

# **WESTPAC MARKET OUTLOOK MAY 2022.**

AUSTRALIA AND  
THE GLOBAL ECONOMY

**WESTPAC INSTITUTIONAL BANK**



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Central banks have again taken centre stage. In our April Market Outlook, we highlighted that “central bankers changed their tune, asserting their determination to respond to the inflation challenge”. This new found determination was on full display over recent weeks. An RBA tightening cycle is now underway, with the RBA lifting rates by 25bps to 0.35% at the May meeting, the first rate increase since late 2010. The decision was accompanied by a significant upward revision to the RBA’s core inflation forecast profile, to 4.75% for this year, up from 2.75% in February. This challenging inflation outlook points to a front-loading of rate hikes by the RBA. We anticipate a 40bps move to 0.75% in June, with the cash rate rising to 1.75% by year end and then a peak of 2.25% in mid-2023.

As foreshadowed by US Fed Chair Jerome Powell, the FOMC delivered a 50bps rate hike in May, taking fed funds to 0.875% up from 0.125% at the start of the year. Long dated bond yields both in the US and Australia soared over the past couple of months as the scale of the inflation challenge has become clearer. Australian 10 year government bonds have jumped to around 3.5%, about 45bps above US 10 years, and sharply up from 1.7% a year ago. We expect Australian 10 year bond yields to consolidate above the 3% mark moving into the second half of the year, before moderating to 2.35% by end 2023.

The Australian dollar has taken on a softer tone and is likely to remain so near-term against the backdrop of an earlier tightening cycle by the US FOMC. Over the second half of 2022 and through 2023, the AUD will likely find its feet, advancing to US80¢ by end 2023, supported by elevated commodity prices and the RBA tightening until mid-2023, whereas the FOMC goes on hold from end 2022.

**Australia:** While a strong expansion of the Australian economy is still in prospect for 2022, led by the consumer, we have moderated the profile for output growth. Higher inflation and an earlier and more compressed RBA tightening cycle will begin to impact in 2022, squeezing household incomes. Growth will cool appreciably in 2023 and 2024, with household balance sheets to come under some pressure as interest rates rise. We now expect output growth of 4.5% this year, which will see the unemployment rate decline to an historically low level of 3.2%, with growth slowing to 2.5% in 2023 and then slipping to a below trend pace in 2024, at 2.0%.

**Commodities:** Most commodities softened in April, except for coal which had a robust rally. Central banks are normalising rates and commencing quantitative tightening, providing a boost to the US dollar and weakening commodity prices, particularly precious and base metals. Following the Russian invasion, supply disruptions, as well as increased demand by the EU to replace Russian gas, drove a 36% surge in thermal coal prices while tight supply is supportive of iron ore prices.

**Global FX markets:** Developments in Ukraine and the consequences for Europe have provided a strong bid for the US dollar this month, so too US rate expectations at fever pitch. Both factors are likely to at least partly reverse through the remainder of 2022 and 2023 as downside risks for global growth abate. Despite the threat of COVID-zero, China holds the greatest promise for upside surprises.

**New Zealand:** Inflation has hit its highest level in more than three decades in New Zealand. This and the related risks for inflation expectations have got alarm bells ringing at the Reserve Bank of New Zealand. The Monetary Policy Committee hiked the Official Cash Rate by 50bps in April and we expect that will be followed by a series of further hikes over the coming months.

**United States:** Having delivered a 50bp hike at the May meeting, the FOMC then made clear that additional 50bp rate hikes are likely at its June and July meetings. While a dramatic change, the May communications made clear these decisions are not being made in fear but rather in recognition of the distance to neutral and the uncertainty at play. Into year end, risks to growth and inflation will balance, allowing the FOMC to go on hold at 2.625% in December, a rate we view as consistent with contractionary policy.

**China:** GDP surprised the market in Q1 and, come Q2, trade and investment are again set to provide resilience against the negative consequences of the Chinese authorities’ tough stance against COVID-19. In the second half of 2022 and beyond, momentum will increasingly come to depend on the consumer, with pent-up demand, sentiment and income gains to provide support.

**Europe:** Russia’s invasion of Ukraine has resulted in a material slowing of activity growth in Europe. Ongoing supply-side issues have weighed heavily on business confidence and investment, and broadening price pressures are threatening real incomes and consumer demand. The tight balance between inflation and growth risks warrants a highly conditional policy normalisation process for the ECB. The BoE, in delivering a 25bp rate hike to 1.0% in May, surprised with a materially weaker growth outlook and an expectation for higher and longer-lasting inflation, highlighting an incredible policy challenge to manage longer-term inflationary expectations.

