

MAKRO MONITOR

August 2023

Századvég

Konjunktúrakutató Zrt.

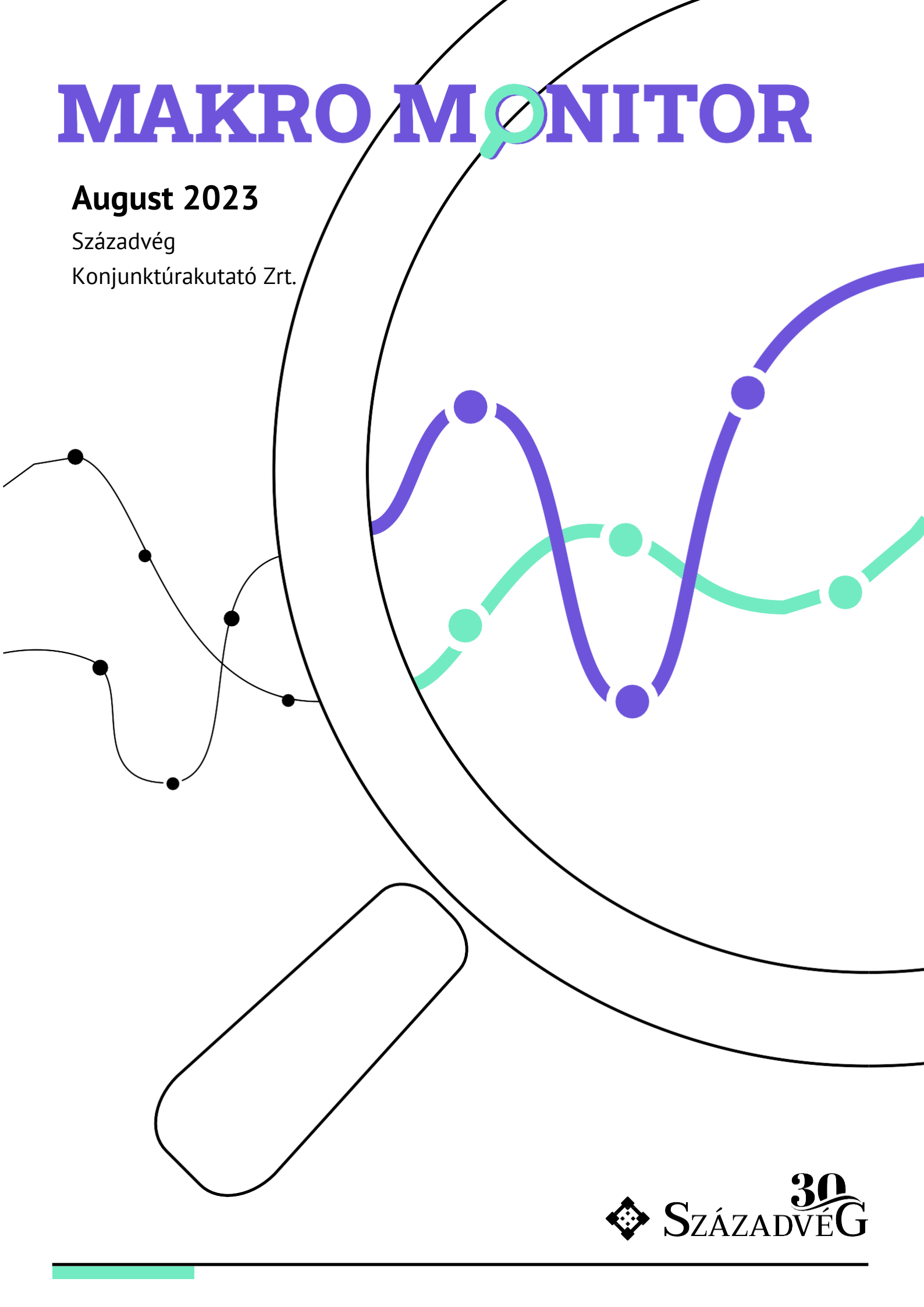


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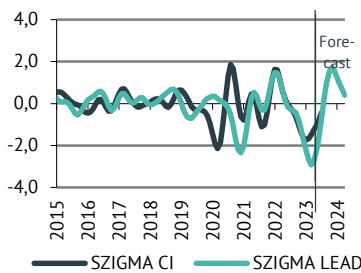
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1. Summary

In Q2 2023, Hungary's economic output shrank by 2.3% year on year and by 0.3% quarter on quarter, according to seasonally adjusted data.

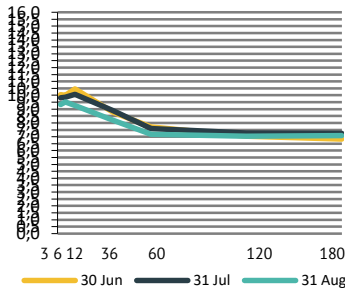
At its meeting in August, the Monetary Council of the central bank did not change the base rate (13%) but continued to cut the policy rate. The central bank cut its effective rate, the overnight deposit facility rate, by 100 basis points to 14.0%.

SIGMA indicators



Source: Századvég

Forint yield curve (%)



Source: Refinitiv

Raw data show that retail sales decreased by 7.8%, while calendar-adjusted data show that it decreased by 8.3% in June 2023, compared to the same period of the previous year. Within this, sales increased by 4.8% in specialised and non-specialised food shops and by 4.3% in non-food shops. The turnover volume of petrol stations fell by 24.2%, significantly more than the other main groups.

In August 2023, the value of the SZIGMA CI indicator, which provides feedback on the current state of the Hungarian economy, was -0.45 up to July 2023. Although close to the historical trend, it was still slightly below it, meaning that the Hungarian economy was still growing below the historical trend.

The other indicator, SZIGMA LEAD, is a short-term indicator for the future of the Hungarian economy. The indicator continues to point to a double turnaround, firstly indicating a positive stronger economic growth. Second, it indicates a stagnation and decline in the growth rate.

Our forecast (22.06.2023)	2023
Change in the GDP (%)	1.1
Inflation (annual average, %)	18.6
EUR/HUF (annual average)	395.0

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

2. Overview of the economy

2.1 External environment

In July, the disinflationary trends that have been underway since the beginning of the year continued in the EU and the euro area.

In July 2023, the disinflationary trends that have been underway since the beginning of the year continued in both the European Union (6.1%) and the euro area (5.3%). Compared with a year ago, the inflation rate has fallen by 3.7 and 3.6 percentage points in the EU and the euro area respectively. Inflation was 3.2% in the United States, 6.8% in the United Kingdom and 3.3% in Japan in July. China, on the other hand, is already experiencing deflation, with prices falling by 0.3% compared with a year earlier.

Apart from Hungary (17.5%), other Central and Eastern European countries are also experiencing inflation rates significantly above the EU average. In July, consumer prices rose by 10.2% in the Czech Republic, 10.3% in Poland and 10.3% in Slovakia compared to the same period last year. In contrast, inflation has already fallen significantly in several countries: In Belgium, the average price of goods was 1.7% higher than a year earlier, in Spain 2.1% higher, in Cyprus 2.4% higher and in Denmark 3.2% higher.

If we break down the euro area inflation into factors, we can see that it follows a trend that is structurally similar to that of Hungary. In July, processed foods, alcoholic beverages and tobacco were on average 10.8% more expensive than a year earlier. In the recent period, inflation was heavily influenced by very high energy prices, but this trend has changed significantly: falling global prices have also had a positive impact on the harmonised index of consumer prices, with the price of household energy 6.1% cheaper than a year earlier. In the euro area, the trend in services is also the opposite of the other main groups: on an annual basis, the decline has not started (5.6%) and there is an increase of 1.3% compared with the previous month.

