

Monthly Macroeconomic and Monetary Review

June 2022

Monetary Policy and Economic Analysis Department





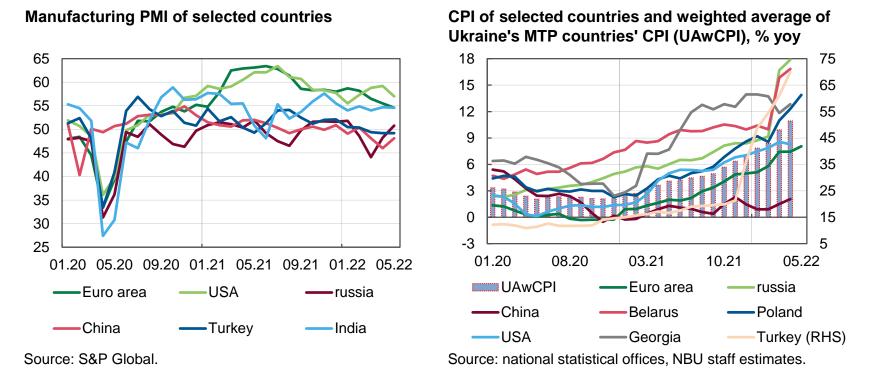


Summary

- The risks of a slowdown in the global economy continue to increase. Inflation pressures are rising, pushing to speed up the normalization of monetary policy. Financial conditions for EMs are tightening
- Consumer inflation in Ukraine continued to accelerate (to 17% yoy in May, according to web scraping, from 16.4% yoy in April). Disruptions of production and supply chains, destruction of production capacities and infrastructure, occupation of territories fueled inflation further. However, disinflationary factors seem also gaining strength, both on the supply and demand sides
- In May, economic activity continued to recover in both the manufacturing and services sectors. However, it may be partly driven by seasonal factors. According to NBU's flash surveys, only 14% of enterprises did not work as of end-May, but capacity utilization was 40% lower than the pre-war level
- Despite the revival of economic activity in May, demand for labor remains sluggish, supply far exceeds demand. Most companies are unable to pay pre-war wages. Households' incomes are supported by social benefits, increased pensions and military payments
- As import recovered faster than exports, the merchandise trade balance turned into a deficit in April. However, sizable international financial assistance and resilient remittances helped maintain the current account surplus
- The state budget deficit continued to widen in May, reflecting significant budget needs and a decrease in revenues (due to the decline in economic activity and provision of tax benefits). The deficit was financed by international financing and the placement of war bonds, the lion's share of which was bought by the NBU
- Disbursed international financial assistance helped partially compensate for large FX interventions on the interbank market. However, reserves are declining
- The NBU returned to active interest rate policy, the key rate was raised from 10% to 25%. This will help protect households' income and savings in the hryvnia and strengthen the NBU's National Bank capability to maintain the exchange rate stability and restrain inflation processes during the war 2

External Environment

Risks of global economic slowdown continue to grow

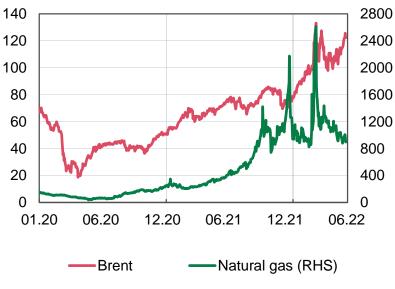


- Sluggish demand, elevated inflation, and global value chain disruptions amid lockdowns in China and war in Ukraine limited the increase in global manufacturing production volumes. Growth in new orders and international trade has slowed
- Input and output prices increased at one of the highest rates in the survey history but already lower than in April
- Generally, food and energy prices contributed to inflation the most. However, core inflation has been rising as well, signaling broader inflationary pressure

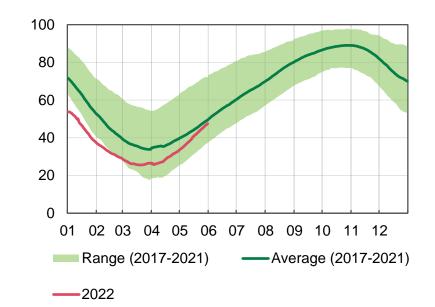


Global energy prices show mixed dynamics as supply factors play out

Crude oil (USD/bbl) and natural gas (TTF, USD/kcm) world prices



EU gas storage stocks, % full



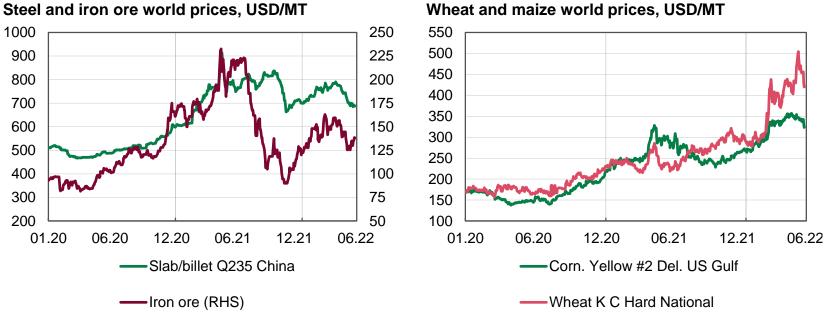
Source: Refinitiv.

Source: Gas Infrastructure Europe.

- Oil rose in price due to:
 - a drawdown of U.S. inventories in the run-up to a seasonal increase in demand,
 - a lack of new OPEC+ agreements to increase production, and
 - a possible embargo on imports of russian oil to the EU. The latter was agreed in late May, although it did not cover oil supplied by pipelines
- European natural gas prices fluctuated around \$1,000 per kcm but were under downward pressure. Record LNG shipments and continued supplies from Russia to most EU countries allowed to rapidly fill storage facilities in Europe close to the average level for this period over the past five years



Global prices in other commodity markets have been declining but remain at elevated levels



Source: Refinitiv.

