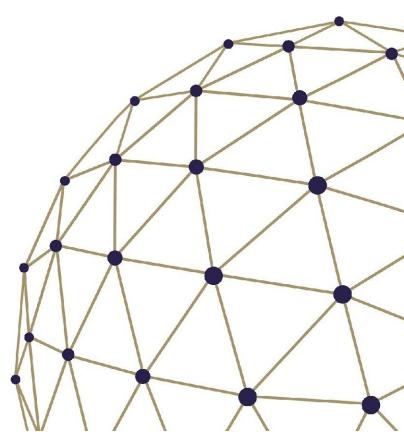


Macroeconomic and financial market developments

July 2017

Background material to the abridged minutes of the Monetary Council meeting 18 July 2017



Time of publication: 2 p.m. on 2 August 2017

The background material 'Macroeconomic and financial market developments' is based on information available until 14 July 2017.

Article 3 (1) of the MNB Act (Act CXXXIX of 2013 on the Magyar Nemzeti Bank) defines achieving and maintaining price stability as the primary objective of the Magyar Nemzeti Bank. The MNB's supreme decision-making body is the Monetary Council. The Council convenes as required by circumstances, but at least twice a month, according to a pre-announced schedule. At the second scheduled meeting each month, members consider issues relevant to decisions on interest rates. Abridged minutes of the Council's rate-setting meetings are released regularly, before the next policy meeting takes place. As a summary of the analyses prepared by staff for the Monetary Council, the background material presents economic and financial market developments, as well as new information which has become available since the previous meeting.

The abridged minutes and the background materials to the minutes are available on the MNB's website at:

http://www.mnb.hu/en/monetary-policy/the-monetary-council/minutes

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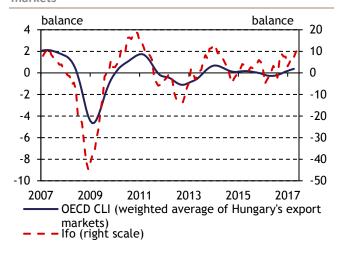
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1. MACROECONOMIC DEVELOPMENTS

1.1. Global macroeconomic environment

On the whole, the medium-term view on the European economic activity has improved in recent months, which is also supported by the high level of the Purchasing Manager Index of the euro area and the Eurocoin indicator, capturing the underlying economic activity processes of the euro area. The rise in global inflation, which commenced at the end of 2016, has slackened in recent months.

Chart 1: Business climate indices in Hungary's export markets



Source: OECD, Ifo

Chart 2: Brent crude oil world market prices



GDP figures for the first quarter of 2017 showed a positive picture overall. Based on raw data, the euro area economy registered a year-on-year growth rate of 2.5 per cent in the first quarter of 2017, while in quarter-onquarter terms it was up 0.6 per cent. The German economy - Hungary's most important trading partner further expanded, and economic growth in the USA also continued. On the whole, the medium-term view on the European economic activity has improved in recent months, which is also supported by the high level of the Purchasing Manager Index of the euro area and the Eurocoin indicator, capturing the underlying economic activity processes of the euro area. Market expectations with respect to the economic growth of the euro area for the entirety of 2017 stand around 1.7 per cent. The exit of the United Kingdom from the EU continues to carry significant medium and long-term risks, the process of which is still surrounded by uncertainty as a result of the outcome of the British elections.

The more than three-year stable growth of the German economy, Hungary's most important export partner, continued in the first quarter of 2017, supported by buoyant domestic demand through investment and a sustained increase in household consumption. In addition, the contribution of net exports to the German GDP was also positive. German industrial production and new industrial orders materially increased in May in annual terms, and the Ifo index, capturing the outlooks of the German industry, rose further in June, and when examining the average of the past months, it is at a favourable level (Chart 1).

