

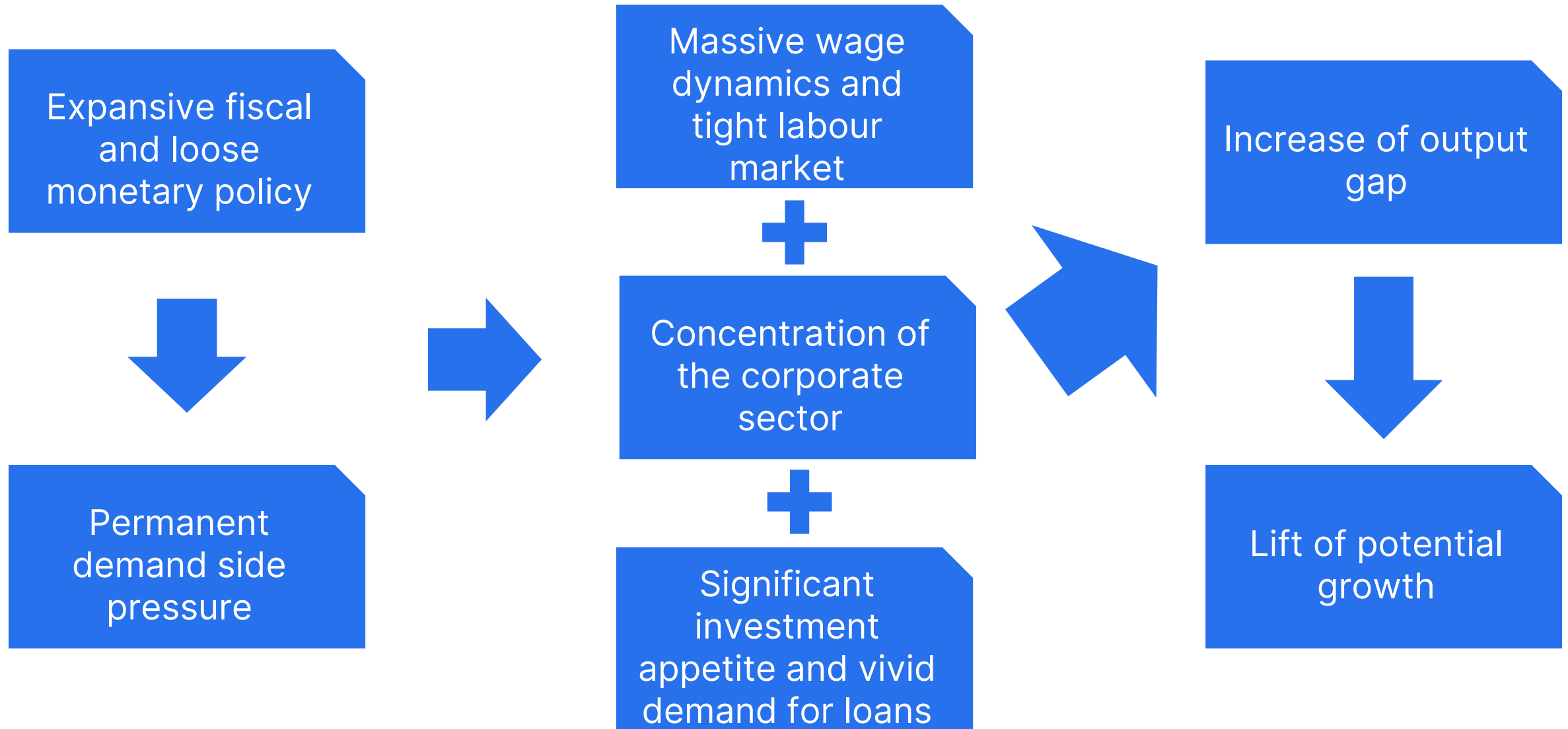
SPECIAL REPORT

High pressure economy: What have we learned?

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The theoretical scheme of the high-pressure economy concept



Conditions supported pursue of high pressure economy

- Low recovery after the financial and the Eurozone crisis
- Negative output gaps
- Fear of deflation rather than inflation
- Zero interest rate environment
- Available supply of labor
- Flat Phillips curve