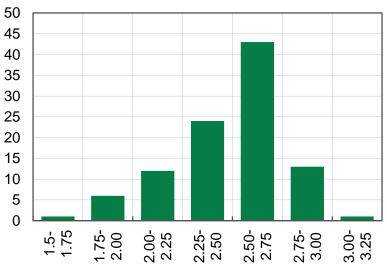
Source: Refinitiv.

- Steel prices declined, owing to weak demand, primarily in China, and a significant drop in scrap prices in most regions. However, high production costs due to expensive energy resources kept prices from falling even further. Activity in China has been determining the dynamics of iron ore prices: the decline at the beginning of the month amid a more stringent lockdown turned into growth at the end of the month on expectations that the Chinese government lift restrictions and introduce additional economic stimulus
- Deterioration in crop conditions in the United States, Northern Europe, and India, which had even imposed export restrictions in response, caused an increase in wheat prices. Meanwhile, talks that Ukrainian ports could be unblocked contributed to their decline at the end of the month. Corn prices have been gradually declining as better weather in the United States allowed to speed up sowing



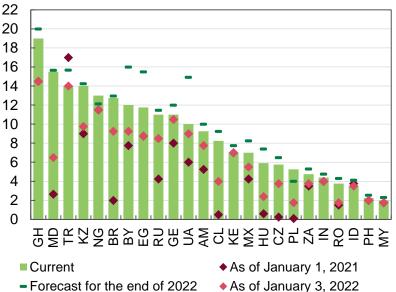
Higher than expected inflation forces central banks to accelerate monetary policy normalization

The Fed funds rate expected level by the end of 2022, K % of respondents



Source: Reuters poll, conducted May 12-18, 89 analysts responded.

Key policy rates in selected EM countries, %

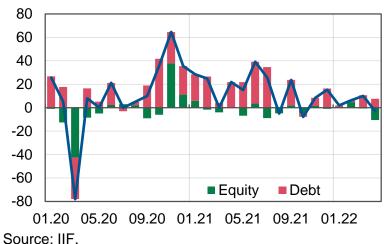


Source: official web-pages of central banks, Focus Economics, Trading Economics, as of 01.06.22.

- Both major CBs and those of EM countries are tightening their monetary policy
- Exceptions:
 - The CB of russia sees room for additional cuts
 - The CB of China lowered the 5-year LPR rate (by 15 bps to 4.45%, more than expected) to support the real estate sector but left the 1-year rate unchanged amid concerns about capital outflows

Tighter financial conditions, risks of global economic slowdown, and geopolitical tensions reduce risk appetite

Non-resident portfolio flows to EM (excluding China), USD bn

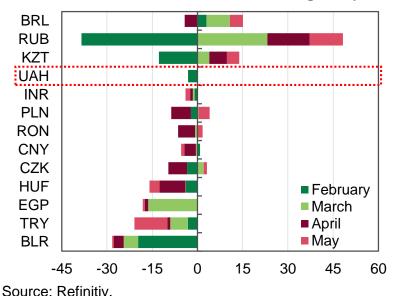


- Eastern European and Middle East countries experience the sharpest tightening of financial conditions due to proximity to war and close ties with russia
- Latin American countries are an exception: faster tightening of monetary policy and better terms of trade owing to higher commodity prices have supported capital flows

Global equity indices, 01 Jan 2019 = 100



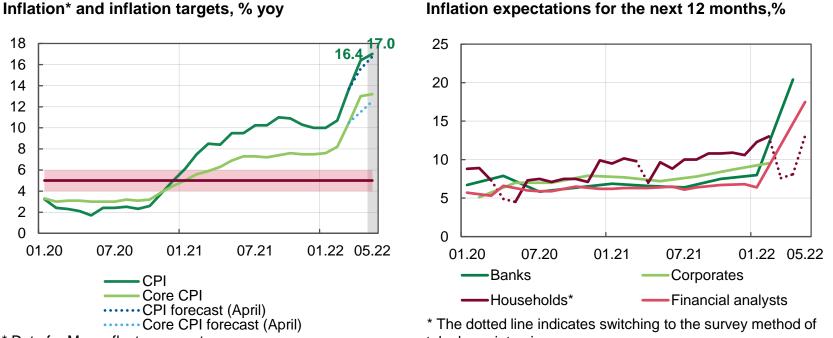
Selected EM currencies vs USD, % change, eop



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Ukraine: Inflation

Inflation in Ukraine continues to accelerate primarily due to supply shocks



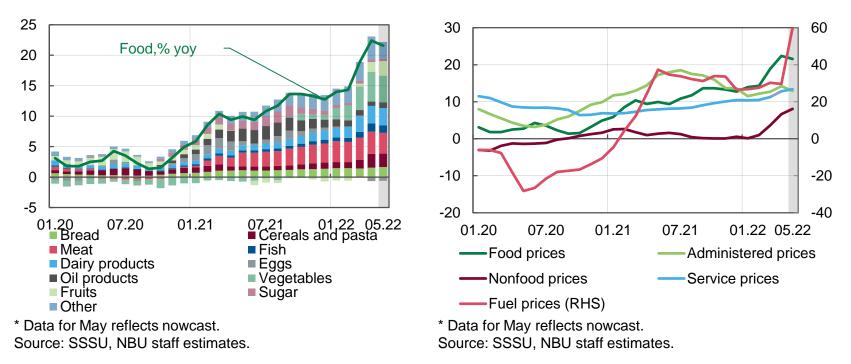
* Data for May reflects nowcast. Source: SSSU, NBU staff estimates. telephone interviews.

Source: NBU, GfK Ukraine, Info Sapiens, Consensus Economics.

