circulation was also influenced by factors of a seasonal nature, which explain the changes in the level of currency in circulation in selected periods (from weekly to yearly seasonality as well as increases observed in holiday periods).

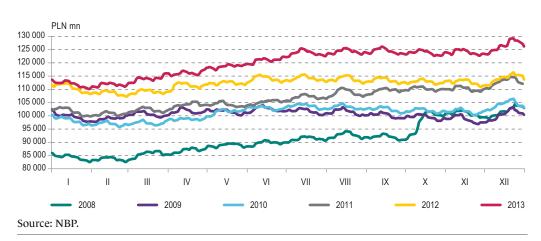
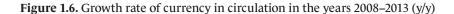
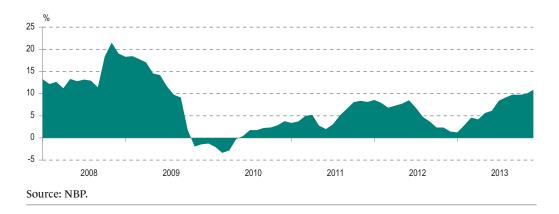


Figure 1.5. Currency in circulation in the years 2008–2013





Steady increases in the annual currency in circulation growth (y/y) were observed during almost the entire 2013 (except for April and October). This rate was in the range from 1.2% (January) to 10.9% (December).

The average level of currency in circulation in December 2013 was PLN 126,523 million, which constituted an increase by PLN 12,414 million compared to December 2012. Furthermore, in the last month of 2013, the average level of currency in circulation increased by PLN 2,518 million comparing to November average level and was higher comparing to the previous year, which amounted to PLN 1,384 million. The December growth in the currency in circulation was of a seasonal nature and resulted from a higher demand for cash due to extensive Christmas shopping.

#### 1.2.3. Public sector deposits held with the central bank

Public sector deposits on account with the central bank include mainly funds on current accounts and term deposits of the State Budget.

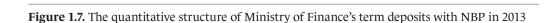
The level of public sector deposits with NBP was an outcome of the following:

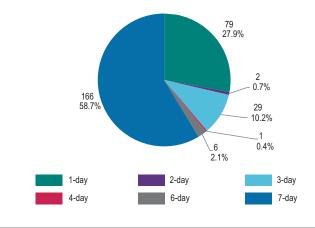
- changes in the volume of budgetary incomes and expenses,
- settlements resulting from the issue and redemption of State Treasury securities,
- funds coming from the MF's foreign currency account with NBP converted into PLN,
- limits set for the Ministry of Finance's PLN term deposits with the central bank,
- flows of funds between Poland and the European Union (including, among others, payment of Poland's membership fee to the EU budget and disbursement of the EU funds),
- the rate of use of the EU funds,
- payments resulting from servicing other transactions connected with the State Budget's borrowing needs,
- payment of a part of the NBP's profit to the State Budget.

In 2013, all elements of public sector deposits showed a downward trend. The average level of public sector deposits in 2013 stood at PLN 3,645 million and was lower by PLN 623 million comparing to the previous year (PLN 4,268 million). The average level of the public sector deposits held on current accounts with NBP amounted to PLN 2,413 million (against PLN 2,533 million in 2012), while the Ministry of Finance's term deposits with NBP representing a significant item in the structure of public sector PLN deposits (33.7%) amounted to PLN 1,227 million against PLN 1,736 million (40.7%) in 2012.

The Ministry of Finance invested surplus funds of the State Budget on a temporary basis in the form of PLN deposits for periods of 1 to 7 days with NBP. A total of 283 deposits were made in 2013. Surplus funds of the Ministry of Finance were most often deposited for the periods of: 7 days (166 deposits, i.e. 58.7% of all deposits), 1 day (79 deposits, i.e. 27.9% of all deposits) and 3 days (29 deposits, i.e. 10.2% of all deposits). The remaining of part were deposits for the periods of 2, 4 and 6 days.

In 2013, the average level of the Ministry of Finance's term deposits with NBP showed a similar tendency as in the previous years, i.e. temporary increases (in April and July to PLN 2.3 billion, in October to PLN 1.7 billion). The increases were related to the temporary increase of the Ministry of Finance's deposits with NBP (to the level of PLN 4.5 billion, similarly to 2012). This stemmed from the need of the Ministry of Finance to accumulate funds





Source: NBP.

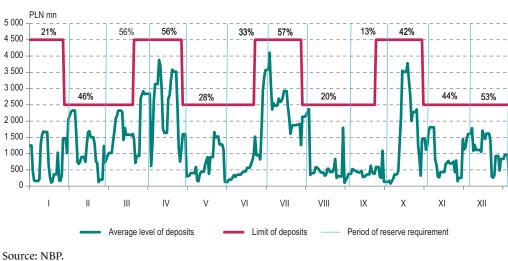


Figure 1.8. The use of the limit for Ministry of Finance's deposits with NBP in 2013

in PLN due to the redemption of Treasury Bonds (OK0113) on 25 January 2013, (PS0413) on 25 April 2013, (OK0713) on 25 July 2013, and (DS1013) and (PP1013) on 24 October 2013.

In 2013 the value of deposits amounted to 39.4% of the daily limit (comparing to approximately 53.4% in 2012). The largest use of the deposit limit (above 50%) was recorded in March, April, July and December 2013.

In 2013, as in the previous year, part of funds from the State Budget was invested in the interbank market through Bank Gospodarstwa Krajowego (on average PLN 10,859 million per year). The Ministry of Finance invested these funds in the interbank market of uncollateralised term deposits as well as in the form of transactions collateralised with Treasury bonds.

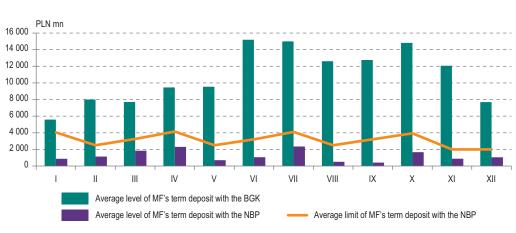


Figure 1.9. The average level of Ministry of Finance's term deposits in 2013

Source: NBP.

The Ministry of Finance transferred most of the funds to the banking sector between June and November 2013 – on average, almost PLN 13.7 billion per month against almost PLN 13.0 billion in the same period last year. In 2013, the average level of deposits of the Ministry of Finance invested with commercial banks was higher by PLN 1,488 million (i.e. approximately 16%) comparing with the previous year.

Additionally, in 2013, the Ministry of Finance placed surplus funds through Bank Gospodarstwa Krajowego as deposit facility with NBP (on average PLN 146 million per year).

