

# FX Insight

## Assessing Valuations as Market Fine-Tunes

### Expensive Dollar, Peso; Cheap Yen and Ringgit

As most central banks reach an inflection points on their policy cycles, we are in a phase of tentative calm in the FX markets. While we cannot rule out the risk of geopolitical conflicts becoming a prominent theme again with the Israel-Gaza fight spilling into the Red Sea, it is arguable that the impact on trade, supply chains and concomitantly, inflation has yet to become significant. As such, we take this rather rare window of relative calm in the markets to refresh our various FX valuation metrics in the hope of uncovering severe misalignments that could potentially provide certain trade ideas.

#### A) Maybank Behavioral Effective Exchange Rate Panel (Maybank-BEER)

Leveraging on macro features of an economy including its net foreign assets, trade openness, interest rate differentials and inflation differentials relative to trading partners, we find that on a **trade-weighted, medium-term basis**:

- USD REER is most overvalued while JPY is severely undervalued. **That could mean significant downside risks to the USDJPY, propelled by divergent monetary policy paths in 2024.**
- Among AxJs, MYR is significantly undervalued while PHP is overvalued on a REER basis. **Long MYRPHP on deviating current account/fiscal positions.**
- SGD, IDR, THB are closer to their “equilibrium levels” with SGD only modestly overvalued.

Nonetheless, we acknowledge that a different set of more cyclical factors could drive near-term outcomes; hence the need for a higher-frequency tracking model.

#### B) Maybank Short Term Tracking Models (Maybank-ST)

This model aims to capture shorter-term dynamic changes in market yield and inflation differentials, the state of world equities and bonds, as well as movements in relevant commodity prices etc., and is estimated on an USD basis. We find that:

- Within the G7 space, the USD spot does not appear to be misaligned with tracking value for 1Q 2024 whilst the GBP actually has some way to weaken against the USD with the GBPUSD model tracking value at 1.24. Both the EUR and AUD actually have space to strengthen with the EURUSD at 1.10 and AUDUSD at 0.69.
- THB and PHP could head higher against USD, with tracking USDTHB and USDPHP valuations at 34.61 and 55.55.
- USDCNY, USDSGD and USDMYR tracking values at 7.17, 1.35 and 4.72 are not actually too far from the spot levels.
- **We prefer to short GBPUSD, USDTHB and long AUDUSD.**

Currency Pair	FX Short-Term Tracking Values Forecasted for end 1Q 2024	Current Value (As of 31 Jan 2024 Closing)
DXY	103.30	103.27
EURUSD	1.10	1.08
GBPUSD	1.24	1.27
USDJPY	148.03	146.92
AUDUSD	0.69	0.66
USDCNY	7.17	7.17
USDSGD	1.35	1.34
USDMYR	4.72	4.73
USDIDR	15871	15780
USDTHB	34.61	35.47
USDPHP	55.55	56.30

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## FX Misalignments

This report consists of two sections. We refreshed the Maybank Behavioral Effective Exchange Rate Panel ([Maybank-BEER](#); Supplementing 3-5 Year Medium-term View) to understand the profile individual REER and to tease out certain misalignments.

We also used the Z-score comparison of the BIS REERs as a point of reference. This is provided by Bloomberg. The Z-score comparison of the Real effective exchange rate which are provided by the Bank for International Settlement and the International Monetary Fund. Z-score is generated by taking the difference of the current REER and a ten-year moving average and dividing it by the standard deviation.

In the last part of the report, the [Maybank FX Short Term Tracking model](#) serves to supplement the 3-6 month view and we used it as one of our proprietary tools to guide our forecasts.

## Checking for FX Misalignments In A Rare Window of Relative Market Calm

### Recent Market Developments

The DXY index ended 2023 at a five-month low, before the more recent reversal. It seems that the bullish reversal is playing out on a few factors

- 1) Fed officials' repeated attempts to rein in aggressive rate cut expectations. While the Jan FOMC has officially put a confirmation on the pivot, Powell also managed to reduce bets on the Mar rate cut.
- 2) China's activity data painted a pretty fragile picture and spurred easing expectations, especially with property sector still under immense pressure and that could continue to weigh on risk sentiment
- 3) Recent decline in inflation expectations that spurred EUR to fall and propped up the USD even more.

So Fed Fund Futures have swung from implying 170bps of cut for 2024 in early Jan to 140bps at last check (2 Feb). Probability of a rate cut in Mar has fallen from 83% then to almost 36%. With most central banks near the peak of tightening cycles, markets could continue to remain in a continuous calibration of rate cut bets and that could leave most FX pairings in a consolidative state.

While we cannot rule out the risk of geopolitical conflicts as a prominent theme again with the Israel-Gaza fight spilling into the Red Sea, it is arguable that the impact on trade, supply chains and concomitantly, inflation has not yet surfaced significantly. Freight prices have risen but the gains in oil prices are considerably modest relative to what was seen in past conflicts. **As such, we take this rather rare window of relative calm in markets to refresh our various FX valuation metrics in the hope of uncovering severe misalignments that could potentially provide certain trade ideas.**

It is important at this point to remind readers the empirically-derived "equilibrium" or "fair" FX valuations provide the most value added when they are used to supplement existing understanding of market conditions. They are not meant to provide point forecasts for fixed durations, and it is common for long stretches of time to pass before spot values converge towards their supposed "equilibrium".

Still, when severe misalignments exist between spot levels and valuations suggested by key drivers, there can be significant informational relevance to subsequent FX moves. I.e., the more overvalued or undervalued a currency is relative to cyclical drivers or fundamentals (depending on the model in question), the more likely that some form of reversion is likely to occur.

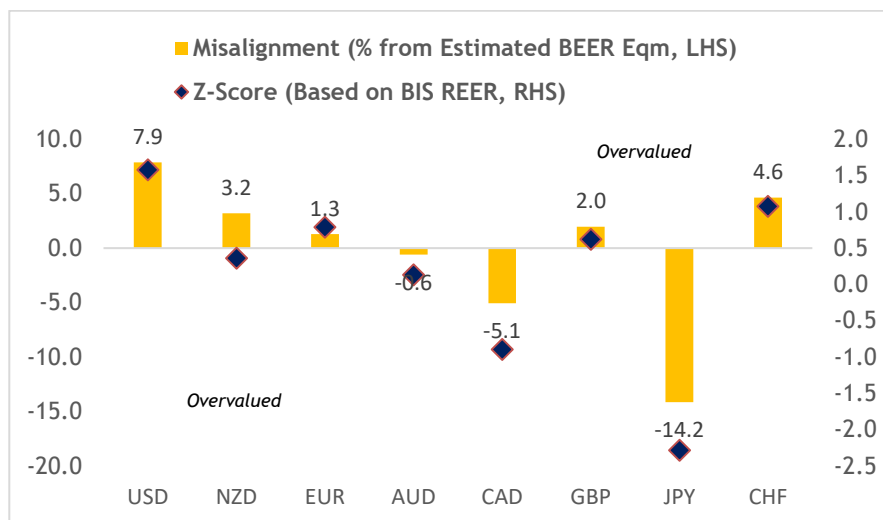
### Maybank-BEER Panel

- Tracks Misalignments in REER terms (i.e., basket of trading partners' currencies).
- Relevant for 3 to 5 Year View
- Based on BEER literature (Clark & MacDonald, 1999)
- Quarterly Data, Dynamic OLS Panel Estimation
- Data used in Panel for *Country I* include:
  - Net Foreign Assets (% of GDP)
  - Trade Openness (Total Trade as % of GDP)
  - Short-run Interest Rates (%-Pt Deviation from Trading Partners' Weighted Average)
  - Inflation Differential (Deviation from Trading Partners' Weighted Average)