- The main factors accelerating inflation are supply shocks, namely:
 - production and supply chain disruptions
 - destruction to production capacities and infrastructure
 - occupation of territories
- The consequences of these are the emergence of local and/or temporary deficits (fuels, salt), increased business costs, a shock rise in prices in the occupied territories
- Inflationary expectations are deteriorating

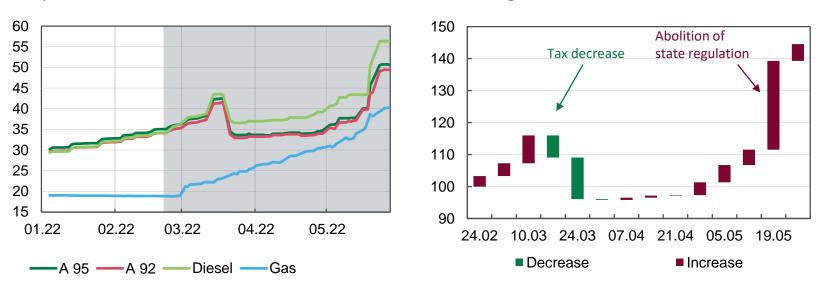
However, signs of disinflationary impact of demand and structural distortions are growing

Contributions to the annual change in food prices, pp Selected CPI components*,% yoy



- There are not only pro-inflationary shocks from the supply side. Due to the surplus of agricultural raw
 materials amid limited export capacity, there is a downward pressure on the prices of a number of food
 products (flour, bread, oil, meat and dairy products, eggs)
- A moderate acceleration in prices for services and non-food products may reflect an increased impact of declining consumer demand
- Introduction of a moratorium on raising heat tariffs and gas distribution for the period of martial law and 6 months after its completion by the Cabinet of Ministers restrains inflation

Fuel shortages in the domestic market are the main factor in its price rise



Fuel prices, UAH / L

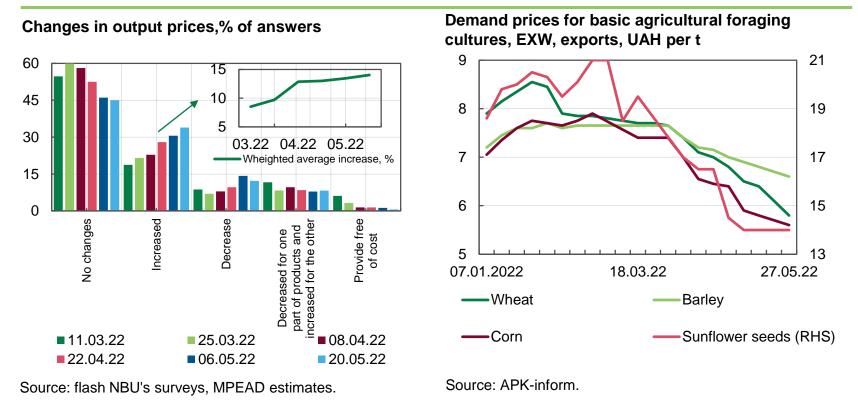
Source: minfin.com.ua, NBU calculations.

Source: minfin.com.ua, NBU calculations.

Prices for gasoline A-95, 17-23.02.22 = 100

- Deficit is caused due to destruction to fuel infrastructure and refineries by russian invaders, port blockade, more expensive and longer logistics
- Since May 17, the <u>government decided</u> to abandon state regulation of fuel prices so that market operators could saturate the Ukrainian oil market
- At the same time, world oil prices remain high increased to \$121 per barrel. As a result, fuel prices are expected to stabilize, but at a high level

The surplus of agricultural products is pushing prices down, but the price pressure is growing due to logistics problems



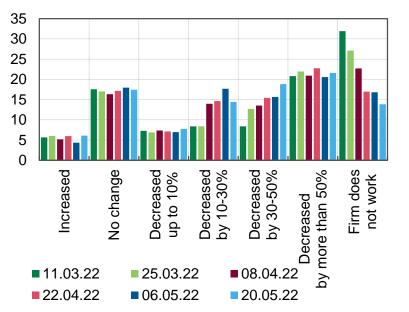
- The share of enterprises that increased output prices reached a third of all respondents, especially the share of those whose prices grew by 10-20%, rose
- Agricultural enterprises dominate among those who have lowered prices due to the surplus of agricultural products because of restrained export capacity

Ukraine: Economic activity

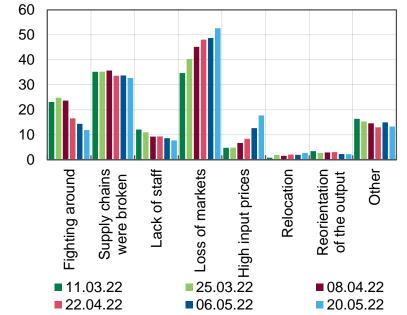


In May, economic activity continued to recover,...

Change in the level of capacity utilization compared to pre-war level, % of responses



Reasons for changes in capacity utilization level,% of answers



Source: flash NBU's surveys.

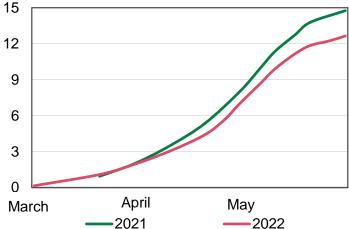
Source: flash NBU's surveys.

- The number of companies that completely ceased their activity fell to 14% in the second half of May (17% in April), but the overall capacity utilization rate remains 40% below pre-war levels
- The loss of markets and increasing price pressure are holding back the recovery. The negative impact of disrupted logistics, in particular fuel supplies, is persistently significant
- The assessment of the strength of enterprises has also improved. In May, the number of enterprises that did not experience problems with lack of resources increased (up to 36%). 40%
 of respondents will have enough resources for more than a month



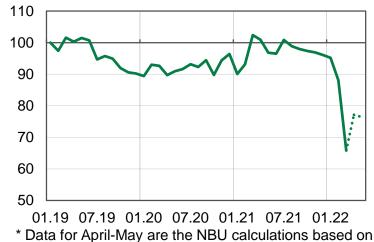
... in the manufacturing sectors...

Field work of spring crops (area of crops), thousand hectares



Source: Ministry of Agriculture.

