

The December calendar for central banks' meetings is likely to shape investors' expectations for monetary policy in 2024

- Global equity markets were broadly flat in the past week, albeit euro area bourses overperformed (SXXE: +2.0% wow & +15% YTD), on the back of lower euro area risk-free rates. Indeed, the German Bund 10-year yield fell by -12 bps wow to 2.26%, reaching a seven-month low of 2.20% intra-week, following dovish comments from ECB officials.
- The ECB convenes on Thursday. Near-zero economic growth and, more so, the latest downward inflation surprise, appear to have taken off the table higher policy interest rates, following a cumulative increase of 450 basis points from July 2022 to September 2023 (current DFR: 4.0%). Instead, attention turns to potential hints for possible cuts during 2024.
- Recall that the latest inflation readings are set to result in a meaningful downward revision for ECB staff's projections, which back in September called for +3.2% (CPI) & +2.9% (core CPI) in 2024, on average. In the event, the headline CPI has averaged +2.7% yoy in Q4:2023, so far, versus September's ECB projections for +3.3%. In a similar vein, the core CPI has averaged +3.9% yoy in Q4:2023, so far, versus September's ECB projections for +4.1%.
- Furthermore, regarding the inflation forecasting horizon up to 2025, ECB staff's technical assumptions in September 2023 called for (average) Brent oil prices of €80/barrel, natural gas prices of €51/Mwh, EUR/USD of \$1.09 and an average 3-month Euribor of +3.4%. Based on futures and FRA average prices in December, so far, mean expected values for 2024-2025 are €75/barrel (-6% lower compared with September), €40/Mwh (-22%), \$1.10 (+1%) and +3.0%.
- All told, the above-mentioned factors suggest that core CPI ECB projections for H1:2025, or earlier, could align with the 2% target. Such an outlook, if sustained in the next months, could open the door to interest rate cuts. Market pricing vis-à-vis cuts is aggressive, in our view, as according to OIS, policy rates are expected to be lower by 125 to 150 bps by end-2024 (see graph below).
- Such an aggressiveness in terms of size, is compatible with elevated recession probabilities, an outcome that risk-markets defy. Indeed, euro area equities are up by +11% since end-October and high yield corporate bond spreads have narrowed by -64 basis points to 419 bps for the same period (+4% in terms of total return).
- An earlier winddown of the PEPP bond portfolio of €1.67 trillion (12% of euro area GDP) is likely, with current guidance calling for full reinvestments of maturing securities to continue at least up to end-2024.
- The Federal Reserve, on Wednesday, is expected to keep the Federal Funds Rate (FFR) unchanged at 5.25% - 5.50%. Attention will turn to the FOMC interest rate "dot plot", the median of which in September pointed to 5.1% at end-2024, 3.9% at end-2025 and 2.9% at end-2026.
- Due to decelerating US inflation (see graph below, with November CPI, released on Tuesday 12th, posting a +3.1% yoy increase), FOMC interest rate projections could be revised downwards (4.5% to 4.75% for 2024), albeit strong labor market data (see Economics) challenge the narrative of aggressive cuts implied by financial markets (between 125 and 150 bps).

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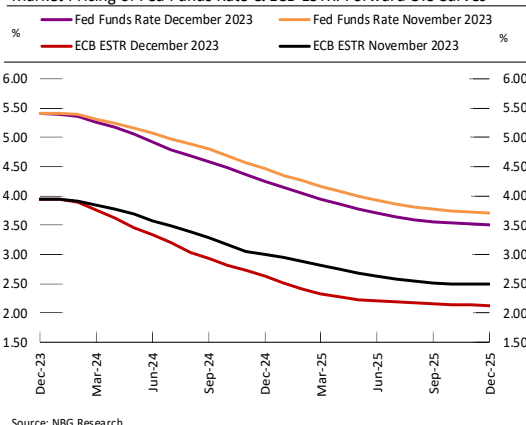
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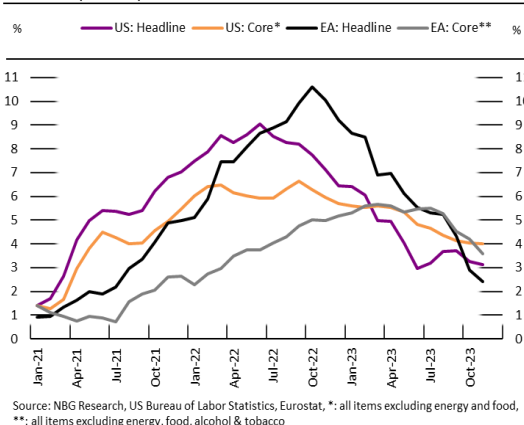
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Charts of the week

Market Pricing of Fed Funds Rate & ECB ESTR: Forward OIS Curves



Inflation (CPI YoY)



US labor market remains strong

- **Headline job creation, somewhat overshoot consensus estimates in November.** Specifically, non-farm payrolls were up by +199k, from +150k in October. The latest reading is compared with consensus estimates for +180k. However, negative net revisions for the previous two months took place (-35k, cumulatively). In all, the 3-month average stood at +204k in November from +192k in October, a resilient outcome by historical standards (monthly average of +91k since 2000). Sector-wise, the most notable gains occurred in health care (+77k). In a contrarian note, a net decline of -38k took place in retail trade.
- **Total household employment, including the self-employed and agricultural workers, increased by +747k in November from -348k in October.** As a result, the unemployment rate decreased to 3.7%, from 3.9% in October, significantly below consensus estimates for a stable reading (trough of 3.4% in April, the lowest since May 1969). Recall also that the fall in the unemployment rate could have been slightly more profound, hadn't it been for a rise in the labor force participation rate, by +0.1 pp to 62.8%. At the same time, the U-6 unemployment rate (which includes the unemployed, part-time workers for economic reasons, and those workers marginally attached to the labor force), which is considered a broader measure of slack, decreased by -0.2 pps to 7.0% in November.
- **The impetus for average hourly earnings posted signs of strengthening in November.** In the event, the monthly growth was +0.4% mom, versus consensus estimates for +0.3% mom (average of +0.25% mom since 2006), from +0.2% mom in October. As a result, the annual growth remained at a resilient +4.0% (average of +3.0% yoy since 2007). The three month-average of monthly annualized returns was 3.4% from 3.0% in the previous month and 4.5% in January 2023. Note also that the average weekly hours worked by total employees increased by +0.1 to 34.4 in November (re-aligning with its average since 2006), suggesting somewhat larger gains for workers' overall compensation.

Euro area real GDP in Q3:2023 was broadly unchanged (zero growth on an annual basis)

- **According to the 3rd estimate (the first including analytical breakdown per expenditure component), real GDP fell by -0.1% qoq (-0.5% annualized) in Q3:2023,** following a +0.1% qoq in Q2:2023. Real GDP trod water for a 4th consecutive quarter and as a result, was roughly unchanged on a yearly basis in Q3:2023 (from +0.6% yoy in Q2:2023). The most profound drag on quarterly growth in Q3:2023 (-0.3 pps) came from **inventories** (including acquisitions less disposals of valuables). At the same time, **Gross Fixed Capital Formation** ("GFCF") were stable on a quarterly basis (-0.1% yoy), following a -0.1% qoq (+1.2% yoy) in Q2:2023 (+1.9% yoy), being neutral to overall GDP growth, with a modest increase in business investment (75% of GFCF) by +0.2% qoq (+1.0% yoy), offsetting a decline for residential investment (25% of GFCF), by -0.6% qoq (-3.2% yoy). **Net exports** were also neutral to headline growth, with imports falling by -1.2% qoq (-3.8% yoy) and exports decreasing by -1.1% qoq (-2.8% yoy). On the other hand, **government consumption** increased by +0.3% qoq (+0.5% yoy), following a +0.2% qoq (+0.1% yoy) in Q2:2023, contributing +0.1 pp to overall growth.