### Overview of the Maybank-BEER Valuation Model

We used the BIS REER z-score (provided by Bloomberg) as a point of reference and found the valuations provided by our Maybank BEER model as well as the Z-score to be well aligned. Within the DM space, the USD remains the most overvalued based on our BEER Model. Another stand-out is the JPY which is somewhat severely misaligned with its “equilibrium levels”. That underscores the potential move lower for the USDJPY, especially with the Fed and BoJ on a divergent policy trajectory this year that could shift the fundamental market forces in the favour of the JPY.

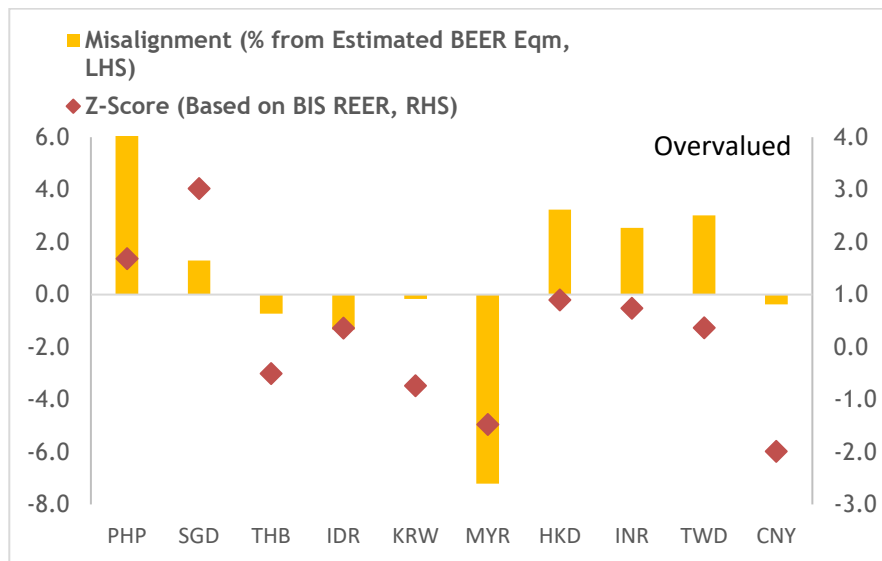
**Chart 1: JPY Most Undervalued While USD is Most Overvalued; USDJPY To Head Lower**



Source: Maybank FX Research & Strategy,

Within the Asian space, MYR remains very undervalued. The external environment is turning benign for the currency. With the Fed likely embarking on an easing cycle soon, the rates landscape should be more favourable for the MYR in light of the fact that the BNM is expected to stand pat for the whole of 2024.

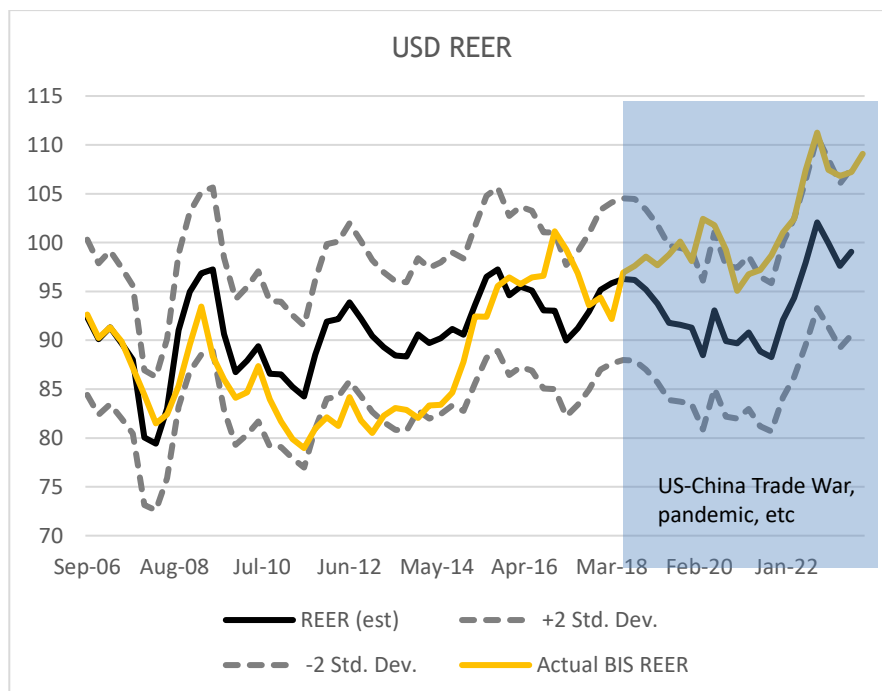
**Chart 2: MYR and PHP Stand Out, The Rest are More or Less Nearer to Equilibrium**



PHP is estimated to be around 6% overvalued while MYR remains almost 8% undervalued based on the BEER model. THB, IDR and SGD are nearer to their fundamental valuations of REER.

### US Dollar is Still Dear but its Safe Haven Status Could Keep it Overvalued to Some Extent

**Chart 3: USD Has Been Overvalued For A few Years**

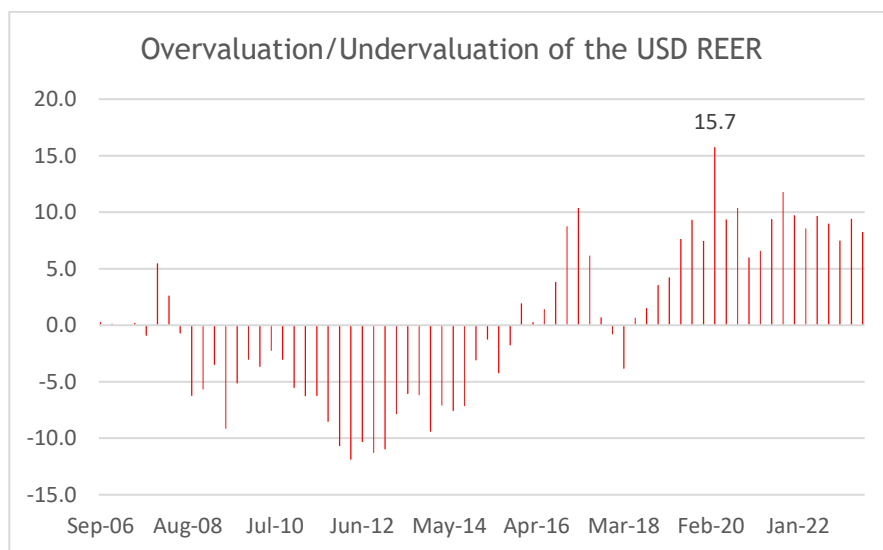


Source: Macrobond, Bloomberg, Maybank FX Research & Strategy Estimates

Our model estimation suggest that the USD seems to retain a premium relative to what the Maybank-BEER Panel estimates the USD REER to be over the past few years. Its +7.1% overvaluation vs. its equilibrium valuation suggests that concerns on valuation based on fundamentals should thus, not be a barrier for the USD to depreciate over the course of 2024. Looking back, USD started to become

