

Key points

- The world economy is set to slow significantly over the remainder of 2022. The chances of a recession have risen and could increase further, notably in Europe. However, we expect central banks to take a more pragmatic approach at the end of 2022 and into 2023 as inflation eases, providing an opportunity for the global economy to skirt an outright recession.
- A shift in expectations of Fed tightening in particular should bring about a peak in the US dollar. Current account surplus currencies – euro, Swiss franc, and Japanese yen – should be primary beneficiaries. Downside in gold below USD 1,800/oz should be limited.
- The start of a tightening cycle by the European Central Bank means that both German and US 10-year yields should continue to move higher towards 2% and 3.5% respectively in the second half.
- The slowing in the global economy should put upward pressure on credit spreads, especially in high-yield and emerging market debt, where they are underpricing the prospect of a slowdown and deteriorating credit metrics.
 Fixed income hedge fund strategies should continue to provide shelter for bond investors as rising rates are joined by widening spreads in the months ahead.
- Equities have only partially factored in a soft landing for the global economy and appear richly priced relative to bonds generally and credit in particular. High-quality, high-visibility earnings will hold the key in the months ahead as earnings risk becomes more prominent.
- Select industrial companies should benefit from governments' accelerated spending to counteract the economic slowdown.



Union Bancaire Privée

Economic outlook: chance of stability but risks remain

Growth in the world economy was expected to slow slightly after the sharp post-pandemic upturn in consumer spending in 2021. However, economies have faced three major shocks in the first half of 2022 that have pressured global growth further:

- the closure of the Chinese economy because of the authorities' zero-Covid response to rising infections,
- the conflict between Ukraine and Russia and the renewed upward pressure it has put on energy and agricultural commodity prices, and
- the prospect of faster and sharper monetary tightening than previously expected in the US and Europe in particular.

As a result, the global economy has slowed more than anticipated in the first half, leaving it susceptible to a global recession, either because of domestic demand succumbing to the shocks of the first semester of 2022, or due to a new external shock such as the start of a wider conflict or a total embargo on Russian commodity exports to major developed economies.

However, a reopening of China should help stabilise growth in the second-largest economy in the world and support growth in Europe in the second half of 2022. This, combined with growing fiscal support and a likely peak in inflation, which should offer the Federal Reserve some policy flexibility, is expected to prevent the current slowdown from turning into an outright global recession.

Economic growth prospects

In the US, the manufacturing and employment markets are not showing any signs of a major economic decline that could lead to an imminent recession. The slide we have seen to date relates more to the surprisingly fast US monetary tightening than to issues originating in China or Europe.

Discussions among Fed officials have shown a desire to balance steady growth with a firm grip on inflation, suggesting that the Fed could change tack once it has brought its key interest rates back to neutral (between 2.25% and 2.50%). As a result, we expect US growth to slow to around 2.7% in 2022 and then stabilise at around 2% in 2023.

Europe appears more vulnerable in the next few quarters, and several countries have posted weak growth or even sequential declines in quarterly output. Temporary contractions in production or even in GDP as a whole may take place, resulting in "technical" recessions at around -0.2% quarter on quarter. This is consistent with our scenario of a sharp slowdown to only 2% in 2022 and 2023, well below the consensus and ECB forecasts of above 2.5% for 2022.

Germany is vulnerable because it is highly dependent on Russia for energy and because global exports are weak. France and Italy have also seen a decline in production, consumer confidence and consumer spending indicators. Indeed, deteriorating financial conditions in the eurozone and leading manufacturing indicators in Germany are warnings that the European economy might contract.

As a result, the stabilisation expected in the second half will be more fragile in Europe than elsewhere. It will depend on the absence of further problems and, indirectly, on progress with the war in Ukraine and a reacceleration in Chinese demand (see below). If major risks are realised, they would push the eurozone into a deeper and more sustained recession than our core scenario outlines.

China entered recession in the second quarter. However, with lockdown measures now being gradually eased and the government announcing new monetary and fiscal support, its economy is likely to recover steadily in the third quarter. Overall growth appears unlikely to hit the authorities' 5.5% growth target in 2022 as the monetary and fiscal stimulus, while it should be substantial enough to pull the economy out of recession, will be much less than that deployed in previous major crises.