# Monetary policy instruments



## Monetary policy instruments

#### 2.1. Interest rate

The short-term interest rate is the primary instrument of the monetary policy; the NBP reference rate determines the yield on main open market operations, affecting at the same time the level of short-term market interest rates. Changes in the NBP reference rate stem from the course of the monetary policy pursued by the central bank. The NBP deposit and lombard rates set the fluctuation band of the overnight interest rate in the interbank market.

In 2013, the Monetary Policy Council six times made the decision to decrease the NBP basic interest rates, including the reference rate, maintaining a symmetrical corridor of +/-1.5 percentage point for fluctuations of short-term market rates which is set by the deposit and lombard rates. As at the end of 2013, the reference rate dropped to its lowest historical level, i.e. 2.50%, which was 175 basis points lower than the level at the end of 2012. A similar scale of changes applied to the deposit and the lombard rates.

**Table.2.1.** Annualised the NBP basic interest rates in 2013 (in %)

Applicable from:	Reference rate	Lombard rate	Deposit rate
10.01.2013	4.00	5.50	2.50
07.02.2013	3.75	5.25	2.25
07.03.2013	3.25	4.75	1.75
09.05.2013	3.00	4.50	1.50
06.06.2013	2.75	4.25	1.25
04.07.2013	2.50	4.00	1.00

Source: NBP.

#### 2.2. Required reserve

In the year 2013 there were no changes in the required reserve system. In the reserve maintenance period, banks were obliged to maintain average balances on accounts with NBP equivalent to, at least, the amount of the required reserve. Such a solution was conducive to stabilising the short-term interest rates.

The required reserve ratio in 2013 was 3.5% on all liabilities, except for funds received from repo and sell-buy back transactions, on which the required reserve ratio was 0%.

The required reserve as at 31 December 2013 amounted to PLN 31,876 million and was higher by PLN 1,957 million – an increase of 6.5% – comparing to the level as at 31 December 2012.

Banks' required reserve funds maintained on accounts with NBP were remunerated at 0.9 of the NBP rediscount rate. In 2013 the average interest rate on reserve holdings was 2.87% against 4.37% in 2012. This decrease resulted from the changes in the rediscount rate, whose average level decreased from 4.86% in 2012 to 3.19% in 2013.

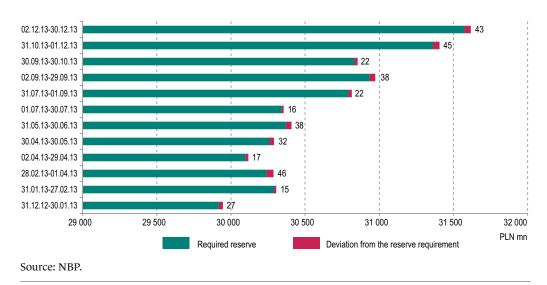


Figure 2.1. Changes in the required reserves and deviations from the reserve requirement in 2013

In 2013, in all the reserve maintenance periods banks recorded a small surplus of the average holdings on banks' accounts as compared to the required reserve, ranging from PLN 14.8 million in February (the lowest surplus) to PLN 46.1 million in March (the highest surplus). The mean balance on the bank accounts deviated from the reserve requirements by PLN 30.1 million accounting for 0.10% of the average reserve requirement level in 2013.

Instruments facilitating management of funds kept by banks on their accounts with NBP (deposit facility, marginal lending facility and intraday credit facility), as well as the remuneration of reserve funds only up to the amount of the required reserves, supported minimisation of reserve holdings held above the level of the required reserve in the respective reserve periods.

The year 2013 recorded two cases of non-compliance with the reserve requirement by commercial banks. In 2013, all cooperative banks maintained the required reserves.

#### 2.3. Open market operations

In 2013, the following open market operations represented the key instrument used to shape market interest rates:

- main operations in the form of a regular issuance of the NBP bills, usually with a maturity of 7 days,<sup>1</sup>
- fine-tuning operations in the form of the issuance of the NBP bills with maturities shorter than those of main operations (1-, 2-, 3-, and 4-day).

<sup>&</sup>lt;sup>1</sup> In 2013, regular operations with 8-day maturity were carried out on 2 May and 31 October, while operations with 6-day maturity on 19 April and 25 October.

#### 2.3.1. Main operations

In 2013, NBP carried out main open market operations which consisted in issuance of the NBP bills with a maturity of 7 days. The NBP bills were issued regularly once a week, on Fridays. As in the previous year, access to main open market operations was available to all banks participating in the SORBNET system with an account in the Securities Register operated by NBP and equipped with the ELBON application, as well as the Bank Guarantee Fund. Tenders for the NBP bills had a settlement period of t + 0 and the yield equal to the NBP reference rate.

In 2013, the average level of the NBP bills issued under the main operations amounted to PLN 124,232 million and was higher by PLN 29,901 million as compared to the average level in 2012. In 2013, the central bank offered the NBP bills for sale under the main operations of the value of PLN 6,677,200 million. In that period, the bids received from banks amounted to PLN 6,504,788 million, while the value of bids accepted by the central bank amounted to PLN 6,470,595 million.



Figure 2.2. The NBP bills – supply and demand in 2013

Note: only main open market operations included.

Source: NBP.

Although the cumulative values of supply and demand were at similar levels in 2013, at individual tenders the assessment of liquidity conditions by commercial banks and by the central bank differed. Additionally, commercial banks have their own individual liquidity management policies which do not have to be consistent with the NBP's policy. Therefore, both overbidding and underbidding occurred, with predominance of the latter. During the year, the ratio of commercial banks' demand for the NBP bills in individual tenders in comparison to the supply offered by NBP fluctuated between 0.849 and 1.051.

#### 2.3.2. Fine-tuning operations

In 2013, the banking sector liquidity level measured by issue of the NBP bills remained within a narrow band, ranging on average from PLN 122,113 million to PLN 128,909 million during the reserve maintenance period. At the same time, continued distrust between contractors in the interbank market resulted in conservative investments by banks in open

market operations. In 2013, in order to mitigate the impact of changes in banking sector liquidity conditions on short-term market interest rates, NBP launched fine-tuning operations at least once per month by issuing the NBP bills with maturities shorter than in the case of main operations. There were two types of these operations. The first type were operations carried out on the last day of the reserve period. Their goal was to balance the liquidity conditions in the banking sector on average in the entire required reserve maintenance period. Additionally, where necessary, open market operations were conducted at some point during the month in order to level market interest rates against the reference rate.

All fine-tuning operations carried out in 2013 were aimed at absorbing liquidity from the banking sector.

