

INFLATION MONITOR October 14, 2024

Economic Analysis and Research Department

Macroeconomic indicators:

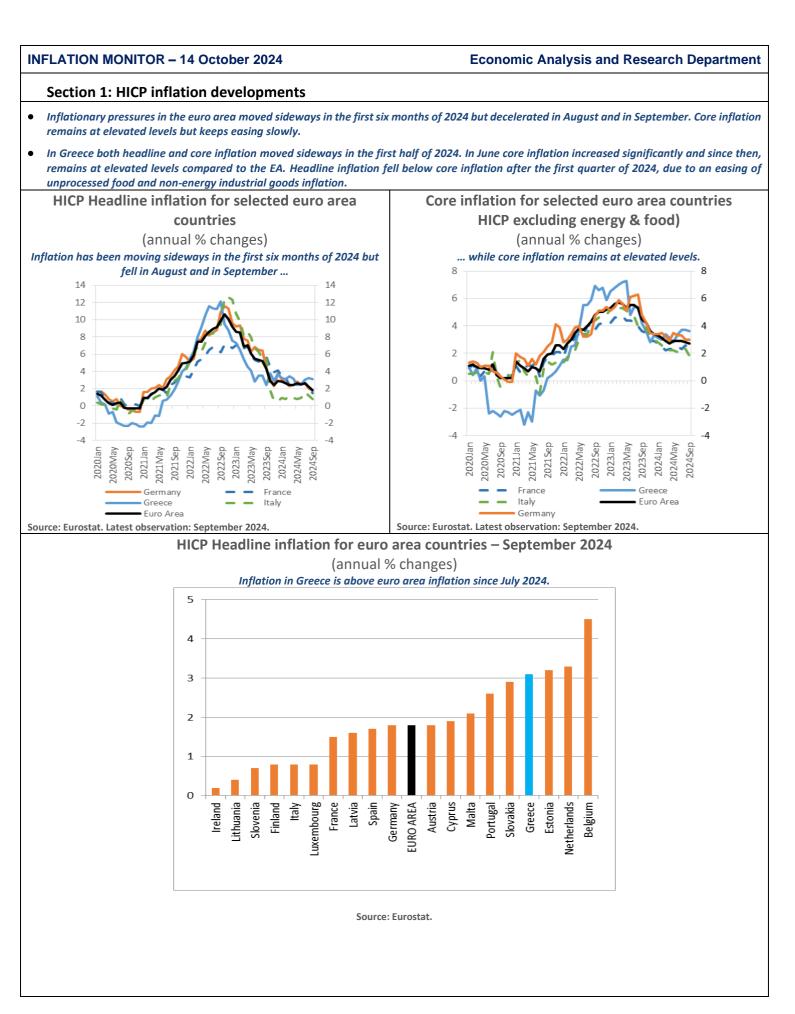
- HICP headline inflation in the euro area declined further to 1.8% in September 2024 from 2.2% in August. This is due to the significant drop in energy inflation and to the slight decline in services inflation. Core inflation (HICP excluding energy and food) ticked down to 2.7% in September from 2.8% in August. This development relates to the slight decline in services inflation as the annual rate of change of non-energy industrial goods remained unchanged. CPI inflation in the US slowed for a sixth consecutive month to 2.4% in September from 2.5% in August 2024. Core CPI inflation ticked up to 3.3% in September, from 3.2% in August. HICP headline inflation in Greece declined slightly to 3.1% in September 2024 from 3.2% in August, driven by a drop in energy and services inflation. Core inflation ticked down to 3.6% in September from 3.7% in August with the marginal decline being attributed solely to a drop in services inflation as inflation of non-energy industrial goods picked up. Significant discrepancies in energy, in non-energy industrial goods and in unprocessed food inflation between the euro area and Greece have resulted in an overall 1.2 percentage point difference in the respective headline inflation figures.
- Commodity prices have increased significantly during the last several weeks, while transportation costs have decreased.
- Labour markets remain considerably tight in most advanced economies, putting upward pressure on inflation.