Global growth: fragile stability and lingering risks of global recession



Sources: International Monetary Fund and UBP

Inflation to peak but normalisation only in 2023



Sources: US Bureau of Labor Statistics, EuroStat and UBP

The coming recovery in Chinese consumer spending growth and ongoing easing in manufacturing and export bottlenecks should allow for a significant upturn in global trade and less pressure on developed-country manufacturers, in particular in Europe.

Inflation and the outlook for policy

Inflation has risen rapidly in the first half of 2022 because of further increases in energy prices, along with the prospect of agricultural commodity shortages. Current trends in these two sectors suggest that inflation will level off while remaining high in the third quarter, before easing in the fourth. We expect it to fall substantially from the record levels in the first half, but we will have to wait until mid-2023 to see it move back in line with central banks' medium-term targets.

Beyond volatility in energy and grain prices, the medium-term risk to inflation could come from general wage growth, leading to a 1970s-style spiral. Wages are already rising in countries where labour markets are stretched, such as the UK and US, and the trend is likely to spread to Europe in the second half of this year. However, because participation rates remain moderate and economies are slowing, labour markets are likely to stabilise and avoid a wage spiral in 2023.

With inflation rising rapidly in all regions, monetary authorities have announced plans to stop liquidity injections and bring forward rate hikes, a process that will accelerate in the coming months.

Accordingly, official interest rates across developed economies are likely to rise back above zero and move close to neutral in the US and UK. After this flash tightening, we expect central banks like the Fed and the ECB to step back and observe the impact of their rapid policy shift on underlying economies, given the already slowing growth and the major risks that continue to evolve, before either continuing or reining in their efforts.

Central banks may be in a better position to adopt this approach in the months ahead as the credibility they had lost – because inflation has exceeded their targets and they were slow to withdraw economic support – now appears to have begun to return with inflation expectations having stabilised after increasing sharply in response to Russia's invasion of Ukraine.

Those expectations should take root as inflation eases in the face of significantly higher key interest rates. This should allow central banks to focus in the future on stabilising the slowing growth outlook rather than fighting inflation.

Fiscal policies have taken a more proactive role this cycle, especially in Europe, with governments providing support for the households and companies worst affected by high inflation. This includes efforts to cushion the blow of high oil and gas prices in Europe, given the difficulty of finding substitutes for Russian energy.

Such support should continue in the second half while the scheduled post-pandemic fiscal tightening may be postponed. Overall, public-sector deficits in 2022 should exceed expectations at the start of the year and remain large in 2023, including in the US, where there are political barriers to adjusting fiscal policy. As a result, public-sector debt levels are unlikely to fall and debt-to-GDP ratios should stay high in all major regions.

Overall, the world economy is set to slow significantly over the remainder of 2022. The chances of a recession have risen and could rise further, notably in Europe, if major risks are not dispelled. Monetary tightening is likely to accelerate in the third quarter. However, we expect central banks will take a more pragmatic approach at the end of the year and in 2023 as inflation eases, allowing them and fiscal authorities to turn their attention back to maintaining growth in the face of external risks.

Forex outlook: a peak in the USD ahead

Since the beginning of the year, the USD has outperformed both G-10 and EM currencies, reflecting the US Federal Reserve's hawkish policy shift. As inflation has continued to rise, markets have priced in an aggressive hiking cycle, to the USD's benefit. The US Dollar Index has risen by nearly 10%, and the USD has reached multi-year highs on almost every valuation measure.

Historically, the USD tends to peak close to the Fed's first rate hike of the year and there are several indications that point to the USD having reached a cyclical peak following the Fed's first hike of this March.

Firstly, US inflation momentum has begun to wane, suggesting that the Fed is unlikely to raise rates beyond current market projections without an additional inflationary catalyst. Confirming this, overnight index swaps (OIS) have priced out the prospect of rate hikes in 2023.



Secondly, long-term yields and breakeven inflation forecasts have begun to fall, indicating that markets believe inflation is a secondary concern to the growth outlook, where worries are building.

As a result, a lower rate-hiking profile than expected should prevent further sustained USD appreciation from current levels unless the growth outlook deteriorates more rapidly for the world than for the US.

While the probability of slower growth or even the risk of an outright recession is increasing, only in the unlikely event of a 2008–09-style crisis would we expect a sustained safe-haven bid for the USD.