2.2 SZIGMA indicators

Hungarian economic growth rate is still below trend, but an improvement is expected.

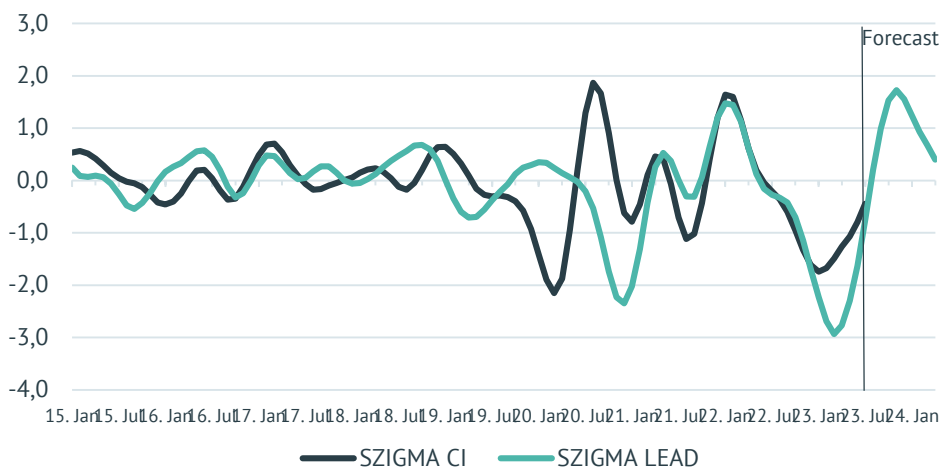
In August 2023, the value of the SZIGMA CI indicator reflecting the current state of the Hungarian economy was -0.45 up to July 2023. This means that Hungarian economic growth is below its historical trend rate. However, this growth rate is improving, as the growth rate of the Hungarian economy is gradually approaching the historical trend rate and is still expected to reach this turning point in August 2023, according to the SZIGMA LEAD forecast indicator. It is important to stress that this below-trend growth marks the end of a longer period. It started in June 2022 and worsened until January 2023, after which it started to slowly improve. The Hungarian economy is a small open economy, and its growth rate is strongly influenced by the international environment, such as the rising cost of importing oil, which has a significant impact on fuel prices. This affects all transport-related products/services. The rising cost of oil imports can be broken down into several factors; for one thing, because the price advantage of Ural oil over Brent has declined. For another thing, the transit fees charged for oil transport have risen sharply this year. Hungary receives oil through two pipelines, of which the transit fee has been tripled for the Druzhba pipeline and increased fivefold for the Adriatic pipeline this year. Inflation and interest rates are still high, though slowly declining, which is not favourable for investment, to put it mildly. High interest rates make credits more expensive, which also affects the return on investments. With inflation still high, real wages have been falling for several months, affecting domestic demand. This was also reflected in domestic retail sales figures, which have been falling for several months. Subdued demand also appears in industrial and construction figures. The latest **construction** output figure, from June 2023, calculated on a fixed basis and adjusted for seasonal and working-day effects, continued to fall on both a monthly and annual basis (1.4% and 3.1% respectively), driven by a sharp decline in civil engineering works (roads, railways, bridges, overpasses, pipelines, telecommunications and electricity networks, etc.). While construction of

buildings rose by 3.4% month on month and 7.6% year on year, civil engineering works fell by 9.8% month on month and 17.9% year on year. This is also supported by the number of new non-residential construction projects, which increased by 1.7% month on month, while decreasing by 1.2% year on year. In addition, the volume index for the month-end stock of construction contracts calculated on a fixed basis increased by 1.0% month on month, while it decreased by 26.0% year on year, due to the outstanding figure (base) of the previous year. The latest **industrial output** figure, from June 2023, calculated on a fixed basis and adjusted for seasonal and working-day effects, decreased both month on month and year on year (by 0.8% and 6.0% respectively). Industrial sales (both domestic and exports), calculated on a fixed basis and seasonally and working-day adjusted, fell both year on year and month on month. This was due to a sharp fall in domestic sales, which could not be offset by export sales. While export sales rose by 1.1% on a monthly basis and 1.4% on an annual basis, domestic sales fell by 1.2% on a monthly basis and 20.5% on an annual basis.

In August 2023, our short-term leading indicator, SZIGMA LEAD, continues to indicate dual dynamics in the growth rate of the Hungarian economy. On the one hand, it is positive that the growth rate of the Hungarian economy could reach its historical trend rate in the next month, August 2023, with above-trend growth thereafter. On the other hand, it is not so positive that this strong growth rate is expected to stall, reverse and start to decline by the end of this year, by November 2023. Importantly, growth is still expected to remain above the historical trend, but at a lower and slowing rate. **In summary**, our forecast continues to show a strengthening of economic growth, with the growth rate expected to come to a halt and slow down at the end of this year. **Industrial production and sales** are expected to strengthen according to seasonally and working-day adjusted fixed-base new orders in industry, the basis for our forecast. The volume index of new industrial domestic sales orders, although down by 9.6% year on year, rose by 5% month on month, which may give hope for an improvement in domestic demand in the future. For new industrial

export sales orders, the monthly volume index fell by 1%, while the annual volume increased by 8.0%. Exports are therefore currently expected to stagnate. As for the German and EU indices affecting the Hungarian economy, the Ifo Business Climate Index for July 2023, **which measures change in business sentiment in the German economy**, weakened by 1.2 index points from the previous month to stand at 87.4 index points, as economic operators became more and more pessimistic. By comparison, the index was the most favourable since the outbreak of the Russia-Ukraine war in March and April this year, when it was above 93 index points. Before the war, in February 2022, the index stood at 98.4%. **Eurostat's** consumer confidence index for July 2023 improved by almost 2.9 index points on an annual basis, but weakened by 2.2 index points on a monthly basis. It currently stands at -34.7 index points in July 2023. The EU consumer confidence index reached its lowest point since the Russia-Ukraine war (-50.4 index points) in October 2022.

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



Source: Századvég

2.3 The real economy

Hungarian GDP fell both year on year and quarter on quarter.

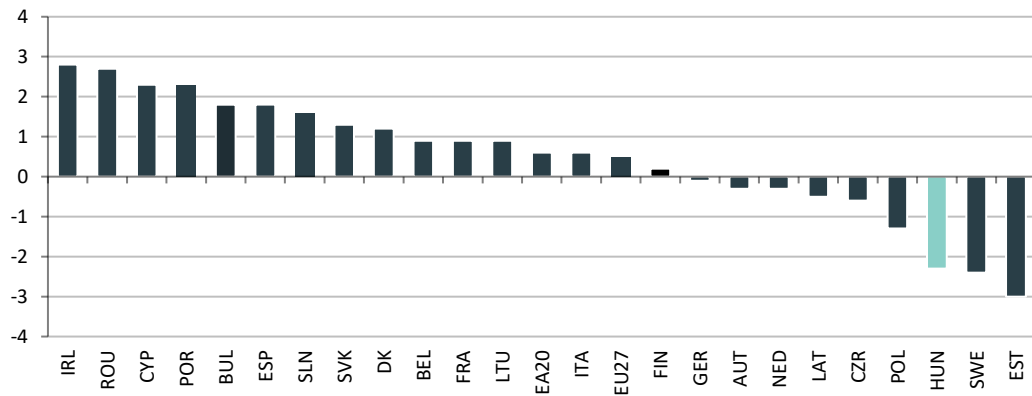
According to the first estimate of the Hungarian Central Statistical Office (HCSO), the annual gross domestic product (GDP) of the Hungarian economy declined by 2.4% year on year in Q2 2023 in raw data and by 2.3% in seasonally and calendar-adjusted data. In addition, the GDP decreased by 0.3% quarter on quarter in terms of seasonally adjusted and balanced data. Preliminary data show that in Q2 2023 the GDP was held back mainly by industry and market services. Among market services, performance declined mainly in commerce, transport and storage. At the same time, agricultural output boosted the Hungarian economy. Among services, human health care and social services grew, approaching their levels before the coronavirus epidemic. Strong growth in the sector dampened the decline in the services sector.