- **Finally, private consumption** posted a partial recovery in Q3:2023, +0.3% qoq (-0.4% yoy) following zero growth in the previous two quarters and -0.8% qoq in Q4:2022, adding +0.2 pps to overall growth. Note that the initial indications for the current quarter's impetus have been anemic. In the event, retail sales increased by +0.1% mom (in seasonally adjusted volume terms | -1.0% yoy) in October, remaining though -0.2% below their average in Q3:2023. At the same time, new passenger car registrations (seasonally adjusted) fell by -2.2% mom (+7.9% yoy) in October and stood at -0.8% versus the Q3:2023 average. Note that car sales are not included in the aforementioned retail sales report.

Euro Area employment posted a subdued impetus in Q3:2023

- **Employment (in terms of hours worked) slightly decreased in Q3:2023, by -0.1% qoq (+0.8% yoy), after a +0.3% qoq (+1.0% yoy) in the previous quarter.** Nevertheless, the number of employees increased by +0.2% qoq in Q3:2023 (+1.3% yoy), from +0.1% qoq (+1.4% yoy in Q2:2023). The rise in employment (in terms of the number of persons), has contributed in the unemployment rate staying roughly stable in Q3:2023 at a record low of 6.5% (6.5% also in October 2023), despite the number of unemployed persons also increasing in that period (average of Q3:2023: +0.9% versus the average in Q2:2023). These developments suggest a widening of the labor force (data for Q3:2023 are due on December 15th), with the latest ratio at 65.5% from 65.2% in Q4:2022 and 64.7% in Q4:2019.

Japanese real GDP growth in Q3:2023 was revised down

- **Japanese real GDP declined by -0.7% qoq in Q3:2023 (-2.9% in annualized terms)** according to the 2nd estimate (+1.5% yoy), versus -0.5% qoq in the preliminary estimate (-2.1% annualized) and following a +0.9% qoq (+3.6% annualized | +2.2% yoy) in Q2:23. The downward revision was mostly due to **inventories** subtracting -0.5 pps from GDP's quarterly growth instead of -0.3 pps in the 1st estimate. In addition, **private consumption** came out at -0.2% qoq (-0.1 pp subtraction | unchanged on a yearly basis) in Q3:2023 instead of being unchanged in quarterly terms in the previous estimate (and neutral to overall growth), following a -0.6% qoq (+0.3% yoy) in Q2:2023. The revisions in the rest expenditure components were not particularly influential. In the event, **public investment**, fell by -0.8% qoq (neutral to headline growth | +2.6% yoy) instead of -0.5% qoq in the advance estimate and after a +1.5% qoq (+4.7% yoy) in Q2:2023. **Residential investment** was down by -0.5% qoq in Q3:2023 (also neutral to headline growth | +2.2% yoy), instead of -0.1% qoq, from +1.7% qoq (+3.2% yoy) in the previous quarter. **Business investment**, decreased by -0.4% qoq (drag of -0.1 pp to GDP's quarterly growth | -1.0% yoy) instead of -0.6% qoq in the advance estimate and following a -1.3% qoq (+1.5% yoy) in Q2:2023. The -0.1 pp drag from **net exports** was unrevised, with imports rising by +0.8% qoq (-4.7% yoy), whereas exports increased by +0.4% qoq (+2.3% yoy). Finally, **government consumption** rose by an unrevised +0.3% qoq (+0.1 pp to the headline GDP growth | +1.0% yoy), compared with -0.1% qoq (+0.8% yoy) in Q2:2023.

Equities

- **Global equity markets paused for breath in the past week following the significant increase by +11% since October 27th.** The S&P500 ended the week up by +0.2% (+20% ytd), recording its 6th consecutive week with gains (the largest such streak since November 2019), with the index up by +11.8% since October 27th. Notably, the equal-weighted S&P500 has increased by +12.3% during the same period, suggesting broad-based gains.

Sector-wise, the Energy sector underperformed (-3.3% wow), due to, *inter alia*, lower oil prices. The IT sector rose by +0.7% wow, with AMD overperforming (+6.2% wow), with the bulk of the increase occurring on Thursday (+9.9%), following the presentation of its new MI300 Series data center AI accelerators that according to the AMD's CEO are the highest-performance accelerators in the world for generative AI. Notably, AMD estimated that the size of the AI chip industry will reach \$400 billion in the next four years, revising higher its previous forecast for \$150 billion as the demand is growing much faster. Communications Services sector increased by +1.4% wow, with Google ending the week up by +2.4%, rising by +5.3% on Thursday, following the introduction of its most capable AI model, Gemini. According to the company, Gemini Ultra is the first AI model to overperform human experts on massive multitask language understanding (MMLU), which uses a combination of 57 subjects including math, physics, history, law, medicine and ethics for testing both world knowledge and problem-solving abilities, while also surpassing OpenAI's ChatGPT in several benchmarks.

On the other side of the Atlantic, the EuroStoxx index rose by +2.0% wow, posting a 6th consecutive week with gains (the largest such streak since December 2022), reaching its highest level since January 2022 (472). In Germany, the DAX40 rose by +2.2% wow, recording a new all-time high intra-week (16759). In Greece, the ASE Index declined by -0.4% wow (+37% ytd), with Banks underperforming (-3.6% wow | +61% ytd).

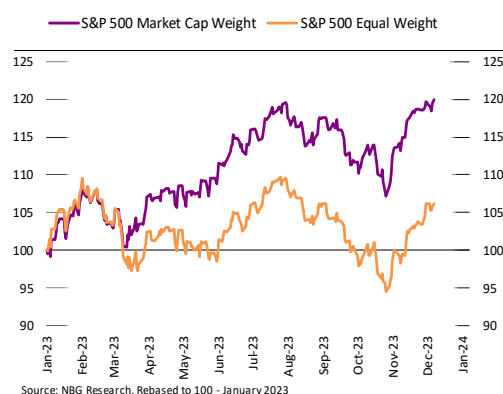
Fixed Income

- **Long-term government bond yields were mixed in the past week, exhibiting increased volatility.** Specifically, the 10-Year US Treasury yield recorded intra-week its lowest level since late-August (4.12%), nevertheless it ended the week broadly stable at 4.23%, following strong labor market data on Friday that pushed back investors' expectations for the onset of policy interest rate cuts by the Fed, to May 2024 from March 2024 previously. In Germany, the 10-year Bund yield declined by -12 bps wow to 2.26%, as investors' expectations for interest rate cuts have been brought forward (April 2024 from June 2024 in the previous week). Periphery bond spreads were little changed (Italy: +4 bps to 177 bps | Spain: +3 bps to 102 bps | Portugal: +3 bps to 66 bps | Greece: -3 bps to 119 bps). **Corporate bond spreads narrowed in the HY spectrum.** Indeed, EUR HY bond spreads narrowed by -15 bps to 420 bps, and their USD counterparts by -12 bps to 375 bps. In the investment grade spectrum, EUR IG bond spreads narrowed slightly by -3 bps wow to 142 bps, the lowest level since February, while their USD counterparts were broadly stable at 110 bps.

FX and Commodities

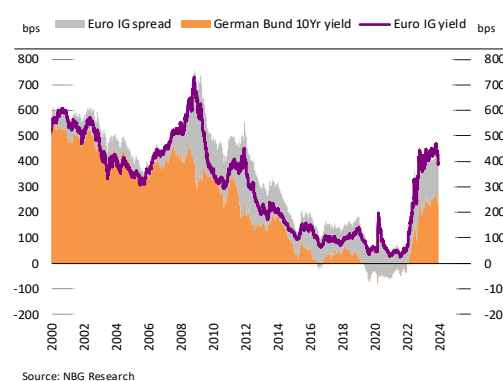
- **In foreign exchange markets, the US Dollar appreciated against the euro by +0.6% wow to \$1.08,** following, *inter alia*, stronger-than-expected US labor market data that challenged market pricing for the FFR. Furthermore, dovish comments from ECB officials weighed on the euro. **In commodities, oil prices declined significantly in the past week** (Brent: -3.9% wow \$75.8/barrel), posting the 7th consecutive week with losses, while recording their lowest levels since late-June intra-week. Softer demand outlook, following, *inter alia*, weaker-than-expected China's crude oil imports coming out at 10.33 million barrels/ day (-10.4% mom | -9.3% yoy), their lowest level in 4 months, contributed to the downside, while investors remain skeptical about the recently announced OPEC+ supply cuts.