Current account surplus currencies to rise vs. the USD

As US growth eases, current account surplus currencies including the JPY, EUR, and CHF should appreciate against the USD.

The EUR will benefit from forthcoming rate hikes by the European Central Bank (ECB) following the sharp rise in eurozone inflation. The ECB is sensitive to the fact that the weak currency has amplified the imported inflation effects on the single-currency area. The EUR should also benefit from a return to flat deposit rates as fixed income investors repatriate capital.

EUR to benefit from forthcoming ECB rate hikes





The JPY tends to appreciate during periods of economic slowdown, reflecting capital repatriation by Japanese investors. It depreciated by nearly 20% during the first two quarters as USD/JPY's long-standing correlation to US 10-year yields manifested itself. With Japan's still-low domestic inflation dynamic, this means that the JPY's real exchange rate has cheapened considerably. As markets price out the prospect of Fed rate hikes in 2023, we believe USD/JPY can strengthen back towards 125.

The outlook for the CHF exchange rate is also constructive, reflecting the currency's safe-haven status and its typical appreciation bias during episodes of slowing growth. We expect that EUR/CHF will continue to decline due to large inflation differentials between the eurozone and Switzerland,

while USD/CHF should top near 1.00 and then decline gradually to reflect modest USD weakness.

We do not anticipate that the Swiss National Bank (SNB) will hike rates in the near term, although this is a risk as the SNB maintains a strict inflation target and will be particularly sensitive to any prolonged inflation overshoot. This poses upside risks for the CHF in the months ahead.

High-beta currencies will remain under pressure

At the beginning of the year, the AUD, CAD, SEK and NOK appreciated, due to a perceived regime shift towards structurally higher commodity prices, decent growth and gradual interest rate normalisation.

However, this phase was not sustained in light of the USD's appreciation. Coming into the second half of the year, these currencies should see a modest weakening trend. Lighter stimulus than expected in China and heightened concerns about slowing global growth will weigh on traditional high-beta currencies such as the CAD and AUD.

The eurozone slowdown, which is more advanced than in any other major economy, will act against aggressive SEK appreciation, given the krona's correlation with German growth metrics.

The German growth slowdown will also weigh on the GBP, as every macroeconomic variable in the UK has continued to worsen. The Bank of England (BoE) is likely to disappoint investors with a relatively shallow rate-hiking cycle, meaning that real inflation-adjusted interest rates will remain deeply negative, thus weighing on sterling.

EM outlook: nuanced, but largely constructive

The outlook for emerging market currencies is nuanced, but generally constructive. While the likes of the TRY and RUB are effectively uninvestible, most of the other major emerging market currencies should fare well in the second half of the year. This reflects several factors:

- 1. USD weakness
- 2. Significantly positive interest rate differentials
- 3. Investors staying structurally underweight EM

The prospect of USD weakness is a benign development for EM currencies, because it reduces USD-denominated debt burdens, while also having a positive effect on EM commodity export revenues. If the USD weakens in line with a slowing US growth outlook, this will reduce the negative feedback loop of weakening EM currencies and increased EM default scenarios. Consequently, we do not anticipate wide-scale EM currency weakness in the second half of the year. We believe the major EM currencies are well placed to withstand slowing US and global growth, because their central banks have already raised rates aggressively – on aggregate by a total of 6000 bps since 2020, arming them against higher external financing costs. Given that markets have largely priced in the Fed's tightening cycle, this means that EM currencies are still enjoying a sizeable interest rate advantage over the USD at all points along the curve. Substantial interest rate differentials mean that the cost of taking short positions for most of the major EM currencies is now prohibitively high – carry is simply too expensive. Consequently, we do not see aggressive FX weakness for the likes of the BRL, ZAR and MXN.

For the CNY, the situation is more nuanced. Ongoing zero-Covid policies mean that Chinese domestic demand will remain subdued, justifying the PBoC's incremental progress towards a looser monetary policy. USD/CNY front-end rate differentials remain elevated and are consistent with USD/CNY trading closer to 7.00. Investors have continued to divest from CNY-denominated assets, which is resulting in large outflows. The upshot of this is that the CNY will remain on a modest weakening trend in the second half of the year.