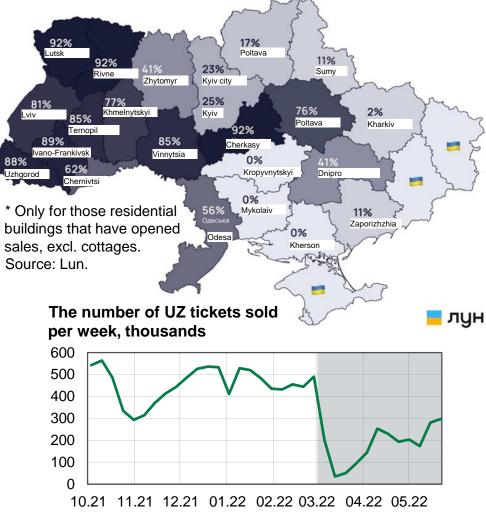




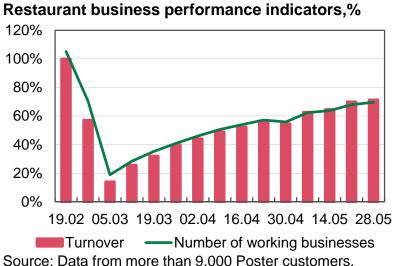
National Bank DEEX data and news.

of Ukraine Source: Ukrenergo, UEEX, NBU calculations.

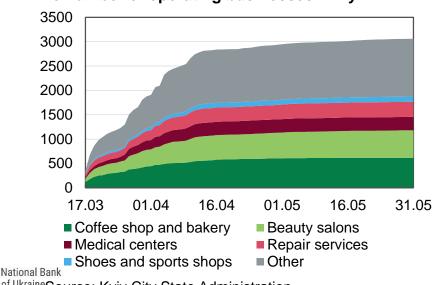
Sales openings in new buildings* as of 30 May 2022, % to the pre-war (24.02) level

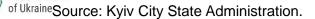


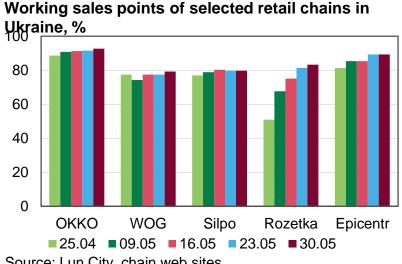
... as well as services sectors, which may, however, partly reflect seasonality



The number of operating businesses in Kyiv

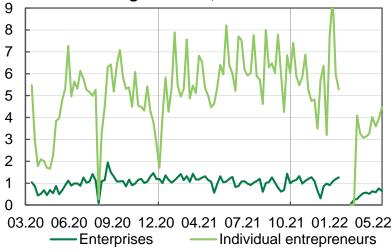






Source: Lun.City, chain web sites.

New business registrations, thousands



Source: Opendatabot (data not available for the period when 17 registration was suspended).

The activities of a number of metallurgical and mining enterprises revived in May, energy infrastructure is being rebuilt

Metallurgy

- Some producers continue to get out of conservatorship and increase capacity, in part due to the abolition of customs duties by Western countries. Some companies report they have resolved the problems with export logistics and created new transport corridors
- An increase in production capacities is restrained by repairs and the risk of hostilities; part of the capacities is destroyed, which will undermine the possibility for the recovery

Mining

- Coal production by state-owned mines has fallen by 37% since the start of the war; some private companies continue to operate and increase hiring to ramp up volumes, including due to the establishment of new export routes
- Gas production is increasing due to the launch of new inter-industrial gas pipelines in the central and eastern regions; some private companies brought mining to pre-war levels
- The main salt mining company has stopped working, instead legal amber mining is increasing

Energy

- Due to lack of coal, Zaporizhzhya TPP, Slovyanska TPP and Kharkiv TPP-5 were shut down; 7 out of 15 NPP power units are operating. Energoatom has launched new capacities for electricity production
- Due to active hostilities, there is no gas supply in Luhansk and Donetsk regions, and the number of disconnected gas distribution stations has increased by 75%
- Most of the destroyed energy infrastructure has been restored in the de-occupied territories as well as gas and electricity supply; electricity and gas supply has been restored in the whole Kyiv region
- Exports of electricity to Moldova have started against the background of declining domestic consumption. Ukrhydroenergo is ready to start exporting electricity to Poland

The return of the citizens, government procurement and relocation of enterprises to the west support other industries

Food Industry

- With the return of the citizens, food producers resume work in the de-occupied territories, introduce new and reopen existing production facilities in the western and central regions. Excess raw materials and the reorientation of consumers to more affordable and cheaper domestic products support the expansion of the product range
- The industry is constrained by export restrictions, reduced purchasing power and rising production costs due to logistical difficulties and rising energy prices
- Some manufacturers keep production volumes, shifting from the Ukrainian to the European market

Engineering

- Engineering is supported by the needs of the energy, transport and mining industries and the production of special equipment, in particular through foreign contracts and government procurement
- Amid growing certainty and the relocation of military actions to the east of the country, manufacturers of components focused on the Western automotive industry began to resume production

Light and pharmaceutical industries

- Some large pharmaceutical companies have reached the pre-war level of production, in particular thanks to the production of drugs for defense and due to increased export opportunities. A number of manufacturers have mastered the production of new products
- At the same time, the demand for veterinary drugs has significantly decreased due to the reduction of livestock and limited access to the market by regions with active hostilities
- A number of clothing and equipment manufacturers have restarted operations in the west of the country and increased production, working for the army



Sowing continues, new export routes are being established and housing construction is being revived

Agriculture

- Sowing of spring cereals and legumes as of May 26 was completed by 78% of last year's levels (13.2 million hectares or 93% of the plan of the Ministry of Agriculture for this year, the plan 14.2 million hectares, which is 16% less than last year)
- Farmers continue to optimize crop structure: reduce land under corn, instead increase crops of wheat, soybeans, buckwheat
- Dairy farms that are in the zone of active hostilities and occupation suffer from the destruction of farm infrastructure and the death of animals; fodder shortages; lack of veterinary drugs and disinfectants; broken supply, processing and sales chains