By **international** comparison, Hungarian GDP has moved up one place in Eurostat's preliminary (first estimate) ranking based on seasonally adjusted annual GDP for Q2 2023. While the Hungarian GDP ranked second to last in Q1 (-2.3%), in Q2 it was third to last in the ranking. Sweden was second last (-2.4%), while Estonia was last (-3.0%). GDP in EU countries also decreased in Q2, with four countries seeing their GDP fall in Q1, and nine countries seeing their GDP fall in Q2. This also affected the EU average (EU27), which was 0.5% in Q2, compared to 1.2% in Q1. In Q2 2023, the highest annual economic growth rate was achieved in Ireland (2.8%), followed by Romania (2.7%) and tied for third place with Cyprus (2.3%) and Portugal (2.3%).

For **quarterly** GDP data for Q2 2023, the top three places saw GDP growth of more than 1%. The EU27 average stagnated (0.0%). In the ranking of 25 countries, Ireland (3.3%) remained in first place, followed by Lithuania (2.8%) and Slovenia (1.4%). The last three countries in the ranking were Poland (-3.7%), Sweden (-1.5%) and Lithuania (-0.6%). At the end of the ranking of 25 countries, the last nine countries have seen their GDP volumes fall. Compared to Hungary's GDP performance (-0.3%),

five countries (Cyprus, Austria, Lithuania, Sweden and Poland) underperformed and three countries matched Hungary’s performance. Including tied rankings, Hungary ranked 12th out of 25 countries in a tie of four, with a -0.3% drop in GDP. The four countries in the tie were Hungary, the Netherlands, Italy and Estonia.

**FIGURE 2: EU Q2 2023 GDP GROWTH
(YEAR/YEAR, %)**



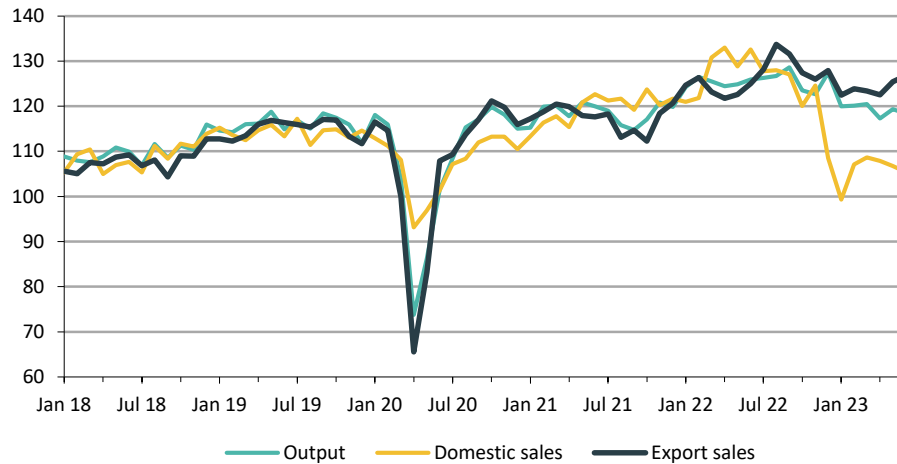
Remark: Seasonally and calendar adjusted indices. Preliminary estimate.

Source: Eurostat

Industrial output continued to fall, while domestic and export industrial sales orders increased.

Compared with the same period of the previous year, industrial production fell by 3.8% year on year according to raw data and by 6.1% according to working-day adjusted data in June 2023. On a monthly basis, the volume of seasonally and working-day adjusted industrial production decreased by 0.9%. In June 2023, industrial sales contracted overall by 6.5% year on year, of which domestic sales fell by 20%, while export sales expanded by 4.0%.

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, the largest share (weight) of industrial production in June 2023 belonged to the manufacturing sector, which accounted for 95.4% of industrial production in that month. Of the other two sectors, the energy sector (electricity, gas and steam supply and air conditioning) contributed 4.2% and mining and quarrying 0.4%. The volume of industrial production fell year on year in all three of the sectors dominating industrial production: Manufacturing, which accounts for 95.4% of the total, fell by 0.8%, while energy, which accounts for 4.2%, declined by 32.7% and mining and quarrying, which accounts for 0.4%, fell by 29.3%. Within manufacturing, output fell in all but five sectors (automotive manufacturing, electrical equipment manufacturing, machinery and equipment manufacturing, pharmaceuticals production and other manufacturing). The largest contributor to the manufacturing sector’s June 2023 output (27.6%) continued to be the automotive sector, where output grew by 19.1% year on year. Electrical equipment manufacturing, the second most important sector (11.0%), significantly behind automotive manufacturing, expanded by 16.9% year on year. Production volume in machinery and equipment manufacturing, which represents a medium weight, increased by 7.2%, while other manufacturing, which represents a small weight (3.4%), increased by 12.0%

and pharmaceuticals, which also represents a small weight (2.7%), increased by 1.2% year on year. Food manufacturing, the second largest subsector by weight (12.2%), saw its year-on-year output fall by 11.1%. Computer, electronic and optical products manufacturing, which represents a medium weight (9.9%), also saw a decline in its year-on-year performance. The decrease was 5.1%. The sharpest decline in volume was in chemical products manufacturing, which represents 7.4%, with a decline of 26.5%. This was followed by the rubber industry, which represents a medium weight (7.4%), with a 20.1% year-on-year decline in output volume.

In June 2023, total new sales orders of the manufacturing industries monitored by the HCSO increased by 10.6% year on year at comparable prices. This was driven by an 11.0% increase in export sales orders and a 3.5% increase in domestic sales orders. As for exports, all the subsectors of the observed sectors, except for metal and metal processing, increased their export sales orders. Of the three largest year-on-year increases, the growth in pharmaceutical sales orders was outstanding and only partly driven by the lower base. This subsector increased its export sales orders by more than 3.5 times compared to the same period last year. The second largest year-on-year increase (17.7%) was in chemical products manufacturing. The weak base played a significant role in the growth of this subsector. The third largest increase (9.0%) was in computer, electronic and optical products, which had no base effect. Domestic sales orders remain less encouraging, with all but three sectors (pharmaceuticals, computer, electronic and optical products and electrical equipment) seeing a year-on-year decline in domestic sales orders. In pharmaceuticals, domestic sales orders stood out from the other subsectors in year-on-year terms. Their domestic sales orders increased by more than two and a half times, with no base effect playing a role. The second largest increase (50.3%) was in electrical equipment manufacturing, in which the base effect did not play a role either. The third largest increase (18.6%) was in metal materials and metal processing, where the base effect was already present. The largest decline (25.3%) was in computer, electronic and optical

products, due to the high base. The second largest decrease (24.2%) was in chemicals manufacturing, which continued to decline despite a low base, meaning that the subsector's domestic sales orders and domestic production continue to shrink.