Precious metals

In the precious metals space, short-term risks for gold are mildly skewed to the downside. With inflation momentum starting to ease and markets pricing in further rate hikes, real interest rates adjusted for inflation may rise, which is normally an ominous development for gold.

Any downward move should be limited, however, reflecting persistently elevated levels of geopolitical uncertainty. Our long-term fair value models for gold are consistent with prices of around USD 2,000 per ounce, so there should not be any significant downside for prices below USD 1,800 in the coming months.

Asset allocation outlook

The declines in global equity and credit markets that occurred in the first half of 2022 have reflected both the rapid withdrawal of pandemic-era policy support from the global economy and the shock to global commodity supply chains caused by Russia's February invasion of Ukraine and by the Western nations' associated sanctions.

The wild moves in both bonds and equities year to date have been well beyond the rising yields and falling P/E multiples anticipated in our 2022 Outlook, "Embracing Change".

Looking ahead, the European Central Bank is preparing to join the US Federal Reserve in a belated and rapid hiking of interest rates. This, combined with what now appears to be a prolonged shock to the supply of critical energy, metals, and grains to the global economy, to say nothing of the slowing growth and



waning earnings momentum, appear likely to remain obstacles for investors for the rest of the year.

Against that backdrop, equities remain richly priced against bonds generally, but credit in particular. With only investmentgrade credit factoring in a meaningful slowdown in activity (see chart overleaf), investors should expect challenging return profiles for both equity and fixed income in the next two quarters.

As a result, investors will need to prioritise risk management rather than reaching for returns which rewarded them through much of the pandemic era in 2020–21. High-quality credit should offer shelter for multi-asset investors while high-visibility earnings streams at reasonable valuations should help mitigate the headwinds on equity returns towards year end.

Fixed income outlook

Despite the losses in fixed income markets in the first quarter of 2022 being the largest to start a calendar year in the past 50 years, bond markets are still only partially pricing in the new, post-pandemic, post-invasion inflation and growth regime that has taken shape over the past year.

Inflation expectations in the US and euro area have reset to the lower end of the pre-2015 range, leaving long-term market forecasts for inflation well above the 2% target of both central banks.

Inflation-adjusted yields across the US Treasury and German bond yield curves remain below zero, suggesting a stillaccommodative stance just as the ECB is set to follow the Fed in a tightening cycle over the course of the summer. The last time investors saw joint Fed and ECB tightening was in 2016–17 when German and US 10-year yields rose by more than 100 bps. As a result, investors should see risk-free yields continue to move higher over the summer, with benchmark Treasury yields moving more decisively into our 3–3.5% target range.

Euro investors should likewise expect German Bund yields to continue to rise from 0% at their March 2022 lows to as high as 2% in order to move closer to a 0% inflation-adjusted yield in the months ahead.

Credit investors, who have enjoyed relative shelter so far in 2022, will likely be faced with the rising interest rate backdrop continuing to be a drag on total returns. However, with slowing economic growth on both sides of the Atlantic, they should expect to see widening spreads join with rising rates to add to the headwinds bond investors will face for the remainder of 2022.

Indeed, though investment-grade bonds have integrated a modest recessionary outlook, emerging market debt as well as high-yield bonds in both the US and single-currency area, are underpricing the prospect of a meaningful slowdown in activity and deterioration of credit metrics in the months ahead.

High-yield bonds underprice the prospect of a slowdown



Sources: Bloomberg Financial L.P. and UBP

We therefore continue to believe that alternative hedge fund strategies which shield against both rising interest rates and widening credit spreads should provide protection in this challenging environment for fixed income investors.

Within more traditional fixed income asset classes, we continue to prefer shorter-duration and floating-rate, high-quality credit.

Admittedly, as US 10-year yields move more deeply into our 3–3.5% target range, tactical opportunities may arise for fixed income investors to re-establish longer-duration exposure provided long-term inflation expectations remain well contained.

Equity outlook

Though the 8–10% returns in global equities we had forecast last December for the current year are unachievable, like in fixed

income substantially all of the declines in global equities year to date can be attributed to the rising interest rate backdrop which collapsed P/E multiples more than we had anticipated.