overvalued around the start of the US-China trade/tech war and this gap persisted through the pandemic. The USD likely strengthened well past its fundamentally-driven equilibrium valuation then due to its allure as a safe haven (which is attributed not just to its fundamentals and more because of the sheer size of USD liquidity, its reserve status and its dominance in most cross-border transactions). We have had quite a rise of other geopolitical conflicts including the invasion of Ukraine and the conflict in Middle East. This current period of relative calm has USD overvalued at 7.1%. That suggests ample room for the USD to converge towards its “fair value” given the right market conditions.

**Chart 4: Extent of Overvaluation Has Narrowed**



Source: Bloomberg, Maybank FX Research & Strategy Estimates

Note: Estimated equilibrium levels lag actual by a few data points due to data availability. This applies to all the Maybank BEER Estimates. The Overvaluation/undervaluation of the USD REER is taken as the difference between the Maybank BEER estimate and the actual BIS REER.

IMF Article IV report (Jun 2023) estimated the REER gap (based on the IMF staff’s CA assessment) to be overvalued by 9.4% in 2022. The USD REER has remained elevated for much of 2022-2023, suggesting that a large part of this overvaluation is likely still intact.

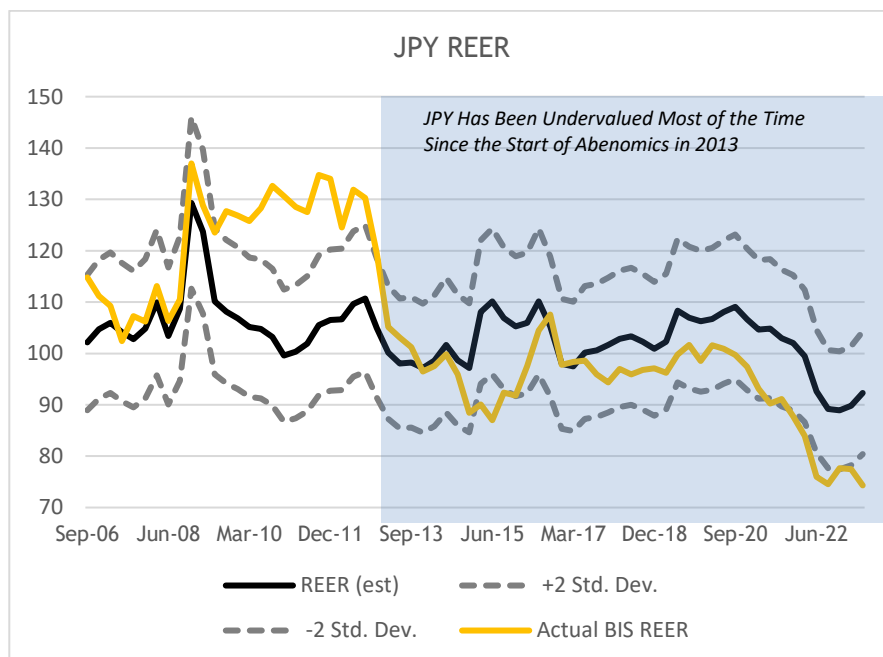
Based on the z-score of the BIS broad REER calculated by Bloomberg, the USD REER is estimated to be around 1.33 std deviations away from the mean among the eight DM currencies (red diamond on Chart 1). In addition, the JPY REER is estimated to be the most undervalued amongst the EM and DM. EUR, CHF and GBP are modestly overvalued as of 16 Jan 2024. That could mean that the case for USD weakness against the EUR, CHF and GBP are less compelling from a fundamental angle.

The evidence of overvaluation in the USD gels with our view that the greenback could weaken in 2024 alongside 1) slowing economic activity at home, 2) falling inflation trend that brings about monetary policy normalization (cut) 3) trade recovery along with the semi-conductor cycle. Stronger growth momentum in trade and economies in other parts of the world vs. the weaker growth in the US supports the case for a softer USD.

### JPY Valuation has been On the Decline Due to Widening Interest Rate Differential

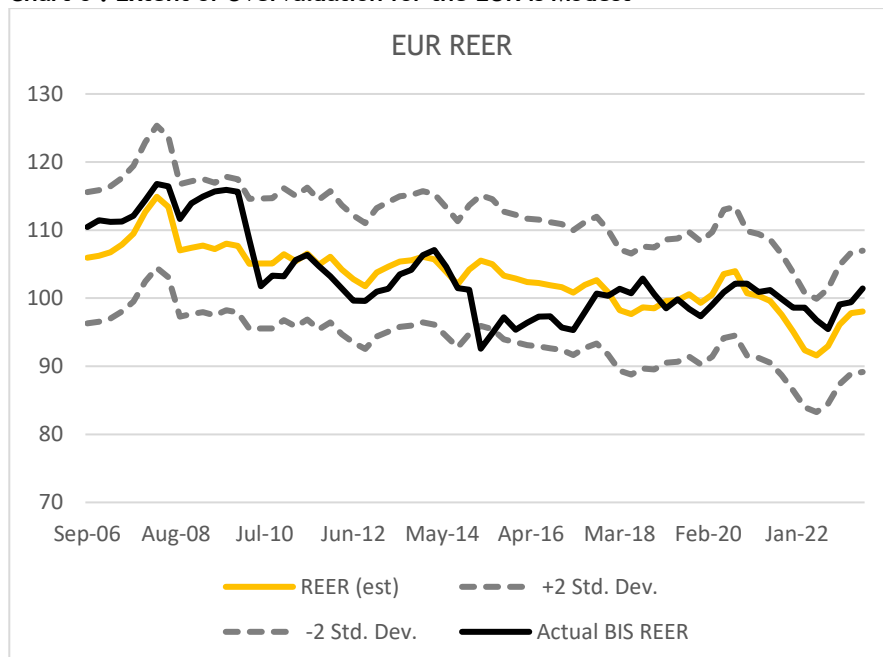
JPY has been undervalued around the early period of Abenomics which started in 2013. In an attempt to generate a virtuous cycle of demand and inflation, there was also a lot of speculative pressure on the currency which led to its undervaluation. As other central banks tightened monetary policies in the past few years, the widening interest rate differential has led to a drop in its JPY valuation but the perceived policy divergence might have amplified the pressure on the JPY, leading to a very undervalued JPY. We suspect that once there is a shift in policy trajectory, we could expect JPY to strengthen more.