In 2013, NBP conducted 25 fine-tuning operations, out of which 12 at the end of the reserve maintenance period. The average level of the NBP bills under this type of operations equalled to PLN 1,846 million and exceeded the average level in 2012 by PLN 264 million. In 2013, the central bank offered for sale in fine-tuning operations bills amounting to PLN 352,500 million. Bids received from banks in that period amounted to PLN 269,006 million, whereas bids accepted by the central bank amounted to PLN 265,745 million.

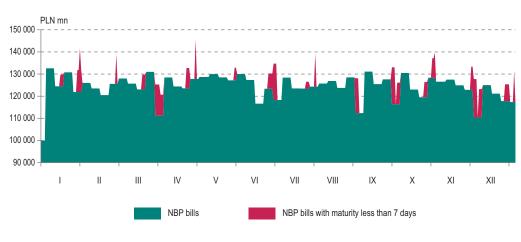


Figure 2.3. Operations curried out by NBP in 2013

Source: NBP.

#### 2.3.3. Structural operations

The goal of structural operations is a long-term change in the liquidity of the banking sector. In 2013, NBP did not conduct operations of this type.

#### 2.4. Standing facilities

Standing facilities enabled banks to invest surplus liquidity (deposit facility) and cover their short-term liquidity needs (marginal lending facility). These operations were conducted with an overnight maturity on the initiative of commercial banks and were aimed at stabilising interbank liquidity level and short-term market rates.

The lombard interest rate set the maximum price of funds obtained from NBP, indicating at the same time the ceiling of rate fluctuations in the interbank market, while the interest rate on deposit facility set the floor for the rate fluctuations.

#### 2.4.1. Deposit facility

In 2013, the total value of the deposit facility amounted to PLN 169 billion and was higher by 18.23% comparing to deposits placed in 2012. The total value of a single deposit placed by banks with the overnight facility ranged from PLN 670 thousand to PLN 8,890 million. Its average daily level amounted to PLN 463 million against PLN 393 million in the previous year. Banks invested the largest funds on the last days of the required reserve maintenance periods.

PLN mn

-1 000

-2 000

-3 000

-4 000

-5 000

-7 000

-8 000

-9 000

-10 000

I II III IV V VI VII VIII IX X XI XII

Figure 2.4. The use of deposit facility in 2013

#### 2.4.2. Marginal lending facility

Source: NBP.

In 2013, banks were able to make use of the marginal lending facility collateralised with securities in order to provide current liquidity to current accounts with NBP. The total value of the lombard credit amounted to PLN 163 million throughout the year, and was almost 8 times larger than in 2012 (PLN 21 million). Its average daily use came to the amount of PLN 448 thousand against PLN 56 thousand in 2012.

# Other operations



## Other operations

#### 3.1. Intra-day credit facility

Intraday credit facility is an instrument that makes it easier for banks to manage liquidity during the operating day and to make interbank settlements at NBP. It is a non-interest bearing facility collateralised with securities that is taken and repaid on the same operating day. In 2013, daily provision of operating liquidity to banks ranged from PLN 33,870 million to 57,118 million. The use of this facility decreased by 1.31% comparing to 2012 and amounted to PLN 40,070 million on average throughout the year.

#### 3.2. Intra-day credit facility in euro

Intraday credit facility in euro is an instrument that ensures the liquidity of settlements in the TARGET2-NBP system. The loan collateralised with Treasury bonds accepted by the ECB is incurred and repaid during an operating day. In 2013, as in the previous year, daily provision of operating liquidity to the bank amounted to approximately EUR 10 million. The drawing on the facility remained at the level from 2012, i.e. EUR 2,550 million.

# **POLONIA** rate



#### **POLONIA** rate

In line with the *Monetary Policy Guidelines*, in 2013 NBP strove – through open market operations – to make POLONIA<sup>2</sup> rate run close to the NBP reference rate. In 2013 the gap between the POLONIA rate and the NBP reference rate further narrowed comparing to previous years. The changes took place amidst the persistent tensions in the global financial markets (however, the intensity of these tensions decreased), which continued to limit efficiency of the domestic interbank depo market. Above mentioned constrains were reflected in, among others, banks' heightened caution in managing their liquidity positions, together with a concurrent tendency to manage liquidity on an overnight basis as well as the preference for building up temporary liquidity buffers by the participants of the interbank market.

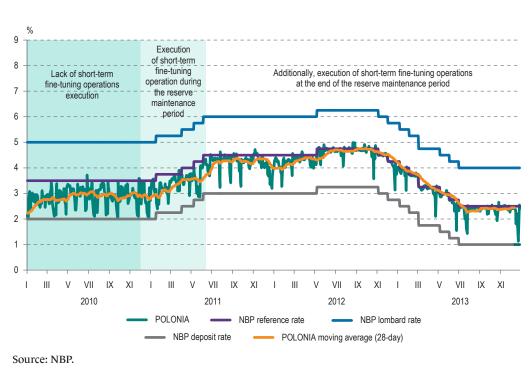
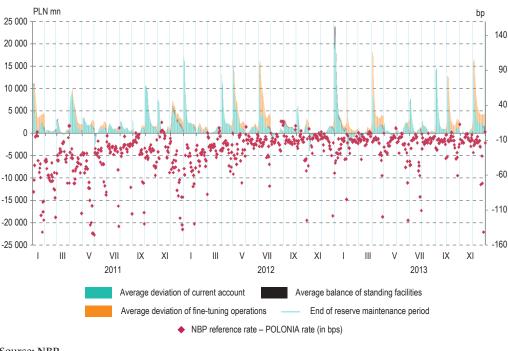


Figure 4.1. POLONIA rate and the NBP rates in the years 2010–2013

In 2013, lower spread between POLONIA rate and the NBP reference rate as well as limitation of its volatility were recorded. Particularly noteworthy is the fact that in 2013 the scale of deviation of the POLONIA rate from the NBP reference rate was also lower from the levels representing the period before the escalation of the financial crisis, i.e. before October 2008. The average absolute deviation of the POLONIA rate from the NBP reference rate in 2013 was 18 bps, as compared to the average of 24 bps in 2007, 19 bps in the period of January-September 2008 and 21 bps in 2012. The standard deviation of the POLONIA rate in 2013

<sup>&</sup>lt;sup>2</sup> POLONIA (Polish Overnight Index Average) is an average overnight market rate weighted by the volume of transactions concluded on the unsecured interbank depo market.