Market-based indicators:

- Medium- and long-term euro area and US nominal bond yields rose.
 - In the **euro area** nominal yields rose somewhat compared to one month ago, driven by higher market-based inflation expectations, while real yields retreated.
 - In the **US** nominal yields rose significantly, as US labour and services sector activity data came out better-thanexpected; market-based inflation expectations increased significantly, with real yields rising.
- The better-than-expected US data readings led to an upward revision of market-based expectations for policy rates in the US; the outlook for expected policy rates in the euro area was broadly unchanged.
 - The **ECB** has already cut rates twice in 2024 by a total of 50 bps. Markets expect two more 25 bps cut until the end of the year, one in October and another in December. Moreover, markets expect that the ECB will cut its rates by 75-100 bps in 2025H1.
 - The Fed has cut the Fed funds rate (FFR) by 50 bps in September 2024. Markets anticipate two additional 25 bps rate cuts by the end of the year, one in November and another in December. Further rate cuts of 75 bps are expected in 2025H1; this constitutes an upward revision for the outlook of US rates (rate cuts of 100-125 bps were expected one month ago).

Key statements and news:

- The latest Fed funds rate cut reflected the FOMC's "greater confidence that inflation is moving sustainably toward 2 percent" (FOMC statement).
- Since September's FOMC meeting, several Fed officials have argued that the 50 bps cut was a recalibration of a monetary policy stance that will remain restrictive and data dependent.



					2023	2024			2024						
EURO AREA	2024 weights (%)	2021	2022	2023	Q4	Q1	Q2	Q3	Mar	Apr	Мау	Jun	Jul	Aug	Sep
Harmonised Index of Consumer Prices (HICP)															
Overall index	100.00	2.6	8.4	5.4	2.7	2.6	2.5	2.2	2.4	2.4	2.6	2.5	2.6	2.2	1.8
Goods	55.12	3.4	11.9	5.7	1.7	1.5	1.3	0.6	1.2	1.3	1.3	1.2	1.4	0.5	0.0
Processed food (including alcohol and tobacco)	15.12	1.5	8.6	11.4	7.1	4.4	2.9	2.7	3.5	3.2	2.8	2.7	2.7	2.7	2.7
Unprocessed food	4.35	1.6	10.4	9.1	5.9	2.8	1.4	1.2	-0.5	1.2	1.8	1.3	1.0	1.1	1.5
Non-energy industrial goods	25.73	1.5	4.6	5.0	2.9	1.6	0.7	0.5	1.1	0.9	0.7	0.7	0.7	0.4	0.4
Energy	9.91	13.0	37.0	-2.0	-9.8	-3.9	0.0	-2.7	-1.8	-0.6	0.3	0.2	1.2	-3.0	-6.0
Services	44.88	1.5	3.5	4.9	4.2	4.0	4.0	4.0	4.0	3.7	4.1	4.1	4.0	4.1	4.0
Core Inflation (HICP less energy, food, alcohol and tobacco) GREECE	70.62	1.5	3.9	4.9	3.7	3.1	2.8	2.8	2.9	2.7	2.9	2.9	2.9	2.8	2.7
Harmonised Index of Consumer Prices (HICP)															
Overall index	100.00	0.6	9.3	4.2	3.5	3.2	2.7	3.1	3.4	3.2	2.4	2.5	3.0	3.2	3.1
Goods	53.62	2.0	12.9	3.8	3.7	2.9	1.6	1.6	2.8	2.7	1.4	0.7	1.1	1.7	1.9
Processed food (including alcohol and tobacco)	17.27	0.7	9.5	9.3	6.1	4.6	3.0	2.3	3.7	3.9	2.5	2.7	2.5	2.1	2.3
Unprocessed food	7.65	2.2	10.1	11.1	12.5	9.0	2.3	1.7	7.2	6.9	2.2	-1.7	-1.2	2.0	4.4
Non-energy industrial goods	21.14	-0.7	5.0	6.4	3.2	2.2	1.4	1.4	2.1	1.8	1.5	1.1	0.9	1.4	1.8
Energy	7.56	12.4	41.0	-13.4	-6.0	-3.4	-1.9	1.0	-1.0	-1.4	-1.8	-2.4	1.4	2.3	-0.8
Services	46.38	-1.0	4.5	4.5	3.1	3.6	3.8	4.7	4.0	3.7	3.3	4.4	5.0	4.7	4.4
Core Inflation (HICP less energy, food, alcohol and tobacco)	67.52	-1.1	4.6	5.3	3.2	3.1	3.1	3.7	3.4	3.1	2.8	3.4	3.7	3.7	3.6

Price developments in the euro area and Greece (annual % changes)

Sources: Eurostat, ELSTAT and BoG calculations.