## Summary of world GDP growth (year average\*)

| Real GDP %ann*  | 2017       | 2018       | 2019       | 2020        | 2021e      | 2022f      | 2023f      |
|-----------------|------------|------------|------------|-------------|------------|------------|------------|
| United States   | 2.3        | 3.0        | 2.2        | -3.5        | 5.7        | 2.6        | 1.8        |
| China           | 6.9        | 6.7        | 5.8        | 2.3         | 8.1        | 5.3        | 5.5        |
| Japan           | 1.7        | 0.6        | 0.3        | -4.8        | 1.8        | 2.2        | 1.4        |
| India           | 6.8        | 6.5        | 4.0        | -8.0        | 9.0        | 8.0        | 6.5        |
| Other East Asia | 4.7        | 4.4        | 3.7        | -2.4        | 4.2        | 4.5        | 4.7        |
| Europe          | 2.6        | 1.9        | 1.3        | -6.6        | 4.9        | 2.2        | 1.5        |
| Australia       | 2.4        | 2.8        | 2.0        | -2.2        | 4.7        | 4.5        | 3.5        |
| New Zealand     | 3.1        | 3.2        | 2.4        | -2.1        | 5.6        | 3.4        | 4.8        |
| <b>World</b>    | <b>3.8</b> | <b>3.6</b> | <b>2.8</b> | <b>-3.3</b> | <b>5.5</b> | <b>3.4</b> | <b>3.3</b> |

Sources: IMF, Westpac Economics. Aggregates weighted using purchasing power parity exchange rates.  
\*Year average growth estimates, the profile of which can differ from that of the ‘growth pulse’.

Past performance is not a reliable indicator of future performance. The forecasts given above are predictive in character. Whilst every effort has been taken to ensure that the assumptions on which the forecasts are based are reasonable, the forecasts may be affected by incorrect assumptions or by known or unknown risks and uncertainties. The results ultimately achieved may differ substantially from these forecasts.

## RBA tightening cycle begins ...

**RBA interest rate tightening cycle begins ...**

The Reserve Bank Board raised the cash rate by 0.25% from 0.10% to 0.35%.

**... with a rise of 25bps to 0.35%, the first increase since November 2010.**

The Board has made some significant changes to the forecasts that were released in the February Statement on Monetary Policy (SOMP). The forecast unemployment rate by early 2023 has been revised down from 3.75% to 3.5% and is expected to hold at that level throughout 2023. That is despite GDP growth expected to slow to a below trend pace of 2% (unchanged from February).

**The RBA faces a challenging inflation outlook.**

But of most significance was the upward revision in inflation. Underlying inflation is now forecast to reach 4.75% by end 2022 (currently 3.7%) compared to the February forecast of 2.75% – a staggering uplift of 2ppts in forecast inflation. Underlying inflation is then forecast to fall back to 3% by mid-2024 compared to 2.75% in the February SOMP.

**RBA lifts 2022 core inflation forecast from 2.75% to 4.75%.**

The task of reducing underlying inflation over that 18 month period from 4.75% to 3.0% overwhelms the previously expected task of holding it steady over the period at 2.75%. It signals that the Board should be prepared to “front-load” its tightening cycle to convince households and business that it is committed to achieving that formidable goal of returning inflation back to the target band (admittedly to the outer limit) by mid-2024.

**By mid-2024, core inflation returns to the top of the 2-3% target band.**

In his press conference, the Governor revealed the interest rate path that was used to arrive at the forecasts. He noted that the cash rate profile was 1.5%-1.75% by end-2022 and 2.5% by end-2023, most likely the base terminal rate. He also noted that the choice of 25 basis points was a return to “business as usual” signalling that increments of 25 basis points might be considered the base case.

We are not convinced that the next move will be 25 basis points.

**This challenging outlook points to rate hikes being front-loaded ...**

Consistent with our previous forecast that the Board would want to reach a cash rate of 50 basis points by June we expected 15 basis points in May to be followed by 25 basis points in June. But that was before we saw the formidable challenge that the Board believes it has to return inflation to within the band over the next 2 years. A larger increase in the cash rate than 25 basis points is likely to be seen by the Board as necessary to convince agents that it is serious about the challenge and to accelerate the unwinding of the emergency measures that saw 65 basis points of rate cuts in 2020.