**Figure 4.2.** Volatility of POLONIA rate compared to the use of selected monetary policy instruments in the years 2011–2013

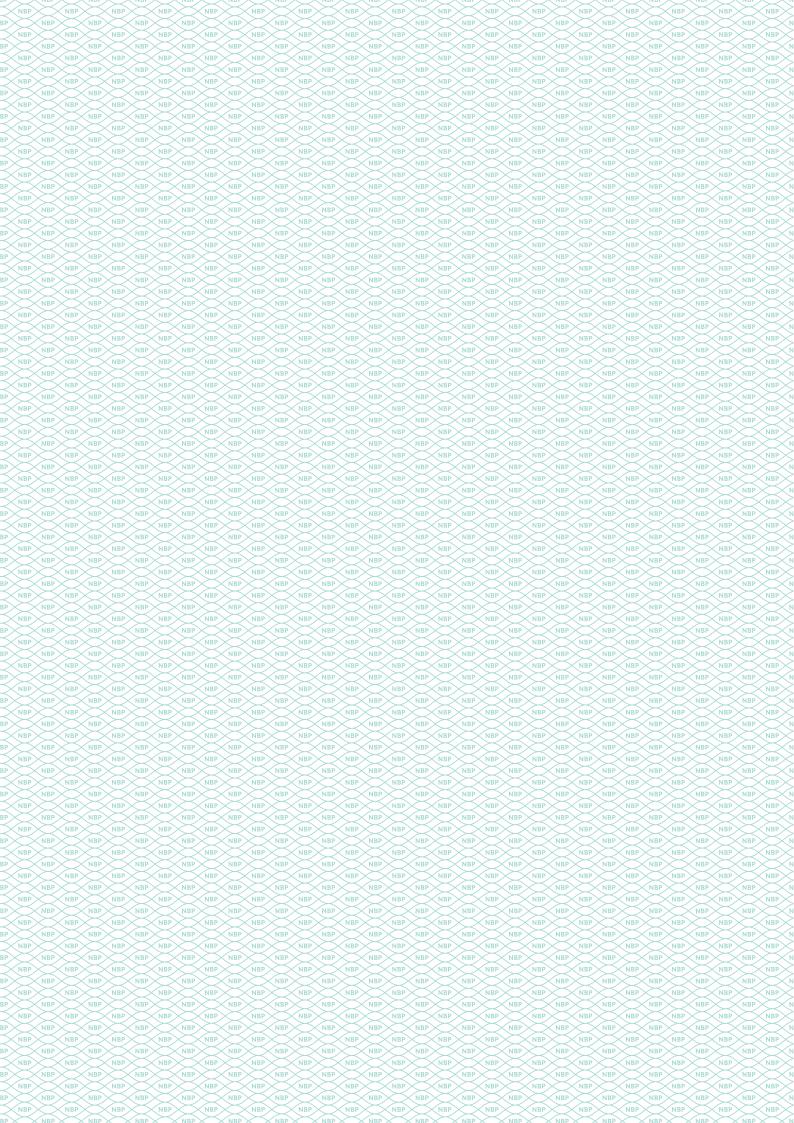
Source: NBP.

was 20 bps, as compared to 45 bps in 2007, 33 bps in the period of January-September 2008 and 21 bps in 2012.

The improvement with respect to steering the POLONIA rate by the central bank in the recent years may partially be attributed to the gradual stabilisation of the situation in the interbank market. Despite that, it should be noted that so far this market has not reached its full efficiency (from before the crisis), which continued to limit the effectiveness of NBP in the realisation of the monetary policy objective.

Given the above, the central bank decided to introduce modifications to the monetary policy operational system. The key influence on narrowing the gap between POLONIA rate and the NBP reference rate and limiting volatility of POLONIA rate has had an introduction of short-term fine-tuning open market operations (conducted irregularly within the required reserve maintenance period and quasi-regularly on its last working day). As a result of the said actions the liquidity conditions were gradually becoming balanced on average over the required reserve maintenance period, which limited the banks' need to use standing facilities offered by NBP.

The fact that NBP continued to apply the above-mentioned approach to banking sector liquidity management resulted in greater confidence of commercial banks in the central bank's actions aimed at balancing the liquidity conditions in the banking sector. As a consequence, banks assumed that, if need be, NBP would intervene in the monetary market by means of a relevant fine-tuning operation. This assumption was taken into account in quotations of the price of money on the interbank market, which was reflected in the POLONIA rate becoming closer to the level of the NBP reference rate.



# Glossary



### **Glossary**

**Banking sector short-term liquidity** – liquidity defined as the balance of open market operations conducted by NBP, i.e. main and fine-tuning operations as well as foreign exchange swaps and standing facilities.

**Deposit facility** – an instrument which enables banks to deposit their liquidity surplus on an overnight basis with the central bank. The interest rate on that deposit constitutes the lower limit for market rate quoted for that particular period.

**Fine-tuning operations** – operations, which may be conducted by NBP in order to limit the impact of changes in the banking sector liquidity conditions on the short-term market interest rates.

**Foreign exchange swaps** – operations under which NBP is able to purchase (or sell) the zloty for foreign currencies, in the spot market and simultaneously to resell (or repurchase) the zloty under forward transaction on a specific value date.

**Intraday credit facility (PLN or EUR)** – a non-interest bearing credit facility which enables banks to obtain funds on an intraday basis, collateralised with securities accepted by the central bank. It is an instrument, which allows commercial banks to manage intraday liquidity.

**Main operations** – operations conducted, as a standard, on a regular basis (once a week). In the context of the banking sector liquidity surplus, they consist in the issue of NBP bills, typically with a 7-day maturity. During tenders, a fixed yield at the level of the NBP reference rate is binding.

Marginal lending facility (lombard credit) – an instrument which enables commercial banks to obtain credit on an overnight basis. The interest on that facility indicates the marginal cost of obtaining funds from the central bank. It is collateralised with securities accepted by the central bank.

**Money Market Dealers** – banks that are the most active in the money and foreign exchange markets, with which NBP enters into contracts on acting as the Money Market Dealer. In addition to the access to the main open market operations, these banks are involved in fine-tuning operations. Money Market Dealers participate in the fixing of the WIBOR and the WIBID reference rates, provide NBP with information concerning overnight transactions concluded on a given day, which are the base for the POLONIA rate fixing.

**NBP deposit rate** – determines the interest rate on deposits with NBP. It sets the floor for fluctuations of the overnight market rate. The deposit rate and the lombard rate create the corridor for the overnight rate fluctuations which is symmetric to the central bank's reference rate.

**NBP lombard rate** – determines the costs of funding obtainable from the NBP. It sets the ceiling for the growth in the overnight market rate.