Price developments in the energy component of the Greek HICP and its subcomponents (annual % changes)

Energy prices eased significantly in the first half of 2024 but oscillated in the third quarter of 2024 due to increases in electricity and in natural gas inflation and significant drops in motor fuel prices inflation.

	2024				2023	2024				2024						
GREECE	weights (%)	2021	2022	2023	Q4	Q1	Q2	Q3	Mar	Apr	Мау	Jun	Jul	Aug	Sep	
Harmonised Index of Consumer Prices (HICP)																
Overall HICP index	100.00	0.6	9.3	4.2	3.5	3.2	2.7	3.1	3.4	3.2	2.4	2.5	3.0	3.2	3.1	
ENERGY	7.56	12.4	41.0	-13.4	-6.0	-3.4	-1.9	1.0	-1.0	-1.4	-1.8	-2.4	1.4	2.3	-0.8	
Electricity	2.56	8.3	43.1	-15.0	0.8	-2.0	-11.2	6.4	-4.6	-7.4	-13.8	-12.2	-1.8	9.7	11.3	
Natural gas and town gas	0.25	68.3	127	-49.3	-55.5	-52.3	-10.6	23.7	-39.1	-26.9	-11.6	13.1	23.4	28.0	20.2	
Liquefied hydrocarbons	0.04	1.3	11.5	7.6	-1.1	1.4	-1.2	-2.2	2.2	-0.9	-1.2	-1.5	-2.7	-3.0	-0.9	
Liquid fuels	1.07	20.0	45.1	-11.8	6.4	7.7	6.3	6.3	12.4	6.3	6.3	6.3	6.3	6.3	6.3	
Solid fuels	0.22	-0.7	11.0	21.2	10.0	7.6	0.0	-1.5	6.9	0.4	0.1	-0.4	-0.7	-1.2	-2.7	
Fuels for personal transport equipment	3.42	13.5	25.5	-7.8	-6.7	-1.8	2.8	-6.4	0.5	2.3	5.5	0.6	0.5	-6.0	-13.1	

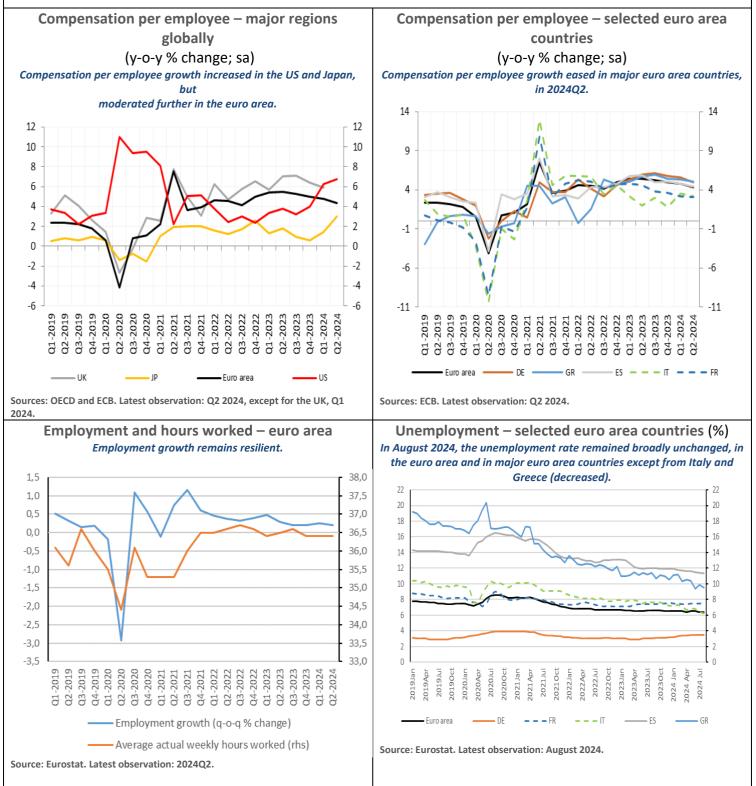
Sources: ELSTAT and BoG calculations.

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Section 2: Labour market developments

• Labour markets remain tight in the euro area and Greece. While labour demand is slowing, it remains high in an environment in which unemployment is historically low.

• In the euro area, nominal wage growth is easing, supported by declining inflation expectations.