Inflationary pressure from the world market remained moderate. The rise in global inflation, which commenced at the end of 2016, has slackened in recent months. The June inflation in the euro area slightly exceeded the expectations, but slowed down to 1.3 per cent, while core inflation rose by 0.2 percentage point to 1.1 per cent. Underlying processes continued to develop moderately. Oil prices in June were around USD 45 on average; prices were primarily influenced by the increasing production – despite the production adjustment – by the USA and the OPEC countries, and by the significant world market

surplus. World market prices of industrial commodities fell, while that of unprocessed food rose in June.

1.2. Domestic real economy developments

According to the received monthly data, the growth of the Hungarian economy continued in the second quarter of 2017. Between March and May 2017, whole-economy employment rose by 1.8 per cent year on year. The unemployment rate stood at 4.4 per cent.

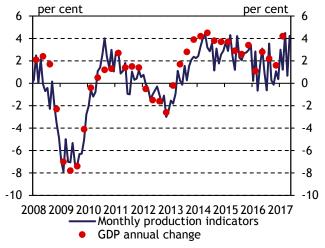
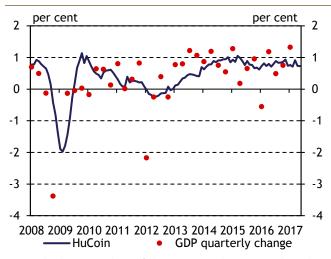


Chart 3: Monthly production indicators and GDP growth

Note: Weighted average of monthly production indicators (industrial output, construction output and retail sales). The weights are derived from regression explaining GDP growth. Source: MNB calculation based on HCSO data

Chart 4: Evolution of the HuCoin indicator



Note: The historic values of the HuCoin indicator may have been changed by revisions to GDP data.

Source: MNB calculation based on HCSO data

1.2.1. Economic growth

According to the HCSO's data release, in the first quarter of 2017 Hungary's gross domestic product grew at a rate of 4.2 per cent year on year and by 1.3 per cent compared to the previous quarter. According to the received monthly data, the growth of the Hungarian economy continued in the second quarter of 2017.

After last year's more moderate growth, the Hungarian economy grew dynamically in the first guarter, supported primarily by the buoyant domestic demand, through a considerable expansion in investment and the continued expansion of consumption. In addition, in parallel with the favourable performance of Hungary's export markets, exports also picked up, thereby net exports making a positive contribution to growth. On the production side, after the wear-off of last year's transient factors, industrial production once again supported economic performance and services also continued to expand (Chart 3). In addition to the public projects implemented from EU funds, the rising investment activity of the private sector also improved the performance of construction. The expansion in retail sales continued; based on the raw data, turnover in May rose by 6.0 per cent year on year.

Based on the HuCoin indicator, which reflects the mediumterm prospects of the domestic economy, the underlying trends of economic activity still indicate stable growth (Chart 4).

In May 2017, the volume of industrial output was up 8.8 per cent year on year, while on a seasonally adjusted basis it rose by 2.3 per cent compared to the previous month. The production level, excluding the working-day effect, rose by 6.2 per cent, explained by having one working day more compared to last May. The output of vehicle manufacturing and other engineering subsectors, representing a high weight, as well as light industry production increased year on year. On the whole, forward-looking indicators reflect a positive picture with regard to the outlooks of the domestic industry.

Based on preliminary data, in May 2017, in line with the industrial production, the value of goods exports and

Chart 5: Number of persons employed and the unemployment rate

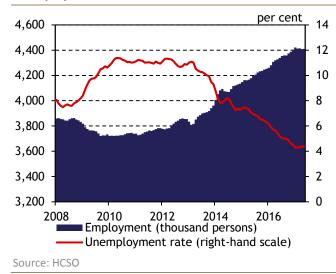
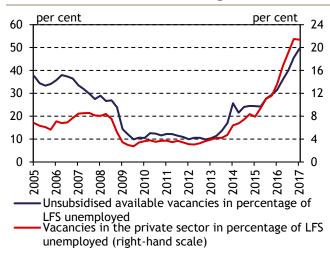


Chart 6: Indicators of labour market tightness



Source: National Employment Service, HCSO

imports increased materially, by 18.6 per cent and 18.2 per cent, respectively, year on year in euro terms, thus compared to last May the trade surplus was up by EUR 170 million. In April 2017, the terms of trade continued to deteriorate –albeit at a more moderate rate than seen in previous months – in which, in addition to mineral fuels, the relative price change of food and processed goods played a key role.