We have chosen 40 basis points rather than 50 basis points purely because we expect that “business as usual” is increments of 25 basis points on a base of multiples of 25 basis points (in line with the practices of most other central banks).

**... with a likely June move of 40bps to 0.75%.**

It is better to slightly trim the largest expected increase in the cycle rather than reduce any subsequent moves to that 15 basis points that was rejected on Tuesday’s meeting.

Apart from that large hike of 40 basis points in June to return the cash rate to 75 basis points, we continue to expect the rate path we forecast before today’s announcement. That is increases of 25 basis points in July; August; October and November with the rate reaching 175 basis points by year’s end instead of our previous 150 basis points.

That will be a level where the household balance sheet will come under some strain and the subsequent movements by the Board will be much more cautious – one hike of 25 basis points in February and another in May to reach a terminal rate of 2.25% (up from 2.00% previously). In contrast, the markets are predicting a terminal rate of above 4%.

**Westpac expects the cash rate to be 1.75% by year end and 2.25% in mid-2024 ...**

The Governor described a revised approach to assessing the outlook for wages. He gave greatest emphasis not to the slow-moving Wage Price Index but to the results of the Bank’s liaison with businesses – 40% of the businesses responding to the liaison assessments described wage increases of above 3%. The Governor confidently declared that wage growth is finally picking up.

It does not appear likely that a “disappointment” with the Wage Price Index that prints on May 18 or even the wages data in the national accounts (June 1) could divert the RBA’s attention from the urgency of lowering that inflation rate back to the target band in 2023.

**... placing household balance sheets come under some strain.**

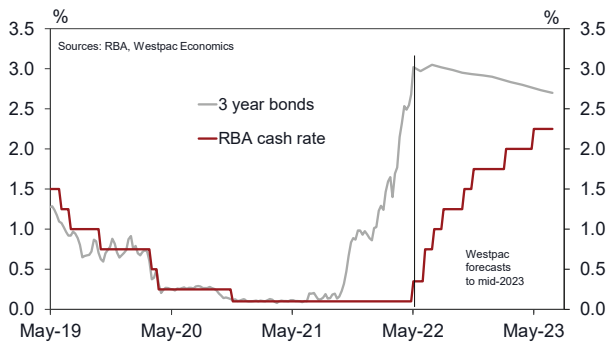
The Governor also clarified the Board’s position on the balance sheet.

The RBA will allow maturing government bonds to run off without reinvesting the proceeds. It has not committed to accelerating the shrinking of the balance sheet by outright sales of bonds. Bear in mind that around \$180 billion of term fund loans to the banks are due to be repaid in September 2023 (around \$80 billion) and a further \$100 billion in June 2024. That compares with around \$350 billion of bond purchases during the pandemic. The Bank can reduce the build-up in its balance sheet during the pandemic by around 35% without needing to sell bonds.