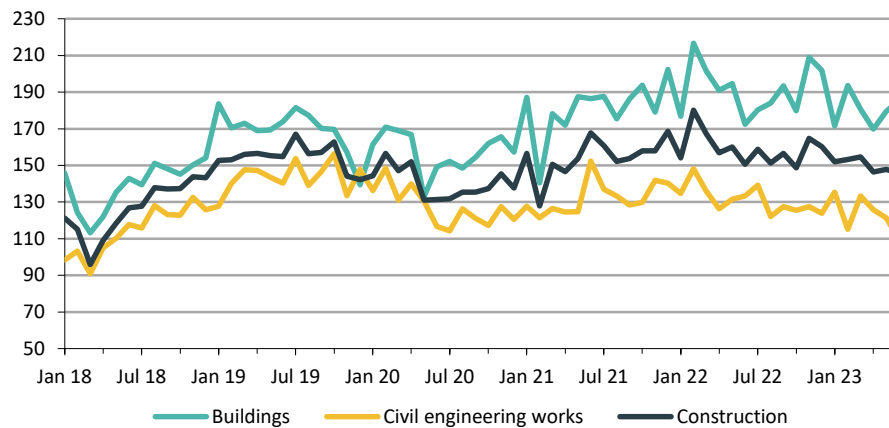
In June 2023, *new sales orders* in priority manufacturing industries grew by 5.1% year on year at comparable prices, driven by an 8.1% increase in new export sales orders. In contrast, new domestic sales orders fell by 9.6%. As regards the year-on-year change in the volume of new export sales orders for each subsector, three sectors (chemicals manufacturing, metal materials and metal processing, computers, electronics and optical products) recorded a decline. The largest year-on-year increase in new export sales orders (62.8%) was in pharmaceuticals, where the weak base played a significant role. The second largest increase (28.4%) was in electrical equipment manufacturing. The third largest increase (20.5%) was in automotive manufacturing, also due to the low base. The contraction in new domestic sales orders was moderated by three subsectors where new domestic sales orders increased year on year. The largest increase (19.7%) was in electrical equipment manufacturing, in which the base effect did not play a role. The second largest increase (18.2%) was in pharmaceuticals, which also did not show a base effect. The third largest increase (5.3%) was in automotive manufacturing, which did not show a base effect either.

Construction output continues to slow.

In June 2023, the annual volume of construction output fell by 3.8% in terms of raw data. In terms of major building groups, the decline in construction volume was due to a 20.5% year-on-year fall in the volume of civil engineering works. The other major building group, buildings, saw an annual volume expansion of 7.5%. On a monthly basis, seasonally and working day adjusted construction output decreased by 1.4% month on month. Construction prices rose by 1.6% quarter on quarter. As for the stock of contracts, the month-end stock of contracts decreased by 26.1% year on year in June 2023, while the stock of new contracts signed in the month increased by 16.7%. Compared with the same period of the previous year, the 26.1% decrease in the stock

of construction contracts at the end of June 2023 was driven by a 2.0% fall in contracts for buildings and a 40.9% fall in contracts for civil engineering works.

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

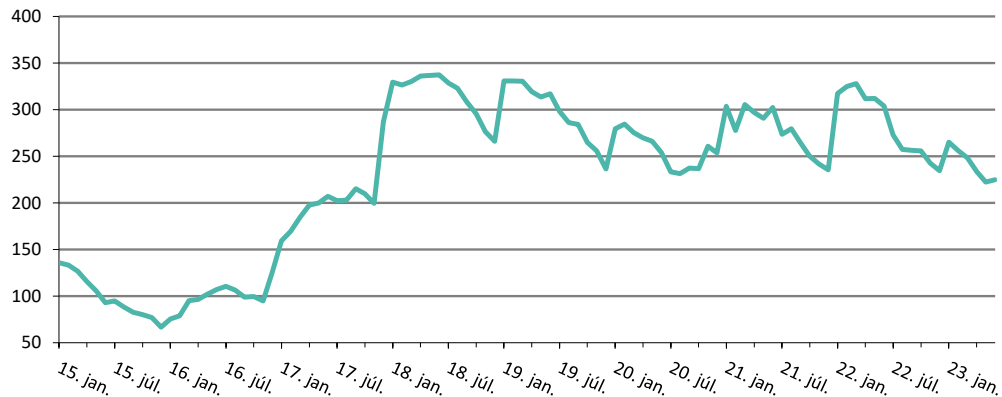


Remark: Seasonally and calendar adjusted indices.

Source: Hungarian Central Statistical Office, Századvég

The outlook for the future improved slightly, as the stock of new construction contracts signed in the month under review increased by 16.7% year on year. Growth was mainly held back by a fall in the stock of new contracts for civil engineering works. The stock of new contracts for buildings increased by 40.1%, while the stock of new contracts for civil engineering works decreased by 14.4%. Over a longer term and on a fixed basis, the current decline in the month-end stock of construction contracts is stagnating this month and is higher than the period prior to the 2018 construction boom; however, if the slowdown in construction continues, it will be close to this lower level.

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



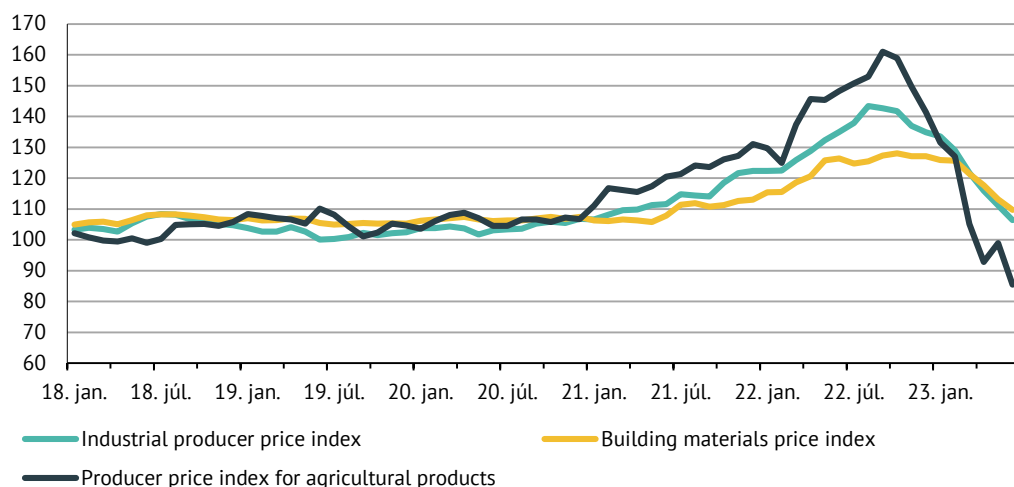
Source: Hungarian Central Statistical Office, Századvég

The agricultural producer price index continued to fall.

In June 2023, the growth rates of the industrial producer price index and the building materials price index continued to decline, while the agricultural producer price index fell substantially. Compared with the same period of the previous year, the agricultural producer price index fell by 14.1% in June 2023, in which the exceptionally high base played a role. The high base effect peaks in October 2022, so this high base effect will play a role in the decline until then. Overall, the 14.1% year on year decline in the agricultural producer price index shows a mixed picture. While producer prices of cereals fell by 39%, producer prices of industrial crops (including oilseeds) by 44.1% and producer prices of plant production and horticultural products by 26.5%, producer prices of vegetables, potatoes, fruit, livestock and animal products increased by varying annual rates. The highest increase in producer prices was for potatoes (71.7%), followed by fruit (35.4%) and vegetables (21.3%). For meat products, livestock producer prices increased by 19.7% and producer prices of animal products by only 5.5% year on year. **Industrial** producer prices increased by 6.4% on an annual basis in June 2023. The high base effect contributed to the slowdown in growth. The year-on-year increase in industrial producer prices continued to be driven by rising raw material prices and production costs, as well as the strengthening of the forint against the euro. In

June 2023, on an annual basis, domestic sales prices increased by 29.8%, while producer prices of export sales fell by 5.0%. This large divergence was driven by changes in energy input prices. Year on year, the energy producer price index increased by 37.5% in June 2023, of which the price index for domestic sales increased by 87.7%, while the price index for export sales decreased by 37.9%. Returning to industrial producer prices, there is already a slow decline on a monthly basis, as industrial producer prices fell by 1.3% month on month. Of this, domestic sales prices fell by 2.4% and export sales prices by 0.7% month on month. **In construction**, the slow decline in building material prices continued. The gradual slowdown in construction output may play a role in this. In June 2023, building material prices rose by 9.7% compared with the same period of the previous year.