US Equities Performance Year-to-Date



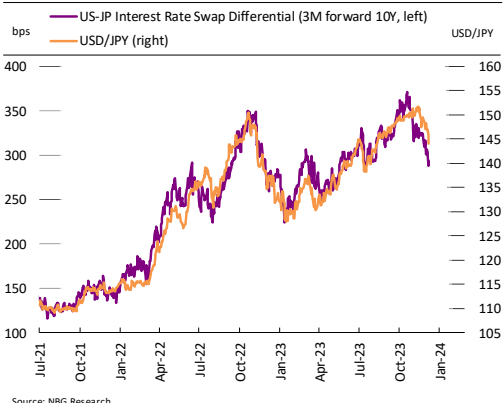
Graph 1.

German Bund 10Yr and EUR IG Corporate Bond yield & spread



Graph 2.

US-Japan Interest Rate Swap Differential and USD/JPY



Graph 3.

Quote of the week: "I agree that incoming inflation data support the idea that additional tightening won't be needed. However, expecting a cut in Q1:2024 is science fiction", **Member of the Governing Council of the European Central Bank, Peter Kazimir, December 6th 2023**

Interest Rates & Foreign Exchange Forecasts

10-Yr Gov. Bond Yield (%)	December 8th	3-month	6-month	12-month	Official Rate (%)	December 8th	3-month	6-month	12-month
Germany	2,26	2,50	2,50	2,40	Euro area	4,00	4,00	4,00	3,25
US	4,23	4,40	4,30	4,20	US	5,50	5,50	5,50	5,00
UK	3,99	4,30	4,20	3,90	UK	5,25	5,25	5,25	4,75
Japan	0,77	0,90	0,90	1,00	Japan	-0,10	-0,10	-0,05	0,00
Currency	December 8th	3-month	6-month	12-month		December 8th	3-month	6-month	12-month
EUR/USD	1,08	1,08	1,09	1,10	USD/JPY	145	147	145	140
EUR/GBP	0,86	0,86	0,86	0,87	GBP/USD	1,26	1,25	1,26	1,27
EUR/JPY	156	159	158	154					
Forecasts at end of period									

Forecasts at end of period

Economic Forecasts

United States	2021a	Q1:22a	Q2:22a	Q3:22a	Q4:22a	2022a	Q1:23a	Q2:23a	Q3:23a	Q4:23f	2023f
Real GDP Growth (YoY) (1)	5,8	3,6	1,9	1,7	0,7	1,9	1,7	2,4	3,0	2,7	2,4
Real GDP Growth (QoQ saar) (2)	-	-2,0	-0,6	2,7	2,6	-	2,2	2,1	5,2	1,3	-
Private Consumption	8,4	0,0	2,0	1,6	1,2	2,5	3,8	0,8	3,6	2,2	2,2
Government Consumption	-0,3	-2,9	-1,9	2,9	5,3	-0,9	4,8	3,3	5,5	1,9	3,9
Investment	7,1	7,2	-0,2	-4,3	-5,4	1,3	3,1	5,2	2,4	4,9	0,7
Residential	10,7	-1,8	-14,1	-26,4	-24,9	-9,0	-5,3	-2,2	6,2	2,5	-10,7
Non-residential	5,9	10,7	5,3	4,7	1,7	5,2	5,7	7,4	1,3	0,2	4,2
Inventories Contribution	0,2	-0,2	-1,9	-0,4	1,5	0,5	-2,2	-0,2	1,2	-0,7	-0,4
Net Exports Contribution	-1,3	-2,6	0,5	2,5	0,3	-0,5	0,6	0,1	-0,1	0,0	0,5
Exports	6,3	-4,6	10,6	16,2	-3,5	7,0	6,8	-9,3	6,0	2,9	2,6
Imports	14,5	14,7	4,1	-4,8	-4,3	8,6	1,3	-7,6	5,2	2,4	-1,6
Inflation (3)	4,7	8,0	8,7	8,3	7,1	8,0	5,8	4,0	3,5	3,7	4,3
Euro Area	2021a	Q1:22a	Q2:22a	Q3:22a	Q4:22a	2022a	Q1:23a	Q2:23a	Q3:23a	Q4:23f	2023f
Real GDP Growth (YoY)	5,9	5,4	4,1	2,4	1,8	3,4	1,3	0,6	0,0	0,1	0,5
Real GDP Growth (QoQ saar)	-	2,7	3,3	1,8	-0,4	-	0,4	0,5	-0,5	-0,1	-
Private Consumption	4,4	-0,2	3,2	5,3	-3,0	4,2	0,1	0,1	1,2	0,9	0,5
Government Consumption	4,2	1,6	-0,6	-0,4	2,0	1,6	-1,9	0,7	1,2	1,0	0,1
Investment	3,7	-2,0	2,0	5,2	-1,6	2,8	1,4	-0,3	0,1	-0,8	0,9
Inventories Contribution	0,4	-0,3	0,6	0,2	-0,4	0,3	-2,1	2,7	-1,3	-0,6	-0,3
Net Exports Contribution	1,4	3,1	0,6	-2,1	1,6	0,0	2,5	-2,3	-0,1	0,0	0,4
Exports	11,4	6,6	8,2	5,1	-1,3	7,4	-1,0	-4,2	-4,5	0,5	0,3
Imports	9,1	0,5	7,5	10,1	-4,5	8,0	-6,1	0,2	-4,8	0,6	-0,4
Inflation	2,6	6,1	8,0	9,3	10,0	8,4	8,0	6,2	4,9	2,8	5,5

a: Actual, f: Forecasts, 1. Seasonally adjusted YoY growth rate, 2. Seasonally adjusted annualized QoQ growth rate, 3. Year-to-year average % change

6-12-Month View & Key Factors for Global Markets

	US	Euro Area	Japan	UK
Equity Markets	<ul style="list-style-type: none"> Corporate profitability is expected to improve in 2024, with annual EPS growth of 12% Households' balance sheets are healthy (low debt, still elevated excess savings) Peaking profit margins Recession risks remain P/E's (Valuations) above long-term means, with a premium of 15%. Current P/E of 18.1x vs a 20-year average of 15.8x 	<ul style="list-style-type: none"> Higher equity risk premium (lower P/E ratio) relative to benchmark market (US) China's policy support measures could accelerate an export-led recovery Geopolitical uncertainty (Ukraine-Russia, natural gas) could re-intensify The economic backdrop remains muted Fiscal policy will turn restrictive in 2024 	<ul style="list-style-type: none"> Higher equity risk premium (lower P/E ratio) relative to benchmark market (US) China's policy support measures could accelerate an export-led recovery JPY depreciation from ¥132 to ¥148 (12%), if continues, could support exporters Signs of policy fatigue regarding structural reforms and fiscal discipline Yield-Curve Control twists, let alone a sustained shift in ultra-loose monetary policy, could hurt market benchmarks (but support Banks) 	<ul style="list-style-type: none"> Significant exposure to commodities Undemanding valuations in relative terms relative to other regions Elevated domestic policy uncertainty The BOE is expected to continue increasing interest rates as inflation remains very high and labor market extremely tight
	● Neutral	● Neutral/Positive	● Neutral	● Neutral
Government Bonds	<ul style="list-style-type: none"> Valuations appear somewhat rich, with term premium, albeit increasing to -0.1%, remaining below 2000-2015 averages (1.4%) Fiscal deficits to remain sizeable in following years Underlying inflation pressures remain acute FED: passive (lower rollover) Quantitative Tightening Global search for yield by non-US investors (e.g. Japan, repatriation from EM Economies) could reverse Safe-haven demand bid to support prices assuming geopolitical risks re-intensify The FED is likely close to be done with rates 	<ul style="list-style-type: none"> ECB to continue unwinding its balance sheet via its APP portfolio Global spillovers from higher US interest rates ECB QE "stock" effect, with government bond holdings of €3.9 trillion (27% of GDP) The ECB is likely close to be done with rates Fragile economic growth outlook due to the war in Ukraine 	<ul style="list-style-type: none"> Sizeable fiscal deficits The range of Yield-Targeting of 10-Year JGB at around 0% could widen further (implicitly @ +100 bps) Global spillovers from higher US interest rates Safe-haven demand Monetary stance remains extremely dovish, despite the unexpected shifts in YCC policy QE "stock" effect, with government bond holdings of ¥594 trillion (102% of GDP) 	<ul style="list-style-type: none"> Inflation expectations could drift higher due to supply disruptions (persistent post Brexit, temporary due to China) The BOE is expected to continue increasing interest rates as inflation remains very high and labor market extremely tight BOE: active (sales) Quantitative Tightening Slowing economic growth post-Brexit
	▲ Slightly higher yields	▲ Slightly higher yields	▲ Slightly Higher yields	▲ Slightly Higher yields
Foreign Exchange	<ul style="list-style-type: none"> USD interest rate differential vs peers remain significant Weak global economic growth Safe-haven demand status US political uncertainty to increase The FED is close to be done, which reduces potential USD upside 	<ul style="list-style-type: none"> Lower geopolitical uncertainty (Ukraine-Russia, natural gas) is positive for EUR Economic growth could accelerate in 2024, suggesting further interest rate hikes by the ECB Global growth risks could abate 	<ul style="list-style-type: none"> Safe haven demand More balanced economic growth recovery (long-term) Higher core inflation rates could accelerate the shift of monetary policy (less accommodative) 	<ul style="list-style-type: none"> Valuations appear undemanding with REER below its 15-year average Sizeable Current account deficit
	● Broadly Flat USD against G10 FX	● Range-bound with upside risks against the USD	▲ Stronger JPY	● Broadly stable GBP