**Chart 5: JPY Undervaluation Has Persisted Since the Start of Abenomics**



Source: Bloomberg, Maybank FX Research & Strategy Estimates

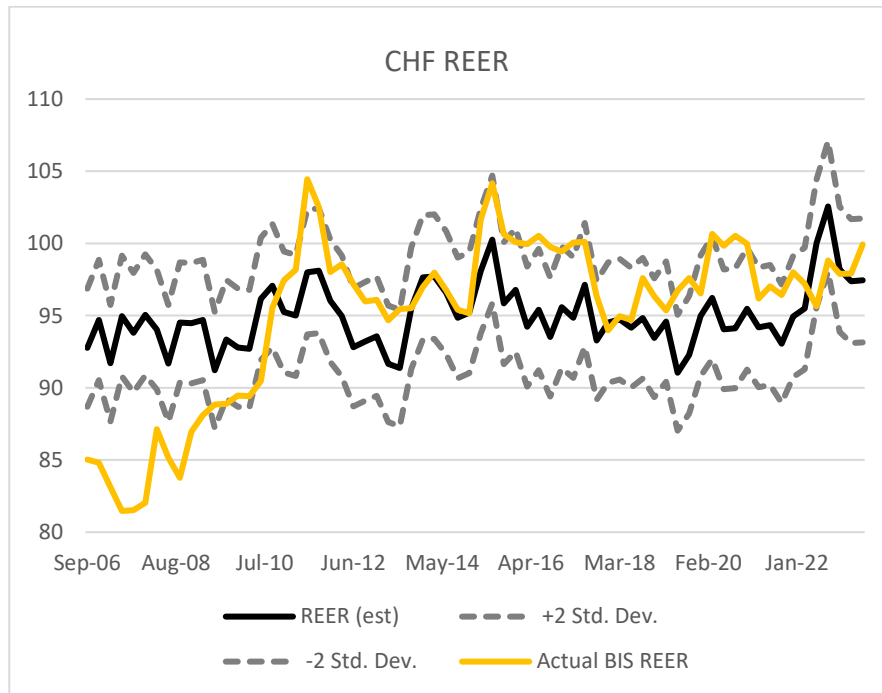
**Chart 6 : Extent of Overvaluation for the EUR is Modest**



Source: Bloomberg, Maybank FX Research & Strategy Estimates

Note: Estimated equilibrium levels lag actual by a few data points due to data availability.

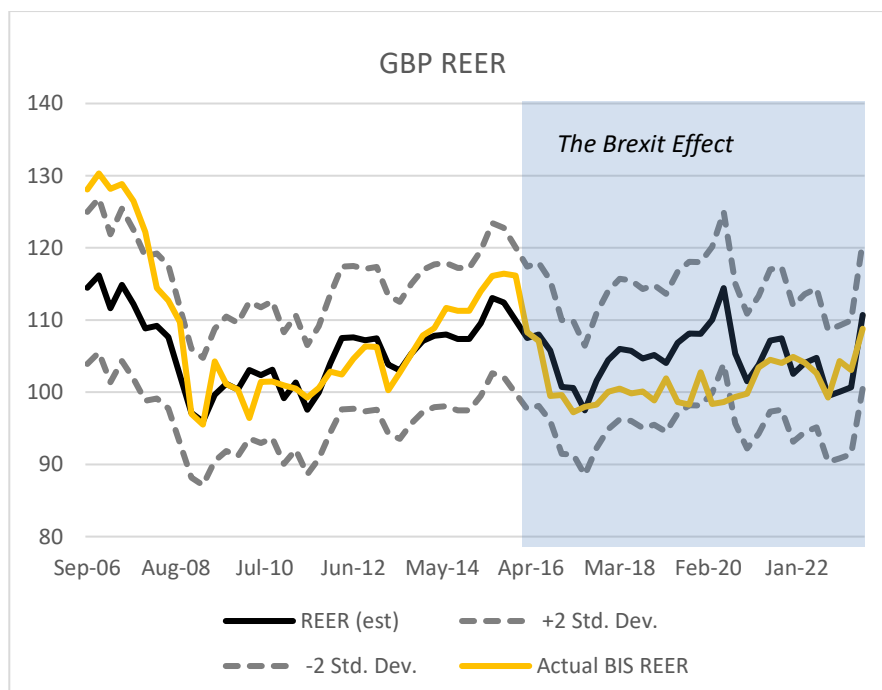
Chart 7: Extent of CHF Overvaluation is also Rather Mild



Source: Maybank FX Research & Strategy Estimates

The Maybank-BEER panel sees GBP to be rather close to its equilibrium value as defined by its macro fundamentals. There seems to be an improvement in REER since its fall-off post EU referendum in 2016 which resulted in the Brexit. The war in Ukraine, Covid pandemic also kept the GBP REER under pressure. The Maybank-BEER estimates suggest that fundamentals did correct, albeit gradually along with the recent improvement in UK-Europe trade balance. The GBP REER has also been on the climb since.

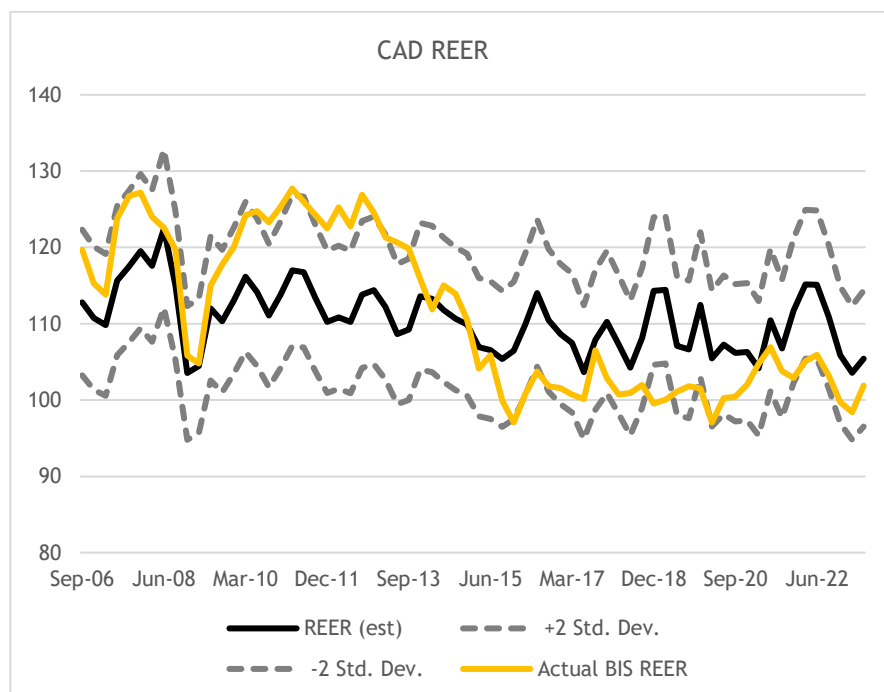
Chart 8: GBP is Fairly Valued by the Maybank-BEER estimates



Source: Maybank FX Research & Strategy Estimates

The Maybank-BEER panel estimates the CAD to be 4.6% undervalued (Chart 1). CAD has room to appreciate given its strong positive net foreign assets as well as its external trade surplus. Given the fact that BoC is more likely to be one of the early easers, there is a risk that the valuation may shift against the CAD soon.

