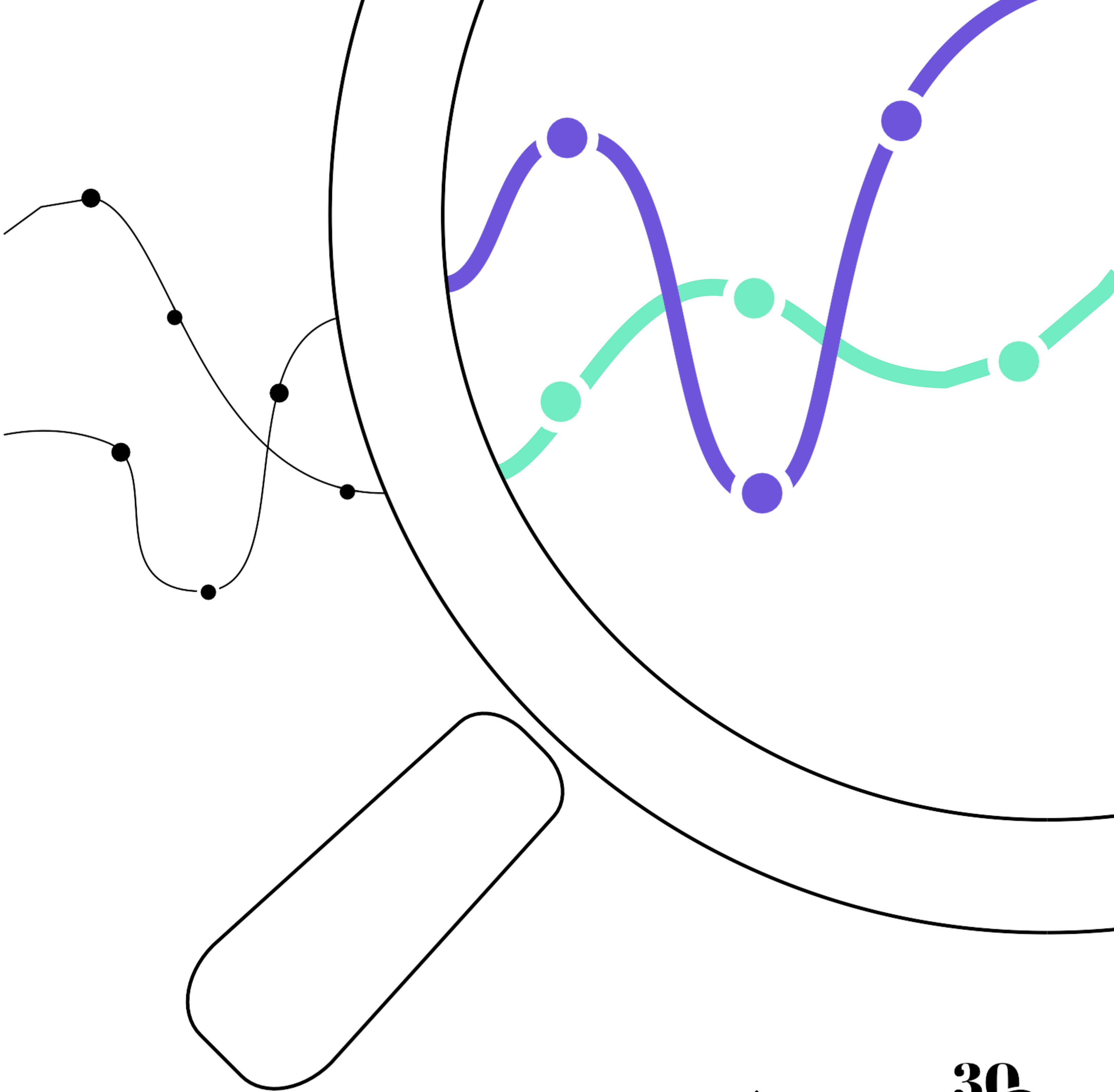
MAKRO MONITOR

November 2023

Századvég
Konjunktúrakutató Zrt.



SZÁZADVÉG 30

Table of Contents

1. Summary

In Q3 2023, Hungarian economic output contracted by 0.3% year on year and increased by 0.9% quarter on quarter, according to seasonally adjusted data.

At its November meeting, the Monetary Council of the central bank continued to cut both its policy rate and its base rate, as it had done the previous month. As a result, the Hungarian base rate (and the policy rate) currently stands at 11.5%, down 75 basis points.

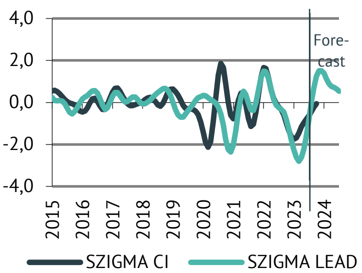
Raw data show that retail sales decreased by 7.8%, while calendar-adjusted data show that it decreased by 7.3% in September 2023, compared to the same period of the previous year. Within this, sales decreased by 2.3% in specialised and non-specialised food shops and by 7.5% in non-food shops. The turnover volume of petrol stations fell by 19.9%, significantly more than the other main groups.

In November 2023, the value of the SZIGMA CI indicator, which provides feedback on the current state of the Hungarian economy, was -0.05 up to October 2023. This compares with -0.11 in the previous month, meaning that the growth rate of the Hungarian economy has continued to move closer, although only slightly, to its **historical trend rate**.

The other indicator, SZIGMA LEAD, is a short-term indicator for the future of the Hungarian economy. The indicator continued to show a two-way movement. It points to a positive economic growth above the historical trend, which is expected to stall later and reverse back to the historical trend with a sideways movement.

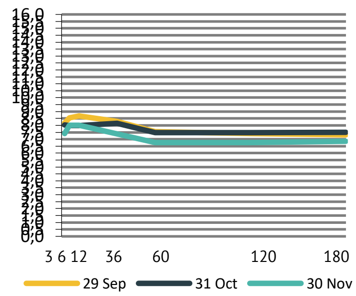
In a still higher interest rate and inflation environment, the trend towards a preference for premium Hungarian government bonds with above-inflation yields over those with fixed yields continued.

SIGMA indicators



Source: Századvég

Forint yield curve (%)



Source: Refinitiv

Our forecast (26.09.2023)	2023
Change in the GDP (%)	-0.3
Inflation (annual average, %)	17.8
EUR/HUF (annual average)	382.3

2. Overview of the economy

2.1 External environment

In October, the disinflationary trends that have been underway since the beginning of the year continued in the EU and the

October 2023 data from Eurostat, the official statistical office of the European Union, show that the annual inflation rate in the euro area slowed to 2.9%, a significant decrease of 1.4 percentage points from 4.3% in September. It is important to note that this rate is a significant improvement compared to 10.6% a year earlier. For the European Union as a whole, annual inflation was 3.6% in October, also down from 4.9% in September and a significant change from 11.5% a year earlier.

October's CPI data show significant differences across Europe, but there is convergence across regions. While Hungary faced high inflation of 9.6%, in the West, Belgium, Denmark and the Netherlands had disinflation of -1.7%, -0.4% and -1.0% respectively. In central Europe, the Czech Republic had 9.5% inflation and Romania 8.3%, showing that higher inflationary pressures are a problem not only in Hungary in the region. Meanwhile, southern regions, such as Italy and Greece, reported 1.8% and 3.8% for inflation respectively, showing the internal diversity of the European economic space in terms of inflation trends.

Detailed October data show inflation trends in the euro area, with food, alcohol and tobacco prices rising by 7.4%, a moderating trend from 8.8% in September. Energy prices show an important turnaround from a significant increase in prices to a 4.6% decrease in September and another significant 11.2% decrease in October, indicating that energy prices have continued to moderate. For the other main groups, prices of non-energy goods rose by 3.5% and those of services by 4.6% in October, showing that inflationary pressures in these areas continue to be more significant. Overall, decreasing energy prices offset increases in food and services prices, shaping the aggregate inflation rate.