**NBP reference rate** – determines the yield obtainable on the main open market operations, affecting at the same time, the level of short-term market interest rates.

**Open market operations** – a principal instrument of the central bank which is used to maintain short-term market interest rates at a level consistent with the NBP reference rate determined by the Monetary Policy Council.

**POLONIA** rate – the POLONIA rate (Polish Overnight Index Average) was introduced by NBP and ACI Polska in early 2005. It is an average overnight rate weighted by the value of transactions in the interbank deposit market. The rate reflects the actual interest rates on short-term interbank deposits. The POLONIA rate is published by NBP in the TM Reuters service (NBPS), Bloomberg service (PZCFPLNI Index) and at the NBP website each day at 5.00 p.m.

The POLONIA rate's fixing is carried out by NBP on each operating day at 4.45 p.m. The participant is obliged to provide the central bank with the list of overnight transactions concluded with other participants and submitted on a given day until 4.30 p.m.

**Repo operations** – short- and long-term refinancing operations aimed to providing liquidity to the banking sector, collateralised with securities approved by NBP.

**Reserve requirement** – a monetary policy instrument used by the central bank, among other things, to regulate the banking sector liquidity and to mitigate volatility of short-term interest rates. The obligation to maintain the reserve is also an element of liquidity management at banks. The reserve requirement is an obligation imposed on banks to maintain a specific average level of funds (set as a percentage) on their accounts with the central bank.

The obligation to maintain required reserve on accounts with NBP applies to banks, branches of credit institutions and branches of foreign banks operating in Poland. The required reserve is maintained in a period-average system. Banks are obliged to maintain an average balance of funds in their accounts with the NBP over the maintenance period at a level not lower than the value of the maintenance requirement. The required reserve is calculated on the basis of returnable funds deposited in bank accounts and the funds obtained from the sale of securities. The basis for the reserve's calculation does not include funds accepted from another domestic bank, obtained from abroad for a minimum of two years and deposited in savings & credit accounts with building societies, as well as funds accumulated at individual retirement accounts or individual pension security accounts. The required reserve is calculated and maintained in zloty. The value of the reserve calculated is diminished by banks by an equivalent of EUR 500 thousand.

**Standing facilities** – operations conducted at the initiative of commercial banks under which commercial banks are able to deposit their liquidity surplus with NBP using deposit facility or reduce short-term liquidity shortage using marginal lending facility.

**Structural operations** – operations conducted in order to change the long-term structure of liquidity in the banking sector. Under these operations the central bank may carry out the following structural operations: issue of bonds, early redemption of bonds, purchase or sale of securities in the secondary market.

**Publication of information in information services** – in the TM Reuters service on the NBPM site and in the Bloomberg service on the NBP18 site, NBP provides banks with information on the current market liquidity situation, specifically concerning:

- banks' current accounts, deposit facility placed with NBP and marginal lending facility (lombard credit) provided by NBP, on a daily basis,
- level of required reserve during a specific reserve maintenance period,
- average balance of banks' current accounts during the required reserve maintenance period,
- forecast of an average daily balance of the current account in the period from the issue date of the NBP bills (under main operations) until the day preceding their maturity. Information on the forecasted average balance of banks' current accounts is published on the TM Reuters at the moment the decision on the value of the NBP bills on offer is taken.

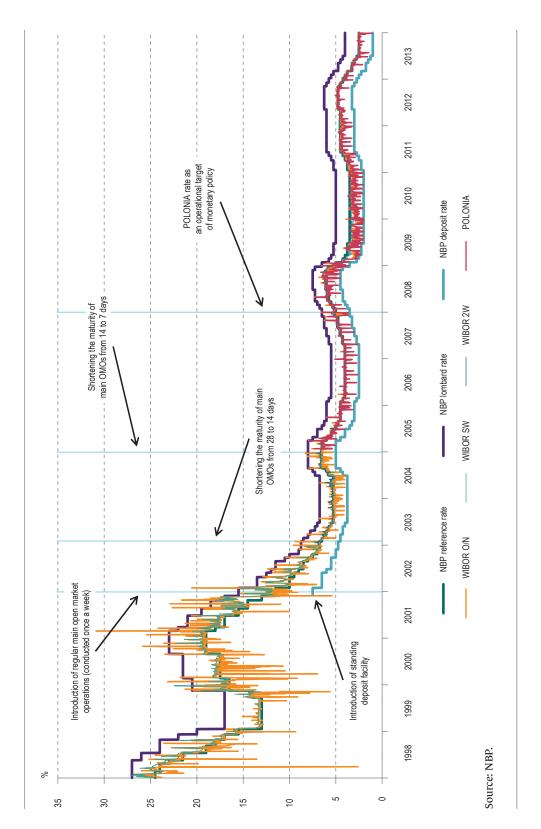
Information on current auctions for NBP bills is also published on the NBPT site of the TM Reuters news service and the NBP19 site of the Bloomberg news service. The outcome of tenders is posted on the NBPU site (TM Reuters) and NBP20 site (Bloomberg).

Current information concerning the liquidity situation and auctions carried out by the NBP under open market operations is regularly published on the NBP website (www.nbp.pl).

## Annexes



Annex 1 Volatility of interest rates in the years 1998–2013



Annex 2 The NBP monetary policy instruments in the years 1990–2013

Required reserves lssue of NBP bills lssue / repurchase of NBP bonds Repo / reverse											
Issue of NBP bills Issue / repurchase of NBP bonds Repo / reverse											
Issue / repurchase of NBP bonds Repo / reverse											
Repo / reverse											
repo operations											
Outright operations											
Loans for central investments											
Rediscount loan											
Marginal lending facility											
Deposit facility											
Loan limits											
Deposits for households											
Intraday credit											
FX swap operations											

Source: NBP.