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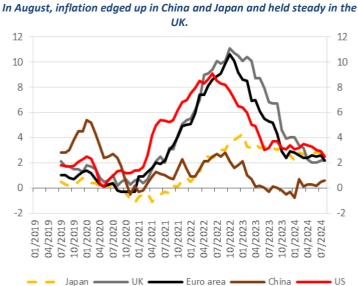
Section 3: Global prices

- Disinflation broadly continues in major advanced economies. •
- Since mid-September, crude oil and European natural gas prices have increased, as the escalating geopolitical conflict in the Middle East has raised concerns of a sudden supply disruption. However, the robust inventories have mitigated further rises in oil and gas prices. Prices for industrial metals and agricultural commodities have also increased, amid renewed optimism, following China's extensive stimulus measures and unfavorable weather conditions respectively.
- The attacks on vessels in the Red Sea/Gulf of Aden by Houthi rebels since mid-December 2023 led several containership companies to suspend transit through that region. As a result, the global sea container transportation costs tripled compared to November 2023; though there is a cost moderation since early September. Transit time between China – Europe has increased as some vessels opt for the longer route via the Cape of Good Hope, but the one of China – USA remains close at its pre-pandemic level, despite the recent increase.

Headline consumer price inflation (annual % change)



Daily commodity prices



Sources: OECD, Eurostat, UK ONS. Latest observation: September 2024 for the euro area, August for the US, the UK, China and Japan.

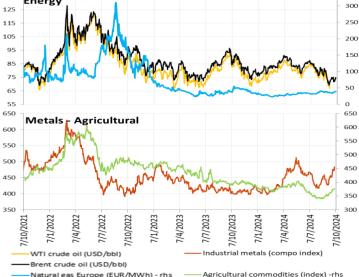
Containers transportation cost – Freightos Index Despite the recent moderation, global sea transportation costs remain



at high levels due to Houthi rebels' attacks on vessels crossing the Red Sea.

Sources: Freightos and LSEG. Latest observation: 08.10.2024.

Notes: Freightos Baltic Indices reflect the ocean container transport spot freight rates (port to port) for a standard forty-foot container (FEU). Monthly average of daily data

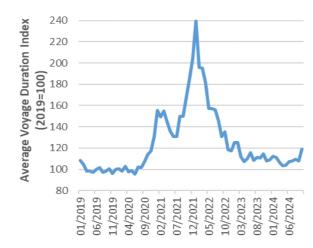


Source: LSEG. Latest observation: 7.10.2024.

Note: S&P Goldman Sachs Commodity spot price indices for industrial metals and agricultural commodities.

China-US West Coast containership voyage time

The average voyage time has broadly declined to its pre-pandemic level, despite the recent increase related to the strike of US-East Coast workers.

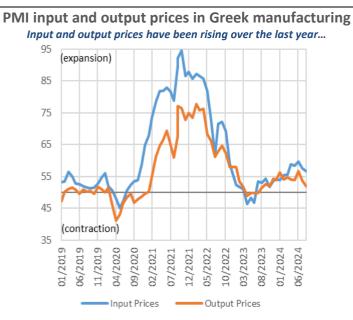


Source: Clarkson Research Services, Bank of Greece's calculations, Latest observation: 08.10.2024

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Section 4: Leading price indicators

• PMI input prices in Greece continued rising for the fourteenth consecutive month in September 2024 due to greater costs for energy, transportation and some raw materials; nevertheless, the pace of increase slowed to the weakest since April. The pass-through of higher costs to customers drove up output price inflation but at the slowest rate in twelve months.







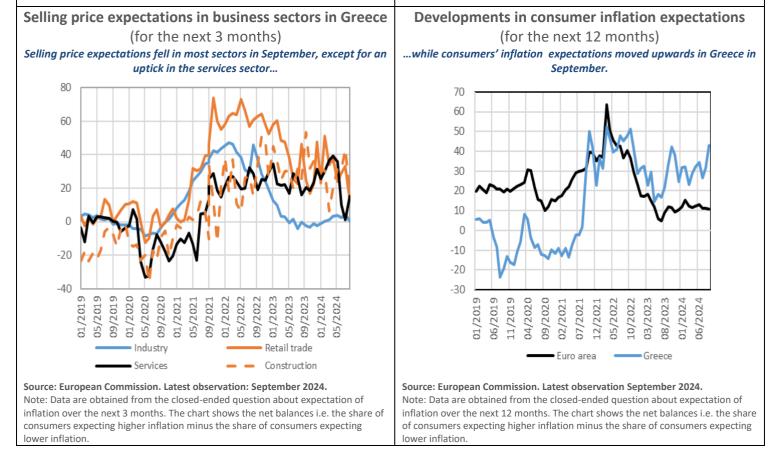
Exports

Imports

Source: S&P Global. Latest observation: September 2024.