Transportation

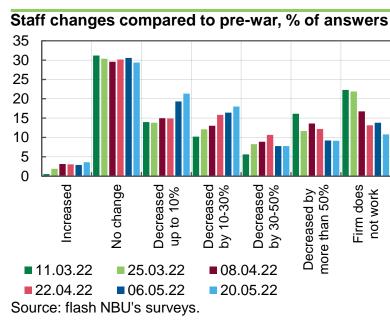
- There is a significant recovery in the transport sector: freight traffic by Ukrzaliznytsia (UZ) resumed up to 45% of pre-war capacity, an additional border crossing was opened for grain cargo transportation
- UZ restored a number of railway connections against the background of de-occupation of some regions and restoration of passenger traffic due to the return of the population; passenger service with the EU is increasing
- However, the queues at the western crossings are still significant, and UZ export capacities are limited by the lack of border infrastructure and the consequences of the shelling

Construction

- Housing construction has resumed in all regions remote from hostilities; housing construction works were also resumed in de-occupied cities; reconstruction and overhaul of damaged houses and social infrastructure premises have been started in Kyiv
- Construction is also supported by the restoration of transport infrastructure and the creation of new production facilities in safe areas (construction of factories, granaries, etc.)
- Manufacturers of construction products are beginning to adjust due to growing demand

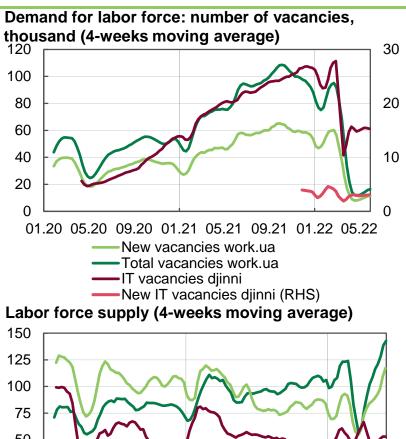
Ukraine: Labor market

Despite reviving economy, demand for workers remains subdued. Supply notably exceeds demand



- According to the NBU surveys, the share of firms that significantly cut staff (over 30%) and those that did not change the number of employees has stabilized
- The weighted average employment rate has improved, which, however, may be due to seasonality. In addition, it is still 25% lower than before the war (40% in early March)
- The increase in the number of vacancies is significantly lower than the increase in resumes, even for IT

* Includes job search gueries in Ukrainian and Russian. ** Includes National Bank job search requests in Poland, the Czech Republic, Russia and of Ukraine Germany in Ukrainian and Russian from Ukraine.





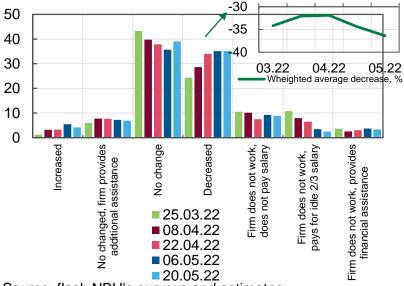
IT candidates djinni, thnd

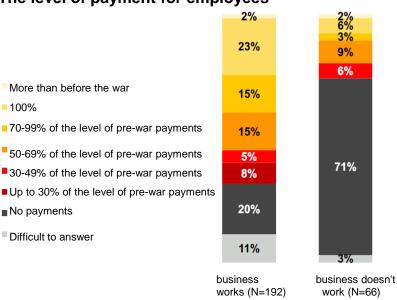
22 Source: work.ua, Opendatabot, Google Trends, NBU staff estimates.



Most companies are unable to pay pre-war wages

A change in salaries compared to pre-war levels, % of answers





The level of payment for employees

Source: flash NBU's surveys and estimates.

Source: Gradus/KSE.

- According to various surveys, the fall in wages in the private sector averaged 25% to 50% compared to pre-war times
 - according to flash NBU surveys, most such companies were in the mining industry and construction. The share of enterprises that have reduced wages by 10%-50% is gradually growing, in particular in the energy, services, transport and trade sectors. Agricultural enterprises dominate among those who have not changed or even increased wages
 - According to grc.ua, salaries in May were 10%-60% lower than before the war (depending on the type of activity). At the same time, in May, compared to April, salaries were raised for drivers, physicians and pharmacists, in the manufacturing and agriculture
- Slightly better situation is in the budget sector the staff was partially sent to the idle regime with the payment of 2/3 of salaries

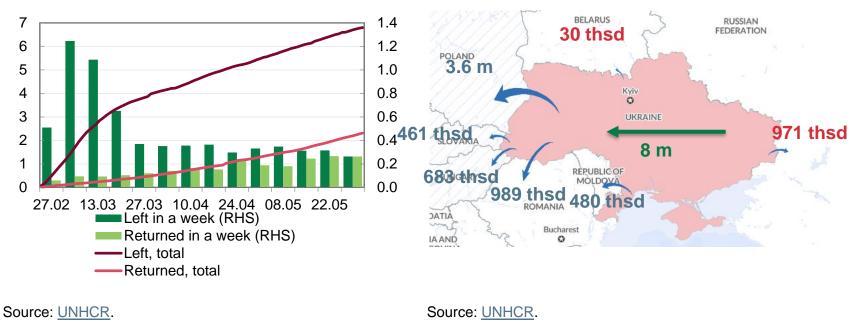
National Bark of Ukraine

However, household incomes are supported by social benefits, higher pensions and increased payments to the military servants

In May, the process of citizens returning to Ukraine intensified

The number of Ukrainians crossing the border from and into Ukraine, millions

Refugees from Ukraine by neighboring countries and internally displaced persons (as of 29 May 2022)

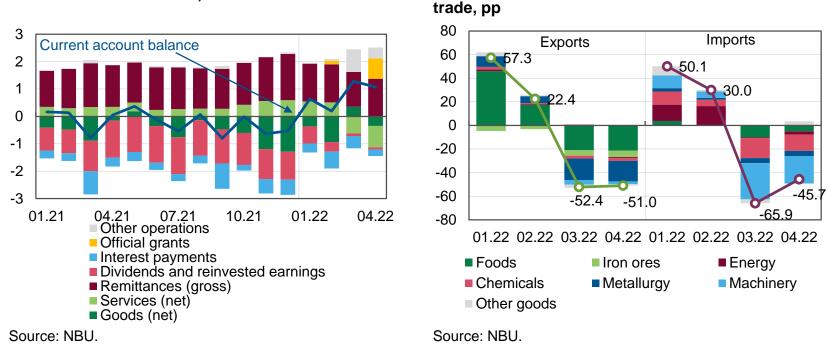


- The number of departures from Ukraine has slowed down, while the rate of return is growing. Thus, in the last week the number of those who returned even exceeded the number of those who left
- This is also testified by mobile operators data