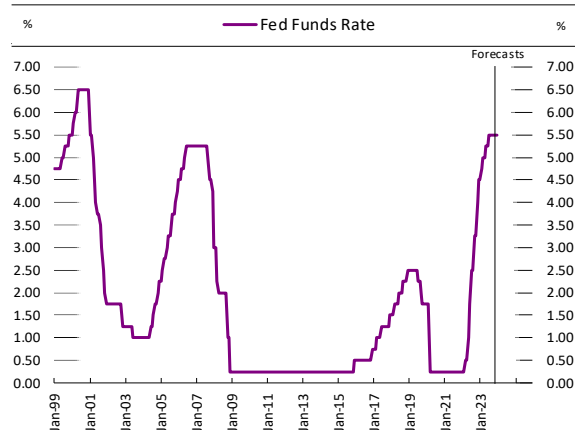
Economic Calendar

In the US, the Federal Reserve meets on December 13th and is expected to retain its Federal Funds Rate (FFR) stable at 5.25% - 5.50% range. Meanwhile, economic activity indicators for November are released. Specifically, retail sales are expected at -0.1% mom from a similar -0.1% mom in October, whereas industrial production is expected at +0.3% from -0.6% mom in October.

In the euro area, the ECB meets on December 14th and is expected to keep its interest rates stable at 4.00% (DFR) and 4.50% (MRO). Also, attention turns to PMI (15/12) surveys for December, as they will provide valuable insight regarding the current economic momentum. Specifically, the PMI composite is expected higher at 48.0, from 47.6 in November.

In the UK, the BoE meets on December 14th and is expected to maintain its bank rate 5.25% for the 3rd consecutive meeting.

US Federal Funds Rate



Source: NBG Research

Economic News Calendar for the period: December 05 - December 18 , 2023

Tuesday 05					Wednesday 06					Thursday 07					
US					US					US					
ISM Services PMI	November	S	A	P	ADP Employment Change (k)	November	S	A	P	Initial Jobless Claims (k)	December 2	S	A	P	
		52.0	+	52.7	51.8	Trade Balance (\$bn)	October	-64.2	-	-64.3	-61.2	1910	+	1861	1925
					EURO AREA					Continuing Claims (k)					
					Retail sales (MoM)					Wholesale trade (MoM)					
					October					October					
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Equity Markets (in local currency)

Developed Markets		Current Level	1-week change (%)	Year-to-Date change (%)	1-Year change (%)	2-year change (%)	Emerging Markets	Current Level	1-week change (%)	Year-to-Date change (%)	1-Year change (%)	2-year change (%)
US	S&P 500	4604	0.2	19.9	16.2	-2.1	MSCI Emerging Markets	59194	-0.6	3.0	1.2	-16.1
Japan	NIKKEI 225	32308	-3.4	23.8	17.2	11.9	MSCI Asia	896	-0.7	2.4	0.2	-17.1
UK	MSCI UK	2164	0.2	0.9	0.7	4.7	China	55	-3.5	-14.7	-15.1	-36.1
Euro area	EuroStoxx	472	2.0	15.2	12.3	0.2	Korea	779	0.6	16.2	9.4	-15.1
Germany	DAX 40	16759	2.2	20.4	17.5	6.8	MSCI Latin America	95055	-0.2	7.7	6.6	2.1
France	CAC 40	7527	2.5	16.3	13.2	7.3	Brazil	318335	-0.8	7.8	9.4	0.4
Italy	MSCI Italy	966	1.7	27.7	25.6	15.0	Mexico	50443	1.0	12.0	6.1	5.8
Spain	IBEX-35	10223	0.8	24.2	24.3	20.6	MSCI Europe	3766	0.0	33.8	42.0	-45.4
Hong Kong	Hang Seng	16334	-2.9	-17.4	-16.0	-31.9	Russia	3080	-2.0	43.0	41.0	-18.4
Greece	ASE	1275	-0.4	37.1	39.3	42.8	Turkey	8110459	-1.0	50.6	70.9	261.8

World Market Sectors and Styles (MSCI Indices*)

in US Dollar terms	Current Level	1-week change (%)	Year-to-Date change (%)	1-Year change (%)	2-year change (%)	Investment Styles	Current Level	1-week change (%)	Year-to-Date change (%)	1-Year change (%)	2-year change (%)
Energy	237.8	-3.1	-3.3	-0.6	34.1	Growth	4452.7	0.5	31.3	25.8	-8.0
Materials	324.7	-1.2	4.5	1.3	-7.4	Value	3227.2	-0.1	4.0	3.1	-2.7
Industrials	343.1	0.4	14.7	12.9	-1.3	Large Cap	1927.8	0.2	18.8	15.6	-3.0
Consumer Discretionary	377.2	1.1	29.5	21.9	-15.7	Small Cap	494.5	0.5	6.4	4.6	-14.6
Consumer Staples	262.1	-0.8	-2.8	-4.5	-6.4	US Growth	2943.9	0.3	24.7	19.1	-12.7
Healthcare	339.7	0.0	-1.6	-3.6	-3.9	US Value	1646.1	0.1	14.7	12.8	9.4
Financials	141.3	0.4	7.9	8.1	-4.7	US Large Cap	4604.4	0.2	19.9	16.2	-2.1
IT	579.7	0.6	47.3	39.3	1.3	US Small Cap	1220.2	1.3	5.4	1.7	-12.9
Telecoms	92.7	1.2	39.1	35.6	-13.6	US Banks	326.4	1.4	-0.5	0.1	-22.9
Utilities	146.8	0.5	-3.9	-4.2	-6.9	EA Banks	119.3	2.0	24.4	29.0	22.0
Real Estate	960.3	0.0	0.4	-1.9	-24.3	Greek Banks	1030.3	-3.6	60.8	64.7	78.3