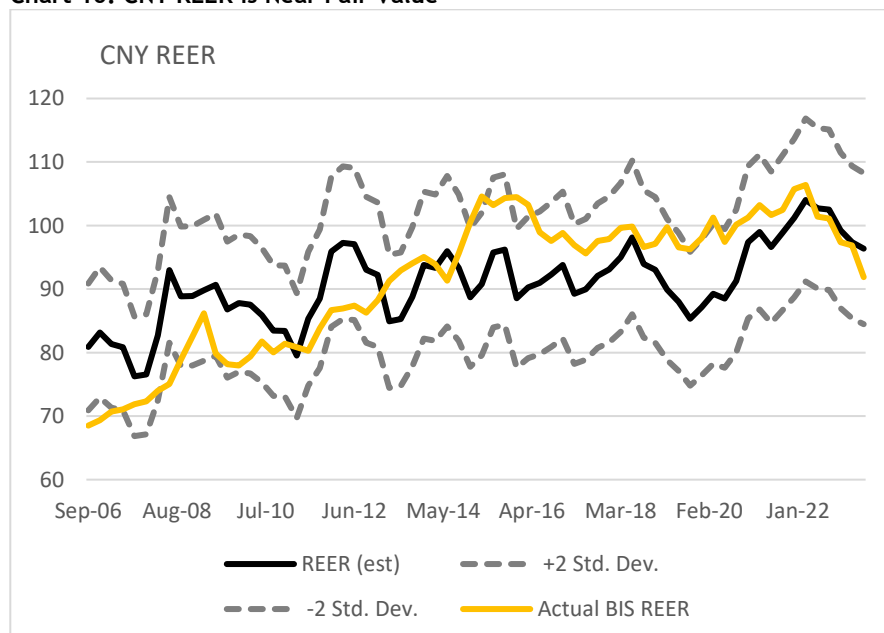
**Chart 9: CAD is Slightly Undervalued**



Source: Maybank FX Research & Strategy Estimates

## The Asian REER Profiles

**Chart 10: CNY REER is Near Fair Value**

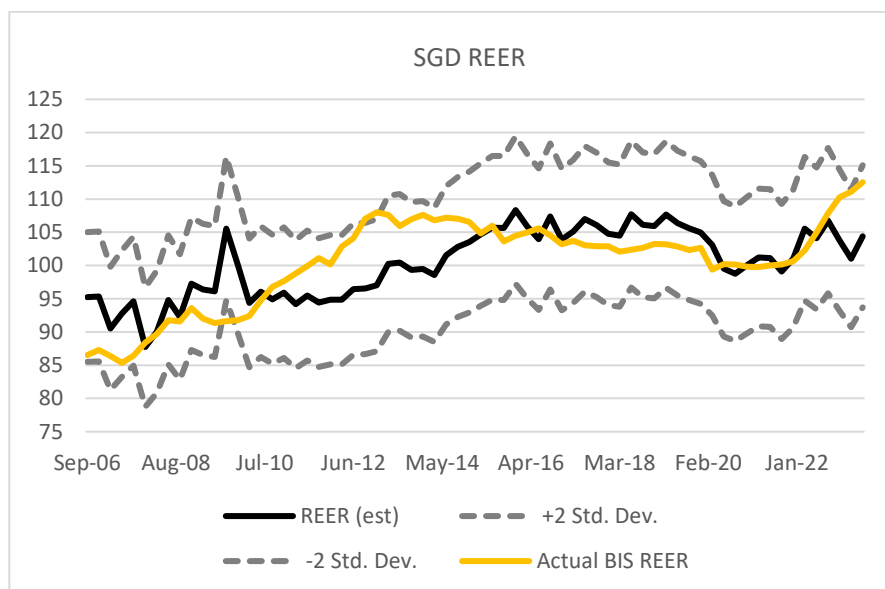


Source: Maybank FX Research & Strategy Estimates



Yuan has been overvalued ever since the China eased up capital controls and attempted to get the currency the reserve status. Recently, it has become mildly undervalued. Given the fragile state of the economy and potential for further monetary easing, it is hard to expect CNY to strengthen significantly this year. This, however, could change if China is able to come up with a strong and comprehensive fiscal plan to support the broader economy.

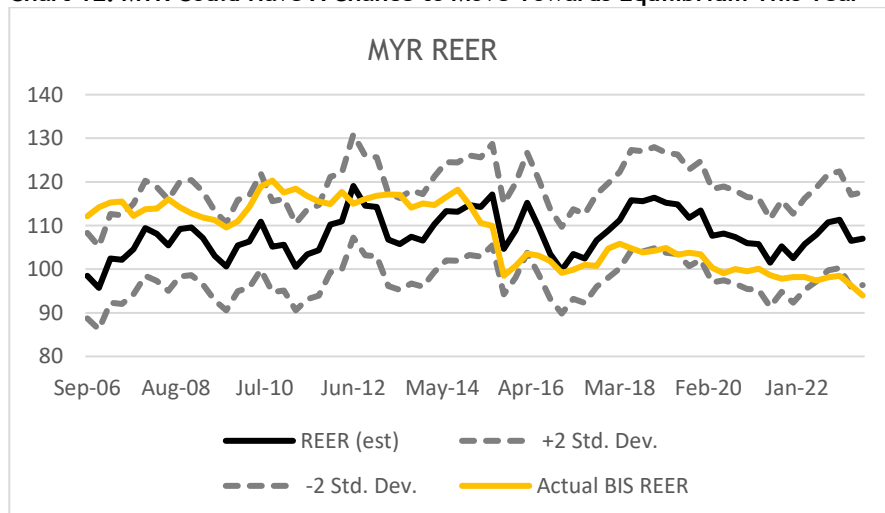
**Chart 11: SGD Tends to be Slightly Overvalued**



Source: Maybank FX Research & Strategy Estimates

It is important to note that while the SGD may appear to be overvalued, the model does not take into account MAS' exchange rate based monetary policy. The SGD has always been on at least a neutral path against this basket and is currently on an appreciating path (assumed to be 1.5%) against the basket. As long as MAS maintains policy credibility, SGD could potentially be overvalued due to its current policy characteristic of appreciation stance. Our house view for MAS to ease only in Oct could mean that SGD may continue to remain relatively supported vs. other currencies that may see their central banks ease earlier (ECB, BoC, Fed).