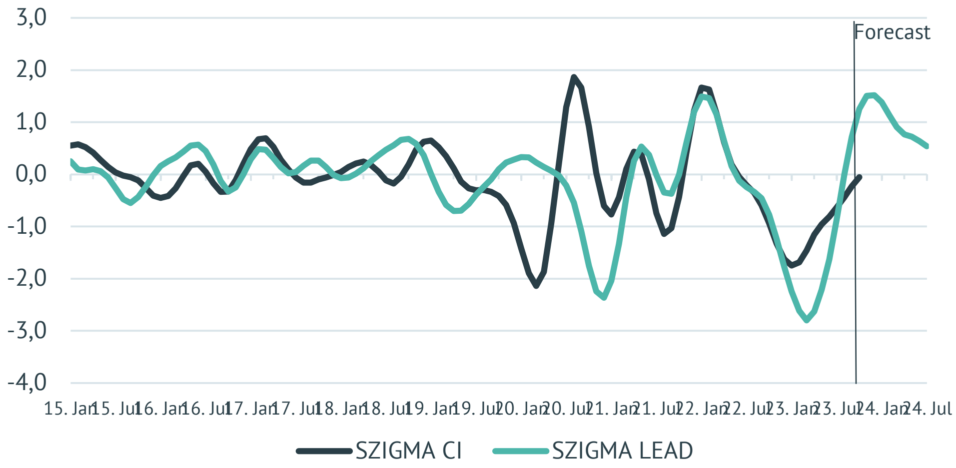
2.2 Our SZIGMA indicators

The growth rate of the Hungarian economy continued to approach its historical trend rate.

In November 2023, the value of the SZIGMA CI indicator reflecting the current state of the Hungarian economy was -0.05 up to October 2023. This compares with -0.11 in the previous month, meaning that the growth rate of the Hungarian economy has continued to move closer, although only slightly, to its **historical trend rate**. The below-trend growth started in June 2022 and only worsened until January 2023, and then started to slowly recover and has now almost reached its historical trend. Despite the gradually improving economic environment (inflation is falling, real income is coming back, base rate is falling, etc.), households are still cutting back on consumption, which is also reflected in industrial and construction performance. In construction, the latest September 2023 seasonally and working-day adjusted fixed-base **construction** output volume fell by 1.9% from the previous month and by 5.7% on an annual basis. The main building groups showed different trends: The construction of buildings increased on a monthly basis, while the construction of civil engineering works stagnated on an annual basis, while other periods showed a decline. The number of new non-residential construction projects fell by 23.6% month on month and 36.3% year on year. In addition, unfortunately, the volume index of the month-end stock of construction contracts, calculated on a fixed basis, does not show a positive picture either, as it fell by 9.3% month on month and by 30.6% year on year. The year-on-year decrease was due to a decline in the contract volume in both main building groups (buildings and civil engineering works). **In industry**, the latest figures, for September 2023, show that the seasonally and working-day adjusted volume of industrial production, calculated on a fixed basis, decreased by 1.3% month on month, while it increased by 5.9% year on year. On a seasonally and working-day adjusted fixed basis, industrial sales (domestic and exports combined) were broadly flat on a monthly basis (up 0.1%), while on an annual basis, they continued to fall (down 9.9%). This is because domestic and export industrial sales fell year on year. Domestic industrial sales strengthened by 2.2% month on month and weakened by 15.0% year on year. Industrial export sales were broadly flat on a monthly basis (up 0.3%) but fell by 6.0% on an annual basis.

In November 2023, our short-term leading indicator, SZIGMA LEAD, indicated improving, but still dual dynamics in the growth rate of the Hungarian economy. For one thing, the growth rate of the Hungarian economy continues to strengthen, reaching its historical trend rate. For another thing, this strengthening growth rate will come to a halt and, although no longer as steeply, reverse sideways back towards its historical trend. **In summary,** our forecast still points to a strengthening of economic growth, with the pace of growth expected to stall and slow sideways at the end of this year. Based on seasonally and working-day adjusted fixed-base new orders in industry, the basis for our forecast, imply a slight strengthening of **industrial production and sales**, as both new industrial domestic sales orders (up 12.6%) and new industrial export sales orders (up 30.7%) expanded on a monthly basis. However, the annual figures continued to show a decrease, with a 7.0% decrease for the first and a 10.5% decrease for the second. As for the German and EU indices affecting the Hungarian economy, the Ifo Business Climate Index for October 2023, **which measures change in business sentiment in the German economy**, strengthened by 1 index points from the previous month to stand at 86.9 index points in October. **Eurostat**'s consumer confidence index improved by 2.5 index points month on month and by 18.3 index points by year on year in October 2023. This month it stood at -32.1 index points.

FIGURE 1: CURRENT (CI) AND FORECASTING (LEAD) SZIGMA INDICATORS



Source: Századvég

2.3 The real economy

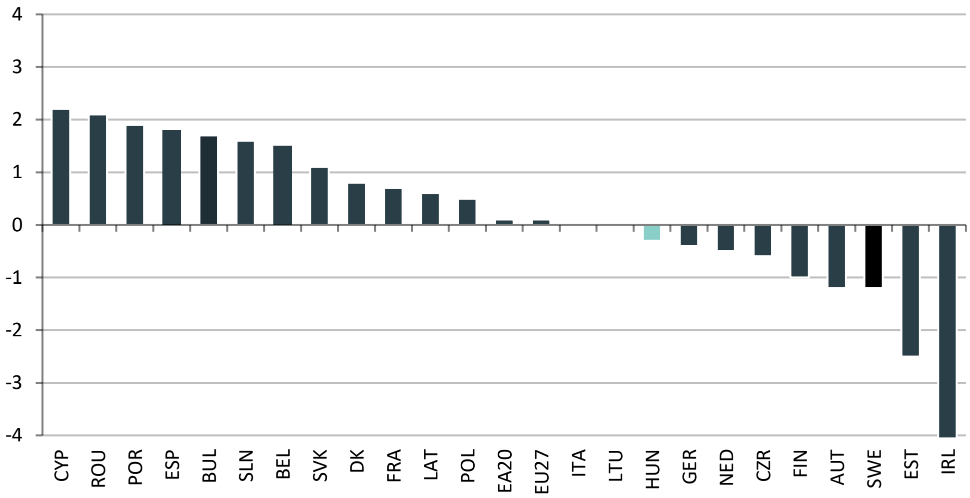
The recession was over in Q3 2023. Hungarian GDP grew by 0.9% on a quarterly basis.

The Hungarian Central Statistical Office (KSH) has released its first estimate of Hungary's gross domestic product, GDP, showing that the recession is over. According to the published data, the performance of the Hungarian economy grew by 0.9% in Q3 2023 compared to the previous quarter, on a seasonally and calendar-adjusted and balanced basis. On an annual basis, it declined by 0.4% in Q3 2023 for raw data and by 0.3% for seasonally and calendar-adjusted data. Preliminary data show that in Q3 2023 the GDP was held back mainly by industry and market services. At the same time, outstanding agricultural performance improved, or rather contained, the decline in GDP. Outstanding agricultural performance was helped by a low base due to last year's exceptional drought and more favourable weather conditions this year. In services, the expansion of the human health and social care sector dampened the decline of the services sector.