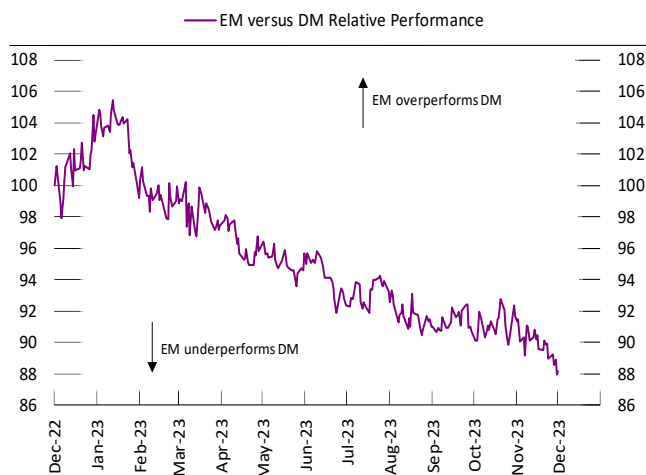
Bond Markets (%)

10-Year Government Bond Yields		Current	Last week	Year Start	One Year Back	10-year average	Government Bond Yield Spreads (in bps)		Current	Last week	Year Start	One Year Back	10-year average
US		4.23	4.22	3.88	3.49	2.30	US Treasuries 10Y/2Y		-50	-33	-54	-82	72
Germany		2.26	2.38	2.53	1.80	0.54	US Treasuries 10Y/5Y		-1	8	-13	-21	36
Japan		0.77	0.71	0.42	0.25	0.18	Bunds 10Y/2Y		-40	-31	-16	-21	61
UK		3.99	4.16	3.66	3.06	1.65	Bunds 10Y/5Y		4.0	10.0	-0.4	-1	44
Greece		3.45	3.60	4.59	3.84	4.80	Corporate Bond Spreads (in bps)		Current	Last week	Year Start	One Year Back	10-year average
Ireland		2.59	2.75	3.06	2.25	1.11	US IG		110	111	138	138	131
Italy		4.03	4.11	4.64	3.68	2.19	US High yield		375	387	481	455	444
Spain		3.28	3.37	3.61	2.81	1.60	Euro area IG		142	145	167	171	122
Portugal		2.92	3.01	3.57	2.71	2.13	Euro area High Yield		420	435	498	514	402
EM		4.88	4.93	5.04	5.05	4.65	EM		248	263	295	308	316
US Mortgage Market		Current	Last week	Year Start	One Year Back	10-year average	EUR Senior Financial		170	173	204	211	N/A
30-Year FRM ¹ (%)		7.17	7.37	6.42	6.41	4.42	EUR Subordinated Financial		273	282	311	320	N/A
vs 30Yr Treasury (bps)		285.1	292.9	240.1	285.6	158.9	EUR AT1		673	697	718	721	N/A

Foreign Exchange & Commodities

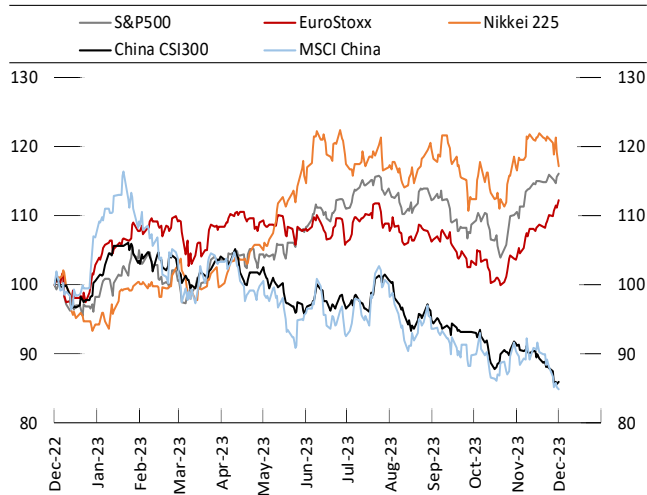
Foreign Exchange		Current	1-week change (%)	1-month change (%)	1-Year change (%)	Year-to-Date change (%)	Commodities		Current	1-week change (%)	1-month change (%)	1-Year change (%)	Year-to-Date change (%)
Euro-based cross rates							Agricultural		397	-0.2	-1.1	-11.9	-15.6
EUR/USD		1.08	-0.6	0.6	2.1	0.9	Energy		244	-4.1	-5.8	-6.8	-15.3
EUR/CHF		0.95	0.2	-1.5	-4.1	-4.1	West Texas Oil (\$/bbl)		71	-3.8	-5.4	-0.3	-11.3
EUR/GBP		0.86	0.1	-1.5	-0.5	-3.2	Crude brent Oil (\$/bbl)		76	-3.9	-4.7	-0.4	-11.7
EUR/JPY		155.62	-2.7	-3.7	8.1	10.5	HH Natural Gas (\$/mmbtu)		2.6	-8.4	18.3	-46.2	-26.8
EUR/NOK		11.72	0.9	-2.2	11.4	11.5	TTF Natural Gas (EUR/mwh)		39	-11.3	-15.7	-72.2	-49.4
EUR/SEK		11.26	-0.5	-3.4	3.2	1.3	Industrial Metals		401	-2.7	-2.1	-13.6	-11.1
EUR/AUD		1.63	0.1	-2.0	4.9	3.9	Precious Metals		2611	-4.2	2.4	10.7	9.0
EUR/CAD		1.46	-0.1	-1.0	2.1	1.2	Gold (\$)		2004	-3.3	2.7	12.0	9.8
USD-based cross rates							Silver (\$)		23	-9.6	1.9	-0.3	-4.1
USD/CAD		1.36	0.5	-1.6	0.0	0.3	Baltic Dry Index		2483	-22.2	62.3	79.3	63.9
USD/AUD		1.52	0.8	-2.6	2.7	3.0	Baltic Dirty Tanker Index		1129	-3.7	-20.7	-46.0	-39.7
USD/JPY		144.51	-2.1	-4.2	5.9	9.5							