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 decreased by 8.3% in June.

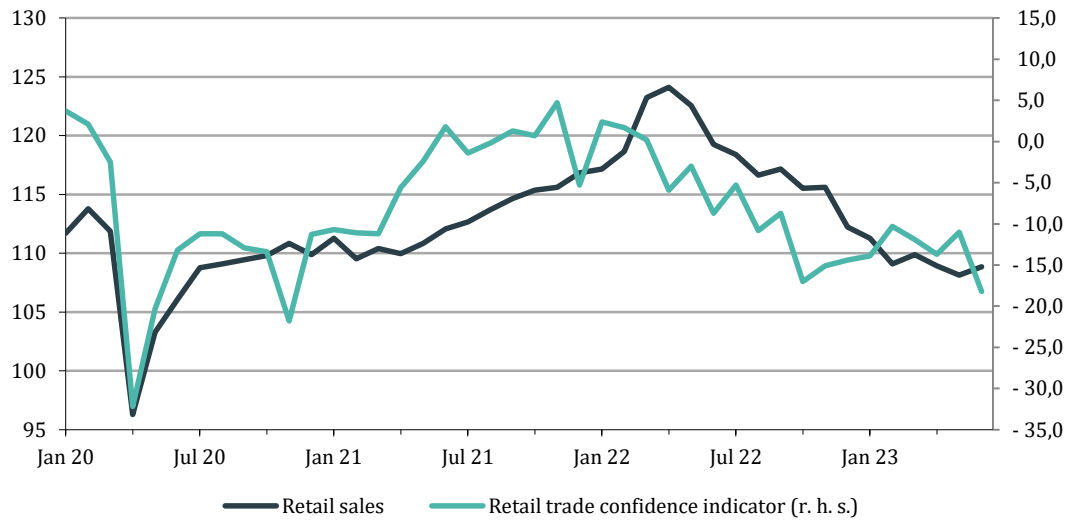
Raw data show that retail sales decreased by 7.8%, while calendar-adjusted data show that it decreased by 8.3% in June 2023, compared to the same period of the previous year. The decline in the volume of retail sales is still due to an inflation above 15%, despite the strengthening of disinflationary trends: as

wages lose purchasing power, the population is forced to rationalise consumption. The discontinuation of the fuel price cap in December will have a similar negative impact on retail sales until the base effect takes effect, as prices fixed at below-market levels have significantly boosted sales volumes over the previous year. However, the prolonged negative trend is set to change, as, for one thing, sales volumes have already increased by 0.7% month on month, which may be a turning point in the steady decline in retail sales. For another thing, the year-on-year decline in retail sales was only 4.7% in the month if vehicle fuel sales are excluded.

In June 2023, turnover in specialised and non-specialised food shops decreased by 4.8%, while turnover in non-food shops also decreased by 4.3%. In fuel retailing, sales fell significantly, by 24.2% year on year, in June.

In food retailing, sales in non-specialised foodstuffs shrank by 5.2% while sales in food products, beverages and tobacco shrank by 4.2%. In nonfood sales, the volume of furniture and electric goods fell by 11.6%, that of parcel delivery and internet services by 4.5% and that of books, newspapers and stationery by 6.6% compared to the same period last year. There was also a significant decrease in the mixed range of manufactured goods (10.8%). In contrast, the biggest sales increase (4.4%) was in pharmaceuticals and medicinal products. In addition, perfume sales also increased (4.1%).

**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 4.0% in June.

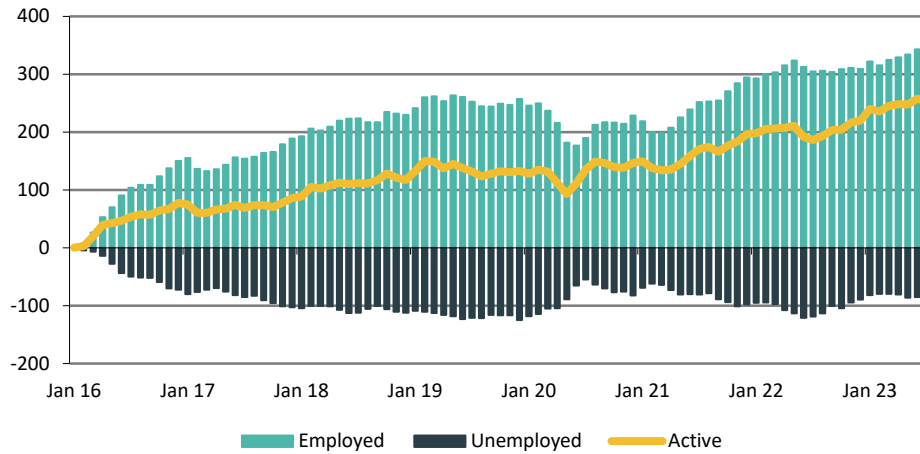
In July 2023¹, the seasonally adjusted activity rate of the population aged 15-74 was 67.3% (4,920,000 persons), which means a labour market growth of 67,000 compared to the same period of the last year. In the period under review, the seasonally adjusted number of employees was around 4,722,000, an increase of 5,000 and 29,000 respectively compared to the previous quarter and the same period of the previous year. Unemployment is again close to the level recorded in the first quarter, with 198,000 people unemployed, an increase of 38,000 compared to the same period last year.

In June, the seasonally adjusted number of employees increased by 500 in one month, while it increased by 9,800 compared to the same period of the previous year. The most significant increase in the number of employees was in the competitive sector, with 29,000 more working in enterprises having at least 5 employees compared to June 2022, up by 1,700 compared to May 2023. The number of public sector employees fell by 800 in the last month, but in the last year there have been nearly 12,000 fewer employees

¹ Three-month moving average

in the sector, a significant decrease. There was no significant change in the number of people working in the nonprofit sector.

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



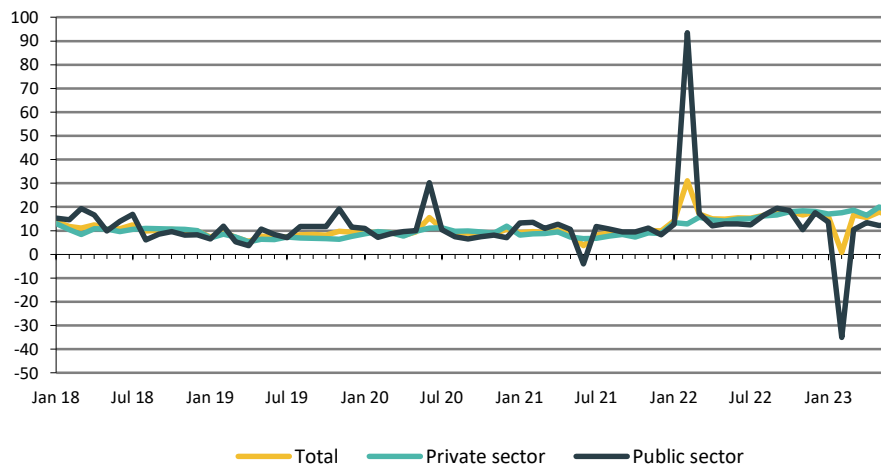
Remark: Seasonally and calendar-adjusted indices

Source: Hungarian Central Statistical Office, Századvég

Real wages continued to fall in June.

In June, the average gross monthly wage in the national economy was HUF 566,800, up 16.0% compared to the same period last year. The highest average gross monthly wage was recorded in the competitive sector, at HUF 577,600. The average net monthly wage including benefits was HUF 390,900, an annual increase of 15.9%. The average regular gross monthly wage, excluding bonuses, rewards and one-off benefits, increased by 14.9% in June 2023 compared to a year earlier, to an estimated HUF 525,300. Inflation, which is still exceptionally high at 20.1% in June, caused real earnings to fall by 3.4%. The median gross monthly wage was HUF 450,000.