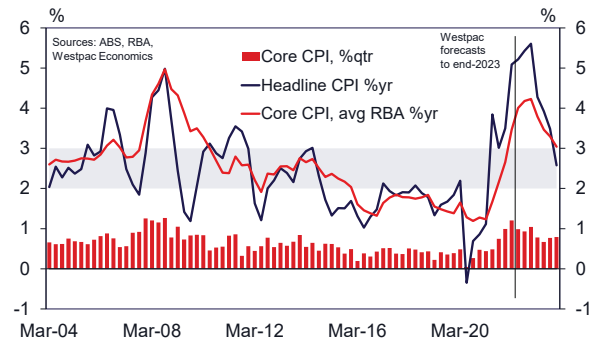
**Bill Evans, Chief Economist**

## ... responding to challenging inflation outlook

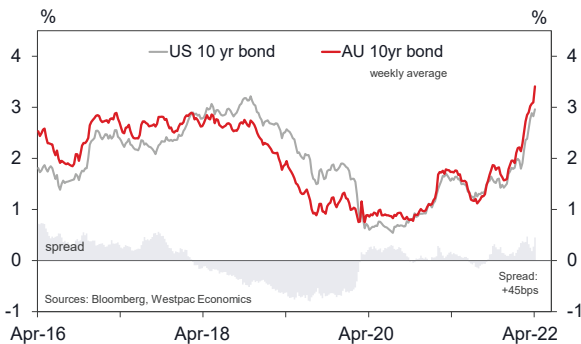
### RBA cash rate and 3 year bonds



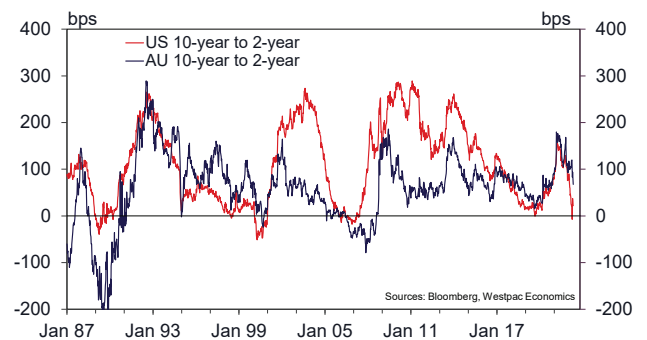
### CPI inflation



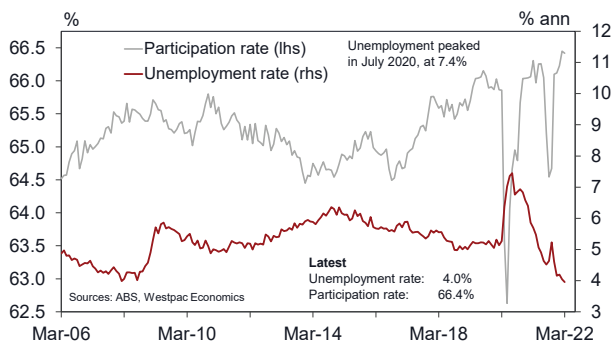
### 10 year bonds yields soar



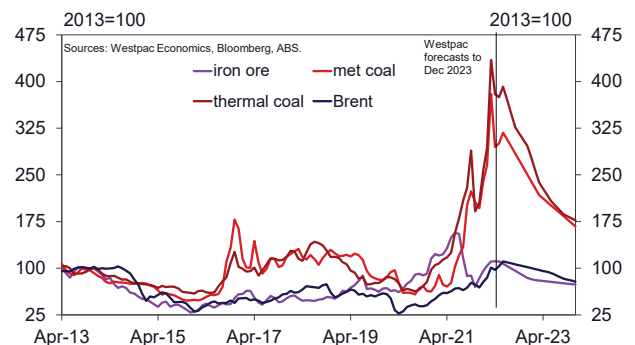
### US yield curve inversion



### Unemployment holds at 4.0%, equal 48 year low



### Australian commodities



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## Reopening rebound in consumer demand ...

**We've moderated our profile for Australian output growth ...**

We have moderated our profile for Australian output growth in light of recent developments on the inflation front and the RBA's tightening cycle. Real GDP is now expected to increase by 4.5% in 2022, cooling to growth of 2.5% in 2023 and then slowing to a below trend pace in 2024, an expected 2.0%. That compares with our previous profile of 5.5%, 2.7% and 2.0%.

**... to 4.5% and 2.5% for this year and next ...**

Output growth in the order of 4.5% this year still represents a strong expansion. Activity is supported by a number of key positives, notably: pent-up consumer demand; strong household balance sheets; and high vaccination rates; as well as a tailwind from earlier policy stimulus.

**... in light of higher inflation and a more aggressive RBA tightening cycle.**

Recent changes to Westpac's interest rate and inflation forecasts (see page 23) have shifted the outlook for the consumer and the housing sector, with negative spill-over effects to other parts of the economy, notably business investment.

**Output growth of 4.5% this year still represents a strong expansion ...**

As we have long foreshadowed, a looming normalisation of policy settings will see conditions cool moving into 2023 and 2024. This normalisation of policy is now set to occur both earlier and on a more compressed timetable. That means that the winding back of stimulus will begin to bite during 2022.

Our revised RBA view now has the cash rate reaching 1.75% by year-end and a peak of 2.25% by May 2023. When we last updated and amended our Australian activity forecasts early in March, following the latest national accounts, we expected the cash rate to peak at 1.75% in March 2024. Meanwhile the Q1 CPI surge points to a higher near-term outlook for inflation.