By **international** comparison, Hungarian GDP has moved up five places in Eurostat's preliminary (first estimate) ranking based on seasonally adjusted **annual** GDP for Q3 2023. While Q2 Hungarian GDP was ranked third from the bottom of the ranking at -2.3%, in the current Q3 ranking it is more in the middle of the pack at -0.3%. (It was ranked ninth from the bottom of the rankings.) Ireland came last with -4.7%, with Estonia in penultimate place with a better performance (-2.5%). Hungary was ahead of Italy and Lithuania in the ranking, with annual GDP stagnation of 0.0%. EU Member States' GDP continued to deteriorate in Q3, as the EU27 average GDP continued to fall in Q1. While the EU27 average was 1.2% in Q1 and 0.5% in Q2, it was only 0.1% in Q3. In Q3 2023, the highest annual economic growth rates were recorded in Cyprus (2.2%), Romania (2.1%) and Portugal (1.9%).

Q3 2023 **quarter-on-quarter** GDP data put Hungary in third place, with GDP growth of 0.9%. Poland was first (1.4%), followed by Cyprus with 1.1% GDP growth. The EU27 average continued to stagnate (0.0%). The bottom three were Austria (-0.6%), Finland (-0.9%) and Ireland (-1.8%). In the ranking of 25 countries, GDP fell quarter on quarter in 11 Member States and the euro area, stagnated in 2 Member States and the EU average, while it increased in 10 Member States.

FIGURE 2: EU Q3 2023 GDP GROWTH RATE (YEAR/YEAR, %)

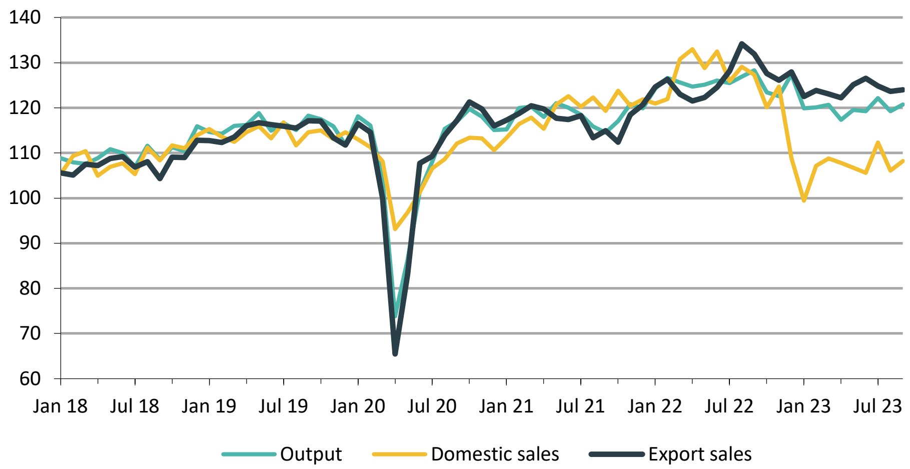


Remark: Seasonally and calendar adjusted indices. Preliminary estimate.
(not including Malta, Luxembourg, Croatia, Greece due to lack of data).
Source: Eurostat

Hungarian industrial output increased by 1.2% on a monthly basis.

Compared with the same period of the previous year, industrial production fell by 7.3% year on year according to raw data and by 5.8% according to working-day adjusted data in September 2023. However, the volume of industrial production, seasonally and working-day adjusted, increased by 1.2% month on month. Overall **industrial sales** fell by 11.2% in August 2023 compared to the same period a year earlier, with both domestic and export industrial sales playing a role. Industrial domestic sales shrank by 16.4% and industrial export sales by 7.7%. However, it is important to note that industrial production and export industrial sales volumes are currently still higher than before the coronavirus pandemic.

FIGURE 3: CHANGES IN INDUSTRIAL OUTPUT AND SALES (2015 MONTHLY AVERAGE = 100%)



Remark: Seasonally and calendar adjusted indices.
Source: Hungarian Central Statistical Office, Századvég

Returning to industrial production, all industries (mining, manufacturing and energy) contributed to the decline in industrial production volumes in September 2023. Manufacturing, which accounted for 95.7% of total industrial production in September 2023, was the largest contributor to industrial production, and its output fell by 6.1%. The energy sector, which accounted for 3.9% of industrial production in that month, saw its output fall by 24.3% year on year. Mining, which has the smallest weight (0.4%), saw its performance fall by 31.1% year on year.

In manufacturing, all but four sectors (automotive manufacturing, electrical equipment manufacturing, machinery and equipment manufacturing, and coke and refined petroleum products) saw their performance fall. In manufacturing, automotive manufacturing, the largest contributor, with a 26.6% share in September 2023, grew by 1.2%. In this month, food, the second largest sector (12.5%), contracted by 9.7%. Electrical equipment manufacturing, the third largest by weight (11.5%), saw its output rise by 2.0%. Machinery and equipment manufacturing, a medium-heavy sector within manufacturing, grew by 3.4%. Annual output in the other sectors shrank in September 2023. Year on year, the sharpest fall in output (21.6%) was in the rubber industry.

In September 2023, total new sales orders of the manufacturing industries monitored by the HCSO increased by 0.3% year on year at comparable prices, i.e. was essentially stagnant. This was mainly driven by domestic sales orders, which grew by 11.8% year on year. Export sales orders fell by 0.3%, mainly due to the two largest manufacturing industries. Export sales orders in the largest industry, automotive manufacturing, fell by 12.2%, while export sales orders in electrical equipment manufacturing, also a large industry, fell by 31.7%. In addition, export sales orders in the metals industry (18.5%) also fell year on year. Domestic sales orders contracted in four industries (automotive manufacturing, machinery and equipment manufacturing, computer and optical products, and chemicals and chemical products).

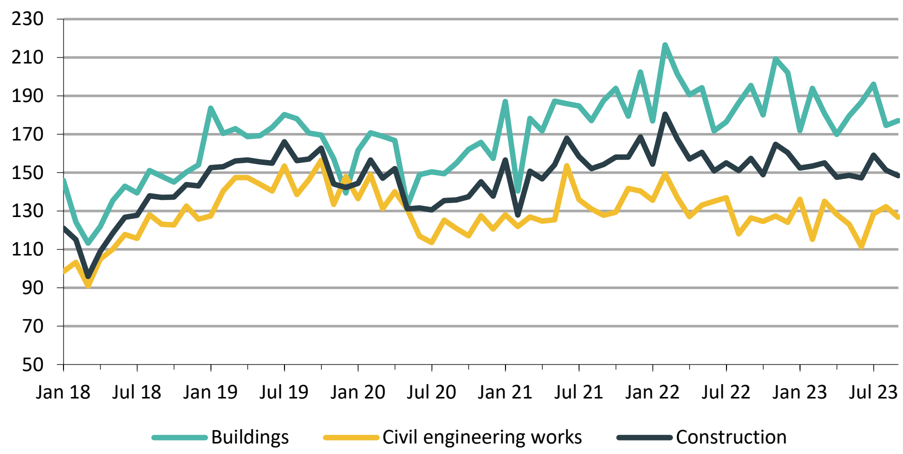
In September 2023, **new sales orders** in key manufacturing industries fell by 10.1% year on year at comparable prices, driven by both a 10.5% decline in new export sales orders and a 7.0% decline in new domestic sales orders. The high base played a role in the decline in new industrial export sales orders. Despite the high base, new export sales orders in automotive manufacturing continued to grow (by 9.1%). The high base played a role in the decline in new industrial domestic sales orders. Despite the high base, the pharmaceutical industry was able to increase its new industrial domestic sales orders by 15.6% year on year.

Construction output continued to fall.

In September 2023, the annual volume of construction output fell by 6.0% in terms of raw data. As for main building groups, while the construction of buildings shrank by 9.5% year on year, the construction of civil engineering works (roads, bridges, railways, complex industrial installations, pipelines, etc.) expanded by 0.4% year on year. Compared with the previous month, seasonally and working-day adjusted construction output shrank by 1.8%.