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



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

2.4 External balance

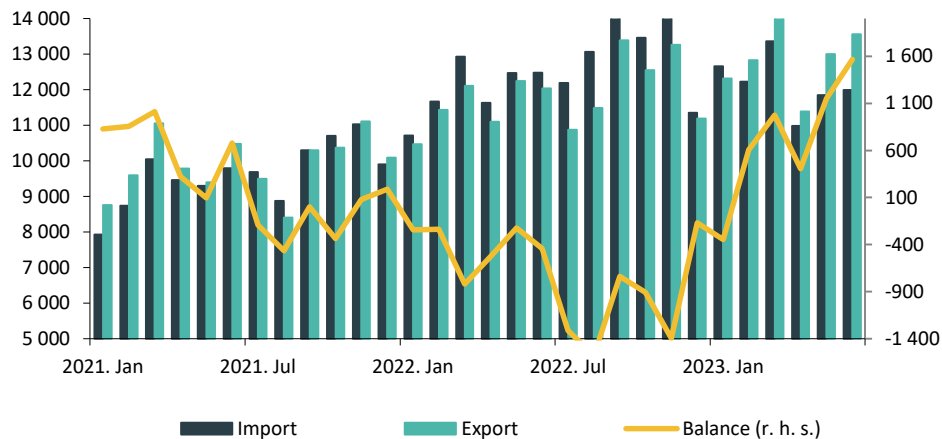
In May, the volume of exports of goods decreased by 3.9% and imports by 1.3% year on year. This brought the foreign trade balance to a surplus of EUR 1.1 billion, an improvement of EUR 1.4 billion compared to the previous year.

In May, the import volume of food products, beverages and tobacco decreased by 2.3%, and their export volume decreased by 9.3% year on year. As for energy carriers, imports decreased by 14.0%, while exports increased by 21.0%. As for processed products, imports decreased by 5.9%, and exports by 2.9% year on year. As for machinery and transport equipment, imports did not change, and exports increased by 9.1%.

The trade balance improved significantly.

In June 2023, the first estimate put the value of exports in euro at 11.0% higher and imports in euro at 4.7% lower than a year earlier. The trade surplus in goods amounted to EUR 1.5 billion, which is EUR 1.9 billion higher than a year earlier.

FIGURE 10: TRADE BALANCE IN GOODS (EUR MILLION)



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

Source: Hungarian Central Statistical Office, Századvég

2.5 Fiscal outlook

Fiscal revenues grew by 21.3% and expenditure by 20.0% in the first seven months, but lower-than-expected VAT receipts and higher-than-planned increases in interest payments on sovereign debt are threatening the annual deficit target.

By the end of July 2023, the central budgetary subsystem had accumulated a deficit of HUF 2,940 billion, which is 86.5% of the annual deficit target. The July deficit was HUF 44.3 billion. This deficit consisted of the HUF 2,983.2 billion deficit of the

central budget, the HUF 118.6 billion deficit of social security funds and the HUF 75.7 billion surplus of extra-budgetary funds.

Central government revenue in the first seven months of the year was 21.3% higher than in the same period of the previous year.

Payments from business organisations were 53.2% higher than in the same period of 2022. Within payments by business organisations, corporate tax, the largest revenue generator, was 40.1% (HUF 198.7 billion) higher than in the first seven months of the previous year. Compared to the same period of the previous year, payments from the energy sector and financial

institutions increased significantly by HUF 254.7 billion and HUF 110.7 billion respectively. The increase in these two items is largely attributable to the special taxes introduced in 2022.

Revenues from consumption-related taxes were 4.8% (HUF 241.6 billion) higher than a year earlier. VAT receipts were HUF 59.6 billion (1.5%) higher than at the end of July in the previous year. In July this year, as in May, VAT receipts were again lower than in the same month of 2022. Excise tax revenue was HUF 34.1 billion (4.7%) more than in the first seven months of 2022. The most significant increase was in excise duties on fuels (HUF 14.3 billion).

Personal income tax receipts increased by HUF 957.1 billion compared to the same period in 2022. The increase is mainly attributable to the low base caused by family tax rebates last year and, to a lesser extent, to wage increases. Receipts from social contribution tax and social insurance contributions increased by 14.5% (HUF 514.5 billion) compared to the same period of the previous year, also caused by wage increases.

Revenue from EU programmes up to July was HUF 802.6 billion, HUF 227.4 billion (39.5%) more than in the same period of 2022. In contrast, expenditure on EU programmes amounted to HUF 1,638.4 billion, HUF 408.0 billion (19.9%) less than the previous year.

Central government expenditure in the first seven months of the year was 20.0% higher than in the same period of the previous year.

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

The amount spent on specific and normative subsidies was HUF 1,410.2 billion higher than at the end of July last year. The most significant item of the increase was HUF 1078.6 billion in expenditure to maintain discount household utility prices.

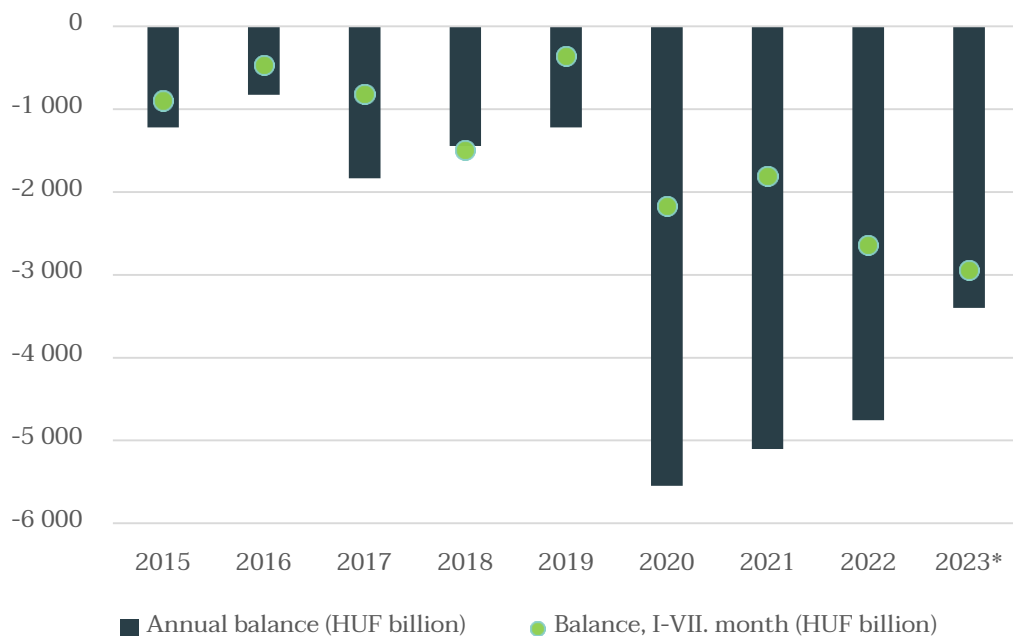
Expenditure on state property increased by HUF 398.9 billion compared to the same period last year. Expenditure on housing subsidies was HUF 28.7 billion higher than in the same period of the previous year.

Compared to the first seven months of the previous year, expenditure on chapter-administered professional appropriations decreased significantly, by HUF 258.8 billion (7.7%); however, compared to June (HUF 555.4 billion), savings in this respect are much more modest.

In the first seven months of 2023, pension expenditure amounted to HUF 3,428.1 billion, up by 22.4% to HUF 628.2 billion compared to the same period in 2022. During the same period, expenditure on the Health Insurance Fund amounted to HUF 2,285.7 billion, an increase of 7.0% (HUF 150.0 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 4.4%.