HYSTERESIS

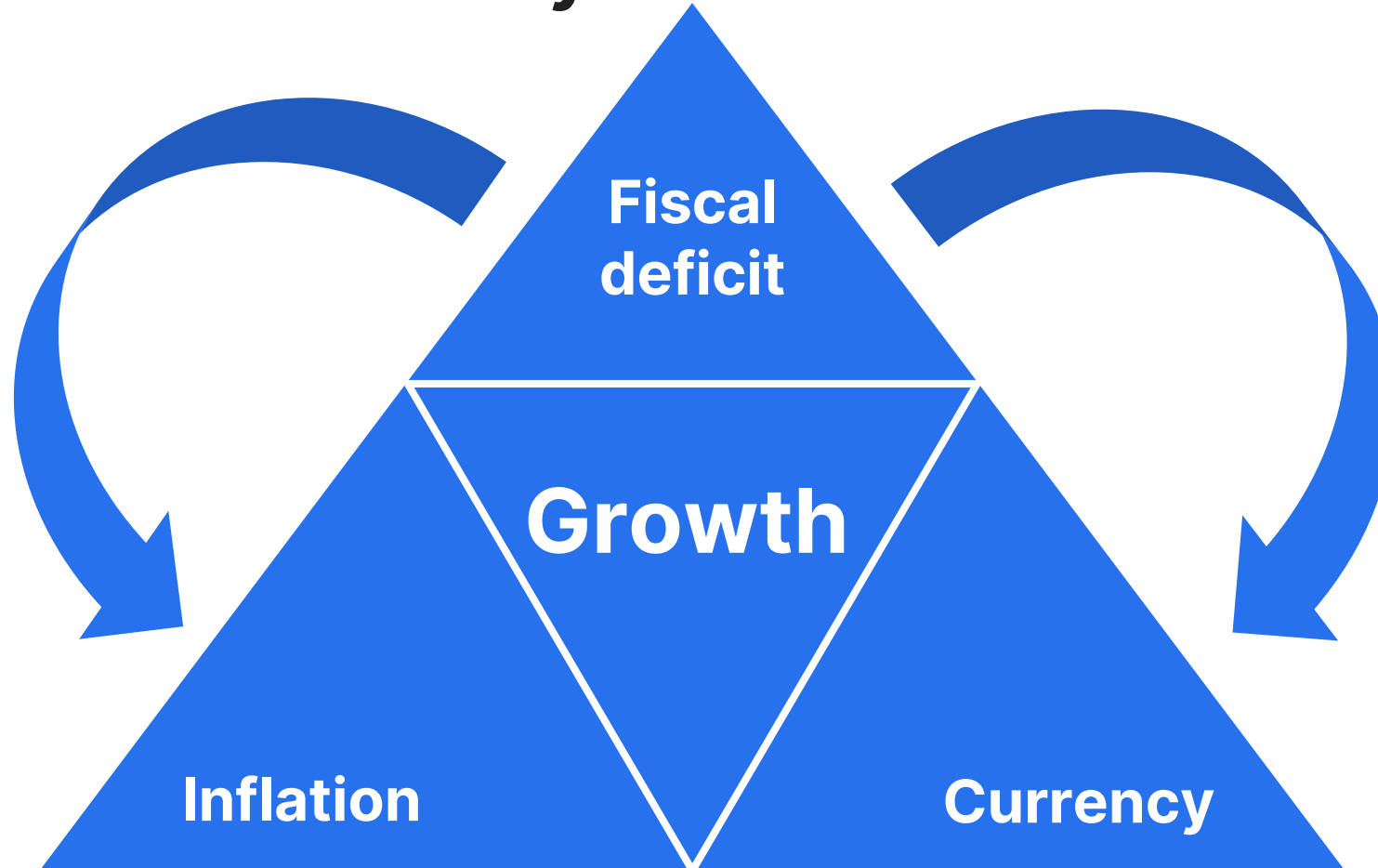


**HOW CAN WE GET
BACK ON TRACK?**

The aim: speed up the convergence

- The concept of high pressure economy (HPE) has emerged recently, as the economic policy addressed their intention of bringing it back to boost economic growth.
- HPE was the major doctrine before the pandemic: the monetary policy of the central bank (MNB) and the fiscal policy were both supporting it.
- Although the general conditions before 2020 had allowed to launch and pursue the HPE, as the negative implications were not too severe, risks of reemergence of economic balance problems are much higher now. In the current changed external and internal environment, it might even cause welfare losses mainly via possibly rising inflation and currency weakening.
- All in all, Hungary should find a different way to catch up with the top performers of CEE via to a more extent focusing on productivity increase.

Possible victims: at the end all the negative consequences projected onto the currency



Specific policy measures: some of them from 2010 but generally from 2016 (*see more details in the Appendix*)

Monetary field

- Unconventional monetary policy mainly aiming at creating excess liquidity
- Funding for Growth Scheme (*NHP*) – 2013-2021
- Bond Funding for Growth Scheme (*NKP*) – 2019-2021