In September 2023, year on year, the stock of contracts at the end of the month fell by 30.6%, with the stock of contracts at the end of the month for buildings falling by 13.4% and for civil engineering works by 42.6%. The stock of new contracts signed in the month under review decreased by 32.0%, mainly due to a decrease in the stock of new contracts for buildings.

FIGURE 4: CHANGES IN THE CONSTRUCTION INDUSTRY (MONTHLY AVERAGE FOR THE YEAR 2015 = 100%)

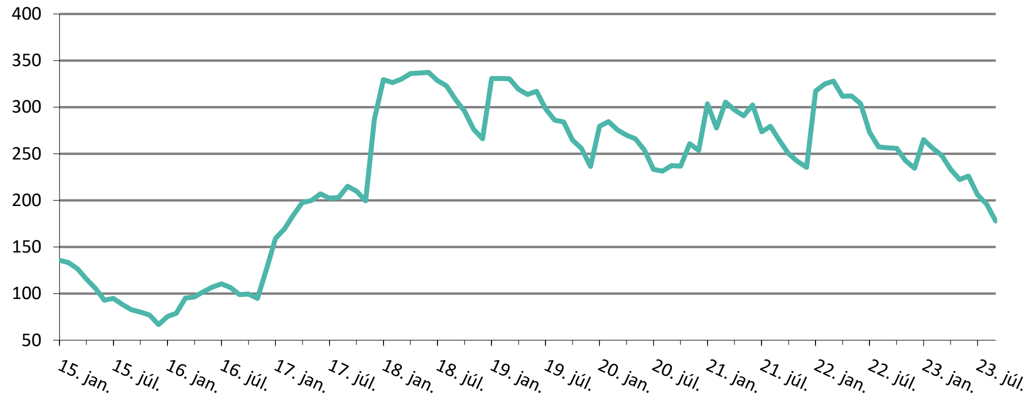


Remark: Seasonally and calendar adjusted indices.

Source: Hungarian Central Statistical Office, Századvég

Looking ahead, construction output is expected to continue to decline as the stock of new construction contracts signed in the month under review is fluctuating and the stock of contracts at the end of the month under review is steadily declining, as illustrated in the graph. The figure below illustrates the evolution of new contracts in construction (buildings and civil engineering works combined) at the end of the month on a fixed basis and in the month under review, where in September 2023, it was already at 178.0%, much lower than one of the weakest periods (233.3%) of the "COVID-19 year", 2020.

FIGURE 5: CHANGES IN MONTH-END CONSTRUCTION CONTRACTS (MONTHLY AVERAGE FOR 2015 = 100%)

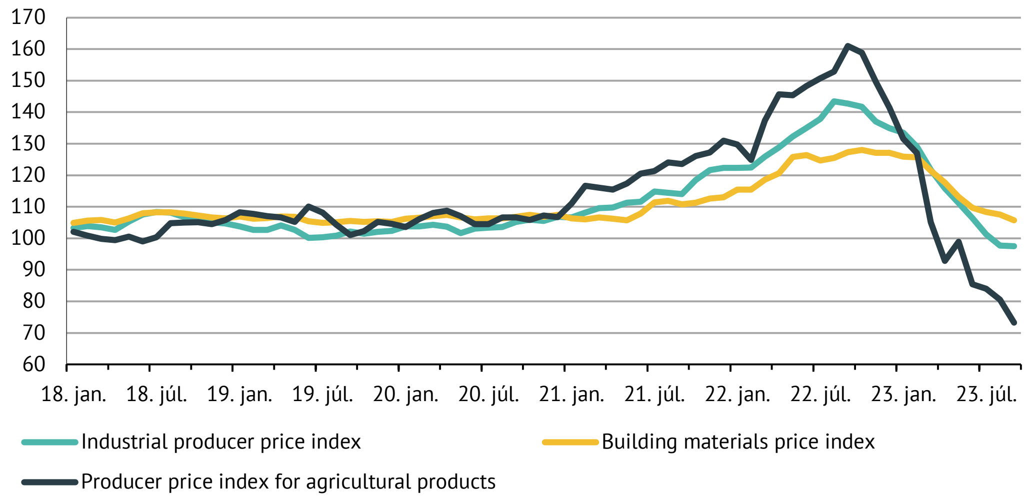


Source: Hungarian Central Statistical Office, Századvég

Agricultural product prices continued to fall.

In September 2023, the industrial producer price index and the agricultural producer price index were lower than in the same period of the previous year. The building materials price index has not yet started to decline in real terms, but price increases have slowed down, i.e. the rate of price increases has fallen. The **agricultural** producer price index decreased by 26.7% year on year in September 2023. The outstandingly high base played a major role in this, as the agricultural producer price index peaked at 161.0% year on year in September 2022. Within the indicator, individual product prices vary significantly. All products except vegetables (5.5%), potatoes (28.5%) and fruit (7.4%) saw their prices fall. Potato producer prices increased less than in the previous months. Producer prices fell by 48.8% for cereals, 41.4% for industrial crops, 36.4% for agricultural and horticultural products and 15.6% for animal products. In September 2023, **industrial** producer prices fell by 2.5% year on year, while they rose by 1.7% month on month. While domestic sales prices rose by 7.8% year on year, export sales prices fell by 7.5% year on year. However, compared with the previous month, domestic sales prices rose by 1.7% and export sales prices by 1.6%. The difference between domestic sales prices and export sales prices is due to the relative weight of the manufacturing and energy industries. Manufacturing has a smaller share in domestic sales and energy has a larger share in it than in export sales. For export sales, prices fell by 1.2% in manufacturing, which accounts for 90% of total sales, and by 58.8% in energy, which accounts for 9.8% of total sales. Meanwhile, domestic sales prices were up 2.3% for manufacturing, which weighted 65%, and 15.4% for energy, which weighted 30%. The growth rate of domestic sales prices in the food industry continued to fall. While domestic sales prices in the food industry rose by 9.3% (on an annual basis) in the previous month, they only increased by 4.8% in September 2023. **In construction**, the increase rate of building material prices is also moderating. They increased by 5.7% year on year in September 2023.

FIGURE 6: INDUSTRIAL PRODUCER PRICE INDEX, CONSTRUCTION INPUT PRICE INDEX, AGRICULTURAL PRODUCER PRICE INDEX (SAME PERIOD OF PREVIOUS YEAR = 100%)



Source: Hungarian Central Statistical Office, Századvég

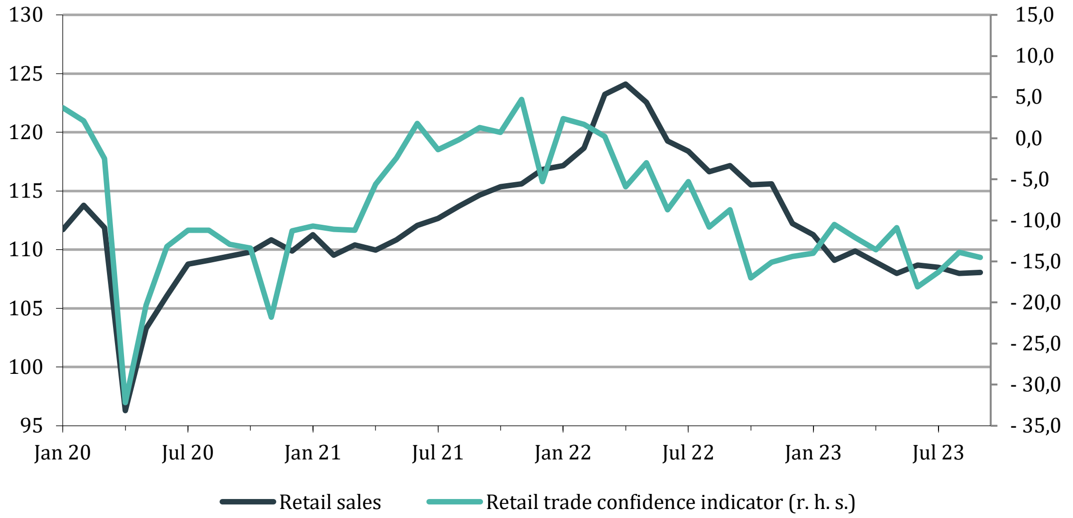
Retail sales contracted by 7.3% in August.