In May 2017 the volume of construction output was up **35.4 per cent year on year**, while output increased by 7.5 per cent compared to the previous month. Production of the two main construction groups developed in a similar manner in May: the construction of buildings and the volume of other construction increased by 27.2 per cent and 46.7 per cent, respectively. The volume of concluded new contracts increased by 53.2 per cent, while the monthend volume of construction companies' contract portfolio was up 94.3 per cent year on year.

According to the preliminary unadjusted data, the volume of retail sales was up 6.0 per cent, in May. Based on calendar adjusted data, it rose by 5.4 per cent year on year, while turnover increased by 1.4 per cent compared to the previous month. As regards the structure of sales, turnover may have increased in May in a wide range of products. The material expansion in the turnover of nonfood consumer durables primarily contributed the growth, accompanied by the continued rise in food and fuel sales.

1.2.2. Employment

According to Labour Force Survey data, the number of employees in the national economy increased by 1.8 per cent year on year from March to May 2017. Based on the seasonally adjusted data, both labour force participation and unemployment rate remained steady, while the number of people in employment, without public workers, slightly increased. The unemployment rate stood at 4.4 per cent (Chart 5).

According to the data released by the National Employment Service (NES), in May the number of nonsubsidised vacancies indicating corporate labour demand was around 15 thousand, similarly as in recent years, while the month-end number of vacant non-subsidised jobs remained steady. The number of vacancies in the private sector, published by the HCSO as forward-looking data, slightly decreased in the first quarter. **The labour market is still historically tight according to the tightness indicators calculated from the various statistics** (Chart 6).

1.3. Inflation and wages

In June 2017, year-on-year inflation was 1.9 per cent, while core inflation and core inflation excluding indirect taxes stood at 2.4 and 2.2 per cent, respectively. Underlying inflation indicators are still in the 1.5–2.0 per cent band. In April 2017, private sector gross average wage rose by 12.6 per cent year on year, which was mostly attributable to the administrative measures at the start of the year (raising the minimum wage and the guaranteed wage minimum and the reduction of the social contribution tax), and it can be interpreted as the effect of the wage adjustment impacting public corporations.

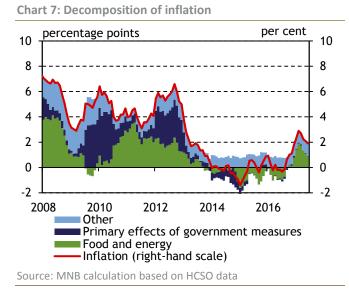
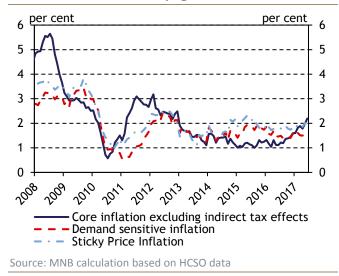


Chart 8: Measures of underlying inflation



1.3.1. Wage setting

In April 2017 private sector gross average wages rose by 12.6 per cent, while regular wages were up 12.5 per cent year on year. In the private sector the growth of both the gross average wages and the regular wages accelerated compared to March. Regular wages developed in line with the usual seasonality of April on a monthly basis. The substantial growth may have been attributable, in addition to the labour market tightness and the wage adjustments that affected the public companies, to the strong pass-through effect after the raising of the minimum wage, which may have been also supported by the decrease of 5 percentage points in the employer's social contribution. Bonus payments in April were similar to those observed last year.