**... likely led by the consumer, with pent-up demand and a strong balance sheet.**

In short, this combination of higher inflation and rising interest rates will take some of the heat out of the 'reopening rebound' in consumer demand in 2022. The post-COVID normalisation in activity and delayed effects of previous policy stimulus are still expected to see strong gains in consumer spending but with annual growth of 6.2%yr in real terms rather than our previous forecast 8% surge.

Both higher prices and higher interest rates will be a significant squeeze on household incomes.

**Higher inflation and the winding back of policy stimulus ...**

The key driver of spending growth will be the gradual release of funds as the savings rate falls. But these funds are nominal and as prices rise faster than previously expected, the capacity to boost real spending is reduced.

Higher interest rates impact most consumers directly through higher interest payments (although RBA scenario analysis points to 40% of standard variable rate borrowers not having to lift current payments even if rates rise by 2%). Some additional effects are likely to come through a hit to consumer sentiment. The Westpac Melbourne Institute Index of Consumer Sentiment has already fallen to its lowest level since September 2020 and is likely to fall further as actual rate increases come through in coming months.

**... will significantly squeeze household incomes ...**

Our estimates suggest the more rapid series of rate rises will deliver a much bigger 'jolt' in 2022. Nominal growth in disposable income is forecast to slow from 5% in 2021 to 1.1% in 2022 before recovering to just over 3% in 2023.

**... with impacts to emerge during 2022.**

The slower forecast growth in spending is still a strong annual growth rate by historical standards because of the expected rebound from abnormally low spending/high saving seen during the COVID period. The revised profile remains consistent with a gradual return to more 'normal' spending/saving behaviour.

The household savings rate is expected to be around 6% by year end, well down from an elevated 13.6% in the December quarter 2021. This marks an end to 'excessive' saving but not a notional drawdown on the stockpile of excess savings households accumulated over 2020 and 2021, estimated to be about \$250bn with an average savings rate of around 17%. That stockpile is only expected to be drawn on in 2023, as high interest rates become more of a stretch, and even then, only to a modest degree.

**The economy is set to cool moving into 2023 and 2024.**

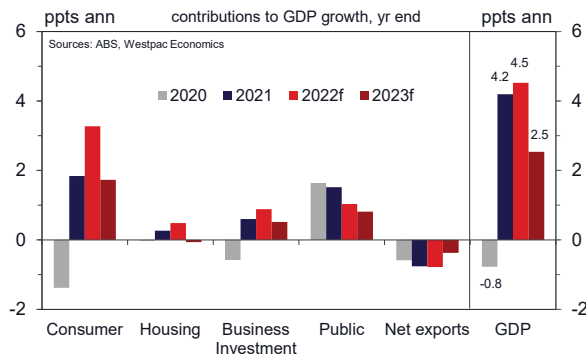
Our current prior is that those borrowers who have accumulated excess savings in offset accounts, will be committed to protecting those savings given our forecasts that house prices nationally will fall by 2% in 2022; 8% in 2023 and 1% in 2024. There is more scope for non leveraged households to access more of their accumulated savings, although we expect these savers to remain cautious given the deteriorating growth outlook.

In effect, sentiment, cost of living and interest rate rises have sizeable impacts but are still secondary compared to the 6-7ppt decline in the savings rate from this 'normalisation'. However, beyond this transition, spending growth is expected to revert to a more subdued 2-2.5% annual pace from around mid-2023.