Raw data show that retail sales decreased by 7.8%, while calendar-adjusted data show that it decreased by 7.3% in September 2023, compared to the same period of the previous year. The decline in the volume of retail sales is still due to an inflation still above 10% in September, despite the strengthening of disinflationary trends: as wages lose purchasing power, the population is forced to rationalise consumption. The lifting of the fuel price cap in December has had a similar negative impact on retail sales for a year, but the effect is slowly eroding from the results. A further decline in inflation could positively affect the long-lasting negative trend in retail sales, leading to an increase in purchasing power. As a result, an improving trend in retail sales is likely in the coming period.

In September 2023, turnover in specialised and non-specialised food shops decreased by 2.3%, while turnover in non-food shops also decreased by 7.5%. In fuel retailing, sales fell significantly, by 18.1% year on year, in September. If we look at the volume of retail sales excluding fuel sales, we see a year-on-year decline of only 3.3%.

In food retailing, sales in non-specialised foodstuffs shrank by 2.7% while sales in food products, beverages and tobacco shrank by 0.7%. In nonfood sales, the volume of furniture and electric goods decreased by 15.7%, books, newspapers and stationery by 3.1% and computer and other industrial goods by 6.3% year on year. There was also a significant decrease in textile products, clothing and footwear (19.5%). In contrast, the biggest sales increase (12.8%) was in fragrances. For nonfood products, only this and pharmaceuticals and medical products showed an increase.

FIGURE 7: RETAIL SALES AND RETAIL CONFIDENCE INDEX (JANUARY 2018 = 100%)



Remark: Seasonally and calendar adjusted indices.

Source: Hungarian Central Statistical Office, Eurostat, Századvég

Unemployment rate at 4.3% in October.

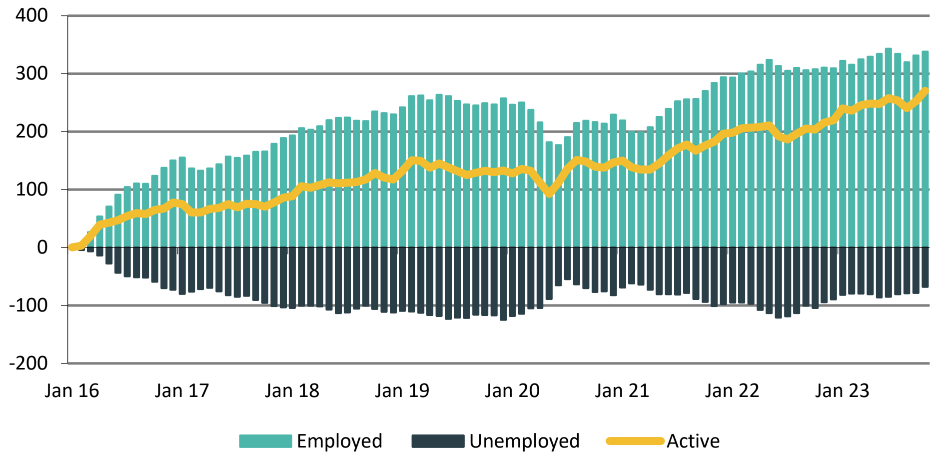
In October 2023[1], the seasonally adjusted activity rate of the population aged 15-74 was 67.6% (4,936,000 persons), which means a labour market growth of 67,000 compared to the same period of the last year. In the period under review, the seasonally adjusted number of employees was around 4,726,000, a year-on-year increase of 30,000. The number of the unemployed continued to rise, to 210,600, a year-on-year increase of 36,600.

In September, the number of employees increased by nearly 9,500 on a seasonally adjusted basis compared to the same period of the previous year. The most significant increase in the number of employees was in the competitive sector, with 12,500 more working in enterprises having at least 5 employees compared to September 2022. However, the number of employees in the public sector has fallen by 8,600 in the last year, a

[1] Three-month moving average

significant reduction. The number of people employed in the non-profit sector increased by 5,600 in one year.

FIGURE 8: CHANGES IN THE LABOUR MARKET (JANUARY 2016 = 0, THOUSAND EMPLOYEES)



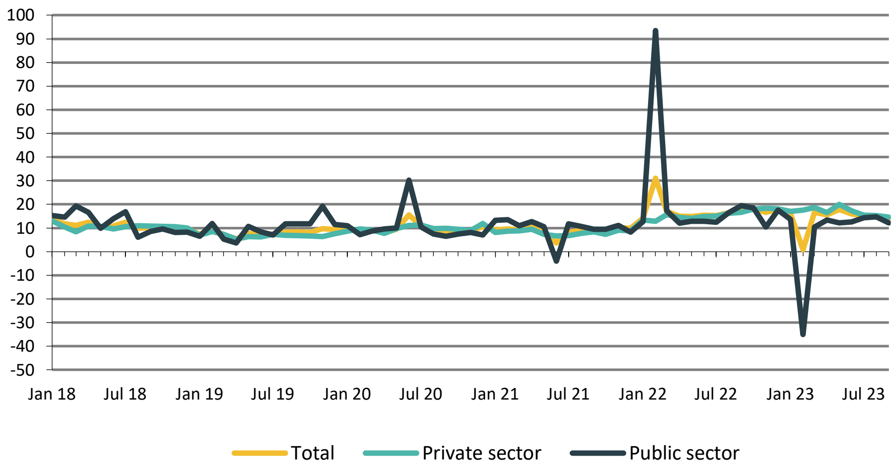
Remark: Seasonally and calendar adjusted indices.

Source: Hungarian Central Statistical Office, Századvég

Real wages started to rise in September.

In September, the average gross monthly wage in the national economy was HUF 557,900, up 14.1% compared to the same period last year. The highest average gross monthly wage was recorded in the competitive sector, at HUF 563,700. The average net monthly wage including benefits was HUF 384,900, an annual increase of 14.1%. The average regular gross monthly wage, excluding bonuses, rewards and one-off benefits, increased by 14.9% in September 2023 compared to a year earlier, to an estimated HUF 537,000. Consumer prices rose by just 12.2% in September, so real wages might have started to rise last month. Wage dynamics in the near future will be strongly shaped by next year's increase in the minimum wage and the guaranteed minimum wage, with negotiations between trade unions and employers suggesting an increase of around 10-15%.

FIGURE 9: CHANGES IN GROSS WAGES (ANNUAL CHANGE, %)



Remark: Seasonally and calendar adjusted indices.
Source: Hungarian Central Statistical Office, Századvég

2.4 External balance

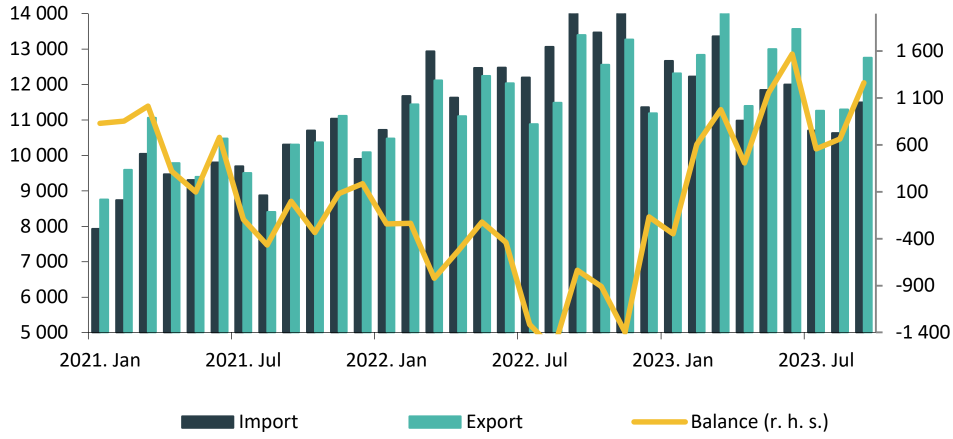
In August, the volume of exports of goods increased by 0.5%, and imports decreased by 7.6% year on year. This brought the trade balance to a surplus of EUR 665 million, an improvement of EUR 2.3 billion compared to the previous year.