1.3.2. Inflation developments

In June 2017, year-on-year inflation was 1.9 per cent, while core inflation and core inflation excluding indirect taxes stood at 2.4 and 2.2 per cent, respectively (Chart 7). Inflation fell by 0.2 percentage point, while core inflation rose by 0.3 percentage point relative to the previous month. Inflation dropped primarily as a result of the decrease in the fuel price index, which was partially attributable to base effects, while the rise in core inflation was mostly caused by the rise in the price of alcohol and tobacco products. The rise in tobacco prices was caused by the price rise explained by market trends, which took place in parallel with the raising of excise duty. With the incoming June data, both inflation and core inflation stood at 2.1 per cent in the second quarter of this year.

Underlying inflation indicators essentially remained unchanged compared to the previous month, being in the range of 1.5–2.0 per cent (Chart 8). In addition to the low level of imported inflation and inflation expectations, moderate commodity prices also contribute to this. In May 2017, agricultural producer prices rose by 4.5 per cent in annual terms, while the domestic sales prices of consumer goods sectors rose by more than 5 per cent.

Based on the incoming June data **both inflation and core inflation corresponded to expectations in the June Inflation Report.** Inflation will reach the 3 per cent target sustainably from early 2019.

1.4. Fiscal developments

The deficit of the central government was HUF 698 billion in June 2017, thus the cumulative balance of the current year was HUF -911 billion at the end of June.

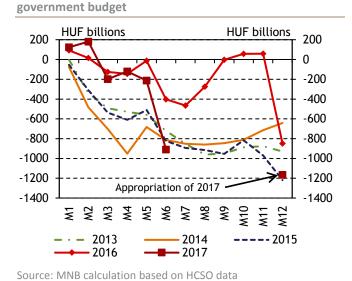


Chart 9: Intra-year cumulative cash balance of the central

In the past years, a monthly deficit of similar magnitude was recorded only in December 2016, **and thus the year-to-date deficit already exceeds the year-on-year values** (Chart 9). The reason for the deficit was similar as at the end of last year: large volume of payments related to EU transfers.

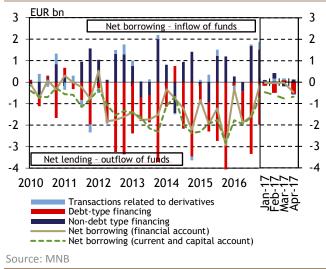
The **revenues of the central government** in June 2017 were up by roughly HUF 12 billion year on year. The minimal growth was attributable to fact that while the budget realised a growth in personal income tax and excise duties, the volume of payments received under the title of value added taxes fell short of the level recorded last year, due to the change in the reimbursement rules.

The **expenditures of the central subsystem** in June 2017 were up by HUF 321 billion year on year, mainly as result of the payment of the EU transfers. In addition, net interest expense in the monthly amount of HUF 287 billion, resulting from the interest payment on government securities concentrated in June and November, also contributed to the high deficit.

1.5. External balance developments

Net lending of the economy was at a steady high level in April. Although the external trade balance rose during the month, it falls short of the level recorded last April, which is attributable to the gradual worsening in the terms of trade and the expanding imports linked with the pick-up in consumption and investments.

Chart 10: Structure of net lending (unadjusted transactions)



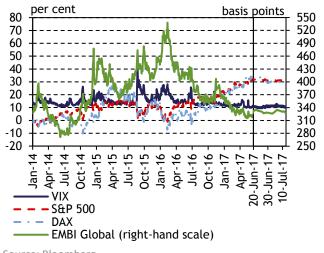
Based on the financing side developments, net external liability decreased further in April, which was achieved through a rise in non-debt liabilities and a fall in debt liabilities (Chart 10). The decrease in the net external debt was essentially linked with the banking sector and the corporations, while there was no material change in the general government's net external debt. Meanwhile, foreign direct investments substantially rose, which was attributable to the growth in intercompany loans (particularly in the commercial loans granted to the subsidiaries of foreign parent companies). The increase in the Hungarian capital outflow, related to a capital increase in a Hungarian company's foreign subsidiary, had the opposite effect. Dividend payments in April were of similar magnitude as last year, not being significant yet. The net external debt of the banking sector decreased by roughly EUR 300 million: a larger scale increase in foreign receivables continued, while foreign loans rose slightly. Corporations' net external debt also decreased by EUR 300 million, which is the result of a larger decrease in liabilities, related to the expiring bonds of a Hungarian large corporation.