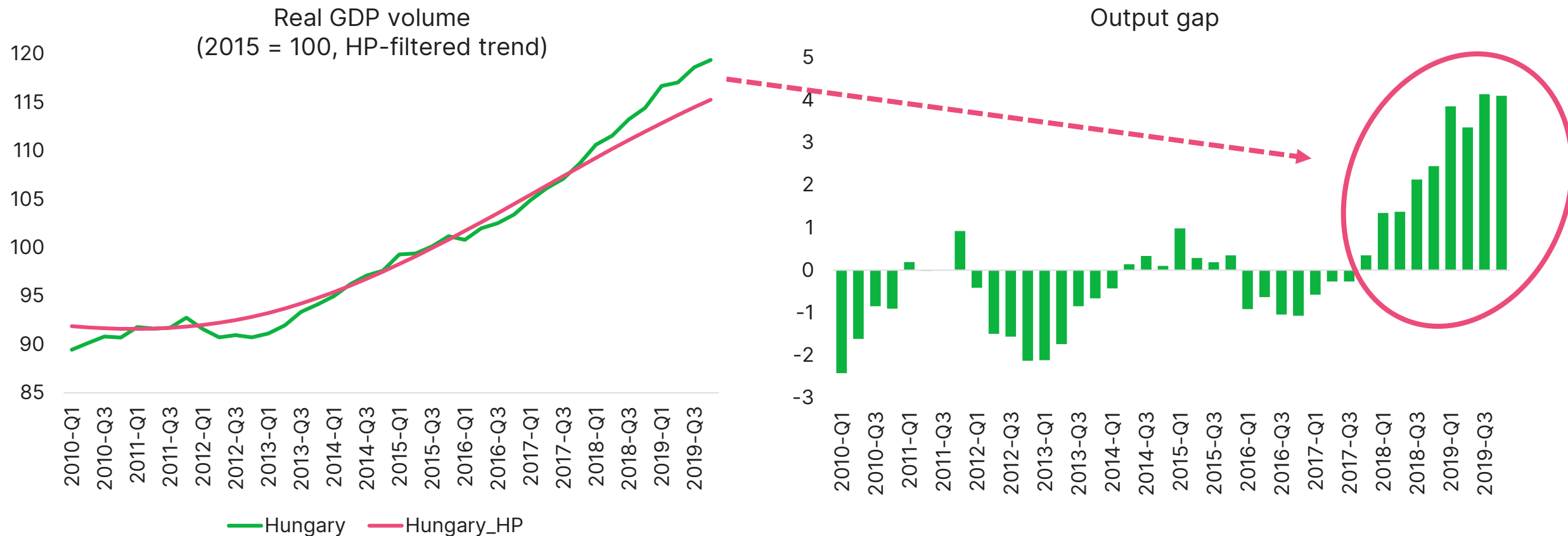
Fiscal side

- Housing subsidy scheme for families (*CSOK*) - 2015
- Tax and wage agreement (government, employers, unions) - 2016
- Flat tax rate in the PIT system - 2012, lowest corporate income tax rate in the EU for years - 2017

Besides some favorable developments, Hungary seems to have reached its limits by 2020

- In its election program already in 2010, the government had promised to create one million new jobs in the next ten years that can rather be seen as a political message. Between 2010-2019, all CEE economies had made huge progress in this field, however, the expansion of the Hungarian labor market was the second largest in the EU in this period.
- Regarding the convergence to the EU average (mainly with respect to the GDP per capita), this was faster compared to the preceding period of the Hungarian membership, however compared to regional peers (especially to Poland and Romania), the overall performance has not proved outstanding. Positive impacts - thanks purely to the HPE - are less visible here.
- The essence of the HPE is that under certain circumstances (no inflation and no economic balance risks, available free capacities), the potential growth would be raised via keeping a positive output gap with demand-stimulating measures. As a result, the GDP would also increase and – contrary to the neoclassical view - this improvement would remain permanent.
- On the next slide you can observe the stretched economy in 2018-19, as a consequence of permanent pressure from monetary and fiscal sides. The economy grew above the potential, however side effects (see slide 10) started to become more visible that make the country more vulnerable amid the permanent crisis times started with the pandemic in 2020.

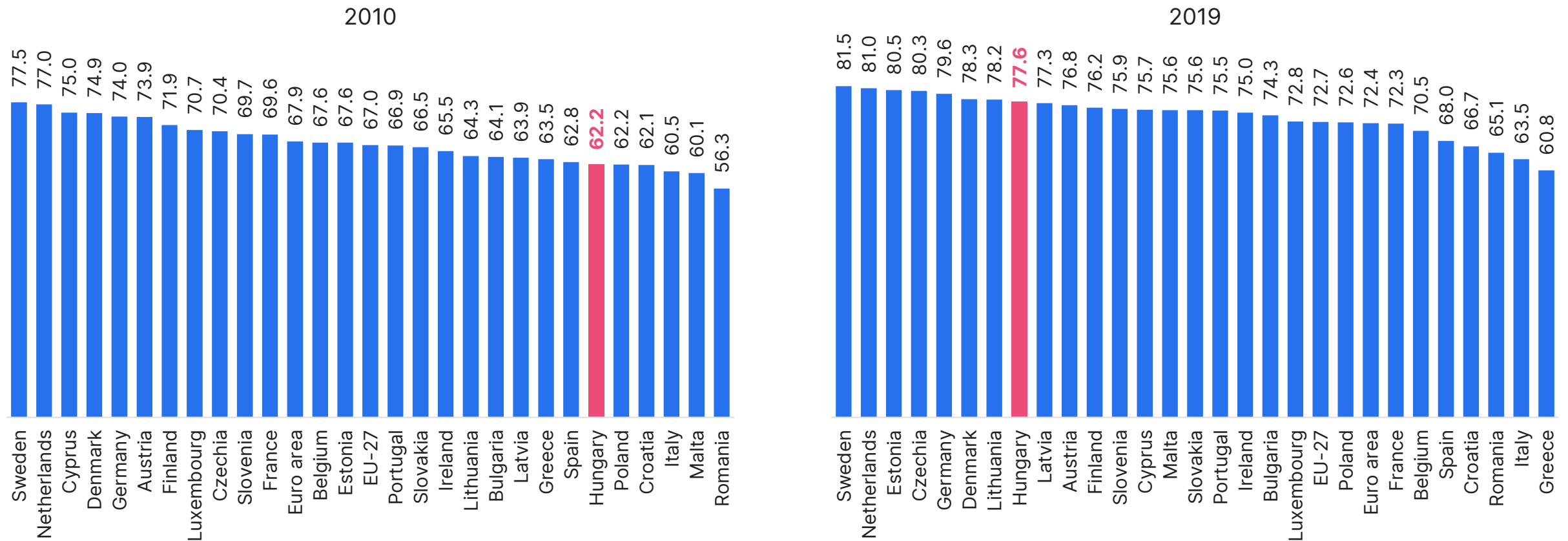
The high pressure economy manifested in massively above the trend growth rates until 2020



Forrás: Eurostat, Erste Research

The expansion of the Hungarian labour market was the second largest in the EU between 2010 and 2019

Employment rate
(Percentage of total population , LFS, From 20 to 64 years)