Ukraine: Balance of Payments

In April, the merchandise trade balance returned to the deficit, although the current account surplus persisted

Contributions to the annual change in merchandise

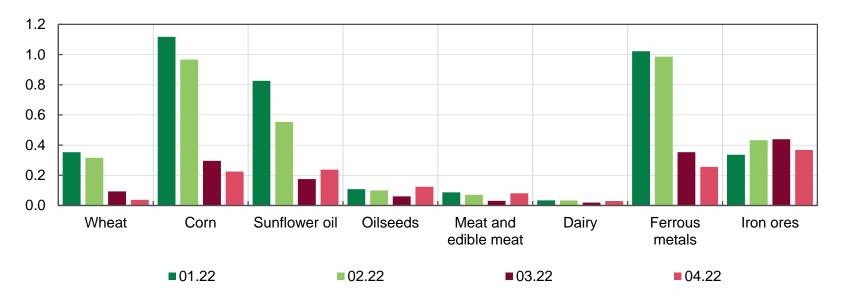


Current account balance, USD bn

- Exports of goods remained almost at the level of March, comprising only a half of last year's volumes
- Instead, imports of goods increased, thus slowing down its decline in annual terms. It expanded across almost all major groups of products, but imports of motorcars did the most
- Therefore, the merchandise trade balance returned to the deficit in April. Moreover, the negative balance in trade in services continued to widen due to the higher imports of travel services and a moderate recovery in exports of IT-services
- However, sizable international financial assistance, resilient remittances, lower reinvested income and suspension of dividends helped maintain the current account surplus

The recovery of merchandise exports is hampered by logistics hurdles and the destruction of production facilities

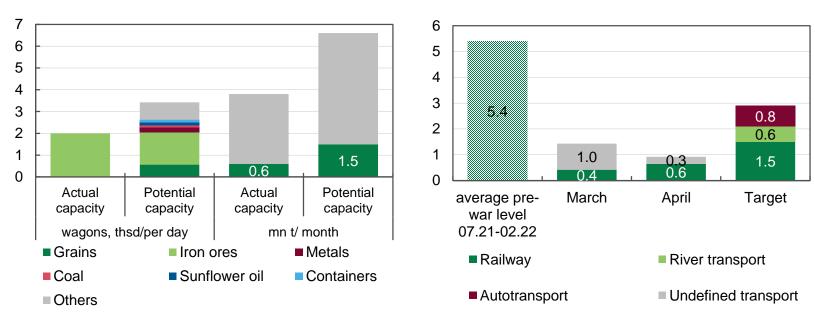
Exports of selected goods, USD bn



Source: SCSU.

- Compared to March, exports of food products recovered somewhat, primarily on account of sunflower oil, oilseeds and meat. The significant decrease in grain exports (by almost 1/3) may be due to the lack of additional custom registrations of batches exported in previous periods, as it was in March
- The decline in exports of iron ores and ferrous metals persisted due to the destruction and conservation of production facilities, as well as difficulties with the shipment of products for export, and the available logistics routes being highly loaded

Even if transportation capacity reaches its potential, it would allow exporting less than 50% of the pre-war grain exports



Cross-border railway capacity

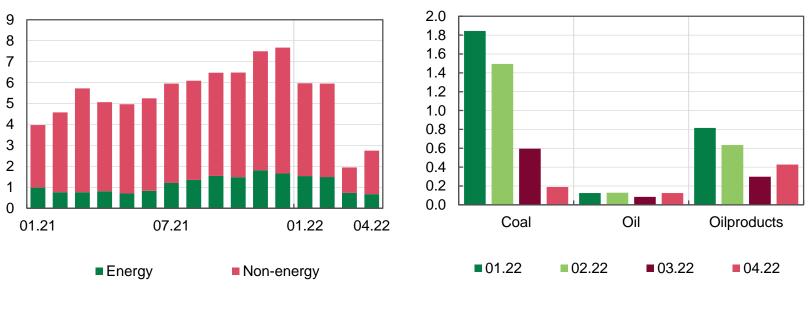
Source: Ukrzaliznytsia.

Source: SCSU, Ukrzaliznytsia.

Exports of grain, m tones/month

- UZ export capacity is restrained by:
 - insufficient transshipment capacity at borders;
 - shortage of wagons in Europe (the share of railway transportation in Europe comprises around 15-35% of the total, in Ukraine - 65%)
 - the need for reloading from wide to narrow gauge and vice versa or shredding trains (for example, in Moldova due to unsatisfactory track condition)
 - bureaucratic procedures (phytosanitary control, product quality control, the need to coordinate movements)

The gradual recovery of economic activity and implemented tax preferences led to an increase in merchandise imports



Energy products imports, m t

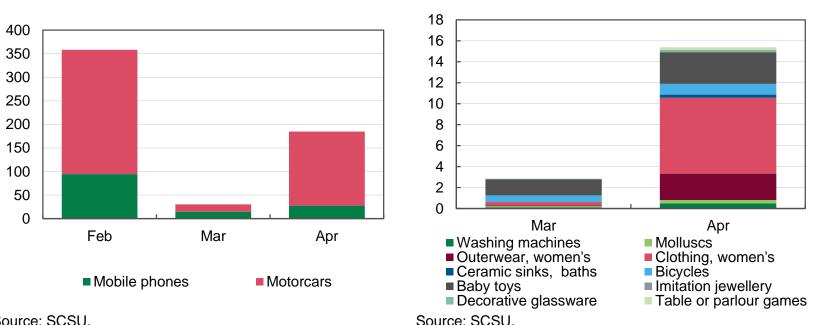
Source: NBU.