Source: ELSTAT. Latest observation: June 2024.

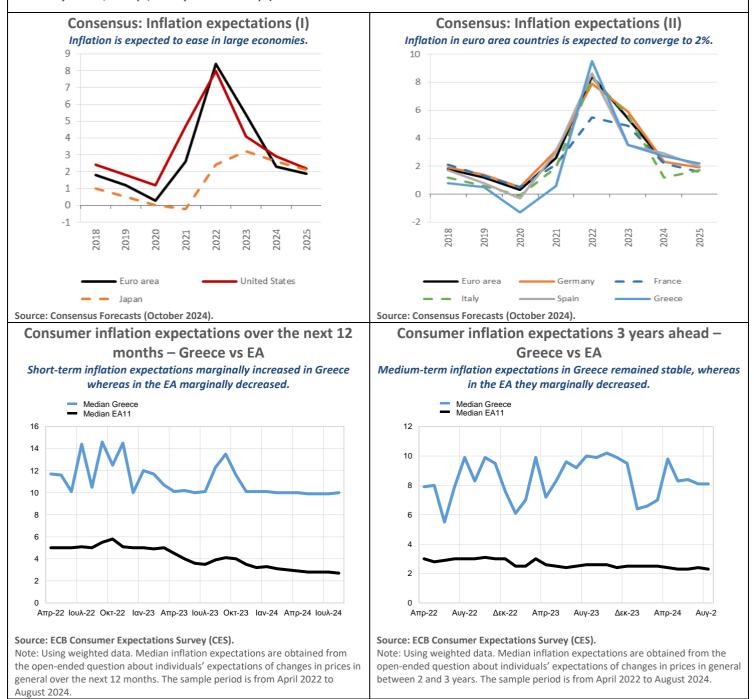
Domestic market

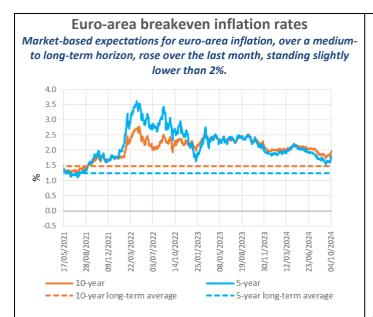


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Section 5: Inflation expectations

- Consensus Forecasts of inflation released in October suggests expected declining inflation for most advanced countries for 2024-2025 and convergence to 2%. Compared to the survey of last month, figures were marginally increased for several EA countries.
- ECB's Consumer Expectations Survey (CES) shows that median inflation expectation over the next 12 months in Greece marginally increased to 10% in August from 9.9% in July whereas in the euro area it marginally decreased to 2.7% from 2.8% in the previous month. Median inflation expectations three years ahead in Greece remained stable at 8.1% while in the euro area they marginally decreased to 2.3%.
- Market-based inflation expectations in the euro area and in the US rose, after stronger-than-expected US labour and services sector activity incoming data; currently, medium term breakeven inflation is below 2% in the EA and slightly above 2% in the US (on 7.10.2024 vs. 12.9.2024, 5-year breakeven inflation rates: EA: 1.80%, +23 bps; US: 2.20%, +27 bps; 10-year breakeven inflation rates: EA: 1.96%, +20 bps; US: 2.27%, +21 bps). Real yields fell in the EA, while they increased in the US, (on 7.10.2024 vs 12.9.2024: EA-5y: 0.31%, -15 bps; EA-10y: 0.29%, -11 bps; US-5y: 1.67%; +13 bps, US-10y: 1.76%; +14 bps).

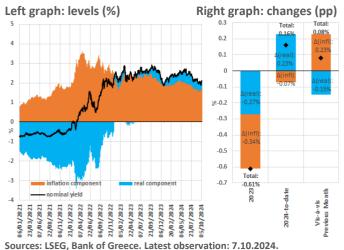




Sources: LSEG, Bank of Greece. Latest observation: 7.10.2024. Note: The chart illustrates daily developments in the yield differential between nominal and inflation-linked EA benchmark bonds with a maturity of 5 (blue line) and 10 (orange line) years. The dotted lines indicate the average value of each series since 2013.