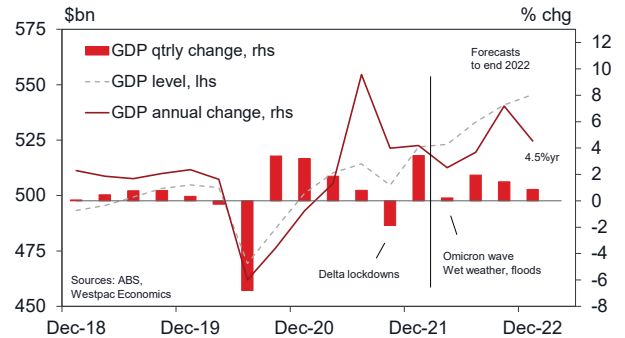
**Bill Evans**, Chief Economist

## ... tempered by higher inflation and rising interest rates

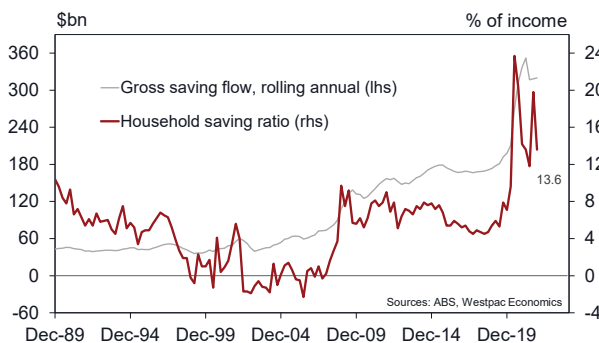
### Australia: the growth mix



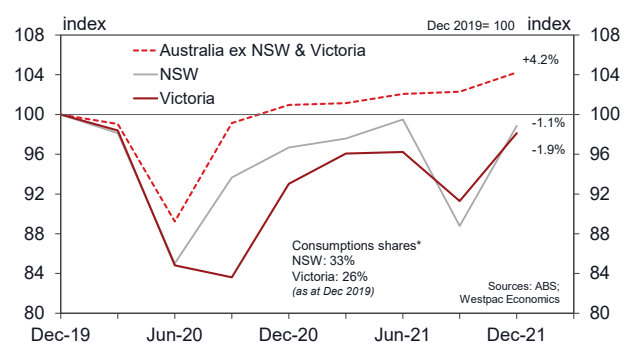
### Australia: volatile path navigating covid



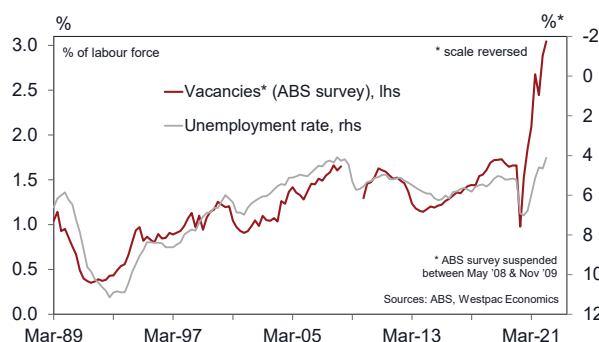
### Household saving ratio and gross saving flow



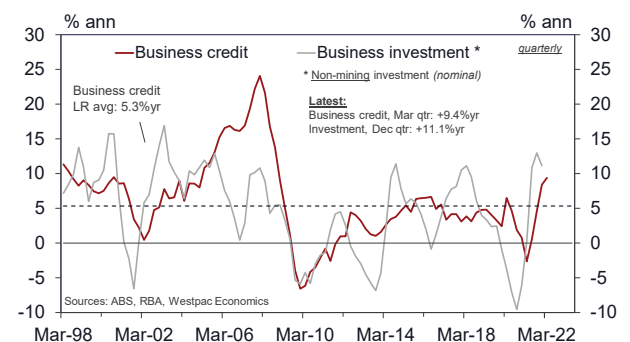
### Consumer spending by state: paths diverge



### Job vacancies aplenty



### Business credit and investment



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## It has been a wild ride...

**Most commodities softened in April, except for coal which had a robust rally.**

It continues to be a wild ride for commodities. While most commodities softened through April, this trend was offset by significant strength in coal prices. Since the April report Qld met coal lifted 25.8% to US\$482/t while thermal coal is up 20.0% to US\$337/t. Offsetting these gains has been the fall in gold (-2.1% to US\$1,887/oz), nickel (-4.8% to US\$31,669/t), and copper (-7.8% to US\$9,611/t) as central banks around the world have started to lift interest rates and turn to quantitative tightening to reduce demand and ease inflationary pressures. Base and precious metals are also under pressure from a stronger US dollar while farm or soft commodities were flat in the month. Crude oil was also flat in the month with Brent up just 1% to US\$106/bbl as was Westpac's broadest measure of commodity prices, the Westpac Export Price Index (+0.5%).

**Central banks normalising rates and commencing quantitative tightening ...**

As noted earlier in this report, the market remains decidedly against China but we are convinced that the authorities there can achieve growth near 5.5% in 2022 and that this pace can be maintained for a number of years. Last week, the Politburo acknowledged COVID and geopolitical challenges and called for additional policy support which we expect to result in robust infrastructure investment growth in 2022. Our commodity forecasts assume that the global economy avoids a material downturn or recession and while we are expecting some realignment between supply and demand, in the medium term supply disruptions/trade realignment will offset the risk from any demand headwinds thus holding commodity prices higher than they otherwise would be.