Annex 3 Main operations in 2013

No.	Tender date*	Maturity date	Maturity period (in days)	Nominal value of sales offers (PLN mn)	Nominal value of offers to buy (PLN mn)	Nominal value of accepted offers (PLN mn)	Average yield on bills annual 365/360 (%)
1	04.01.2013	11.01.2013	7	135 000.00	132 603.10	132 603.10	4.25
2	11.01.2013	18.01.2013	7	130 500.00	124 463.64	124 463.64	4.00
3	18.01.2013	25.01.2013	7	132.000.00	130 777.23	130 777.23	4.00
4	25.01.2013	01.02.2013	7	129 400.00	121 871.94	121 871.94	4.00
5	01.02.2013	08.02.2013	7	126 000.00	127 807.14	126 000.00	4.00
6	08.02.2013	15.02.2013	7	123 500.00	126 929.80	123 500.00	3.75
7	15.02.2013	22.02.2013	7	122 000.00	120 493.00	120 493.00	3.75
8	22.02.2013	01.03.2013	7	126 800.00	125 583.61	125 583.61	3.75
9	01.03.2013	08.03.2013	7	128 000.00	130 587.40	128 000.00	3.75
10	08.03.2013	15.03.2013	7	127 500.00	125 685.94	125 685.94	3.25
11	15.03.2013	22.03.2013	7	127 000.00	123 060.90	123 060.90	3.25
12	22.03.2013	29.03.2013	7	131 000.00	132 661.20	131 000.00	3.25
13	29.03.2013	05.04.2013	7	126 000.00	111 190.78	111 190.78	3.25
14	05.04.2013	12.04.2013	7	130 500.00	128 466.50	128 466.50	3.25
15	12.04.2013	19.04.2013	7	128 000.00	124 397.06	124 397.06	3.25
16	19.04.2013	25.04.2013	6	133 000.00	123 553.01	123 553.01	3.25
17	25.04.2013	02.05.2013	7	137 000.00	127 786.94	127 786.94	3.25
18	02.05.2013	10.05.2013	8	129 000.00	128 683.48	128 683.48	3.25
19	10.05.2013	17.05.2013	7	130 000.00	134 017.47	130 000.00	3.00
20	17.05.2013	24.05.2013	7	128 500.00	130 563.95	128 500.00	3.00
21	24.05.2013	31.05.2013	7	128 000.00	127 162.10	127 162.10	3.00
22	31.05.2013	07.06.2013	7	130 000.00	131 904.40	130 000.00	3.00
23	07.06.2013	14.06.2013	7	128 500.00	127 313.10	127 313.10	2.75
24	14.06.2013	21.06.2013	7	123 500.00	116 613.10	116 613.10	2.75
25	21.06.2013	28.06.2013	7	133 000.00	123 368.20	123 368.20	2.75
26	28.06.2013	05.07.2013	7	127 000.00	118 248.20	118 248.20	2.75
27	05.07.2013	12.07.2013	7	129 000.00	128 404.29	128 404.29	2.50
28	12.07.2013	19.07.2013	7	123 500.00	126 981.22	123 500.00	2.50
29	19.07.2013	26.07.2013	7	127 000.00	123 443.12	123 443.12	2.50
30	26.07.2013	02.08.2013	7	130 000.00	124 318.01	124 318.01	2.50
31	02.08.2013	09.08.2013	7	127 000.00	125 714.43	125 714.43	2.50
32	09.08.2013	16.08.2013	7	127 000.00	126 860.80	126 860.80	2.50
33	16.08.2013	23.08.2013	7	124 500.00	123 734.55	123 734.55	2.50
34	23.08.2013	30.08.2013	7	128 500.00	129 005.68	128 500.00	2.50
35	30.08.2013	06.09.2013	7	128 000.00	112 344.70	112 344.70	2.50
36	06.09.2013	13.09.2013	7	133 000.00	131 109.81	131 109.81	2.50
37	13.09.2013	20.09.2013	7	126 500.00	125 450.46	125 450.46	2.50
38	20.09.2013	27.09.2013	7	130 000.00	127 605.60	127 605.60	2.50
39	27.09.2013	04.10.2013	7	134 000.00	116 392.00	116 392.00	2.50
40	04.10.2013	11.10.2013	7	130 500.00	137 182.20	130 500.00	2.50
41	11.10.2013	18.10.2013	7	123 000.00	123 402.35	123 000.00	2.50
42	18.10.2013	25.10.2013	7	126 000.00	119 524.07	119 524.07	2.50
43	25.10.2013	31.10.2013	6	133 000.00	128 355.50	128 355.50	2.50
44	31.10.2013	08.11.2013	8	127 000.00	126 563.00	126 563.00	2.50
45	08.11.2013	15.11.2013	7	127 500.00	133 150.00	127 500.00	2.50
46	15.11.2013	22.11.2013	7	125 000.00	124 915.50	124 915.50	2.50
47	22.11.2013	29.11.2013	7	127 000.00	122 875.13	122 875.13	2.50
48	29.11.2013	06.12.2013	7	130 000.00	110 397.84	110 397.84	2.50
49	06.12.2013	13.12.2013	7	129 000.00	125 001.25	125 001.25	2.50
50	13.12.2013	20.12.2013	7	126 000.00	121 148.00	121 148.00	2.50
51	20.12.2013	27.12.2013	7	127 500.00	117 774.36	117 774.36	2.50
52 Tatal	27.12.2013	03.01.2014	7	127 000.00	117 340.80	117 340.80	2.50
Iotal	in 2013			6 677 200.00	6 504 787.86	6 470 595.05	

<sup>\*</sup> Day of payment for the NBP bills on the tender date. Source: NBP.

Annex 4 Fine-tuning operations in 2013

No.	Tender date*	Maturity date	Maturity period (in days)	Nominal value of sales offers (PLN mn)	Nominal value of offers to buy (PLN mn)	Nominal value of accepted offers (PLN mn)	Average yield on bills annual 365/360 (%)
1	15.01.2013	18.01.2013	3	13 000.00	5 280.00	5 280.00	4.00
2	28.01.2013	01.02.2013	4	13 000.00	9 925.00	9 925.00	4.00
3	30.01.2013	31.01.2013	1	10 500.00	9 835.58	9 835.58	4.00
4	27.02.2013	28.02.2013	1	13 500.00	13 675.34	13 500.00	3.75
5	19.03.2013	22.03.2013	3	10 000.00	6 650.00	6 650.00	3.25
6	29.03.2013	02.04.2013	4	14 500.00	14 091.97	14 091.97	3.25
7	02.04.2013	05.04.2013	3	17 000.00	9 505.00	9 505.00	3.25
8	22.04.2013	25.04.2013	3	18 000.00	9 190.00	9 190.00	3.25
9	29.04.2013	30.04.2013	1	18 000.00	19 274.99	18 000.00	3.24
10	29.05.2013	31.05.2013	2	6 000.00	5 749.19	5 749.19	3.01
11	24.06.2013	28.06.2013	4	15 000.00	6 900.00	6 900.00	2.75
12	28.06.2013	01.07.2013	3	20 000.00	16 468.37	16 468.37	2.75
13	23.07.2013	26.07.2013	3	8 000.00	3 100.00	3 100.00	2.50
14	30.07.2013	31.07.2013	1	15 000.00	16 384.65	15 000.00	2.48
15	30.08.2013	02.09.2013	3	16 000.00	15 733.19	15 733.19	2.50
16	27.09.2013	30.09.2013	3	18 000.00	16 658.09	16 658.09	2.50
17	01.10.2013	04.10.2013	3	16 000.00	9 700.00	9 700.00	2.50
18	22.10.2013	25.10.2013	3	15 000.00	6 875.00	6 875.00	2.50
19	28.10.2013	31.10.2013	3	9 000.00	8 800.00	8 800.00	2.50
20	30.10.2013	31.10.2013	1	2 500.00	2 926.14	2 500.00	2.48
21	27.11.2013	29.11.2013	2	15 000.00	10 500.00	10 500.00	2.50
22	29.11.2013	02.12.2013	3	19 000.00	17 339.00	17 339.00	2.50
23	03.12.2013	06.12.2013	3	21 500.00	12 800.00	12 800.00	2.50
24	23.12.2013	27.12.2013	4	13 000.00	7 600.00	7 600.00	2.50
25	30.12.2013	31.12.2013	1	16 000.00	14 044.49	14 044.49	2.48
Total	in 2013			352 500.00	269 006.00	265 744.88	