In August, the import volume of food products, beverages and tobacco decreased by 12.0%, and their export volume increased by 0.2% year on year. As for energy carriers, imports increased by 26.0%, while exports by 31.0%. As for processed products, imports decreased by 8.7%, and exports by 4.2% year on year. As for machinery and transport equipment, imports decreased by 15.0%, and exports increased by 0.5%.

The trade balance improved significantly.

In September 2023, the first estimate put the value of exports in euro at 5.1% higher and imports in euro at 19.0% lower than a year earlier. The trade surplus in goods amounted to EUR 1.3 billion, which is EUR 2.1 billion higher than a year earlier.

FIGURE 10: BALANCE OF TRADE IN GOODS (EUR MILLION)



Remark: The September 2023 figures are from the first estimate.

Source: Hungarian Central Statistical Office, Századvég

2.5 Fiscal outlook

By the end of October 2023, 89.4% of the increased annual deficit target had been met.

The October deficit of the central budgetary subsystem amounted to HUF 222.7 billion, bringing the accumulated deficit to HUF 3,487.4 billion by the end of October 2023, which corresponds to 89.4% of the annual deficit target. This deficit consisted of the HUF 3,509.7 billion deficit of the core budget, the HUF 142.3 billion deficit of social security funds and the HUF 164.4 billion surplus of extra-budgetary funds.

Central government revenue in the first ten months of the year was 18.0% higher than in the same period of the previous year.

Payments from business organisations were 31.0% higher than in the same period of 2022. Within payments by business organisations, corporate tax, the largest revenue generator, was 36.8% (HUF 237.9 billion) higher than in the first ten months of the previous year. Compared to the same period of the previous year, payments from the energy sector and retail tax revenues increased significantly, by HUF 216.6 billion and HUF 123.1 billion, respectively. The increase in these two items is largely attributable to the special taxes introduced in 2022.

Revenues from consumption-related taxes were 4.0% (HUF 286.3 billion) higher than a year earlier. VAT receipts were only HUF 13.7 billion, or 0.2%, higher than at the end of October last year. On the downside, VAT receipts in October were again lower than in the same month of 2022, just as in July and August. Excise tax revenue was HUF 103.4 billion (10.2%) more than in the first ten months of 2022. The highest increases were recorded for excise tax receipts on fuel and tobacco (HUF 53.7 billion and HUF 40.7 billion respectively).

Personal income tax receipts increased by HUF 1,100.1 billion compared to the same period in 2022. Nearly half of the increase is due to the low base resulting from last year's family tax rebate, while the other half is due to wage growth. Receipts from social contribution tax and social insurance contributions increased by 14.8% (HUF 746.4 billion) compared to the same period of the previous year, also caused by wage increases.

Revenue from EU programmes reached HUF 1,191.5 billion in October, HUF 222.9 billion (23.0%) more than in 2022. In contrast, expenditure on EU programmes amounted to HUF 2,151.2 billion, HUF 318.4 billion (12.9%) less than the previous year.

Central government expenditures in the first ten months of the year was 19.6% higher than in the same period of the previous year.

Among significant expenditure items, expenditure on specific and normative subsidies, housing subsidies, expenditure on public property and interest expenditure were higher than a year earlier.

The amount spent on specific and normative subsidies was HUF 1,582.8 billion higher than at the end of October last year. The most significant item of the increase was HUF 1,301.4 billion in expenditure to maintain discount household utility prices.

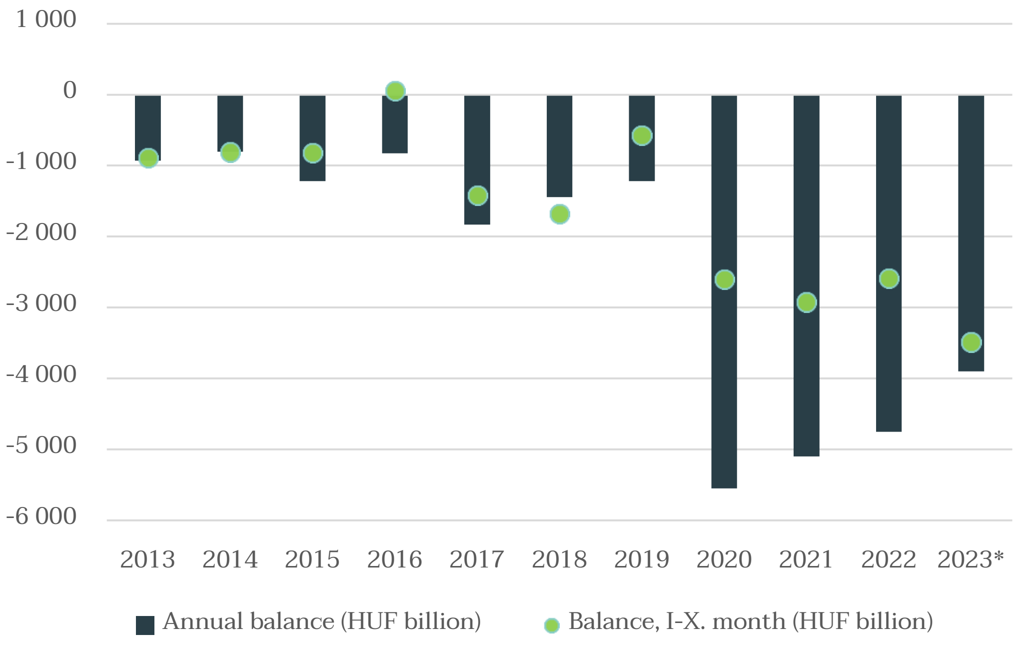
Expenditure on state property increased by HUF 585.3 billion, while expenditure on housing subsidies was HUF 91.4 billion lower than in the same period of the previous year.

Expenditure on budgetary bodies and chapter-administered appropriations increased by HUF 266.1 billion, or 2.8%, compared with the first ten months of the previous year, but this is in the opposite direction to the government's spending cut plans of 11.7%.

In the first ten months of 2023, pension expenditure amounted to HUF 4,724.3 billion, up by 22.3%, or HUF 862 billion, compared to the same period in 2022. During the same period, expenditure on the Health Insurance Fund amounted to HUF 3,287.9 billion, an increase of 7.6% (HUF 232.5 billion) compared to the base period. Within this, expenditure on medical and preventive care, which accounts for more than half of the Fund's expenditure, increased by 5.3%.

The balance of interest expenditure and interest income was HUF 491.7 billion (34.0%) more negative at the end of October than in the first ten months of 2022.

FIGURE 11: CENTRAL SUBSYSTEM BALANCE, 2015–2023 (JANUARY TO OCTOBER, HUF BILLION)



Source: Ministry of Finance, Hungarian State Treasury; *compared to the actual deficit in 2013-2022 and the planned (revised) deficit in 2023

2.6 Monetary developments

In October, prices increased by 9.9%, on average.

In October 2023, consumer prices increased by 9.9% on average, compared to the same period of the previous year. In the past year, the highest price increases have been in food (10.4%) and services (13.2%). Household energy prices fell by 16.1% compared to a year earlier, due to the inclusion of the base effect. Consumer prices decreased by an average of 0.1% over a month, with an 3.8% fall in vehicle fuel prices leading the decrease. The seasonally adjusted core inflation rate was 10.9% higher than in the same period of the previous year.