2. FINANCIAL MARKETS

2.1. International financial markets

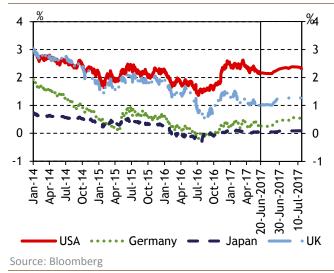
Investor sentiment in the period since the last interest rate decision was determined by the communications made by the governors of the key central banks and the stagnating global risk indicators. The communication of the central banks' governors was followed by a rise in the yields of long-term government securities and a fall in stock exchange indices, although the US equity market was able to adjust. Bank equities outperformed due to the orderly wind-down of two Italian banks and the favourable results of the stress test performed by the Fed. The developed currencies' market was determined by the strengthening of the euro, which appreciated by 2.5 per cent against the US dollar. As a result of the news related to the decrease in US production and in oil inventories, oil prices started to rise.

Chart 11: Developed market equity indices, the VIX index (left-hand scale) and the EMBI Global Index (right-hand scale)



Source: Bloomberg

Chart 12: Yields on developed market long-term bonds



In the period since the previous interest rate decision, risk indicators continued to stagnate at a low level, while the yields of long-term government securities considerably rose. Global investor sentiment in the period under review was mostly determined by the communication of the important central banks' governors globally and geopolitical tensions. As a result of the communication of the central bank governors there was a distinct rise in yields of long-term government securities, while stock exchange indices declined. Of the latter ones, US indices adjusted in the second half of the period. On the other hand, risk indices essentially stagnated, thus on the whole money and capital markets were still characterised by calm international risk-taking sentiment.

The European and Japanese stock exchange indices declined, while the US ones are essentially unchanged. The European and Japanese stock exchanges fell by 0.8-2 per cent, while the US indices, after a rise of 0.2-0.3 per cent, essentially stand at the same level as at the previous interest rate decision. The VIX and VStoxx indices, measuring the US and euro area equity market volatility, still fluctuated around the historically low level of 10 and 14 per cent, respectively.

Although the bond market risk indices stagnated at a low level, developed long-term bond yields increased substantially. The emerging bond market EMBI Global spread fluctuated around 330 basis points during the period, while the MOVE index, measuring the volatility of the developed bond markets, was also at a low level (Chart 11). However, developed 10-year bond yields mostly rose to a large degree: the German, British, US and Japanese yields rose by 32, 27, 16 and 3 basis points, respectively (Chart 12). The growth was primarily attributable to the communications of the governors of globally important central banks, regarded by the market as slightly tightening. Emerging countries were also characterised by increasing yields and the yields in the Central and Eastern European region, taken in the narrow sense, also rose by 11-17 basis points.

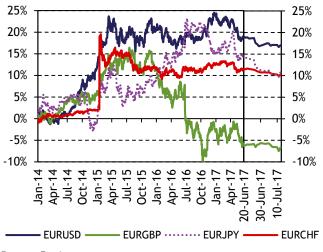


Chart 13: Developed market FX exchange rates

Source: Reuters

Note: Positive values indicate the strengthening of the variable (second) currency.

Oil prices were up 3-5 per cent. The price rise was caused primarily by the decline in US extraction and in inventories. Nevertheless, the oil market is still characterised by volatility, as the representatives of several key oil producer countries made statements pointing toward a decline in oil prices, and the growth in the extraction by Libya and Nigeria also pointed toward a decrease.