<sup>\*</sup> Day of payment for the NBP bills on the tender date. Source: NBP.

### Annex 5 Agreements with the Ministry of Finance

The agreement on the purchase and sale of foreign currencies to service liabilities and receivables of the State Treasury and principles for the performance of such service – the agreement sets the rules, terms and conditions of transactions concluded between the Ministry of Finance and NBP relating to the purchase and sale of foreign currencies. The agreement sets out limits on FX transactions in 2013 in the following amounts:

- the total sales of foreign currencies by NBP to the Ministry of Finance shall not exceed the equivalent of EUR 6,200 million;
- the total amount of foreign currencies purchased by NBP from the Ministry of Finance shall not exceed the equivalent of EUR 6,500 million,

#### while:

- the accumulated absolute difference between the amount of foreign currencies sold and purchased as at the year-end shall not exceed the equivalent of EUR 6,200 million,
- the accumulated absolute difference between the amount of foreign currencies purchased and sold as at year-end shall not exceed the equivalent of EUR 3,000 million.

The agreement on the MF's PLN term deposits with NBP – pursuant to the Public Finance Act, the Minister of Finance is authorised to make interest bearing deposits with Narodowy Bank Polski or with another bank, should there be a temporary surplus of funds on the central account of the State Budget. In 2013, the limit for the Ministry of Finance term deposits placed with NBP, counted in terms of daily balances, was as follows:

- PLN 4.5 billion in the period from 1 January to 24 January, 20 March to 24 April, 20 June to 24 July, and 20 September to 23 October,
- PLN 2,5 billion in the period from 25 January to 19 March, 25 April to 19 June and from 25 July to 19 September,
- PLN 2,0 billion from 24 October to 31 December.

#### Annex 6

#### Banks - Money Market Dealers in 2013

In the period to April 2013, access to the main open market operations and fine-tuning operations was granted to all banks that:

- participated in the SORBNET system,
- participated in the Securities Register kept with NBP, in the case where the subject of
  operation was securities deposited in the Securities Register, or directly participated in
  the National Securities Depository (Krajowy Depozyt Papierów Wartościowych S.A.)
  in the case where the subject of the operation was securities deposited in the National
  Securities Depository,
- possessed software for sending orders and offers to NBP using the electronic data exchange system.

Owing to improvement in the domestic interbank market and the participation of the central bank in joint works with the KNF Office and ACI Polska aimed at the creation of appropriate incentives for banks to participate in the fixing of WIBID and WIBOR rates, the NBP Management Board introduced in May 2013 a restriction on access to fine-tuning operations. The restriction allowed participation in fine-tuning operations only by the banks which function as Money Market Dealers. The adopted change concerned exclusively short-term operations with a maturity of 7 days, conducted during the required reserve maintenance period. This restriction did not concern fine-tuning open market operations executed on the last working day of the required reserve maintenance period, access to which have all banks allowed to participate in main open market operations.

The rules governing participation in open market operations are set forth in the Resolution of the Management Board of Narodowy Bank Polski No 56/2010 of 21 October 2010 on the criteria for participation by domestic banks, branches of foreign banks and branches of credit institutions in open market operations carried out by Narodowy Bank Polski (as amended). The Resolution sets forth the general rules for the assessment by the central bank of the activity of candidates for the function of a Money Market Dealer.

Candidates for the position of a Money Market Dealer are subject to annual assessment by NBP based on standard criteria of the Dealer Activity Index (DAI), comprising:

- bank's settlement and offer potential,
- bank's activity in the interbank deposit market,
- bank's activity in the repo and sell/buy/back market,
- bank's activity in the interest rate derivatives (FRA, IRS) and in the FX swaps.

Modifications regarding detailed rules of assessment of banks' activity in financial markets were introduced to the scoring system based on which NBP selected the group of banks to function as Money Market Dealers in 2013. These changes were related to the effort of the central bank to create incentives for the development of the interbank market and consisted in doubling the amount of scoring points in the following criteria: III – covering the market of collateralised interbank deposits, IV – covering the repo transactions market, SBB/BSB and V – covering FX swaps. Moreover, in the case of criterion III the central bank decided to assign appropriately higher weights to long-term deposits.

A bank acting as a Money Market Dealer has to perform specific obligations. In 2013 these obligations included:

- providing NBP, on a current basis, with the information concerning the bank's current and forecasted financial liquidity and situation in the financial market,
- providing NBP, on a current basis, with aggregated data on the bank's activity in financial markets, including the FX market,
- participating in the fixing of WIBOR and WIBID reference rates (since May 2013).

As at the beginning of 2013, the list of Money Market Dealers was as follows (order by the bank settlement number):

- 1. Powszechna Kasa Oszczędności Bank Polski S.A.
- 2. Bank Handlowy w Warszawie S.A.
- 3. ING Bank Śląski S.A.
- 4. Bank BHP S.A.
- 5. Bank Zachodni WBK S.A.
- 6. Bank Gospodarstwa Krajowego
- 7. mBank S.A. (former BRE Bank S.A.)
- 8. Bank Millennium S.A.
- 9. Bank Polska Kasa Opieki S.A.
- 10. Kredyt Bank S.A.
- 11. Raiffeisen Bank Polska S.A.
- 12. Societe Generale S.A. Oddział w Polsce
- 13. Deutsche Bank Polska S.A.
- 14. Bank Gospodarki Żywnościowej
- 15. BNP Paribas S.A. Oddział w Polsce

In 2013, four banks ceased to function as Money Market Dealers.