EM vs DM Performance in \$



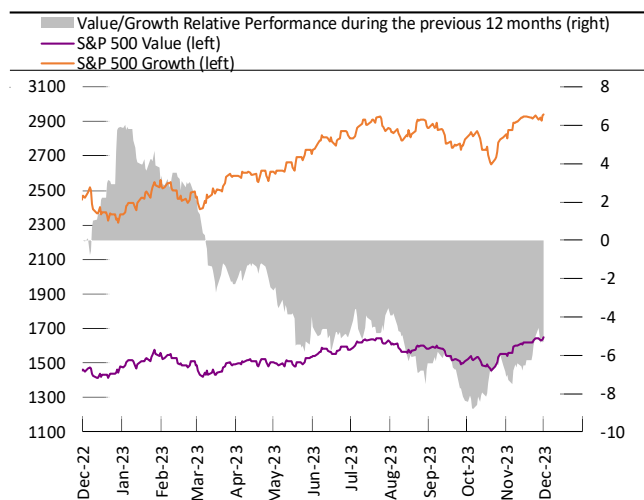
Data as of December 8th – Rebased @ 100

Equity Market Performance



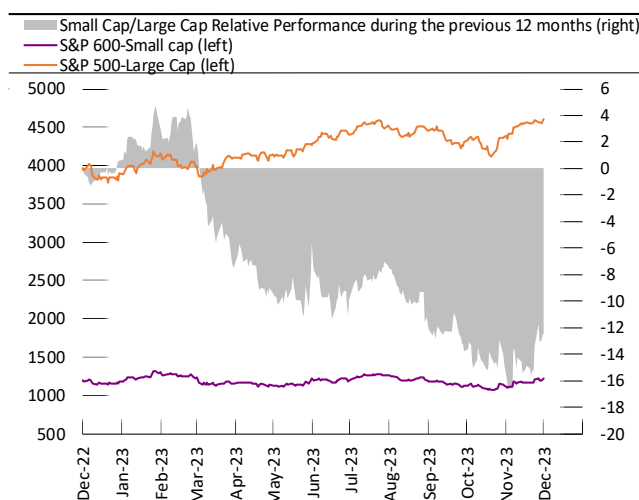
Data as of December 8th – Rebased @ 100

S&P 500 Value & Growth Index



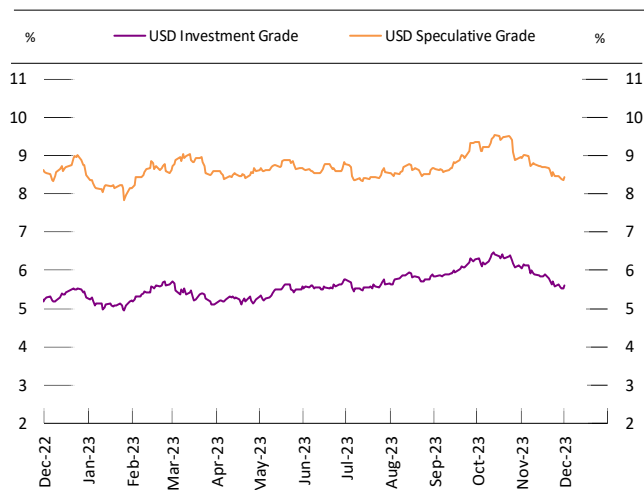
Data as of December 8th

S&P 500 & S&P 600 Index



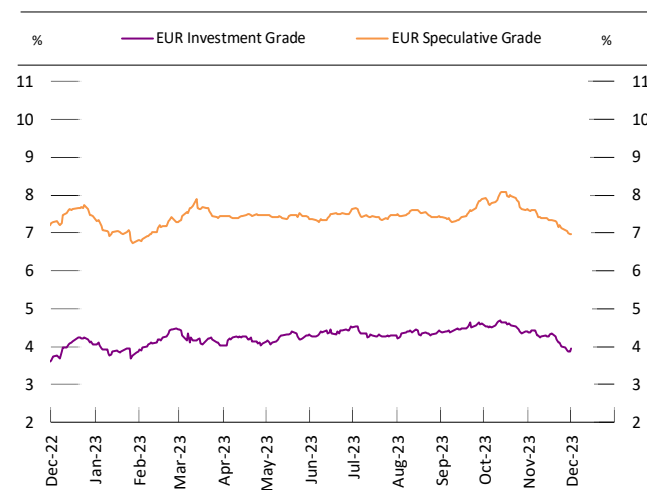
Data as of December 8th

USD Corporate Bond Yields



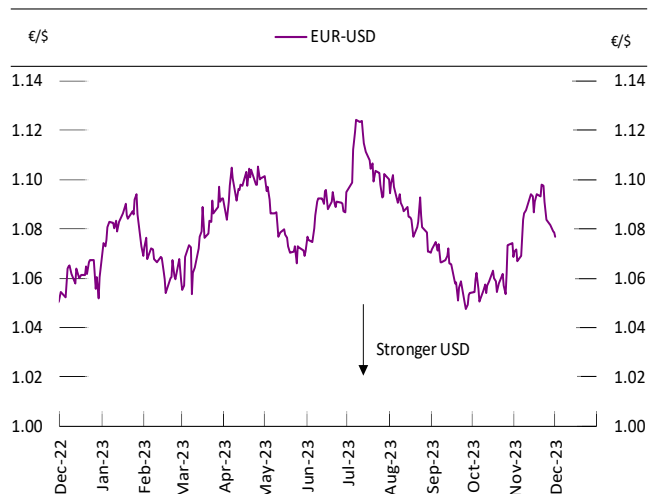
Data as of December 8th

EUR Corporate Bond Yields



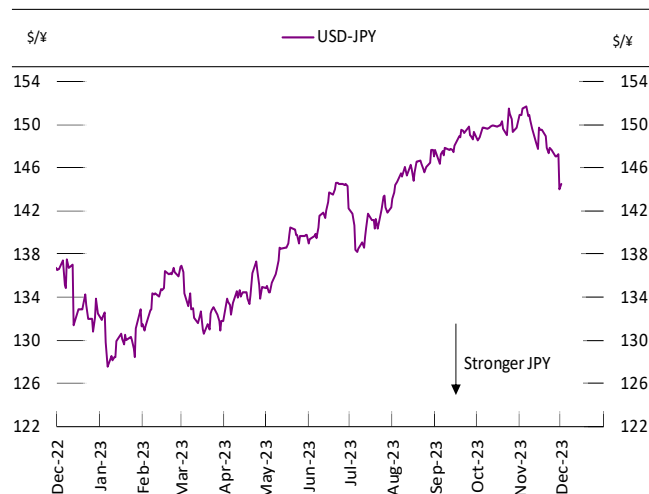
Data as of December 8th

EUR/USD



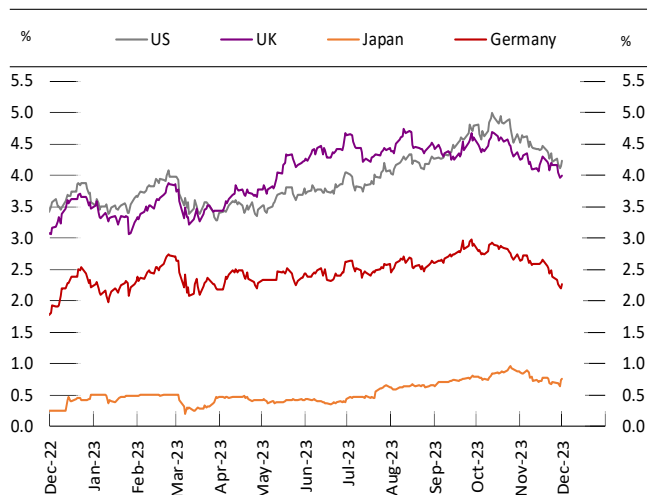
Data as of December 8th

JPY/USD



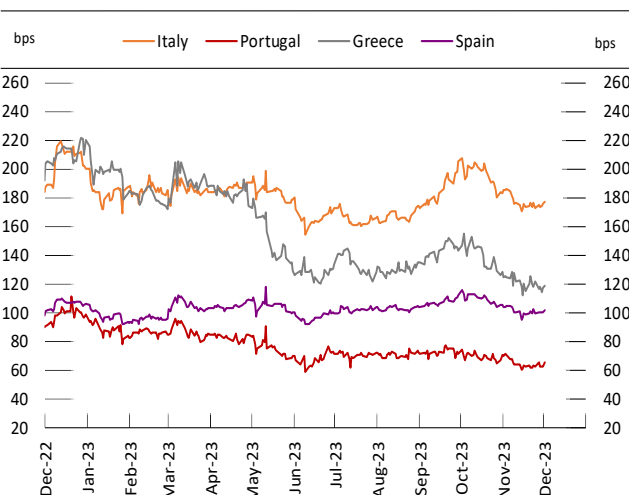
Data as of December 8th

10- Year Government Bond Yields



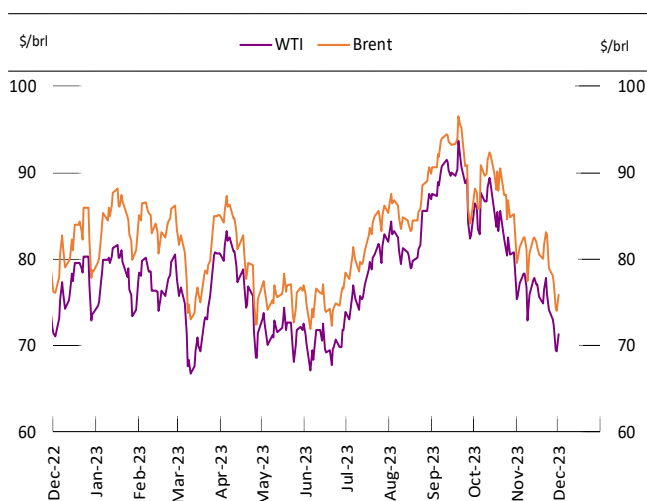
Data as of December 8th

10- Year Government Bond Spreads



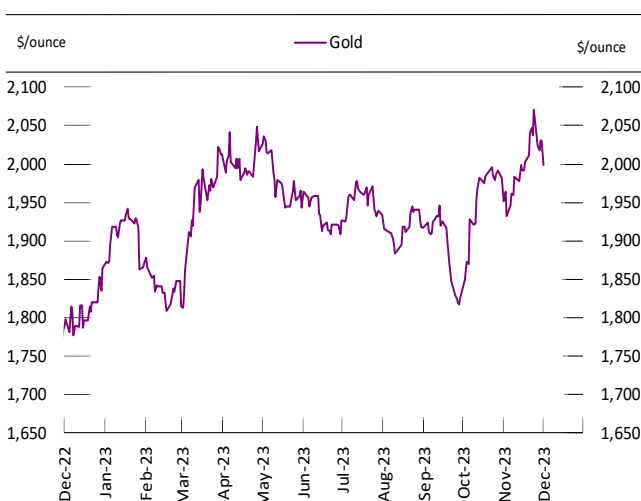
Data as of December 8th

West Texas Intermediate and Brent (\$/bbl)