Euro area: Decomposition of nominal 5y yields into real yield and inflation component

In the EA, nominal yields increased, with the inflation expectations component rising significantly, while real yields (i.e. inflationlinked bond yields which compensate investors for inflation) retreated.



Note: The chart shows the decomposition of the 5-year EA benchmark bond yield (black line) into its real (blue bars) and inflation-linked (orange bars) components. The inflation component is the breakeven inflation rate and the real component is the yield of the bond that compensates bondholders for inflation (i.e. the 5-year German inflation-linked federal bond).

US breakeven inflation rates Market-based expectations for US inflation, over a medium- to long-term

horizon rose over the last month, standing slightly above 2%.

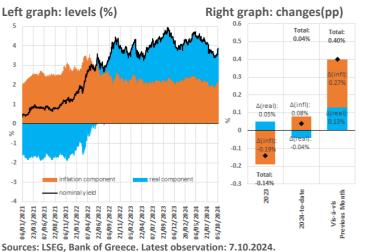


Sources: LSEG, Bank of Greece. Latest observation: 7.10.2024.

Note: The chart illustrates daily developments in the yield differential between nominal and inflation-linked US Treasury bonds with a maturity of 5 (blue line) and 10 (orange line) years. The dotted lines indicate the average value of each series since 2013.

US: Decomposition of nominal 5y yields into real yield and inflation component

In the US, nominal yields on medium-term bonds rose significantly, with both the inflation expectations component and real yields (i.e. yields on US Treasury inflation-protected securities) rising amid stronger-than-expected US labour and services sector activity incoming data.



Note: The chart shows the decomposition of the 5-year US Treasury bond yield (black line) into its real (blue bars) and inflation-linked (orange bars) components. The inflation component is the breakeven inflation rate and the real component is the yield of the bond that compensates bondholders for inflation (i.e. the 5-year US Treasury Inflation-Protected Security).

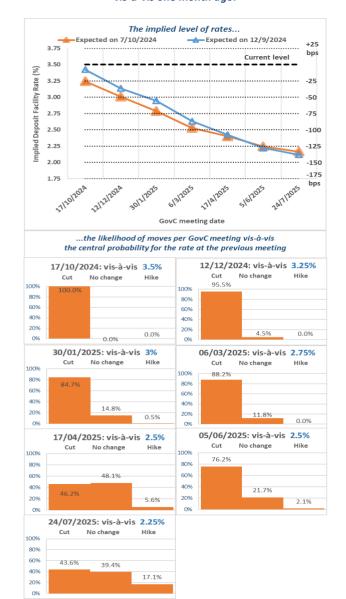
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Section 6: Policy interest rates expectations

- The ECB has already cut rates twice in 2024 by a total of 50 bps. Markets expect two more 25 bps cuts by December, one in October and another in December (probabilities: 98% and 95%, respectively). Furthermore, by the end of 2025H1 ECB's DFR is expected to stand 75-100 lower than at the end of 2024.
- The FED has cut rates by 50 bps in September's FOMC. Two more cuts are expected until the end of 2024: one in November and another in December (probabilities: 85% and 98%, respectively). By the end of 2025H1, the FFR is expected to stand 75 bps lower than its level at 2024-end, which constitutes an upward revision compared to one month ago (when cuts of 100-125 bps were expected).

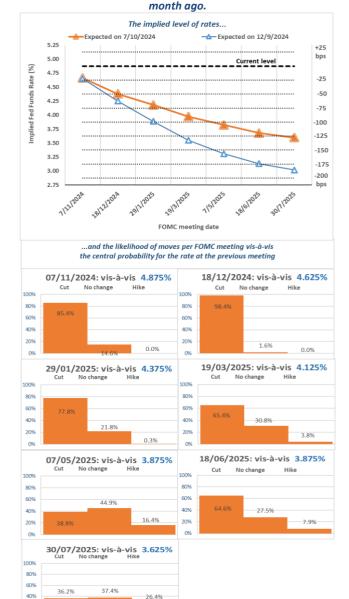
Short-term rates in the euro area

Money markets expect that the ECB will cut rates by 25 bps in each of the two GovC meetings up to the end of 2024. The outlook for ECB rates in the first semester of 2025 has remained broadly unchanged, vis-à-vis one month ago.