The focus of investors was primarily on the communication of the governors of globally important central banks. Although neither the ECB, nor the Fed have changed their monetary conditions, the communication of the central bank governors attracted substantial attention. In the beginning of the period, Mario Draghi (governor of ECB) and Mark Carney (governor of BoE) made a presentation at an ECB conference, which was deemed by investors to have a tightening tone. The communication of Janet Yellen in the beginning of the period was also characterised by a tone that suggested tighter monetary conditions, which was somewhat muted by her speech made at the US Congress at the end of the period. In addition, of the G7 countries Canada was the second one to set on a tightening path, as the Canadian central bank, after keeping its key policy rate steady for 2 years, raised it by 0.25 basis points to 0.75 per cent. As a result of the communications in the beginning of the period, long-term government securities started to rise substantially, which proved to be persistent until the end of the period. In parallel with this, after the speech of Mario Draghi, the euro started to strengthen against developed currencies, thus it appreciated by a total of 2.5 per cent against the dollar (Chart 13).

Based on the market pricing, the interest rate increase expectations related to the key central banks were also brought forward. Thus the first interest rate increase by ECB and by the Bank of England is expected to take place roughly around April-June 2018 and December 2017, respectively, while the next interest rate increase by Fed is priced by the market to March 2018.

Although the main developed stock exchange indices performed poorly, the performance of bank equities was outstanding within both the European and the US indices. The rise was generated by the start of the orderly winddown of two Italian banks (Veneto Banca, Banca Popolare di Vicenza), as well as by the favourable results of Fed's stress test, as none of the larger banks failed the annual survey, which is unprecedented since the introduction of the test. Thus the Italian banking sector index rose by 12, the euro area one by 5 and the US one by 4 per cent.

2.2. Developments in domestic money market indicators

The forint, together with the currencies of the region, appreciated against the euro, but it moved in a narrow band throughout the period. The government securities market yield curve became steeper, as in addition to the slight fall in short-term yields, long-term yields rose as a result of international factors. The non-residents' forint government securities holding declined, with their share falling to around 22 per cent. In the calm international risk-taking sentiment, the Hungarian CDS is around 108 basis points at present after a decrease by a few basis points since the previous interest rate decision.

Chart 14: EUR/HUF exchange rate and the implied volatility of exchange rate expectations

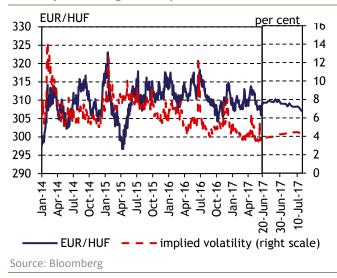
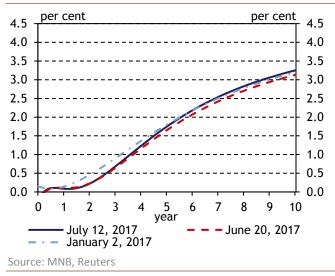


Chart 15: Shifts in the spot government bond yield curve



During the period, the forint fluctuated in a narrow band, slightly depreciating in the beginning of the period, followed by a strengthening together with the currencies of the region, and closed around 308 (Chart 14). On the whole, the currencies in the region appreciated moderately, thus the forint appreciated by 0.5 per cent, the Polish zloty by 0.3 per cent, while the Czech koruna and the Romanian leu by 0.6 per cent against the euro.

The government securities market yield curve became steeper: the less than eighteen months segment of the yield curve declined by a few basis points, while there was a 5-8 basis points and 10-15 basis points upward shift in the middle and long end of the curve, respectively (Chart 15). The slope of the yield increase at the long end corresponded to the international and the regional change: together with the soar in euro yields, the Polish ten-year yield, similarly to the Hungarian ones, rose by 16 basis points.

On the whole, demand at the bond auctions of the period was adequate. At the auctions of the 3-month discount Treasury bill held during the period the bid to cover ratio was 1.5-fold in one case and almost three-fold in the rest of the cases. In the case of the long-term papers, the number of bids received at the auction of 3-year bonds fell short of the announced volume, thus instead of the offered HUF 15 billion, the Government Debt Management Agency accepted bids only in the amount of HUF 9 billion. On the other hand, the 5-year auction was characterised by strong demand, while the demand for 10-year papers was medium. No material change has been observed in the average auction yield of the 3-month discount Treasury bill, which stood at 0.02-0.03 per cent. On long maturities, the average auction yields of the 3-, 5- and 10-year government securities slightly rose together with the secondary market yields.