The balance of interest expenditure and interest income was HUF 567.0 billion (64.3%) more negative at the end of July than in the first seven months of 2022.

FIGURE 11: CENTRAL SUBSYSTEM BALANCE, 2010-2023 (JANUARY TO JULY, HUF BILLION)



Source: Ministry of Finance, Hungarian State Treasury; *compared to the actual deficit in 2015-2022 and the planned deficit in 2023.

2.6 Monetary developments

In July, prices rose by 17.6% on average.

In July 2023, consumer prices increased by 17.6% on average, compared to the same period of the previous year. Over the past year, the highest increases were for food (23.1%) and household energy (35.7%), the latter due to changes in household utility discounts. Consumer prices rose by 0.3% on average over a month. The seasonally adjusted core inflation rate was 17.5% higher than in the same period of the previous year.

The more significant contributors to the 23.1% average increase in food prices were the 30.7% increase in egg prices, the 29.5% increase in dairy product prices, and the 26.7% increase in bread prices. Butter and butter cream inflation of 24.2% and pastry inflation of 25.4% also exceeded average food inflation for the month. In contrast, poultry prices (10.5%), sugar prices (9.9%), margarine prices (3.4%) and edible oil prices (1.5%) rose at a below-average rate. The main drivers of the 14.6% average inflation in spirits and tobacco were primarily the 28.1% increase in beer prices.

The average price increase of 3.6% for consumer durables represents a significant improvement compared to the previous period, driven by factors such as sustained lower input material prices, increasingly efficient supply chains and a significantly stronger forint exchange rate compared to the same period last year. The current value is already within the central bank's inflation target range. Looking at the main group, above-average price increases were also recorded for kitchen and other furniture (12.7%), heating and cooking equipment (11.2%) and new cars (9.5%), among others. Consumer durables inflation is moderated by a 2.0% rise in audio and video equipment and a 2.4% price decline for televisions. It is also important to highlight the improving trend for used cars: in July, used cars prices were down by 6.8% compared to a year earlier, which, due to their high weight, has a significant impact on the overall result for the main group.

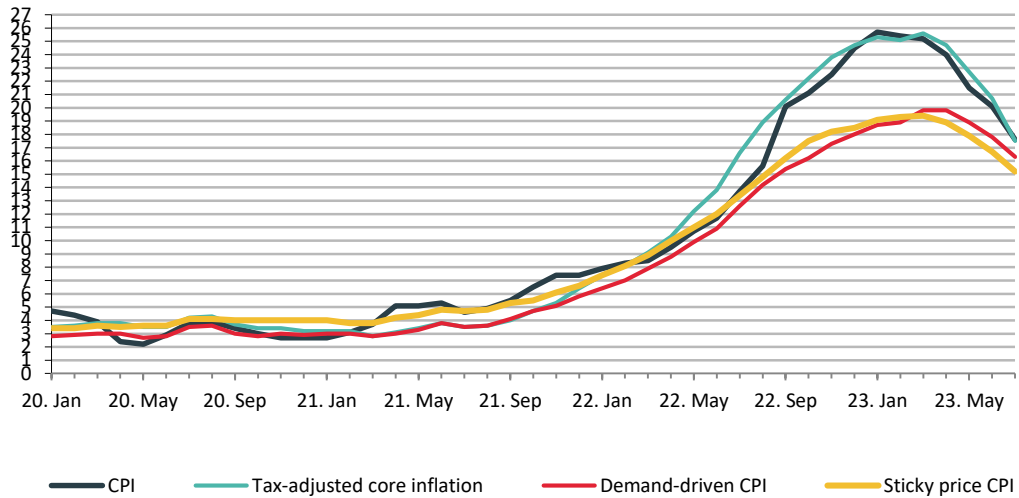
The average increase in household energy prices was 35.7% in July as compared to the same period of the previous year. Within household energy, the price of piped gas increased by 47.2%, electricity by 26.0% and

cylinder gas by 41.6% over the past year. From August 2022, discount household utility prices remain unchanged until the average consumption; however, above that, consumers have to pay a higher price, which is recorded by the HCSO in the billing month. The increase in energy prices will result in an inflation surplus of around 2.5-3% each month, a trend that is expected to continue until September 2023, when the base effect will take effect.

In July, the price of services rose by an average of 14.6%, driven mainly by a 21.2% increase in vehicle repair and maintenance, a 21.7% increase in tickets for sports events and museums, a 22.0% increase in household equipment repair and a 42.5% increase in other long-distance travel. Domestic holiday prices also increased significantly, by 23.0%. 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%. In contrast to the other main groups, services inflation has not started to fall on an annual basis, but continues to rise, slowing the decline in the overall inflation rate.

Compared to the previous month, food prices fell by an average of 0.9%, with the largest decreases recorded for eggs (5.0%), milk (4.4%) and bread (3.9%). Prices of services rose by 1.7% on a monthly basis, while the price of household energy increased by 1.1% compared with the previous month. Vehicle fuel prices also increased at the same rate.

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



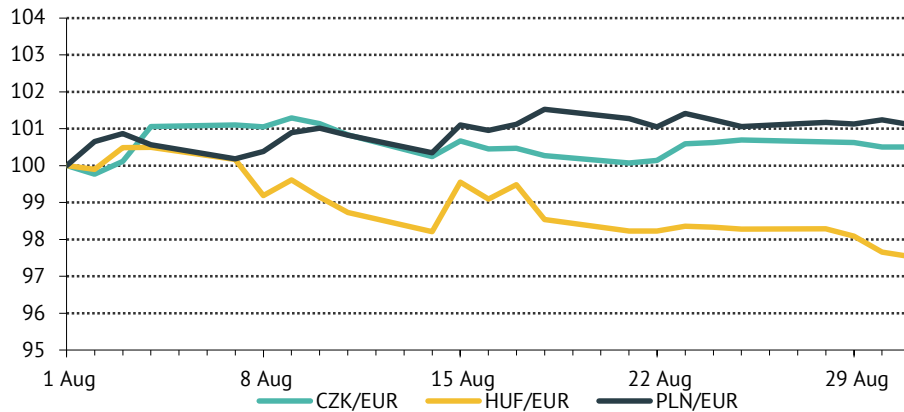
Source: MNB, Századvég

Among the core inflation indicators published by the MNB, in July, the seasonally adjusted core inflation rate and the core inflation rate net of indirect taxes were 17.5%, and the sticky price inflation rate was 15.2%. Core inflation excluding processed food was 16.3% in July.

Currencies of regional competitors weakened against the euro.

Developments in the region were negative against the euro in August, with the exception of the forint. In the past period, the Czech koruna weakened by 0.5%, the Polish zloty weakened by 1.1% against the Euro. Government bond yields also rose over the period under review, with the Czech 10-year government bond yield 22 basis points higher at 4.32% and the Polish 10-year yield 13 basis points higher at 5.59%.

**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 dollar.

Hungarian money and foreign exchange market indicators have declined in the recent period, but strengthened again in August amid high volatility. The HUF strengthened by 2.5% against the Euro, by 2.2% against the Swiss Franc, and by 1.6% against the US Dollar. This means that at the end of August 2023, one euro was worth 380 forints, one US dollar was worth 349 Forints and one Swiss franc was worth 397 forints. Sovereign debt held by foreigners increased by HUF 123 billion to HUF 7,016 billion in the past month.