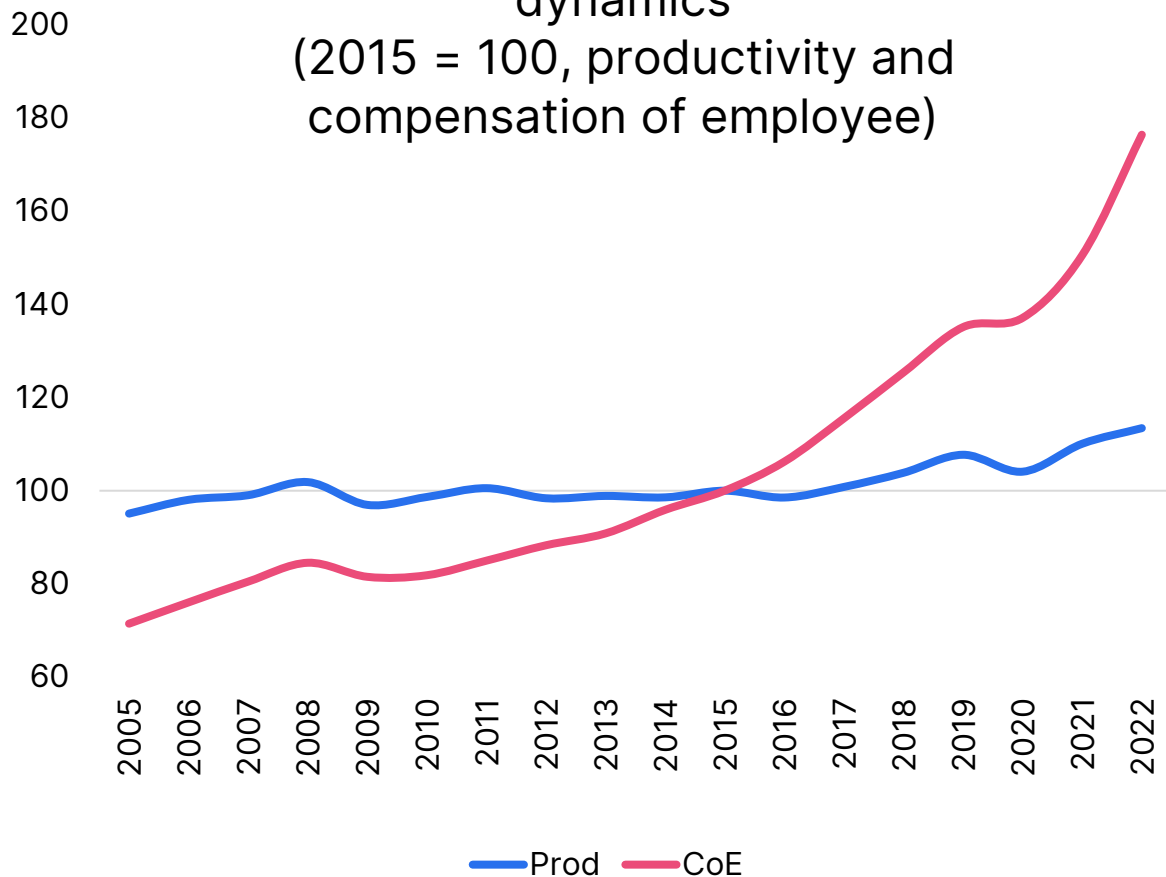
Forrás: Eurostat, Erste Research

Side effects

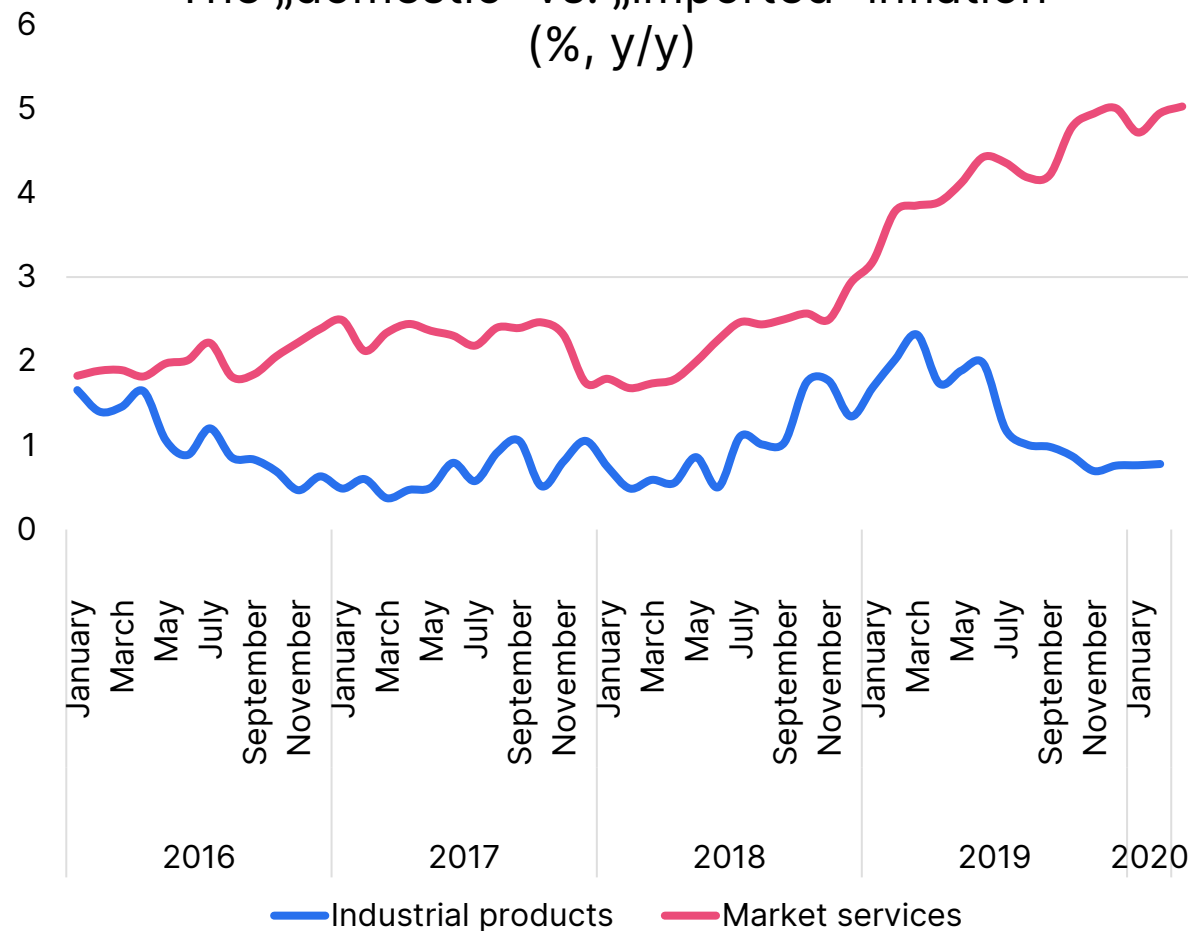
- Appearance of lower-educated workers on the labor market coupled with the new system of fostered-work and in the lack of development of the educational system, labor productivity practically stagnated. Besides, wage dynamics rocketed, partly due to the increasing lack of labor at that time. Tightness of the labor market coupled with massive wage dynamics increased the price pressure on domestic field that can be identified in market services inflation. It can be described as a quasi domestic inflation indicator, as the main driver of repricing in market services is the domestic wage dynamics.
- Investment-friendly environment created room for carrying out huge projects, and expansions of capacity - mainly in the manufacturing sectors. At first, it supported well investment-driven economic growth and investment to GDP ratio increased well above 20 percent. However, it hides the fact that that even before the pandemic crisis, investment already started to decline in real terms, while prices of projects increased.
- The monetary policy and interest rate environment were accommodative. For the majority of the period, however, real level of interest rates did not relevantly differ from that of regional peers, except for the period of 2018-19, when mainly due to various unconventional monetary policy tools, the negative real interest rate was the deepest in the region.
- Regarding the Maastricht criteria for the budget balance, it had been met. However, in European comparison, Hungary's ranking was not so favorable and given the structural balance, Hungary was among the Top3 worst performers in 2016-19.
- Side effects of the economic policy sent the forint on a different path in comparison to the regional peers. Compared to 2010, the forint depreciated not only in nominal but also in real terms.