A more significant contribution to the 10.4% average increase in food prices came from the 54.4% rise in sugar prices, the 23.8% increase in chocolate and cocoa prices and the 22.0% rise in buffet prices. The 17.3% inflation in fruit and vegetable juice and the 15.6% inflation in spices and condiments also exceeded the average food inflation for the month. In contrast, poultry prices rose at a below-average rate (5.9%), while deflation was also seen for butter and butter cream (down 4.9%) and cheese (down 6.4%). The main drivers of the 11.6% average inflation in spirits and tobacco were primarily the 19.6% increase in beer prices.

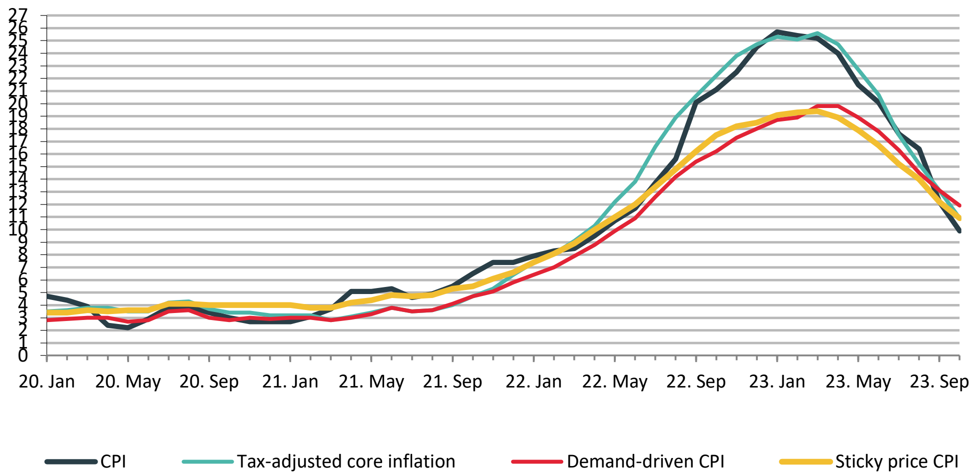
The average price increase of 0.7% for consumer durables represents a significant improvement compared with the previous period, driven by factors including sustained lower input material prices, the resumption of more efficient supply chains, falling demand and a significantly stronger exchange rate compared with the same period a year earlier. Looking at the main group, above-average increases were also recorded for kitchen and other furniture (10.4%), vacuum cleaners and air conditioners (7.1%) and heating and cooking equipment (5.9%). Inflation in consumer durables is moderated by a 3.0% fall in the price of televisions. It is also important to highlight the improving trend for second-hand cars: in October, second-hand cars were already 9.1% less expensive than a year earlier, which has a significant impact on the overall result for the main group, due to the high weight of just over 2%.

Thanks to the build-up of the base effect in September, the average fall in household energy prices in October was 18.1% year on year. Within household energy, the price of piped gas fell by 33.5% and electricity by 3.4% over the past year. In contrast, firewood was 5.4% more expensive and cylinder gas 4.7% more expensive.

In October, prices for services rose by an average of 12.6%, with the main contributors being a 31.0% increase for travel to other destinations, a 27.8% increase in the price of gambling, a 21.7% increase for postal services and a 20.1% increase for TV subscriptions. Domestic holiday prices also increased significantly, by 15.8%. The average increase in the price of services was moderated by, among other things, the prices of garbage collection, water and sewerage services remaining unchanged (100.0%) and the introduction of county and country passes, which reduced the price of travel to work and school by 21.7%. The month has already seen a decline in year-on-year inflation for services.

Compared to the previous month, food prices decreased by an average of 0.1%: margarine was 2.5% lower, cheese 1.2% lower, sugar 1.1% lower and flour 1.0% lower. Clothing prices rose by 3.2% on a monthly basis, while the price of household energy was 0.3% lower than in the previous month. Vehicle fuel prices fell by 3.8% from September.

FIGURE 12: THE EVOLUTION OF INFLATION (ANNUAL CHANGE IN PERCENTAGE)



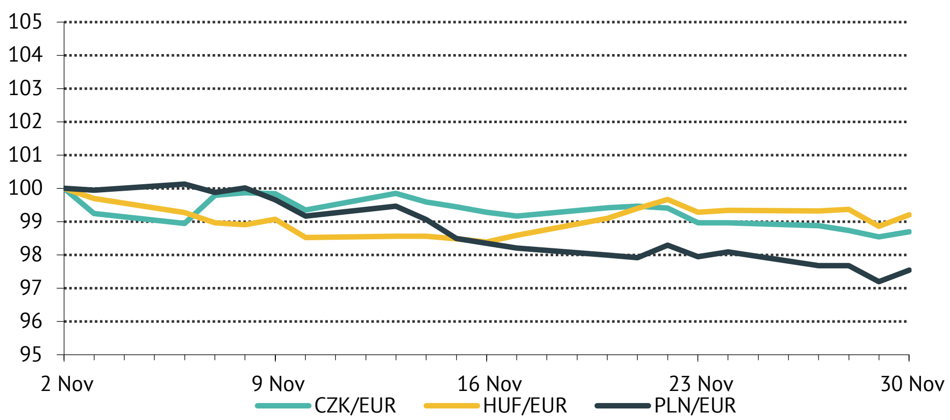
Source: MNB, Századvég

Among the core inflation indicators published by the MNB, the core inflation rate net of indirect taxes was 10.9%, the core inflation rate excluding processed food was 11.9% and the sticky price inflation rate was 10.9% in the tenth month of the year.

The currencies of competitors in the region have also strengthened against the euro.

Regional trends relative to the euro were similar in November. The Czech koruna has remained almost flat, while the Polish zloty has strengthened by 3.5% against the euro over the period. Government bond yields also fell over the period, with the Czech 10-year government bond yield 36 basis points lower at 4.27% and the Polish 10-year yield 8 basis points lower at 5.5%.

FIGURE 13: CHANGES IN EXCHANGE RATES IN THE REGION (BASELINE VALUE = 100%)



Source: Refinitiv, Századvég

In January, the Hungarian currency strengthened against the euro, the Swiss franc and the

Domestic money and foreign exchange market indicators improved last month. The HUF strengthened by 0.8% against the Euro, by 0.5% against the Swiss Franc, and by 3.5% against the US Dollar. This means that at the end of

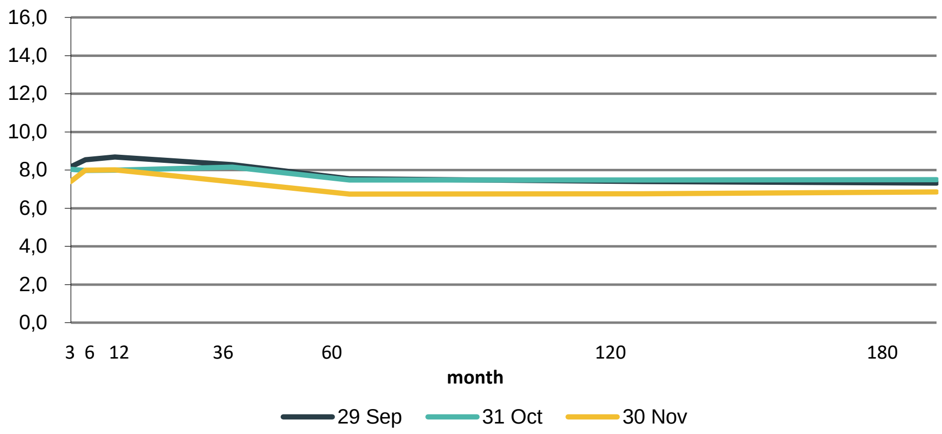
November 2023, one euro was worth 380 forints, one US dollar was worth 347 forints and one Swiss franc was worth 397 forints. Sovereign debt held by foreigners increased by HUF 58.5 billion to HUF 7,020 billion in the past month.