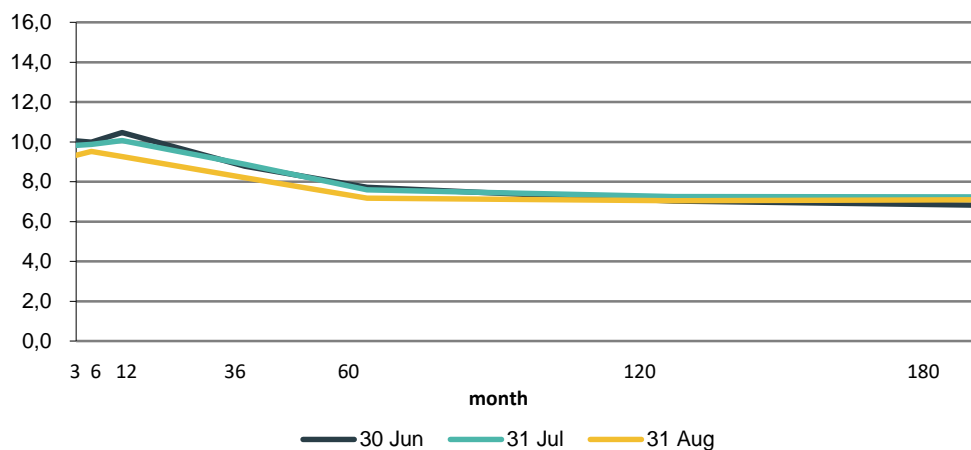
The central bank continued its monetary easing in August.

At its meeting in August, the Monetary Council of the central bank did not change the base rate (13.0%) but continued to cut the policy rate. The Monetary Council left the overnight deposit interest rate at 12.5%, but also lowered the upper limit of the interest rate corridor by 100 basis points to 16.5%, together with the policy rate. The central bank’s effective rate, the interest rate in overnight deposit quick tenders, fell to 14.0%. Overall, the central bank continued to ease monetary policy, but markets have already priced in the convergence of the policy rate and the base rate in September.

The question is mainly what steps the central bank will then take to continue the period of interest rate cuts.

In the government bond market, yields for shorter maturities varied between -35 basis points and -80 basis points on the secondary yield curve in August. This means that the 3-month yield was 9.32%, the 6-month yield was 9.52% and the 1-year yield was 9.26% on 31 August. The 3-year yield fell by 68 basis points to 8.2%. Yields are down 41 basis points over the 5-year horizon, 22 basis points over the 10-year horizon and 15 basis points over the 15-year horizon compared to the previous month. These three yields changed, therefore, to 7.18%, 7.04%, and 7.09%, respectively.

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



Source: GDMA, Századvég

On 31 July 2023, the total value of “MÁP Plusz” government securities held by retail investors was HUF 1,134.0 billion after a HUF 1300.5 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 environment, households prefer to buy discount bonds and the inflation-tracking Premium Hungarian Government Bond (PMÁP), whose cumulative value has risen to HUF 6,203.4 billion, an increase of HUF 1,881.8 billion compared to the end of 2022. In the significantly higher interest rate environment, the total stock of government securities held by households

stood at HUF 9,319.3 billion at the end of June 2023, up from HUF 8,619.3 billion at the end of 2022, i.e. HUF 700.0 billion more than in the last month of the previous year.

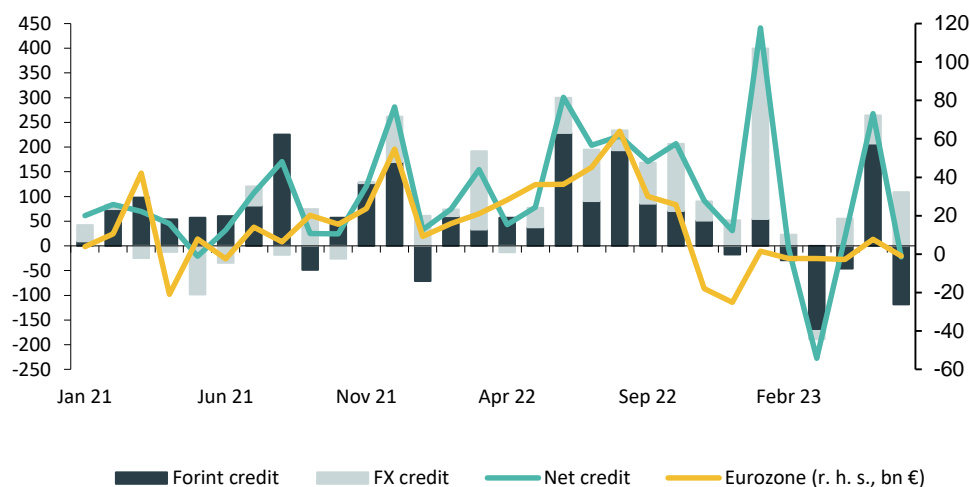
The share of foreign currency debt in the sovereign debt changed to 26.0% in July (i.e. increased by 0.82 percentage point from the previous month), which is in the range (maximum 30%) specified in the financing plan for 2023 of GDMA. In the first seven months of the year, average foreign currency debt averaged 25.6%, a level exceeded in July.

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.

The stock of foreign currency loans to companies increased.

Seasonally adjusted data show that the net repayment of HUF loans in the business sector was HUF 118.8 billion in June 2023. In contrast, net foreign currency borrowing increased, with HUF 108.6 billion in June 2023. Seasonally adjusted total net loan repayments amounted to HUF 22.3 billion in the period under review. Corporate loan repayment in the euro area was minus EUR 0.9 billion in June 2023.

FIGURE 15: CORPORATE BORROWING (HUF BILLION)



Source: MNB, ECB, Századvég

3. Századvég's forecast²

TABLE 1:2023 Q2 FORECAST

	2022	2023	2024
Gross domestic product (volume index)	4.6	1.1	4.3
Internal market demand (volume index)	5.1	-2.2	4.6
Export volume index (based on national accounts)	11.8	2.5	6.9
Import volume index (based on national accounts)	11.1	-0.5	6.8
Balance of international trade in goods (EUR billion)	-8.5	-3.7	-3.7
Consumer price index (%)	14.4	18.6	5.1
Central bank base interest rate at the end of the period (%)	13.0	11.7	6.6
Unemployment rate (%)	3.6	4.3	4.6
Current account balance as a percentage of GDP	-8.2	-4.1	-3.3
Net lending as a percentage of the GDP	-6.2	-2.1	-1.3
ESA balance of public finances as a percentage of GDP	-6.2	-3.9	-3.3
Sovereign debt as a percentage of GDP	73.5	68.2	67.1

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

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

	2023			2024		
	03.2023	06.2023	change	03.2023	06.2023	change
Gross domestic product (volume index)	0.6	1.1	0.5	3.4	4.3	0.9
Internal market demand (volume index)	-1.4	-2.2	-0.8	1.6	4.6	3.0
Export volume index (based on national accounts)	1.8	2.5	0.7	4.5	6.9	2.4
Import volume index (based on national accounts)	-1.0	-0.5	0.5	2.6	6.8	4.2
Balance of international trade in goods (EUR billion)	-6.5	-3.7	2.8	-5.5	-3.7	1.8
Consumer price index (%)	17.5	18.6	1.1	4.5	5.1	0.6
Central bank base interest rate at the end of the period (%)	10.7	11.7	1.0	7.8	6.6	-1.2
Unemployment rate (%)	3.9	4.3	0.4	3.6	4.6	1.0
Current account balance as a percentage of GDP	-4.0	-4.1	-0.1	-2.2	-3.3	-1.1
Net lending as a percentage of the GDP	-1.7	-2.1	-0.4	0.0	-1.3	-1.3
Balance of public finances as a percentage of GDP	-3.9	-3.9	0.0	-2.5	-3.3	-0.8
Sovereign debt as a percentage of GDP	69.7	68.2	-1.5	67.6	67.1	-0.5

Source: Századvég's calculation

² Date of preparation: 22 June 2023