Divergence between wage outflows and productivity resulted in visible domestic price pressures

Real labour productivity and wage dynamics
(2015 = 100, productivity and compensation of employee)

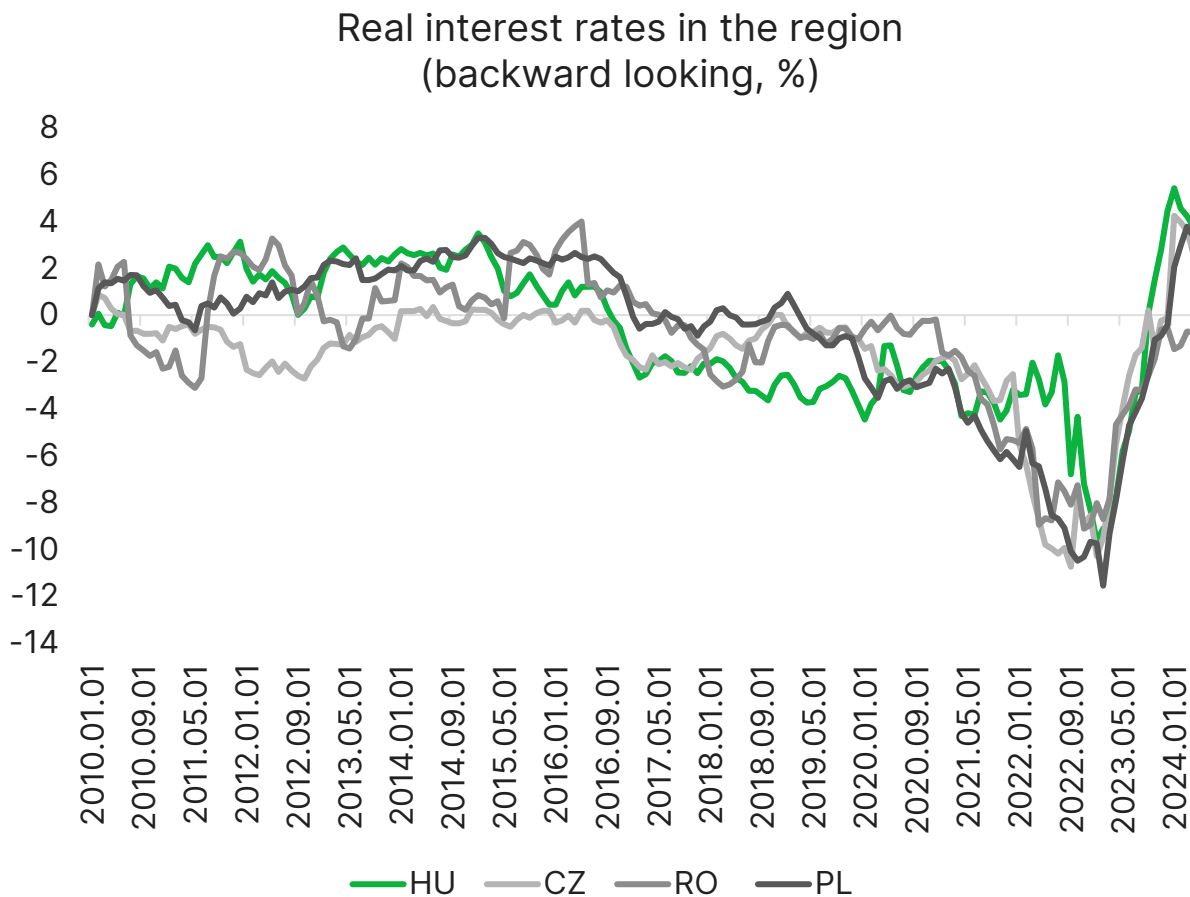
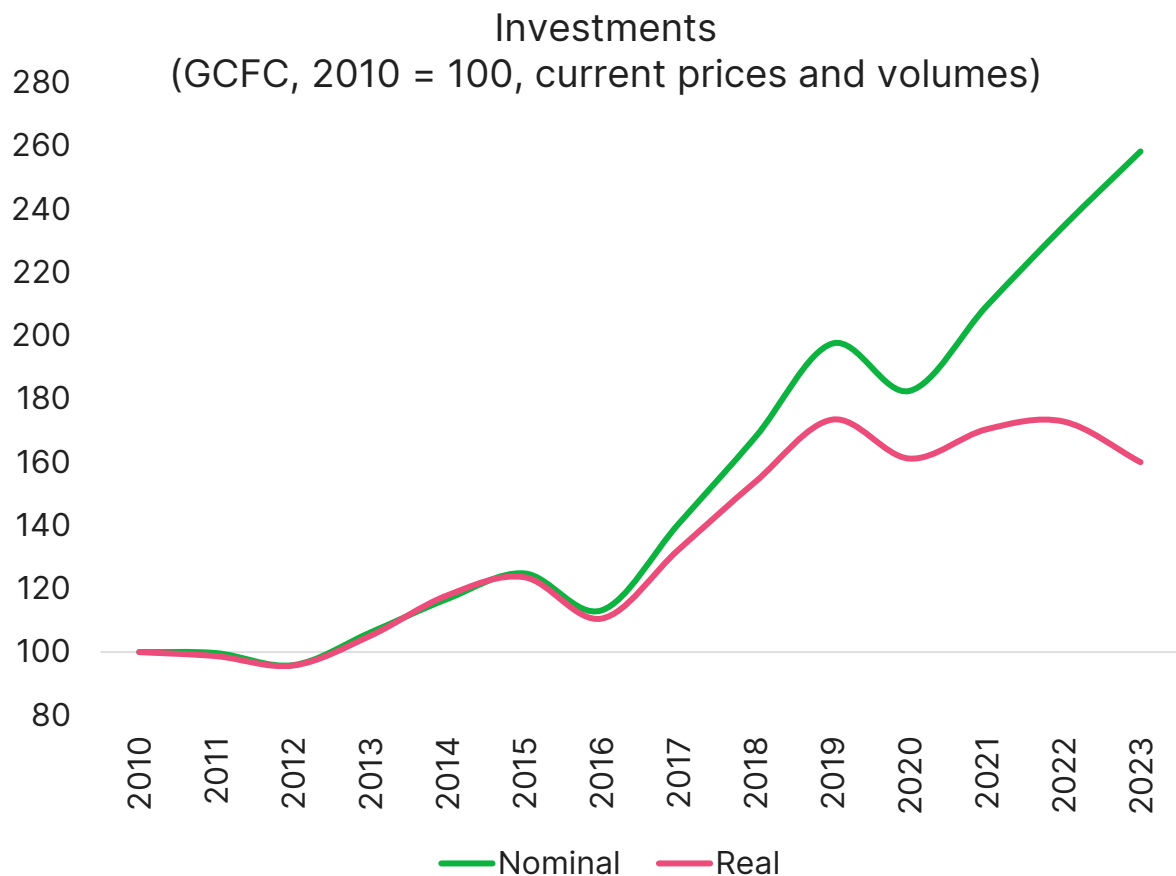


The „domestic” vs. „imported” inflation
(%, y/y)