Indeed, despite the almost 150-bp fall in US and eurozone GDP growth forecasts since the start of 2022 and growing cost pressures, strong pricing power has helped to steady corporate earnings expectations, offering an island of stability in a sea of volatility within global equities.

Look for earnings expectations to better price a slowing US economy



Sources: International Monetary Fund and UBP

With yields likely to press higher in the second half of the year, the magnitude of P/E headwinds of the first half should abate though not fully subside in the second. As the slowdown in European and US economies crystallises, investors should see the current 8–10% earnings growth expectations for 2022 and 2023 begin to come under pressure.

As a result, even if the Federal Reserve is successful at engineering a soft landing as it has been on only three occasions in the past thirteen of its rate-hiking cycles since the 1950s, fair value in the S&P 500 would still sit near 3,400– 3,800, or as much as 10% below current levels, given the new growth and interest rate outlooks that have taken hold around the world.

Having tracked the decline in global developed equity markets, emerging market equities appear on the surface to be more attractively valued than US equities in particular. However, many of these economies have missed the post-pandemic demandfuelled growth spurt but disproportionately absorbed the inflationary pressures, with rising commodity prices. As a result, a selective approach is warranted in the broader EM space as macro risks are more pronounced there than in developed economies in the current environment.

From a sector point of view, the de-rating of big tech leaves them near their cheapest levels both in absolute terms and relative to the S&P 500 since 2013. This suggests that the underperformance driven by P/E compression year to date is substantially complete. However, big tech companies being established as dominant players in online advertising, retail, social media, and mobile computing, they are likely more susceptible to the cyclical risks facing the global economy than in previous cycles, when market share gains could offset headwinds. As a result, a focus on high-quality, high-visibility earnings streams, even within the growth-focused technology space, will be increasingly valuable.

As the economy slows, however, opportunities will emerge as governments seek to counteract this slowdown. In particular, in China and Europe, we have already seen a desire to invest in the energy transition in order to both enhance long-term energy security and mitigate the year-to-date surge in fossil fuel prices.

Indeed, even in the US which has been slower than its counterparts across both the Atlantic and Pacific oceans, the Biden administration appears to be preparing a fiscal package which includes investment in green technology to spur the US energy transition.

While the green narrative retains its long-term appeal given the investment dollars that will be directed at the sector in the years to come, as investors have observed year-to-date, the performances these long-dated investments offer are often highly volatile and near-term. To help mitigate this risk in the current environment, investors can look to high-quality utilities in Europe which are driving the energy transition there. Moreover, as the energy transition takes shape, opportunities should emerge in the industrials sector which contains a number of the primary beneficiaries from the capital spending required to spur the transformations under way in the global economy.

With energy having performed strongly year to date, investors should become more nuanced in their exposure within the sector: with refining margins sitting at their highest levels since at least the mid-1980s, and with little prospect of new supply, refining companies may offer investors an opportunity.

All-time high refining margins provide some earnings visibility within the energy sector