Imports of goods, USD bn

Source: SCSU.

- Country's defense needs, as well as the gradual resumption of industrial and commercial enterprises activity, led to increased purchases of non-energy goods: machinery, food, and industrial goods. Liberalization of merchandise imports taxes was an additional factor in its recovery
- Energy imports have been hampered by seaport blockades and logistics hurdles on the western border, while the gradual resolution of oil transportation problems has boosted their purchases

Preferential taxation stimulated an increase in imports of not only essential goods



Imports of selected goods, USD m

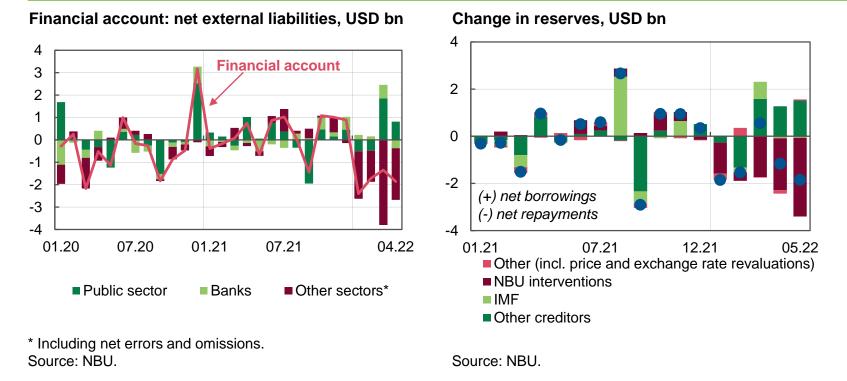
Source: SCSU.

- Compared to March, imports increased in April:
 - motorcars 10 times •
 - mobile phones almost doubled
 - washing machines almost guadrupled •
 - mollusks more than 3 times •
 - sinks, washbasins 13 times •
 - decorative glassware 13 times •
 - imitation jewelry has doubled •
- Imports of fur and finished leather, parts and accessories for musical instruments, cut flowers, combs and hairpins exceeded last year's volumes

National Bank of Ukraine



Disbursed international financial assistance helped partially compensate for large FX interventions

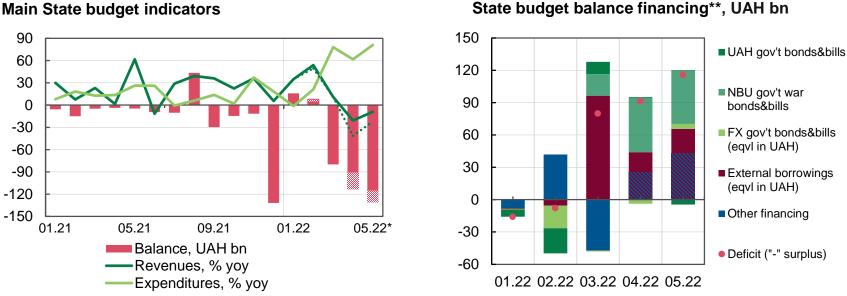


- Capital outflows from the private sector slightly slowed down but continued to be determined by an increase in non-residents' liabilities under trade credits and a further rise in FX cash outside banks
- The public sector saw capital inflows, which, however, decreased compared to March as the government was receiving grant funds, which are accounted for in the current account
- Disbursed international financial assistance helped partially compensate for large FX interventions on the interbank market. Even with reserves being declining, it helped to maintain them at a fairly high level

Ukraine: Fiscal sector



A sizeable budget deficit comes from significant budget needs and weak revenues



Main State budget indicators

* High-frequency data from the MFU website. Dotted and patterned fillings show relevant indicators excluding grants.

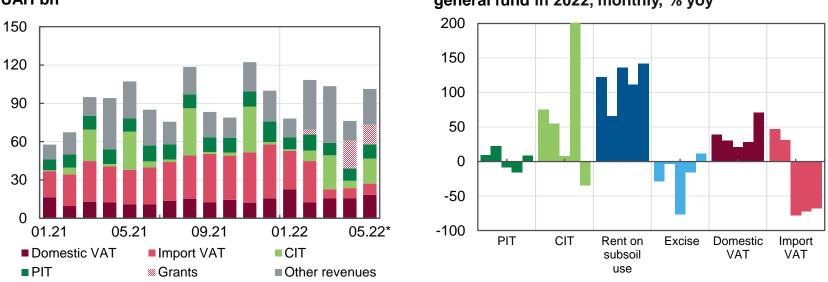
** Debt transactions are net borrowings. NBU calculations based on the MoF's website information.

Source: Treasury, MoF, openbudget.gov.ua, NBU staff estimates.

- In May. the state budget deficit continued to widen, and in Jan-May 2022, the negative balance exceeded the annual deficits in the previous two years
- Revenues continued to decline, but their decrease slowed somewhat supported by both tax and non-tax revenues (in April, the latter plunged as the NBU transferred its profit earlier)
- At the same time, expenditures expectedly surged, primarily those directed to defense needs and social programs
- The state budget deficit was covered by international and monetary financing

Due to the decline in economic activity and provision of tax benefits, the tax revenues continued to decrease

Revenues of the state budget's general fund, UAH bn



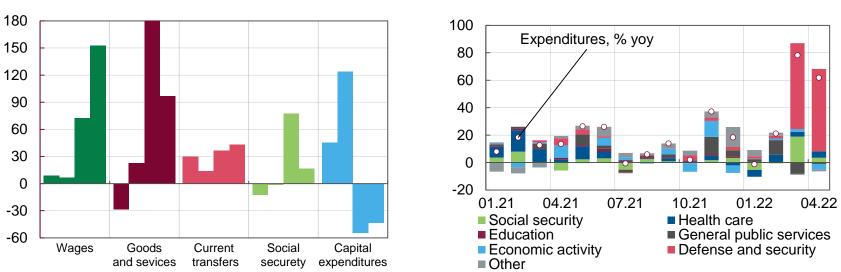
Growth in tax revenues of the state budget's general fund in 2022, monthly, % yoy

* Operative data from the MFU website. Dotted and patterned fillings show relevant indicators excluding grants. Source: Treasury, MFU, openbudget.gov.ua, NBU staff estimates.