Data as of December 8th

Gold (\$/ounce)



Data as of December 8th

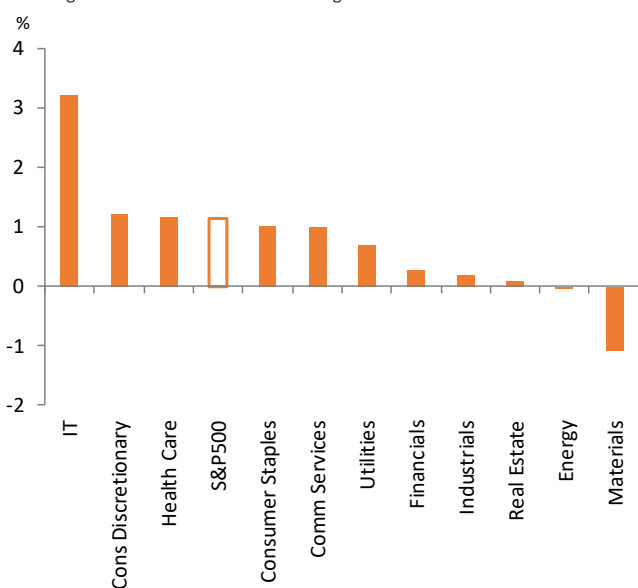
US Sectors Valuation

	Price (\$)			EPS Growth (%)		Dividend Yield (%)		P/E Ratio				P/BV Ratio			
	8/12/23	% Weekly Change	%YTD	2023	2024	2023	2024	2023	2024	12m fwd	20Yr Avg	2023	2024	Current	20Yr Avg
S&P500	4604	0.2	19.9	1.7	11.8	1.5	1.6	21.0	18.8	18.9	15.8	4.3	3.9	4.3	2.9
Energy	623	-3.3	-7.3	-26.7	4.5	3.7	3.6	10.8	10.3	10.4	15.1	2.0	1.9	2.0	2.0
Materials	514	-1.7	5.0	-23.2	3.5	2.1	2.2	19.0	18.3	18.4	15.1	2.7	2.6	2.7	2.8
Financials															
Diversified Financials	1039	-0.5	8.6	1.5	11.0	1.4	1.5	19.6	17.6	17.8	15.9	2.7	2.5	2.7	2.3
Banks	326	1.4	-0.5	12.3	-5.1	3.4	3.5	9.2	9.7	9.7	11.7	1.1	1.0	1.1	1.2
Insurance	646	-0.9	8.5	18.8	22.7	1.7	1.9	15.2	12.4	12.6	11.2	2.3	2.1	2.3	1.4
Real Estate	237	-0.3	1.9	0.9	2.7	3.8	3.9	17.0	16.5	16.6	18.6	2.7	2.9	2.7	2.7
Industrials															
Capital Goods	967	0.7	10.7	19.1	12.5	1.6	1.7	20.7	18.4	18.6	16.1	5.0	4.5	5.0	3.6
Transportation	966	-0.1	6.5	0.2	9.2	2.1	2.2	16.3	14.9	N/A	14.9	4.8	4.2	4.8	3.7
Commercial Services	559	-1.5	15.0	10.7	11.3	1.3	1.4	29.2	26.2	26.4	21.7	8.9	7.9	8.9	4.9
Consumer Discretionary															
Retailing	3742	0.5	35.9	69.2	15.7	0.6	0.7	33.4	28.9	29.2	23.1	11.1	8.5	11.1	8.1
Consumer Services	1571	1.0	23.7	220.9	10.8	1.1	1.2	23.8	21.5	N/A	28.4	126.5	66.8	N/A	13.6
Consumer Durables	425	3.3	14.8	-8.9	7.7	1.2	1.2	17.1	15.9	16.0	16.8	3.8	3.4	3.8	3.3
Automobiles and parts	132	2.1	69.3	-10.3	7.9	0.3	0.4	30.1	27.8	N/A	11.5	4.8	4.0	4.8	2.3
IT															
Technology	3573	2.0	42.0	0.6	8.1	0.7	0.8	27.6	25.5	25.6	16.0	17.6	15.5	17.6	5.9
Software & Services	4199	-0.4	47.7	12.0	13.4	0.7	0.8	33.1	29.2	29.4	18.7	10.7	8.6	10.7	6.4
Semiconductors	2993	1.1	80.3	2.4	32.5	0.9	1.0	29.6	22.4	22.8	17.9	7.2	6.4	7.2	3.8
Communication Services	237	1.4	49.0	27.5	16.7	0.7	0.8	19.5	16.7	16.9	17.5	3.6	3.2	3.6	2.9
Media	964	1.5	59.1	34.1	19.8	0.2	0.2	22.6	18.9	19.1	21.3	4.3	3.7	4.3	3.2
Consumer Staples															
Food & Staples Retailing	658	0.3	6.1	1.3	6.3	1.6	1.6	22.5	21.2	21.3	17.2	4.9	4.5	4.9	3.7
Food Beverage & Tobacco	785	-1.0	-9.0	3.4	4.9	3.5	3.6	17.1	16.3	16.4	17.0	4.7	4.3	4.7	4.7
Household Goods	789	-3.6	-8.6	6.2	7.6	2.6	2.8	23.4	21.7	21.8	19.7	8.3	8.0	8.3	6.1
Health Care															
Pharmaceuticals	1224	0.4	-5.5	-34.6	29.8	2.0	2.1	22.1	17.1	17.4	14.6	5.5	4.9	5.5	4.1
Healthcare Equipment	1849	-0.1	0.0	3.8	8.6	1.2	1.3	18.9	17.4	17.5	15.8	3.8	3.5	3.8	3.1
Utilities	320	-0.3	-10.9	5.9	8.3	3.5	3.7	17.0	15.7	15.8	15.5	1.9	1.8	1.9	1.8

Blue box indicates a value more than +2standard deviation from average, light blue a value more than +1standard deviation from average. Orange box indicates a value less than -2standard deviation from average, light orange a value less than -1standard deviation from average

1-month revisions to 12-month Forward EPS

Earnings Revisions indicate 1-month change in 12-month Forward EPS

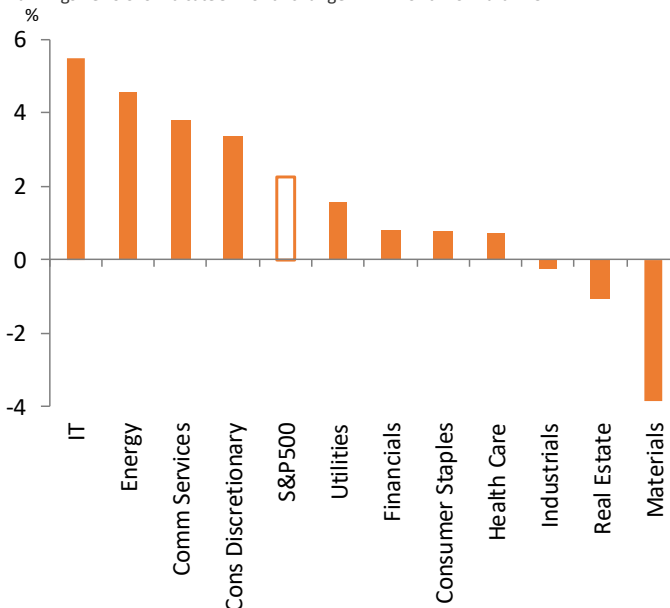


Data as of December 8th

12-month forward EPS are 6% of 2023 EPS and 94% of 2024 EPS

3-month revisions to 12-month Forward EPS

Earnings Revisions indicate 3-month change in 12-month Forward EPS



Data as of December 8th

12-month forward EPS are 6% of 2023 EPS and 94% of 2024 EPS

National Bank of Greece | Economic Analysis & Research Division | Global Markets Analysis