**Chart 12: MYR Could Have A Chance to Move Towards Equilibrium This Year**

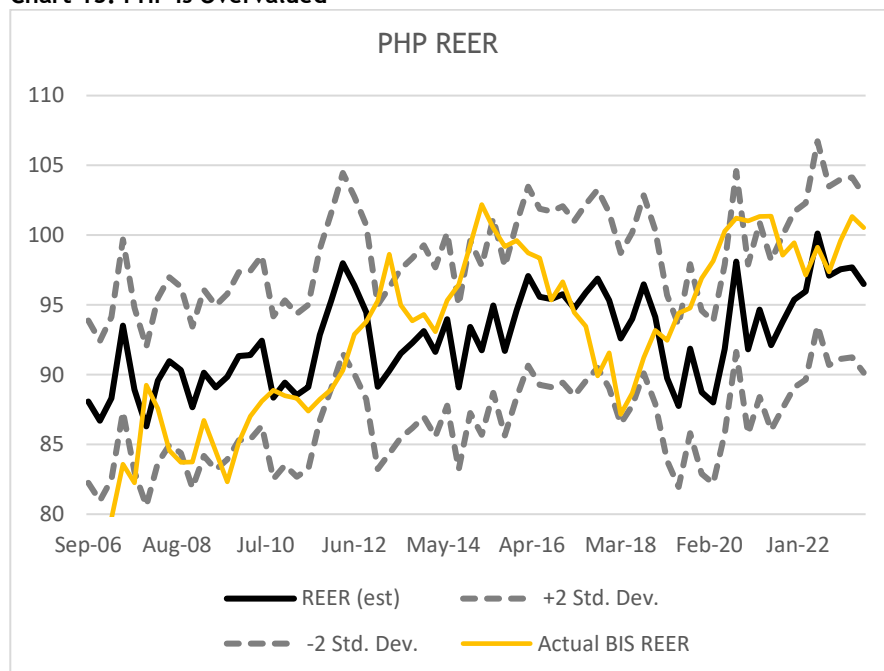


Source: Maybank FX Research & Strategy Estimates

MYR remains very undervalued and has been so since the oil crash. This year could be a more positive year for MYR as the external environment is turning benign for

the currency. With the Fed likely embarking on an easing cycle soon, the rates landscape should be more favourable for the MYR in light of the fact that the BNM is expected to stand pat for the whole of 2024. In addition, our Economist has highlighted that 2024 is the year of take-off for the Malaysian economy with the blueprints, masterplans such as the MADANI economy framework, National Energy Transition Roadmap and New Industrial Master Plan likely to be implemented with the fiscal reforms and economic restructuring widely watched. Successive steps towards fuel subsidy rationalization could reinvigorate confidence in the MYR.

**Chart 13: PHP Is Overvalued**



Source: Bloomberg, Maybank FX Research & Strategy

Part of the reason for the fall in PHP valuation is because of the rising inflation relative to trade partners' as well as the deterioration in its net foreign assets as a percentage of GDP. Given a lack of improvement on its twin deficits, we suspect that PHP could still underperform on a REER basis this year.

### Conclusion for the BEER Model:

Taken together, there is value in expecting the PHP to weaken against the MYR. This also gels with our view that Malaysia's fiscal position could potentially improve as the government becomes more committed to fiscal reforms. Current-account wise, Malaysia is also in a position of strength and could benefit from stronger tourism arrivals this year. For IDR, SGD, THB, there is less directional pull in terms of fundamental misalignments of REER for these currencies. However, given the fact that the MAS is still likely to keep SGD strong at least for the 1H of 2024, it is more likely that SGD could retain its buoyancy within the region.

Within the DM space, the USD still has room to fall but with EUR, GBP and CHF close to fair valuations of their REER, its decline is likely to be modest on a fundamental basis. However, a pick-up in global growth and a slow-down in the US economy could continue to provide the market conditions for the USD to fall.

The most compelling finding from this study is that the USDJPY is likely to fall. After years of negative interest rate policy and Abenomics, 2024 could see the Fed being on the easing cycle while BoJ tightens and this shift should swing market forces in the favour of the JPY.

## Maybank FX Short Term Tracking Models

### Introduction and Methodology Primer

As part of our broader FX strategy, we utilize an FX short term tracking model to help in guiding our view. The model is based upon a regression of the currency on a number of variables that we believe would drive the pair. They are also primarily focused on tracking the currency pairs in the short term and hence, variables selected would also be of that nature. The models ultimately estimate both a tracking value and range of where we see the currency pair would trade at.

We do not necessarily select variables to ensure that the model achieves the best fit but rather those that we think can make logical and economic sense. The regression for every currency pair would contain the “core” variables which are a) inflation (MSCI World Index/FTSE World Government Bond Index) b) 10y real yield differentials with the US and c) current account differential with the US. We would then augment each currency pair regression with idiosyncratic variables that we believe could drive the pair. This could include for example gold prices for USDTHB. We also make use of the model to forecast a value for 1Q 2024 based on our estimates for the respective variables.

We would also like to note some caveats for our model. This includes firstly that there could be large deviations in the value calculated from the actual real value. This would not be any cause of concern though as the situation could represent some major overvaluation or undervaluation of the currency pair and when we back test for currencies where this has occurred, we find that it does not trade too long at those levels before reverting again back to our tracking value or range. Another caveat which we would like to note is that our model is only intended to give short term estimates of the currency pairs and not long term estimates of which the drivers can debatably be different.

**Table 1: Our Key Assumptions**

Currency Pair	FX Short-Term Tracking Values Forecasted for 1Q 2024
UST 10Y Yields	4.10%
Brent	\$75
Gold	\$2100
MSCI World Index	3050
FTSE World Government Bond Index	850

**UST yields** are expected to stay above 4.00% as the aggressive rate cut bets that we have seen are gradually unwind as US economic data may only show a more gradual slowing over time. Bond prices should thus remain subdued in 1Q.

The possibility of a US soft landing is also looking more likely, which can in some sense keep the optimism towards **equities (MSCI World Index)** reasonably supported into the end of the quarter.

**Oil prices** should remain around **\$75/bbl** given the balance of both upside and downside risks (risks of geopolitical conflict affecting supply are offset by weak global demand).

We also see prices of other commodities such as coal and copper being weighed down by the economic challenges in China.

**Gold** should be around the US\$2,100 mark amid both central bank demand and geopolitical tensions.

## **Short-Term Model Projections For 1Q 2024**

Given such conditions, our own short term tracking model sees that the DXY is still expected to hold up at a strong level of about 103.30 into the end of 1Q 2024.

EURUSD looks to remain around weak levels as wide rate differentials continue to weigh on the high beta Euro. On the flipside, oil and gas prices are not looking to be of concern to the common currency. Inflation we also see is likely to remain high and would take time to come down, which means rates can still hold up. GBPUSD is also looking to remain weak with the US rate still staying high although elevated inflation means that UK rates would likely be supportive to the GBP.

The model points to the USDJPY pair possibly ending 1Q 2024 at around levels closer towards the 150.00 mark. The BOJ we believe is only likely to exit NIRP in April on the condition of a strong result from the Spring wage negotiation (which we think would also be the case). However, with the BOJ set to make no move in 1Q 2024, JPY bulls would be kept at bay which would lead to the currency staying weak. Inflation in Japan is also expected to slow as cost-push pressures ease. Other fundamentals such as the Japanese current account should still remain at favorable levels.