Short-term rates in the US

Interest rate derivatives price in a 25 bps rate cut by the Fed in November and another 25 bps in December. The US rates outlook for the first semester of 2025 has been revised upwards, vis-à-vis one



Sources: LSEG. Latest observation: 7.10.2024.

Notes: Upper charts: The orange line shows the most recent expectation about the level of the policy rate (ECB: Deposit Facility Rate, Fed: Fed funds rate), as implied by the OIS rates' yield curve (ECB) or the pricing in futures contracts (Fed) for each meeting from today until December 2024. The blue dotted line shows the expectation on average over the last 30 days. The horizontal axis shows the date of each meeting. The dashed lines show the present level of the policy rate and its expected level given the market's view about upcoming rate moves by the ECB (charts in the left) or the Fed (charts on the right). Lower charts: The bars show the level of likelihood (i.e. implied probabilities) for the event of a rate move (from left to right: cut, no change, hike). The graphs correspond to monetary policy meetings (GovC for the ECB and FOMC for the Fed) during 2024. The probabilities for each move are calculated as the sum of the probabilities for rates lower, equal or higher, respectively, vis-à-vis the central probability for the rate at the previous meeting as inferred by the latest OIS yield curve (ECB) or futures contracts for different delivery dates (Fed).

20%

Section 7: Eurosystem's latest published inflation projections (September 2024)

Euro area

- Headline inflation is projected to increase somewhat in the last quarter of this year, due to upward energy base effects, before moderating further to reach the target by the end of 2025.
- Over the medium term, energy inflation should settle at low positive rates, given market expectations for energy commodity prices and planned climate change-related fiscal measures.
- Lately food price inflation has declined strongly, due to lower energy and food commodity prices. Food price inflation will move broadly sideways, before moderating further from 2025.
- HICP inflation excluding energy and food (HICPX) will remain above headline inflation for almost all of the horizon but will continue its downward path. Services inflation has remained stubbornly high over recent months but it should ease driven by moderating indirect effects of energy price shocks, the downward impact from monetary policy tightening and lower labour cost pressures.
- Lately, wage growth has started to decline from elevated levels. Growth in compensation per employee will decline in the second half of the year and will average 4.5% in 2024. It will further moderate over the projection horizon.
- A recovery in productivity growth will support the moderation in labour cost pressures.
- Profit growth has declined notably, buffering the pass through of labour costs to prices.

Greece

- HICP inflation will decline significantly over the next two years.
- In 2024, its drop reflects the sharp decline in energy commodity prices and the de-escalation of food inflation.
- By the end of the projection horizon, inflation will converge towards 2% but will remain above it. Services inflation is expected to be the most persistent component, reflecting expected notable increases in wages.
- Nominal compensation per employee will increase at a rate slightly over 5% per year because of the tight labour market and information on the recent collective labour agreements.

Macroeconomic projections	, September 2024
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<u>Euro area</u>

	НІСР	HICP ex energy and food	HICP energy	Comp. per employee	Productivity	ULC
			Rat	e of changes		
2024	2.5	2.9	-1.4	4.5	0.0	4.5
2025	2.2	2.3	1.1	3.6	0.9	2.6
2026	1.9	2.0	0.6	3.2	1.1	2.1

Greece

	HICP	HICP ex energy and food	HICP energy	Comp. per employee	Productivity	ULO
			Rate of o	changes		
2024	2.9	3.4	-1.7	5.8	0.6	5.2
2025	2.2	2.9	-0.9	4.9	0.9	4
2026	2.1	2.5	-1.0	5.1	0.7	4.4

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Table of news and statements on inflation (period: 17/9/2024-14/10/2024)