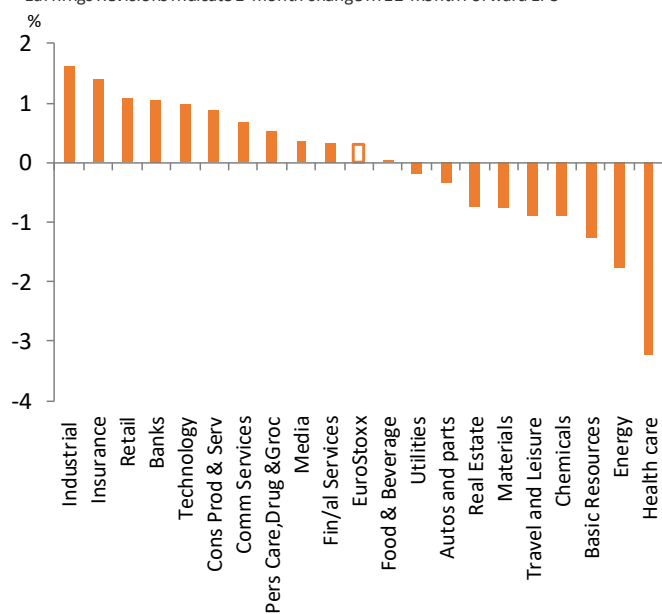
Euro Area Sectors Valuation

	Price (€)			EPS Growth (%)		Dividend Yield (%)		P/E Ratio				P/BV Ratio			
	8/12/23	% Weekly Change	%YTD	2023	2024	2023	2024	2023	2024	12m fwd	20Yr Avg	2023	2024	Current	20Yr Avg
EuroStoxx	472	2.0	15.2	4.2	5.0	3.3	3.5	13.2	12.6	12.6	13.1	1.7	1.6	1.7	1.6
Energy	352	-1.0	1.6	-30.4	2.7	5.1	5.2	7.5	7.3	7.3	11.1	1.2	1.1	1.2	1.5
Materials	1005	1.8	9.0	-45.4	12.8	3.2	3.4	16.4	14.5	14.6	13.4	1.3	1.3	1.3	1.6
Basic Resources	215	1.5	-4.0	-52.6	1.6	3.0	3.1	9.3	9.2	9.2	10.3	0.6	0.6	0.6	0.9
Chemicals	1495	1.8	11.6	-41.5	18.1	3.3	3.4	19.7	16.7	16.9	14.3	1.7	1.7	1.7	2.1
Financials															
Banks	119	2.0	24.4	34.1	3.2	7.3	7.7	6.4	6.2	6.3	9.8	0.7	0.7	0.7	0.9
Insurance	356	2.2	15.9	41.4	13.6	5.1	5.5	10.1	8.9	9.0	9.4	1.5	1.3	1.5	1.0
Financial Services	545	2.0	11.9	31.2	-20.2	3.2	3.4	9.0	11.3	11.1	15.3	1.2	1.2	1.2	1.3
Real Estate	141	2.0	7.2	-4.1	-1.4	4.5	5.2	11.8	12.0	12.0	16.2	0.7	0.8	0.7	1.0
Industrials															
Industrial Goods & Services	1115	2.8	15.9	12.0	12.4	2.4	2.6	18.0	16.0	16.1	15.3	2.6	2.4	2.6	2.4
Construction & Materials	597	2.4	29.3	4.0	5.9	3.4	3.6	13.1	12.4	12.4	13.5	1.7	1.6	1.7	1.6
Consumer Discretionary															
Retail	676	-1.1	31.9	18.5	11.2	3.8	4.3	22.3	20.0	20.2	22.5	5.4	5.0	5.4	5.5
Automobiles and parts	617	4.3	21.8	1.3	-5.2	5.1	5.1	6.0	6.3	6.3	8.4	0.9	0.8	0.9	1.1
Travel and Leisure	222	3.6	21.1	60.3	10.5	1.8	2.6	12.4	11.2	N/A	N/A	2.4	2.1	2.4	2.0
Consumer Products & Services	498	3.6	16.7	10.8	14.4	1.5	1.7	30.8	26.9	27.2	21.4	6.3	5.5	6.3	3.7
Media	320	1.5	22.7	17.0	8.8	2.3	2.5	21.2	19.5	19.6	15.5	3.5	3.3	3.5	2.0
Technology	948	1.5	32.7	29.7	10.5	1.0	1.1	25.1	22.8	22.9	21.0	4.4	3.9	4.4	3.5
Consumer Staples															
Food, Beverage & Tobacco	163	1.4	-1.2	-7.8	13.5	2.1	2.4	19.9	17.6	17.7	17.8	1.9	1.8	1.9	2.6
Personal Care, Drug & Grocery	176	2.5	5.3	-5.2	11.5	2.5	2.6	16.4	14.7	14.8	16.2	2.2	2.1	2.2	2.6
Health care	742	0.7	-4.5	-8.3	6.6	2.6	2.7	16.1	15.1	15.2	15.0	1.8	1.7	1.8	2.1
Communication Services	288	0.0	10.1	-5.9	11.1	4.1	4.4	15.0	13.5	13.6	13.2	1.4	1.4	1.4	1.9
Utilities	392	2.3	12.1	9.3	-7.2	5.0	5.0	11.9	12.8	12.7	13.2	1.7	1.7	1.7	1.5

Blue box indicates a value more than +2standard deviation from average, light blue a value more than +1standard deviation from average. Orange box indicates a value less than -2standard deviation from average, light orange a value less than -1standard deviation from average

1-month revisions to 12-month Forward EPS

Earnings Revisions indicate 1-month change in 12-month Forward EPS

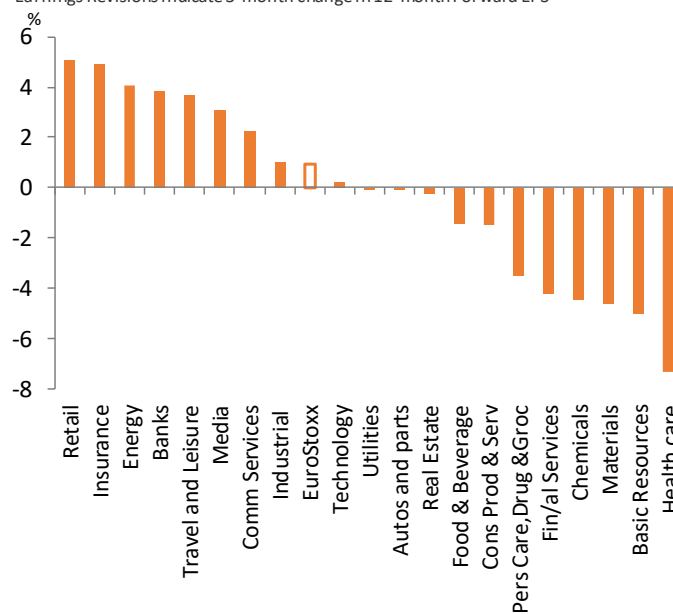


Data as of December 8th

12-month forward EPS are 6% of 2023 EPS and 94% of 2024 EPS

3-month revisions to 12-month Forward EPS

Earnings Revisions indicate 3-month change in 12-month Forward EPS



Data as of December 8th

12-month forward EPS are 6% of 2023 EPS and 94% of 2024 EPS

National Bank of Greece | Economic Analysis & Research Division | Global Markets Analysis

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