- On the background of the introduced tax benefits for imported goods, the domestic taxes strengthened their role as the main source of revenues
- Fairly high level of tax revenues was supported by companies' efforts to keep staff and pay wages, advance CIT payments, and high world gas prices. The revival of economic activity since April also contributed
- However, the suspension of VAT refunds remains a "weakness" of domestic tax developments

Expenditures expectedly surged in March-April

Growth in expenditures of the state budget in 2022, % yoy



the state budget, pp

Contributions to annual changes in expenditures of

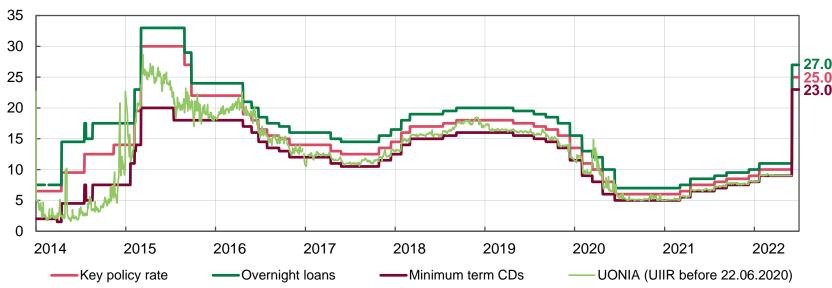
Source: openbudget.gov.ua, Treasury, NBU staff calculations.

- Expenditures on the defense sector (in particular, due to a significant increase in military allowances), and social care (including the e-Support program and payments to internally displaced persons) have seen most of the growth
- At the same time, given the restricted budget resources, some expenditures were incurred based on the current needs, which in particular resulted in a decrease in capital expenditures

Ukraine: Monetary sector



NBU returns to an active interest rate policy, however...



NBU interest rates and UIIR/UONIA, %

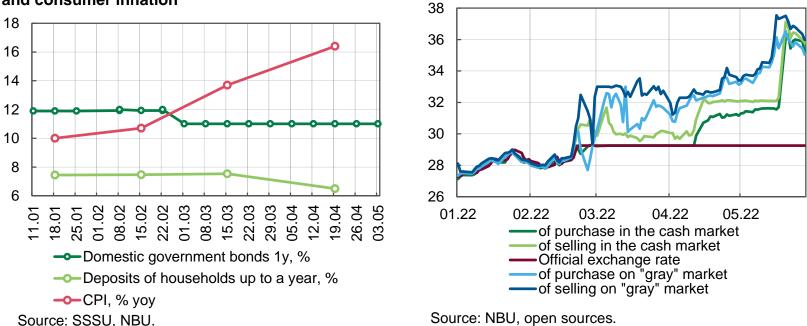
Source: NBU.

- In the absence of adequate material benefits for holding hryvnia assets, the threat has been growing that the economy dollarization might rise and the financial system lose respective resources
- Thus, the Board of the National Bank of Ukraine has decided to raise the key policy rate from 10% to 25% from the third of June. This step aims to:
 - protect households' income and savings in the hryvnia
 - raise the attractiveness of hryvnia assets
 - reduce the pressure on the foreign exchange market
- The NBU has also decided to widen the interest corridor for monetary transactions with banks to
 ^{National Bank} ± 2 pp (it was ±1 pp before). This will provide an additional room for reviving the interbank market

...it is still more focused on maintaining the EX rate due to the stabilizing role of the latter during wartime

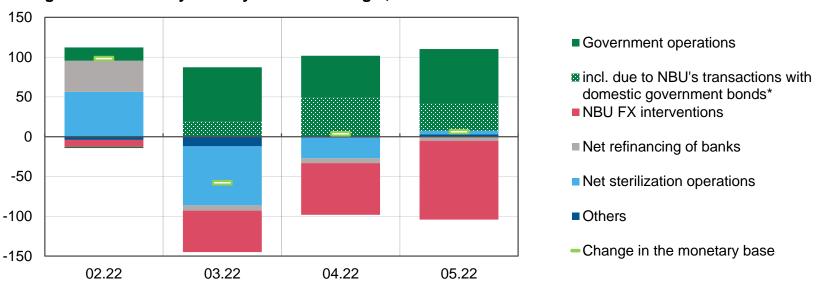
Yields on hryvnia government bonds in the primary market, rates on hryvnia deposits and consumer inflation

Hryvnia exchange rates against the US dollar in selected markets



- Currently, the yields on hryvnia deposits and government bonds are significantly lower than current inflation and inflation expectations, which make them unprofitable for the holders of these assets. The growth of yields on hryvnia government bonds will indirectly bring the hryvnia deposit rates to grow
- More attractive hryvnia savings will help decrease demand on the FX market. This will prevent further accumulation of imbalances, ease pressure on Ukraine's international reserves, and will gradually resolve the issue of multiple exchange rates
- In May, the NBU lifted restrictions on setting the exchange rate at which authorized institutions sell FX cash to customers. This step was aimed to enhance competition in the cash segment of the FX market and reduce unproductive capital outflows from Ukraine

NBU FX interventions, to a great extent, absorb monetary financing



Change in the monetary base by factor affecting it, UAH billion

* NBU purchases of the war bonds (+) / interest and principal payments for domestic government bonds (-) in the NBU portfolio.

Source: NBU.

- Government conversion of foreign currency into the hryvnia was the main channel of the monetary base growth
- In May, the NBU's purchases of military bonds, totaling UAH 50 billion, remained an additional channel of the monetary base growth. However, large NBU purchases of these bonds undermine confidence in the stability of the hryvnia and generate depreciation expectation
- In May, the main part of 'issued hryvnia' was absorbed by the NBU's interventions as it was selling foreign currency on the FX market
- Establishing market rates for government bonds following key policy rate hike will increase demand for them. This will reduce the need for monetary financing of the government by the NBU