Sources: Bloomberg Financial L.P. and UBP

Authors



Michaël Lok

Group Chief Investment Officer (CIO) and Co-CEO Asset Management

michael.lok@ubp.ch



Norman Villamin

Chief Investment Officer (CIO) Wealth Management and Head of Asset Allocation

norman.villamin@ubp.ch



Patrice Gautry

Chief Economist

patrice.gautry@ubp.ch



Peter Kinsella

Global Head of Forex Strategy

peter.kinsella@ubp.com

Disclaimer

This document is a marketing communication containing GENERAL INFORMATION on the financial services and/or financial instruments, and reflecting the sole opinion of Union Bancaire Privée, UBP SA and/or any entity of the UBP Group (hereinafter "UBP") as of the date of issue. It may contain generic recommendations but it is not and should not be deemed an offer nor a solicitation to enter into any transaction with UBP, buy, subscribe to, or sell any currency, product, or financial instrument, make any investment, or participate in any particular trading strategy in any jurisdiction where such an offer or solicitation would not be authorised, or to any person to whom it would be unlawful to make such an offer or solicitation. This document is meant only to provide a broad overview for discussion purposes, in order to determine clients' interest. It does not replace a prospectus, KID, KIID or any other legal document relating to any specific financial instrument, which may be obtained upon request free of charge from UBP or from the registered office of the issuer of the instrument concerned, where applicable. The opinions herein do not take into account individual clients' circumstances, objectives, or needs. In this document UBP makes no representation as to the suitability or appropriateness, for any particular client, of the financial instruments or services described, nor as to their future performances. Clients who wish to obtain more information about any specific financial instruments can request it from UBP and/or their Relationship Manager. Where an investment is considered, the information on the risks linked to each financial instrument shall be provided in good time by separate means before the investment decision is taken. In any case, each client must make their own independent decisions regarding any securities or financial instruments mentioned herein and regarding the merits or suitability of any investment. Before entering into any transaction, clients are invited to carefully read the risk warnings and the regulations set out in the prospectus or other legal documents and are urged to seek independent, professional advice from their financial. legal, accounting and/or tax advisors with regard to their investment objectives, financial situation and specific needs. UBP performs analysis on the financial instruments based on market offer and may maintain and/or seek to develop business affiliations with third parties for that purpose; furthermore UBP may create its own financial instruments. This generic information is therefore not independent from the proprietary interests of UBP or connected parties, which may conflict with the client's interests. UBP has policies governing cases of conflicts of interest and takes appropriate organisational measures to prevent potential conflicts of interest. The information contained in this document is not the result of financial analysis within the meaning of the Swiss Banking Association's "Directives on the Independence of Financial Research" or of independent investment research as per the EU's MiFID or other regulations. EU regulation does not govern relationships entered into with UBP entities located outside the EU. The investments mentioned herein may be subject to risks that are difficult to quantify and to integrate into the valuation of investments. Generally speaking, products with a high degree of risk, such as derivatives, structured products or alternative/non-traditional investments (such as hedge funds, private equity, real estate funds, etc.) are suitable only for clients who are capable of understanding and assuming the risks involved. The value of any capital investment may be at risk and some or all of the original capital may be lost. The investments are exposed to currency fluctuations and may increase or decrease in value. Fluctuations in exchange rates may cause increases or decreases in the client's returns and/or in the value of the portfolio. The client may be exposed to currency risks if a financial instrument or the underlying investment of a financial instrument is denominated in a currency different from the reference currency of the client's portfolio or from the currency of their country of residence. For more information on risks, the brochure "Characteristics and risks of certain financial operations" should be consulted. called When providing investment advice or portfolio management services, UBP considers and assesses all relevant financial risks, including sustainability risks. Sustainability risks are defined by the EU's Sustainable Finance Disclosure Regulation (2019/2088) as "an environmental, social or governance event or condition that, if it occurs, could cause a negative material impact on the value of the investment". For further information on our sustainability risk management approach please visit [www.ubp.com]. Reasonable efforts have been made to ensure that the content of this document is based on objective information and data obtained from reliable sources. However, URP cannot guarantee that the information the Bank has gathered in good faith is accurate and complete, nor does it accept any liability for any loss or damage resulting from its use. Circumstances may change and affect the data collected and the opinions expressed at the time of publication. Therefore information contained herein is subject to change at any time without prior notice. UBP makes no representations, provides no warranty and gives no undertaking, express or implied, regarding any of the information, projections or opinions contained herein nor does it accept any liability whatsoever for any errors, omissions or misstatements in the document. UBP does not undertake to update this document or to correct any inaccuracies which may have become apparent after its publication. This document may refer to the past performance of financial instruments. Past performance is not a guide to current or future results. The value of financial instruments can fall as well as rise. All statements in this document, other than statements of past performance and historical fact, are "forward-looking statements". Forward-looking statements do not guarantee future performances. The financial projections included in this document do not represent forecasts or budgets, but are purely illustrative examples based on a series of current expectations and assumptions which may not happen as forecast. The actual performance, results, market value and prospects of a financial instrument may differ materially from those expressed or implied by the forward-looking statements in this document. The projected or targeted returns are inherently subject to significant

15 June 2022

economic, market and other uncertainties that may adversely affect performance. UBP also disclaims any obligation to update forward-looking statements, as a result of new information, future events or otherwise. Any performance data included in this document does not take into account fees, commissions, expenses charged on issuance and redemption of securities, or any other costs, nor any taxes that may be levied. The tax treatment of any investment depends on the client's individual circumstances and may be subject to change in the future. This document does not contain any tax advice issued by UBP and does not reflect the client's individual circumstances. This document is confidential and is intended to be used only by the person to whom it was delivered. This document may not be reproduced, either in whole or in part. UBP specifically prohibits the redistribution of this document, in whole or in part, without its written permission and accepts no liability whatsoever for the actions of third parties in this respect. This document is distribution by UBP would be restricted.