The stock of Hungarian forint-denominated government securities held by non-residents fell by roughly HUF 10 billion in the period, thus their holdings amounted to HUF 3,343 billion at the end of the period. As a result, their share in forint government securities was down to 22 per

cent. In the moderately positive international and regional market sentiment, the Hungarian 5-year CDS spread decreased slightly, by roughly 2 basis points, at present standing at 108 basis points.

3. TRENDS IN LENDING

The stock of corporate loans increased at a faster rate, by 8.2 per cent in annual terms in May 2017 due to transactions. The outstanding loans of the credit institutions to households rose by HUF 34 billion in total as the combined balance of disbursements and repayments, thus at the end of May the annual growth in outstanding lending was 2.1 per cent. The smoothed interest rate spread of forint corporate loans was still 2.2 percentage points in May.

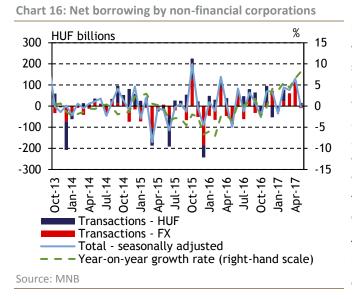
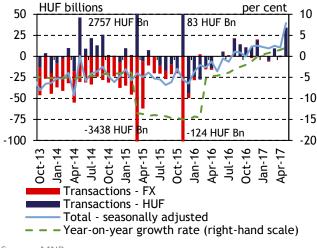
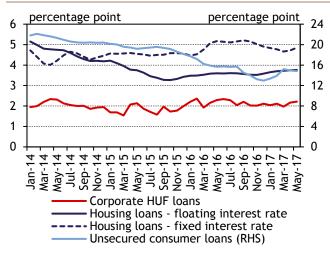


Chart 17: Net borrowing by households



In May, the outstanding corporate loans of credit institutions rose by HUF 5 billion due to transactions, which is equivalent to a decrease of HUF 4 billion on a seasonally adjusted basis (Chart 16). Broken down by currency, forint loans increased by HUF 15 billion, while foreign currency loans fell by HUF 10 billion. The gross amount of total new loans in May was up 28 per cent in annual terms. Excluding money market transactions, the volume of new loans amounted to HUF 146 billion during the month. The stock of corporate loans increased at a faster rate, by 8.2 per cent in annual terms in May 2017 due to transactions.

The outstanding loans of the credit institutions to households rose by HUF 34 billion in total as the combined balance of disbursements and repayments, thus at the end of May the annual growth in outstanding lending was 2.1 per cent (Chart 17). The value of new contracts concluded during the month was HUF 115 billion, thus in annual terms it registered a growth of 44 per cent. As regards the individual sub-segments, the volume of new housing loans, personal loans and car purchase loans rose by 36, 51 and 38 per cent, respectively. Chart 18: Development of corporate and household credit spreads



Note: Three-month smoothed spreads on the APR. In the case of corporate forint loans the 3-month BUBOR. In the case of variablerate or for up to one year fixed-rate housing loans 3-month BUBOR, while in the case of over the year fixed rate housing loans the corresponding spread over the IRS. Source: MNB

The smoothed interest rate spread of forint corporate loans was still 2.2 percentage points in May (Chart 18). However, small-amount market loan spreads – typically taken by SMEs – exceeded the average of the other Visegrád countries by 0.9 percentage point. The average interest rate spread on housing loans to households calculated using the annual percentage rate still stands at 4.6 percentage points, which can be considered high in international comparison. After a minor fall, the spread on unsecured consumer loans to households stood at 14.8 percentage point in May. Typically, banks explained the high spreads by becoming more open to riskier clients. The problem of high spreads affects primarily the market of long-term fixed-rate transactions.