Forrás: Eurostat, MNB, Erste Research

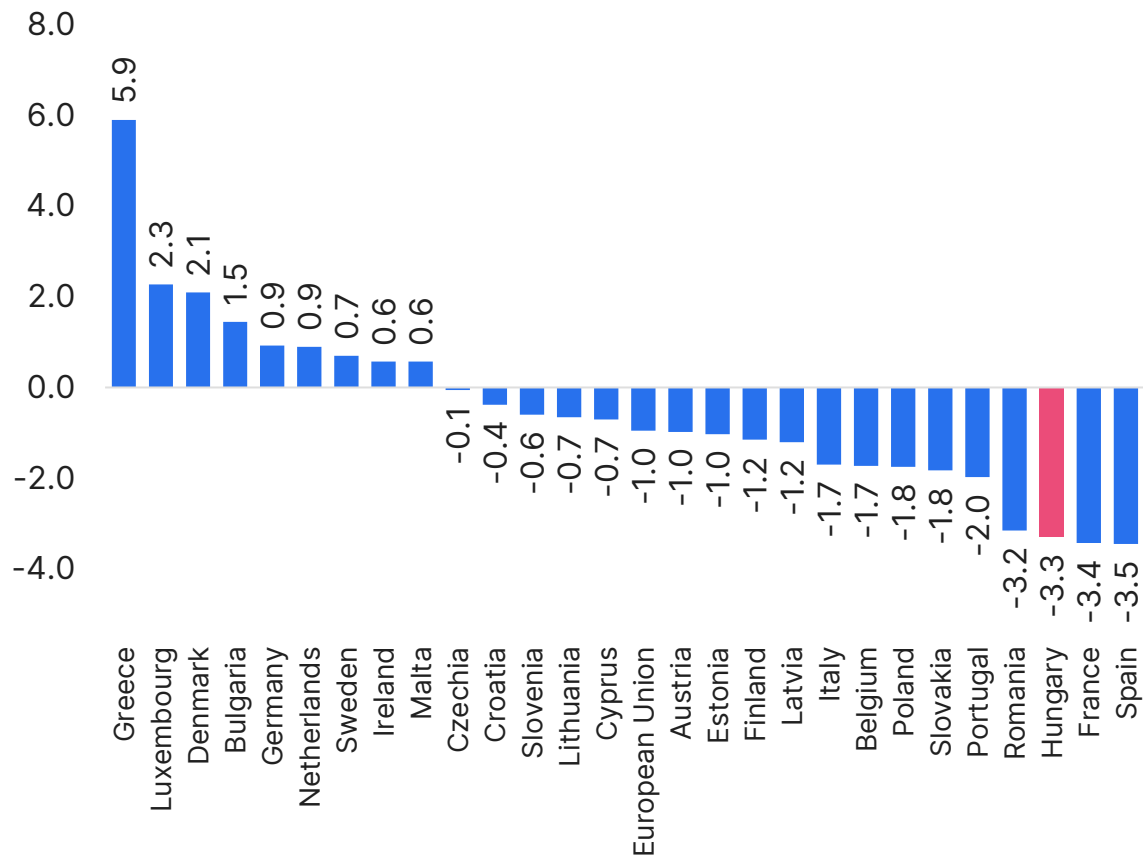
The investment friendly environment could not materialize growth in real terms by time despite negative real rates



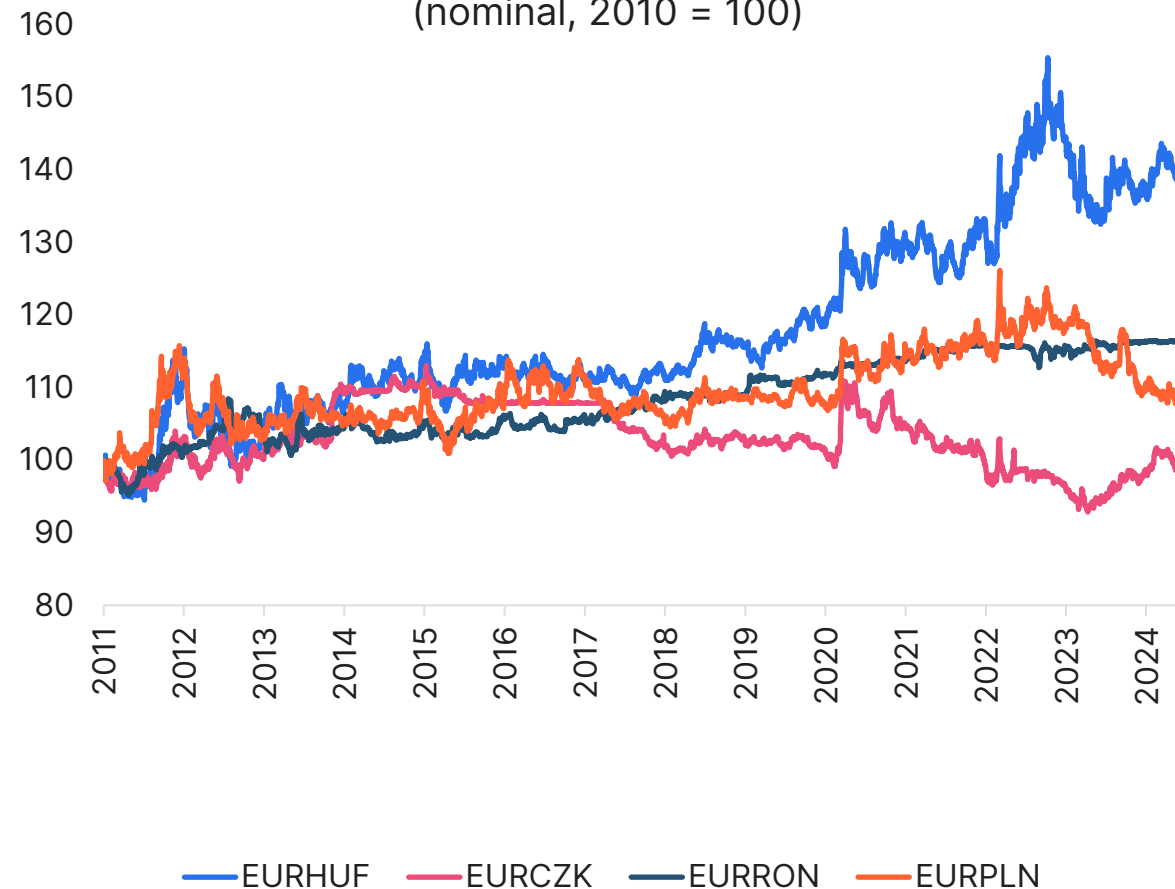
Forrás: Eurostat, Bloomberg, Erste Research

All the mentioned factors – including the loose stance of budget – contributed to the depreciation of HUF

Budget deficit adjusted for the cyclical component
(% GDP, average of 2016-19)



Currencies in CEE
(nominal, 2010 = 100)



Forrás: Eurostat, Bloomberg, Erste Research

The environment is quite different currently

BEFORE THE PANDEMIC (2010-2019)

Low recovery after Financial Crisis in 2008 and the European Debt Crisis in 2012

Negative output gaps

Fear of deflation rather than inflation

Zero interest rate environment

Available supply of labor

Relative disciplined fiscal policies and subdued credit growth in the Eurozone



RECENTLY

Low growth figures, subdued credit growth

Negative output gaps

The highest inflation environment in decades

Elevated interest rate environment

Tight labor market, lack of additional supply

Huge budget deficit and higher debt costs

Literature

Arthur Okun, "Upward Mobility in a High-Pressure Economy," Brookings Papers on Economic Activity, Spring 1973.