Kredyt Bank S.A. ceased to act as a Money Market Dealer as a result of the merger with Bank Zachodni WBK S.A. on 4 January 2013.

Deutsche Bank Polska S.A., Bank Gospodarki Żywnościowej S.A. and BNP Paribas S.A. Oddział w Polsce failed to meet the conditions for holding the position of a Money Market Dealer specified by NBP and introduced on 2 May 2013.

Annex 7
Daily information (as at the month-end)

PLN mn	XII 2012	1 2013	11 2013	III 2013	IV 2013	V 2013	VI 2013	VII 2013	VIII 2013			XI 2013	XII 2013
_	287 886.05 318 573.86	29 237.87	45 041.18 64 486.38	63 132.05	89 510.50 118 609.90	110 062.07	135 717.25	161 057.86	183 962.85		234 774.94	259 051.05	279 648.69 321 986.95
	~ ~	31 -5 118.48 -1	0	-22 642.03	-29 099.40	-28 687.01	-23 889.75	-23 392.11	-23 757.14	-26 639.28		-35 329.02	-42 338.27
	, v.	3 113.48	161.73	451.65	223.07	75.88	53.94	158.35	65.79		602.17	844.55	2 973.23
	٠.	2 278.00		2 841.00	318.00	200.00	3 573.00	2 374.00	374.00		_	1 607.00	549.00
	$\sim$	110 594.06	_	116 008.40	118 138.45	119 582.54	122 331.23	122 516.40	124 084.41	123 291.63	124	123 476.64	126 143.23
	48 815.55	25 749.41	31 280.85	30 925.25	32 411.36	31 147.74	17 902.22	33 506.44	28 623.97	43 584.87	31 207.73	27 837.99	38 125.71
	18 897 05	1 538 16	1 030 07	17.67	2 152 05	776 63	2000	2 713 36	163.64	10 751 05	155.02	283.36	6 240 QE
		00.00	0000	00.0	0.00	0.00	00.0	0000	0.00	0.00	0.00	0000	0.000
	00.00	0.00	00.00	0.00	00.00	0.00	00:00	00.00	0.00		0.00	0.00	0.00
	00.00	0.00	0.00	0.00	0.00	0.00	0.00	00.00	0.00		0.00	00.00	0.00
	38 791.43 4 975.00	45 543.33	39 726.17	33 869.84 1 592.50	46 113.82 0.00	37 602.39	39 204.42 4 282.08	46 059.57 0.00	37 701.50 1 414.40	37 881.14 0.00	37 491.47	36 584.34 2 615.68	35 750.93 0.00
	99 841 81	131 796 94	125 583.61	125 282 75	127 786 94	130 000 00	134 716 57	124 318 01	128 077 89	116 392 00	126 563 00	127 736 84	117 340 80
	00.0	00:00	0.00	0.00	00.00	0.00	0.00	00.00	0.00	0.00	0.00	0.00	0.00
	99 841.81	121 871.94	125 583.61	111 190.78	127 786.94	130 000.00	118 248.20	124 318.01	112 344.70	116 39	126 563.00	110 397.84	117 340.80
	0.00	9 925.00	0.00	14 091.97	0.00	0.00	16 468.37	0.00	15 733.19	0.00	0.00	17 339.00	0.00
	3.74	3.92	3.70	3.30	3.10	2.91	2.63	2.31	2.49	2.20	2.45	2.44	2.40
	375.00	2 166.00	1 405.00	320.00	6 287.00	2 285.00	825.00	2 230.00	2 855.00	3 535.00	1 381.00	1 100.00	2 130.00
%					,	;				1		,	,
	4.30	4.10	3.87	3.41	3.31	3.14	2.80	2.54	2.60	2.56	2.58	2.61	2.62
	4.26	4.05	3.80	3.38	3.26	3.05	2.79	2.60	2.60	2.56	2.55	2.58	2.58
-	4.24	4.04	3.80	3.39	3.26	3.05	2.78	2.60	2.60	2.58	2.57	2.58	2.59
	4.21	4.03	3.80	3.39	3.25	3.01	2.78	2.63	2.61	2.59	2.60	2.60	2.61
_	4.11	3.95	3.73	3.39	3.08	2.74	2.73	2.70	2.70	2.67	2.66	2.65	2.71
%	3.98	3.81	3.60	3.39	3.02	2.65	2.71	2.74	2.11	2.75	2.75	2.75	2.75
_	4 00	3 84	3 59	3.16	3.03	2 88	2.50	2 24	2.32	900	2.08	2 33	2 32
	4 00	3 6	3.59	3.15	3.03	2.85	2.50	2.25	2.32	2.27	2.28	2.33	2.25
	4.06	3.85	3.60	3.18	3.06	2.85	2.59	2.40	2.40	2.36	2.35	2.38	2.38
	4.04	3.84	3.60	3.19	3.06	2.85	2.58	2.40	2.40	2.38	2.37	2.38	2.39
	4.01	3.83	3.60	3.19	3.05	2.81	2.58	2.43	2.41	2.39	2.40	2.40	2.41
	3.91	3.75	3.53	3.19	2.88	2.54	2.53	2.50	2.50	2.47	2.46	2.45	2.51
	3.78	3.61	3.40	3.19	2.82	2.45	2.51	2.54	2.57	2.55	2.55	2.55	2.55
_	3.0996	3.0874	3.1679	3.2590	3.1721	3.2953	3.3175	3.1929	3.2209	3.1227	3.0507	3.0846	3.0120
-	4.0882	4.1870	4.1570	4.1774	4.1429	4.2902	4.3292	4.2427	4.2654	4.2163	4.1766	4.1998	4.1472
_ ;	1.3189	1.3561	1.3122	1.2818	1.3060	1.3019	1.3050	1.3288	1.3243	1.3502	1.3691	1.3615	1.3769
<u>š</u> –	OFFICIAL RESERVE ASSETS (as at the end of the month) in PI N mn	453.70	253.80		346 057 50	363 230 60		351 632 80	352 337 50				319 933 00
_		640.20	610 20		83 530 20	84 665 20		82 879 50	82 603 60				77 144 30
	-10 999.30	-1 542.04	1 844.54	-6 940.66	-1 218.50	-1 389.07	1 273.77	584.15	392.31	-1 855.65	1944.80	-82.89	2 040.25

\* Average deviation of current account from the required reserve calculated cumulatively from the beginning of reserve requirement period.

\*\* Open market operations are reported at nominal value. The balance of this position includes NBP bills minus repo operation.

Source: NBP.

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