In November, the central bank continued to cut the base rate.

At its November meeting, the Monetary Council of the central bank continued monetary easing after cutting the base rate the previous month. As a result, the base rate in Hungary is currently at 11.5%, down 75 basis points. Accordingly, the upper limit of the interest rate corridor was changed to 12.5% and the lower limit to 10.5%. The pace of monetary easing has been in line with analysts' expectations, and the central bank's communication suggests that this pace is likely to continue in the coming months.

In the government bond market, yields for shorter maturities varied between +2 basis points and -64 basis points on the secondary yield curve in November. This means that the 3-month yield was 7.4%, the 6-month yield was 8.0% and the 1-year yield was 8.01% on 30 November. The 3-year yield fell by 76 basis points to 7.39%. Yields are down 73 basis points over the 5-year horizon, 72 basis points over the 10-year horizon and 15 basis points over the 64-year horizon compared to the previous month. These three yields changed, therefore, to 6.75%, 6.76%, and 6.85%, respectively.

FIGURE 14: CHANGES IN THE HUF YIELD CURVE (%)



Source: GDMA, Századvég

On 31 October 2023, the total value of "MÁP Plusz" government securities held by retail investors was HUF 974,6 billion after a HUF 1,459.9 billion decrease from the HUF 2,434.5 billion level at the end of December 2022. The main reason for this, is that in a high inflation and interest rate environment, households prefer to buy discount bonds that exceed the interest rate of MÁP Plusz and the inflation-tracking Premium Hungarian Government Bond (PMÁP), whose cumulative value has risen to HUF 6,605.6 billion, an increase of HUF 2,283.9 billion compared to the end of 2022. The total stock of government securities held by households stood at HUF 9,678.6 billion at the end of October 2023, up from HUF 8,619.3 billion at the end of 2022, i.e. HUF 1059.3 billion more than in the last month of the previous year.

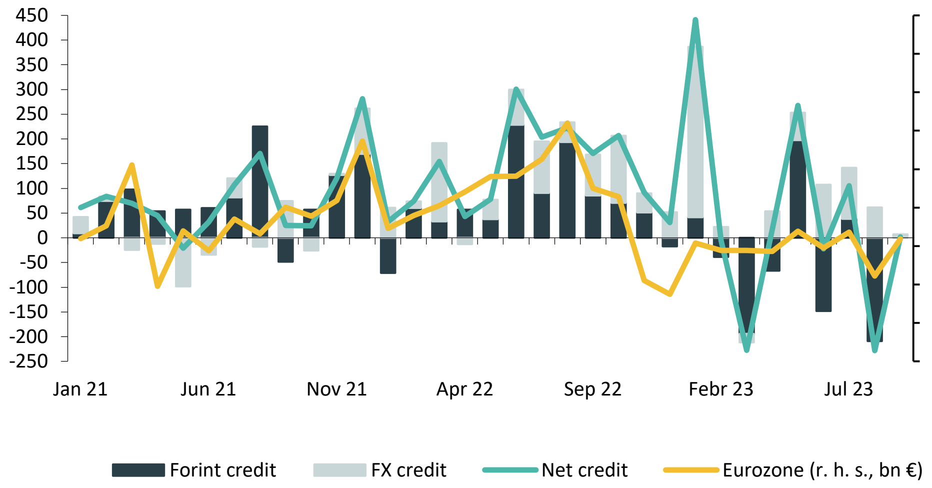
The share of foreign currency debt in the sovereign debt changed to 26.6% in October (i.e. decreased by 0.5 percentage point from the previous month), which is in the range (maximum 30%) specified in the financing plan for 2023 of GDMA. In the first ten months of the year, average foreign currency debt averaged 25.85%, a share of foreign currency debt higher than in October.

Hungary's sovereign debt rating remained at Baa2 with a stable outlook at Moody's, BBB with a stable outlook at S&P and BBB with a negative outlook at Fitch. The risk rating of Hungarian government bonds is therefore in the recommended for investment category of all three major international rating agencies.

Corporate credits increased in Hungary.

Seasonally adjusted data show that the net borrowing of HUF loans in the business sector was HUF 12.4 billion in September 2023. At the same time, net lending in foreign currency increased, with net borrowing amounting to HUF 6.9 billion in the ninth month of the year. Seasonally adjusted total net borrowing amounted to HUF 1.9 billion in the period under review. Corporate borrowing in the euro area was EUR 3.7 billion in September 2023.

FIGURE 15: CORPORATE BORROWING (HUF BILLION)



Source: MNB, ECB, Századvég

3. Századvég's forecast[2]

TABLE 1: 2023 Q3 FORECAST

	2022	2023	2024
Gross domestic product (volume index)	4.6	-0.3	2.5
Household final consumption expenditure (volume index)	6.3	-1.5	1.8
Gross fixed capital formation (volume index)	2.2	-10.1	8.1
Export volume index (based on national accounts)	11.8	3.7	2.6
Import volume index (based on national accounts)	11.1	-0.2	4.1
Balance of international trade in goods (EUR billion)	-14.9	-11.0	-13.4
Consumer price index (%)	14.6	17.8	5.5
Central bank base interest rate at the end of the period (%)	13.0	11.0	7.3
Unemployment rate (%)	3.6	3.8	3.5
Current account balance as a percentage of GDP	-8.1	-5.2	-6.6
Net lending as a percentage of the GDP	-6.0	-3.1	-4.5
ESA balance of public finances as a percentage of GDP	-6.2	-5.2	-3.7
Sovereign debt as a percentage of GDP	73.3	70.8	70.4

Source: MNB, Hungarian Central Statistical Office, Századvég's calculation

TABLE 2: QUARTER-ON-QUARTER CHANGE OF OUR FORECAST

	2023			2024		
	06.2023	09.2023	change	06.2023	09.2023	change
Gross domestic product (volume index)	1.1	**-0.3**	-1.4	4.3	**2.5**	-1.8
Internal market demand (volume index)	-2.2	**n.a.**	n.a.	4.6	**n.a.**	n.a.
Household final consumption expenditure (volume index)	n.a.	**-1.5**	n.a.	n.a.	**1.8**	n.a.
Gross fixed capital formation (volume index)	n.a.	**-10.1**	n.a.	n.a.	**8.1**	n.a.
Export volume index (based on national accounts)	2.5	**3.7**	1.2	6.9	**2.6**	-4.3
Import volume index (based on national accounts)	-0.5	**-0.2**	0.3	6.8	**4.1**	-2.7
Balance of trade in goods (EUR billion)	-3.7	**-11.0**	-7.3	-3.7	**-13.4**	-9.7
Consumer price index (%)	18.6	**17.8**	-0.8	5.1	**5.5**	0.4
Central bank base interest rate at the end of the period (%)	11.7	**11.0**	-0.7	6.6	**7.3**	0.7
Unemployment rate (%)	4.3	**3.8**	-0.5	4.6	**3.5**	-1.1
Current account balance as a percentage of GDP	-4.1	**-5.2**	-1.1	-3.3	**-6.6**	-3.3
Net lending as a percentage of the GDP	-2.1	**-3.1**	-1.0	-1.3	**-4.5**	-3.2
Balance of public finances as a percentage of GDP	-3.9	**-5.2**	-1.3	-3.3	**-3.7**	-0.4
Sovereign debt as a percentage of GDP	68.2	**70.8**	2.6	67.1	**70.4**	3.3

Source: Századvég's calculation

[2] Date of preparation: 28 September 2023