Ball, L. M. (2015): Monetary Policy for a High-Pressure Economy. Center on Budget and Policy Priorities, Full Employment Project <http://www.econ2.jhu.edu/People/ball/HighPressure.pdf>

Garga, Vaishali és Sanjay R. Singh, 2021. "Output hysteresis and optimal monetary policy," Journal of Monetary Economics, Elsevier, vol. 117(C), 871-886.

Girardi, Daniele, Walter Paternesi Meloni és Antonella Stirati, 2020. „Reverse hysteresis? Persistent effects of autonomous demand expansions," Cambridge Journal of Economics, Volume 44, Issue 4, 835–869.

Jordà, Òscar, Sanjay R. Singh és Alan M. Taylor, 2020. "The Long-Run Effects of Monetary Policy," NBER Working Papers 26666.

Hungarian Central Bank: The Growth Report 2016: <https://www.mnb.hu/letoltes/novekedesi-jelentes-2016-en.PDF>

Hungarian Central Bank: <https://www.mnb.hu/en/monetary-policy/funding-for-growth-scheme-fgs;>
<https://www.mnb.hu/letoltes/nhp-tanulma-nyko-tet-2022-eng-0923.pdf>

Hungarian Central Bank: <https://www.mnb.hu/en/pressroom/press-releases/press-releases-2019/considerations-behind-the-launch-of-the-bond-funding-for-growth-scheme-bgs-and-main-features-of-the-programme>

Funding for Growth Scheme (FGS)

Following the crisis years of 2008-2012, corporate lending shrank to 75 percent of its pre-crisis level by mid-2013. To mitigate the market disruption in SME lending, to facilitate economic growth and to strengthen financial stability, the MNB launched the Funding for Growth Scheme in the middle of 2013.

During the program, the MNB provided funding typically at an interest rate of 0 percent for credit institutions participating in the program, and then they provided loans to SMEs at an interest rate of maximum 2.5 percent. From mid-2013 until the breakout of the Coronavirus crisis, the program had four phases (**FGS1, FGS2, FGS3, FGS Fix**) with different pillars. The program became increasingly targeted as lending conditions improved, and the focus shifted to investment loans.

Meanwhile, at the beginning of 2016, the MNB launched the **Market-Based Lending Scheme (MLS)** in parallel with the FGS3 to facilitate the return to market-based lending. For credit institutions, the MLS introduced interest rate swaps tied to lending activity (LIRS), along with the option to place preferential deposits, subject to a commitment to increase their SME lending activity during the given calendar year by one quarter of the nominal value of the LIRS transaction.

In Spring 2020, due to the emergence of the coronavirus pandemic, the MNB responded with a coordinated series of measures, among which the **FGS Go!** was also launched, with an initial overall amount of HUF 1,500 billion, subsequently increased to HUF 3,000 billion in two steps.

Contracted amount of loans granted in each phase (HUF bn)

FGS1		FGS2		FGS3		FGS Fix	FGS Go!	
Investment loan	Working capital loan	Investment loan	Working capital loan	I. (HUF)	II. EUR	Investment loan	Investment loan	Working capital loan
176,5	114,1	832,2	390,6	474,5	210	564	1139	1578

Bond Funding for Growth Scheme (BGS)

On July 1, 2019, the Monetary Council launched the Bond Funding for Growth Scheme, as a new element of its non-conventional monetary policy tools. The aim of the program was to help the diversification of the debts of domestic companies by increasing the liquidity of the corporate bond market. Within the framework of the program, the central bank purchased bonds issued by non-financial companies in an amount of HUF 1,550 billion.

By increasing the liquidity of the bond market, the MNB intended to improve the efficiency of monetary policy transmission and to also encourage economic actors to rely on this type of financing - in addition to bank loans - to a sufficient proportion.

The scheme did not have an effect on the monetary policy conditions, as the excess volume of funds resulting from the purchases under the BGS was sterilized via the preferential deposit facility. (Eligible credit institutions were allowed to place deposits at the MNB at the base rate).

In December 2021, the Monetary Council decided to close the Bond Funding for Growth Scheme. According to the MNB, ample liquidity and strong capital position of the banking sector, as well as the improvement in bond market conditions made it possible to satisfy the corporate sector's funding needs on a market basis.



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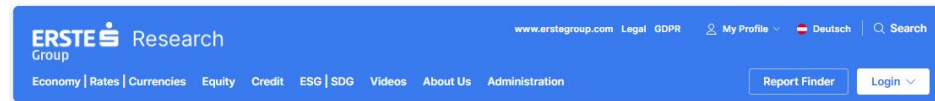
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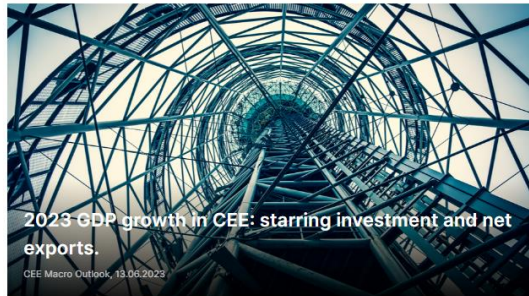


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