Switzerland: UBP is authorised and regulated in Switzerland by the Swiss Financial Market Supervisory Authority (FINMA).

UK: UBP is authorised in the United Kingdom by the Prudential Regulation Authority, and is subject to regulation by the Financial Conduct Authority (FCA) and limited regulation by the Prudential Regulation Authority.

Dubai: This marketing material has been communicated by Union Bancaire Privée (Middle East) Limited, a company regulated by the Dubai Financial Services Authority ("DFSA"). It is intended for professional clients and/or market counterparties only and no other person should act upon it. The financial products or services to which this material relates will only be made available to a client who meets the professional client and/or market counterparty requirements. This information is provided for information purposes only. It is not to be construed as an offer to buy or sell, or a solicitation for an offer to buy or sell any financial instruments, or to participate in any particular trading strategy in any jurisdiction.

Hong Kong: UBP is a licensed bank regulated by the Hong Kong Monetary Authority (HKMA) and a registered institution regulated by the Securities and Futures Commission (SFC) for Type 1, 4 & 9 activities only in Hong Kong. The securities may only be offered or sold in Hong Kong by means of documents that (i) are addressed to "professional investors" within the meaning of the Securities and Futures Ordinance (Chapter 571 of the Laws of Hong Kong) and any rules made thereunder (the "SFO"); or (ii) are defined as "prospectuses" within the meaning of the Companies Ordinance (Chapter 32 of the Laws of Hong Kong) (the "CO") or constitute offers to the public within the meaning of the QO. Unless permitted to do so under the laws of Hong Kong, no person may issue or have in their possession for the purpose of issuing, whether in Hong Kong or elsewhere, any advertisement, invitation or document relating to the securities, directed at, or likely to be accessed or read by, the public in Hong Kong, except where the securities are intended to be disposed of only to persons outside Hong Kong, or only to "professional investors" within the meaning of the SFO.

Singapore: UBP is a bank regulated by the Monetary Authority of Singapore (MAS), is an exempt financial adviser under the Financial Advisers Act 2001 of Singapore to provide certain financial advisory services, and is exempt under section 99(1) of the Securities and Futures Act 2001 of Singapore to conduct certain regulated activities. This document has not been registered as a prospectus with the MAS. Accordingly, this document and any other document or material in connection with generic recommendations may not be circulated or distributed, whether directly or indirectly, to persons in Singapore other than (i) to institutional investors; or (ii) accredited investors as defined under the Securities and Futures Act 2001 of Singapore. under Section 274 of the Securities and Futures Act 2001 of Singapore ("SFA"), (ii) to relevant persons pursuant to Section 275(1), or any person pursuant to Section 275 of the SFA, or (iii) otherwise pursuant to, and in accordance with the conditions of, any other applicable provision of the SFA. This advertisement has not been reviewed by the Monetary Authority of Singapore.

Luxembourg: UBP is registered by the Luxembourg supervisory authority the Commission de Surveillance du Secteur Financier (CSSF).

Italy: Union Bancaire Privée (Europe) S.A., Succursale di Milano, operates in Italy in accordance with the European passport – held by its parent company, Union Bancaire Privée (Europe) S.A. – which is valid across the entire European Union. The branch is therefore authorised to provide services and conduct business for which its parent company, Union Bancaire Privée (Europe) S.A., has been authorised in Luxembourg, where it is regulated by the Luxembourg financial supervisory authority, the Commission de Surveillance du Secteur Financier (CSSF).

Monaco: This document is not intended to constitute a public offering or a comparable solicitation under the Principality of Monaco's laws, but might be made available for information purposes to clients of Union Bancaire Privée, UBP SA, Monaco Branch, a regulated bank under the supervision of the Autorité de Contrôle Prudentiel et de Résolution (ACPR) for banking activities and under the supervision of the Commission de Contrôle des Activités Financières for financial activities.

© UBP SA 2022. All rights reserved.