Meanwhile, model estimates see that the USDCNH should stay at elevated levels given the persistent weakness in China's economy especially as its property markets could remain under stress. Manufacturing PMI may continue showing quite some weakness. Under such conditions, rates are looking to also stay low in China, which also keeps the yields down. The current account should still report a reasonable surplus.

In Southeast Asia, the Dollar - ASEAN pairs are set to stay at rather high levels at end 1Q 2024 according to the model results given continued high US rates. Idiosyncratic factors may also be at work against some of these currencies. The IDR for example is looking to see quite substantial weakness given commodity prices for coal and iron ore would likely be hurt by the economic weakness in China. This would in turn weaken Indonesia's external position through a narrowing of the CA surplus.

Meanwhile, the MYR too would be negatively affected by the weakness in China given the strong trade links between Malaysia and China. Softer inflation in Malaysia also means BNM is being kept under pressure to give more help to the economy and keep rates much lower compared to the US. The THB may need more time for its external position to improve amid a return of tourists and hence, it would not immediately see major strengthening just yet in 1Q 2024. However, gold prices staying high would continue to give it support. The PHP's persisting negative fundamentals that include a current account deficit and high fiscal spending would keep the currency in an unfavorable position. Stable Brent prices at least avoids there being another negative factor on the PHP. The SGD could be weak but it would show more resilience compared to the other regional peers given robust fundamentals such as its wide CA surplus and high inflation (resulting in MAS holding a tight stance).

Chart 14: Strong Dollar Amid Only Gradual US Economic Slowing

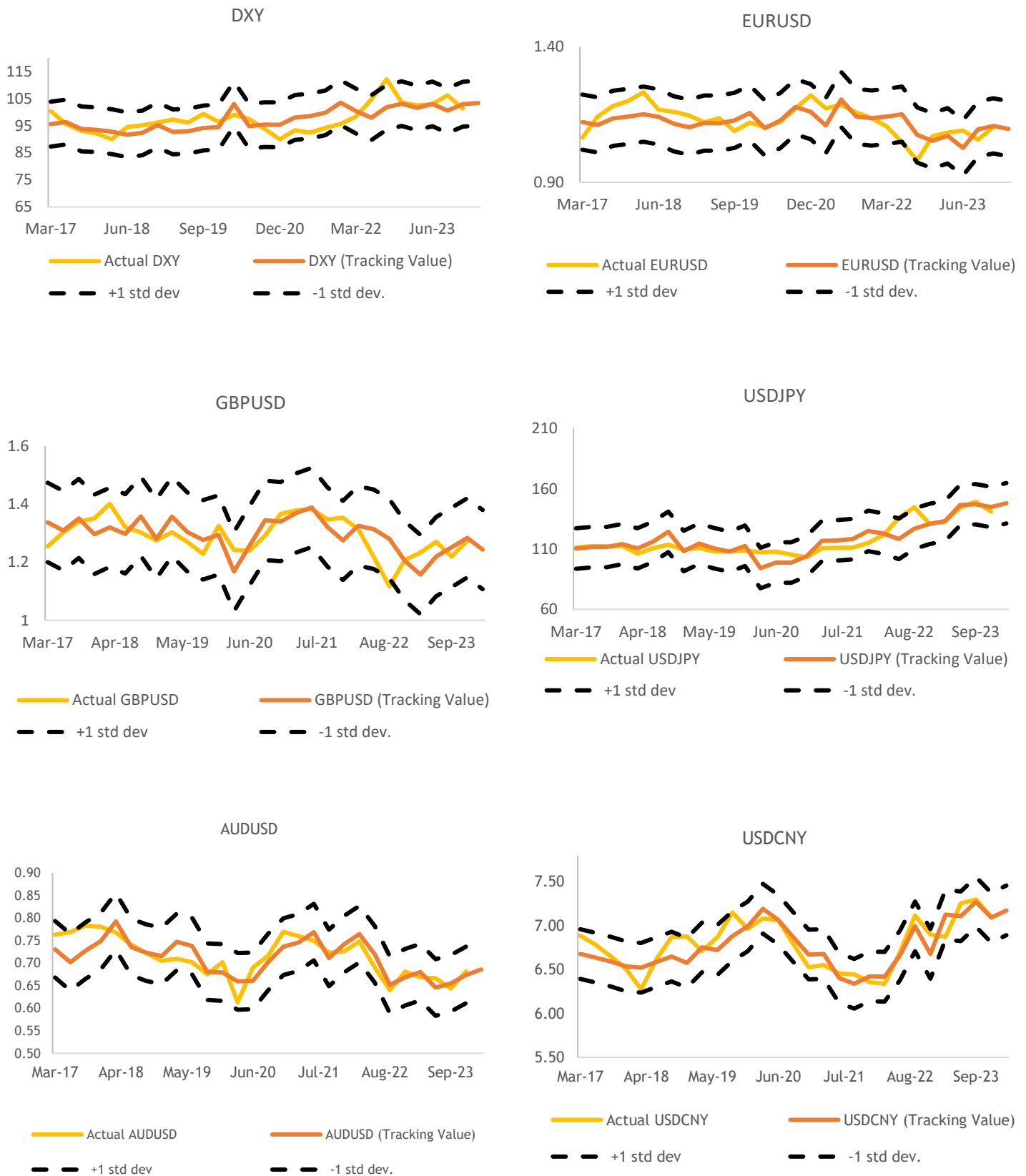
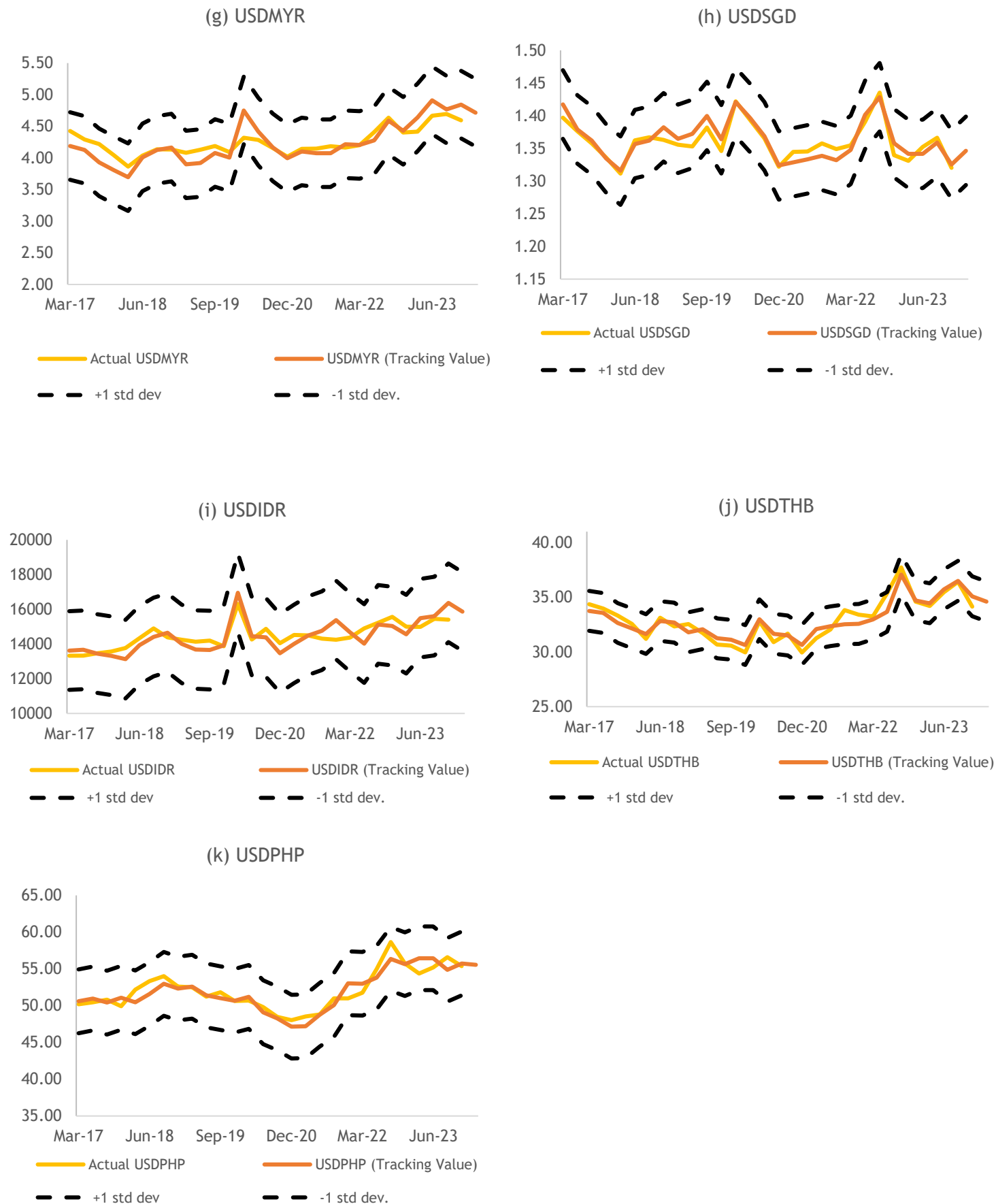