Statements by central bankers and other officials

- 18.9.2024: FOMC Monetary policy decisions (Press release, link): "[...] The Committee has gained greater confidence that inflation is moving sustainably toward 2 percent, and judges that the risks to achieving its employment and inflation goals are roughly in balance [...] In light of the progress on inflation and the balance of risks, the Committee decided to lower the target range for the federal funds rate by 1/2 percentage point to 4-3/4 to 5 percent. [...]"
- **30.9.2024:** Fed Chair J. Powell (speech at the National Association for Business Economics Annual Meeting, <u>link</u>): "[...] our decision to reduce our policy rate by 50 basis points reflects our growing confidence that, with an appropriate recalibration of our policy stance, strength in the labor market can be maintained in a context of moderate economic growth and inflation moving sustainably down to 2 percent. Looking forward, if the economy evolves broadly as expected, policy will move over time toward a more neutral stance. But we are not on any preset course."
- **30.9.2024: Fed Governor M. Bowman (speech at the Georgia Bankers Association President/CEO Conference,** <u>link</u>): "[...] The progress in lowering inflation since April is a welcome development, but core inflation is still uncomfortably above the Committee's 2 percent goal. [...] I agreed with the Committee's assessment that, given the progress we have seen since the middle of 2023 on both lowering inflation and cooling the labor market, it was appropriate to reflect this progress by recalibrating the level of the federal funds rate and begin the process of moving toward a more neutral stance of policy."
- 2.10.2024: I. Schnabel, ECB Member of the Executive Board (speech at a lecture in memory of Walter Eucken, <u>link</u>): "[...] With signs of softening labour demand and further progress in disinflation, a sustainable fall of inflation back to our 2% target in a timely manner is becoming more likely, despite still elevated services inflation and strong wage growth. [...]"
- 8.10.2024: F. Elderson, ECB Member of the Executive Board and Vice-Chair of the Supervisory Board (interview with Delo, <u>link</u>): "[...] We expect inflation to decline to our target in the second half of 2025. Headline inflation is projected to average 2.5% in 2024, then 2.2% in 2025 and 1.9% in 2026. Services inflation remains strong but, according to our projections, we will see a deceleration going into the new year. [...]"

Data releases									
Date	Announcement	Actual	Expected*	Actual vs	Previous				
				Expected	reading				
16 September	Italy CPI (%ΔYoY Aug Final)	1.1%	1.1%	0.0%	1.1%				
16 September	Italy HICP (%ΔYoY Aug Final)	1.2%	1.3%	-0.1%	1.3%				
18 September	Euro Zone HICP (%ΔYoY Aug Final)	2.2%	2.2%	0.0%	2.2%				
18 September	Euro Zone HICP excl. food, energy, alcohol, tobacco (%ΔYoY Aug Final)	2.8%	2.8%	0.0%	2.8%				
20 September	Germany PPI (%∆YoY Aug)	-0.8%	-1.0%	0.2%	-0.8%				
27 September	France HICP (%ΔYoY Sep Preliminary)	1.5%	2.0%	-0.5%	2.2%				
27 September	France CPI NSA (%∆YoY Sep Preliminary)	1.2%	1.6%	-0.4%	1.8%				
27 September	United States Core PCE (%ΔYoY Aug)	2.7%	2.7%	0.0%	2.6%				
27 September	United States PCE (%ΔYoY Aug)	2.2%	2.3%	-0.1%	2.5%				
30 September	Italy CPI (%ΔYoY Sep Preliminary)	0.7%	0.8%	-0.1%	1.1%				
30 September	Italy HICP (%ΔYoY Sep Preliminary)	0.8%	1.0%	-0.2%	1.2%				
30 September	Germany CPI (%∆YoY Sep Preliminary)	1.6%	1.7%	-0.1%	1.9%				
30 September	Germany HICP (%ΔYoY Sep Preliminary)	1.8%	1.9%	-0.1%	2.0%				
1 October	Euro Zone HICP (%ΔYoY Sep Flash)	1.8%	1.8%	0.0%	2.2%				
1 October	Euro Zone HICP excl. food, energy, alcohol, tobacco (%ΔYoY Sep Flash)	2.7%	2.8%	-0.1%	2.8%				
3 October	Euro Zone PPI (%ΔYoY Aug)	-2.3%	-2.4%	0.1%	-2.1%				
10 October	Greece HICP (%ΔYoY Sep)	3.1%			3.2%				
10 October	Greece CPI (%∆YoY Sep)	2.9%			3.0%				
10 October	United States Core CPI NSA (%ΔYoY Sep)	3.3%	3.2%	0.1%	3.2%				
10 October	United States CPI NSA (%∆YoY Sep)	2.4%	2.3%	0.1%	2.5%				

Source: LSEG.

*Expected figures are based on opinion polls among financial sector experts.

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ISSN: 2945-2481