Chart 15: ASEAN Pairs Remain Elevated as US Rates Stay High



Source: Bloomberg, Maybank FX Research &amp; Strategy

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DXY	103.30	103.27
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Source: Bloomberg, Maybank FX Research & Strategy

### Conclusion on the Maybank FX Short Term Tracking Model:

- Within the G7 space, the USD spot does not appear to be misaligned with tracking value for 1Q 2024 whilst the GBP actually has some way to weaken against the USD with the GBPUSD model tracking value at 1.24. Both the EUR and AUD actually have space to strengthen with the EURUSD at 1.10 and AUDUSD at 0.69.
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## Conclusions

We take this rather rare window of relative calm in the markets to refresh our various FX valuation metrics in the hope of uncovering severe misalignments that could potentially provide certain trade ideas.

Using the Maybank Behavioral Effective Exchange Rate Panel (Maybank-BEER), we

- leveraged on macro features of an economy including its net foreign assets, trade openness, interest rate differentials and inflation differentials relative to trading partners, we find that on a trade-weighted, medium-term basis:
- USD REER is most overvalued while JPY is severely undervalued. That could mean significant downside risks to the USDJPY, propelled by divergent monetary policy paths in 2024.
- Among AxJs, MYR is significantly undervalued while PHP is overvalued on a REER basis. Long MYRPHP on divergent current account/fiscal positions.
- SGD, IDR, THB are closer to their “equilibrium levels” with SGD only modestly overvalued. Nonetheless, we acknowledge that a different set of more cyclical factors could drive near-term outcomes; hence the need for a higher-frequency tracking model

Our Maybank Short Term Tracking Models (Maybank-ST) which aims to capture shorter-term dynamic changes in market yield and inflation differentials, the state of world equities and bonds, as well as movements in relevant commodity prices etc., and is estimated on an USD basis. The estimates provide a short term 3-6 month view of the currencies.

We find that within the G7 space, the USD spot does not appear to be misaligned with tracking value for 1Q 2024 whilst the GBP actually has some way to weaken against the USD with the GBPUSD model tracking value at 1.24. Both the EUR and AUD actually have space to strengthen with the EURUSD at 1.10 and AUDUSD at 0.69. THB and PHP could head higher against USD, with tracking USDTHB and USDPHP valuations at 34.61 and 55.55. USDCNY, USDSGD and USDMYR tracking values at 7.17, 1.35 and 4.72 are not actually too far from the spot levels. This suggests that based on current data available and barring no changes in policy shifts and bias, these currencies should be closer to these estimates in the short term.



## Appendix: Model Estimations & Results

### Maybank-BEER Panel

For the correct statistical inference under nonstationary data, we used panel dynamic ordinary least squares estimation (panel DOLS). This method allows for the inclusion of non-stationary variables in the estimation, by incorporating lags and leads of the independent variables. Data period used is from Q1 2006 to Q3 2023, for all 18 currencies.

Variables chosen were largely in line with BEER literature, and have the following interpretations and coefficients.

Variable	Form	Interpretation	Coefficient
Dependent: BIS REERs	<i>Natural Log of REER Indices</i>	-	-
Net Foreign Assets to GDP	<i>NFA as % of GDP</i>	Reflects a country's savings and investment flows.	-0.000441 (0.00)
Trade Openness	<i>Total Trade as % of GDP</i>	Trade liberalization generally lowers the domestic price of tradable goods, thus depreciating the REER.	-0.000932 (0.001)
Short-term Interest Rate Differential	<i>Deviation from Trading Partners' Weighted Avg.</i>	A higher real interest rate differential should be related to a REER appreciation, and this relationship should be stronger with greater capital account openness.	0.010657 (0.011)
Inflation Differential	<i>Deviation from Trading Partners' Weighted Avg.</i>	High inflation (relative to trading partners) could make the economy uncompetitive and likely lead to lower REER	-0.013460

*P-values in brackets ().*

Estimated misalignments from medium-term “fair values” are as follows:

Currency	BEER-Derived Medium-Term Misalignment (% from Equilibrium; +ve: Overvalued on REER Basis & v.v.)
USD	7.9
EUR	1.3
JPY	-12.1
CHF	4.6
GBP	2.0
CAD	-5.1
AUD	-0.6
NZD	3.2
CNY	-0.4
SGD	1.3
MYR	-7.2

IDR	-1.3
INR	2.5
THB	-0.7
KRW	-0.2
TWD	3.0
PHP	6.4

Source: Maybank FX Research & Strategy Estimates

## APPENDIX I: TERMS FOR PROVISION OF REPORT, DISCLAIMERS AND DISCLOSURES

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