**... boosted the US dollar and weakened commodity prices particularly for base metals.**

Thermal (Newcastle) coal prices are up 36% since the 24th February when Russia invaded Ukraine, while Qld met coal is up 18% with both reaching all-time highs due to record high gas prices resulting from the ongoing disruptions to Russian supply. In addition, western sanctions are making it difficult to trade Russian coal. Russia produced around 430mt of coal in 2021 and exported around 210mt to make it the third largest exporter of seaborne thermal coal (-160mt or 15% of exports) and the second largest exporter of met-coal (-50mt or 13% of exports). Our forecasts do have a correction from here with thermal coal down to US\$250/t at end 2022 and met coal down to US\$355/t. At end 2023 thermal coal is forecast to have eased to US\$149/t while met coal is forecast to be down to US\$250/t. The recent surge in prices has resulted from a shortage in seaborne coal, supply is down 6% year to date despite record high prices, with the industry struggling to lift output due to weather and COVID disruptions adding to the ongoing labour shortages and years of underinvestment. In addition, Russian coal shipments (mainly from the Far East) are down around 11% year to date.

**Supply disruptions as well as increased demand in EU to replace Russian gas ...**

We are also expecting Chinese domestic coal output to lift through the medium term: the NDRC aims to lift domestic coal capacity by 300mt to enhance energy security which, if achieved, materially reduces China's imports of coal. This rebalancing of supply toward local production is already starting to have an impact and has moderated the demand for imported coal; through late March and into April imported met coal lost its significant, but short lived, premium to Chinese met coal.

**... saw thermal coal prices surge 36% since the Russian invasion of Ukraine.**

There are, however, a number of factors that could keep coal prices higher for longer. The first is the high cost of natural gas. Gas is currently about 45% more expensive to produce power than coal (after adjusting for thermal efficiency and carbon cost). It has been estimated that the current API2 coal price break-even with the current EU gas price is US\$572/t. The second is further disruptions to Russian supplies of coal. Finding an alternative to 50 to 100mt of Russian coal is significantly more challenging than other commodities due to logistical constraints and quality differences. Most Russian coal is produced in the middle of the country (Kuzbass region) with about 45% railed some 5,000km west towards Europe leaving the remaining 55% railed some 5,000km east to China. Russian coal exports east are constrained by rail capacity but this will moderate in 2 to 3 years when the Russian government completes its \$10bn upgrade to the Trans-Siberian and Baikal-Amur lines which significantly boosts cargo capacity.

**Tight supply is supportive of iron ore prices, while a moderation in steel sales ...**

China's iron ore demand remains robust with crude steel production in March at the highest level since June 2021. By contrast, due to COVID disruptions, steel demand is weak, resulting in steel inventories rising at mills and traders. Meanwhile, iron ore inventories at Chinese ports declined more than 3% in April so have started to moderate but are still 13% higher in the year while imports of ore are down 14% in the year to March. Ongoing supply disruptions to seaborne ore, and the above discussed China stimulus, are likely to support iron ore prices at least for the near term. It is, however, worth noting that seasonal supply is rising while demand remains under pressure.

**... lifted inventories and suppressed steel prices in the face of rising input costs.**

We expect the iron ore market to move lower through the second half of 2022 and into 2023 with prices drifting down towards the cost curve. The latest update from Wood Mackenzie has the VIU curve for the 90th percentile down 5% to \$68/t due to lower discounts for lower grade ore, foreign exchange and freight costs, and rising operational costs (diesel, labour, ESG-compliance etc.). This does suggest a downside risk to Westpac's end 2025 forecast of US\$85/t.

**Justin Smirk**, Senior Economist

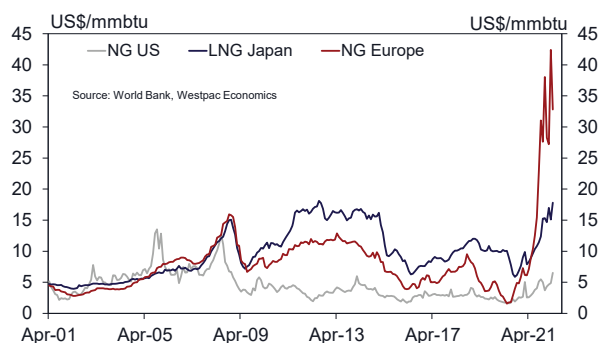


## ... as supply disruptions hit demand recovery

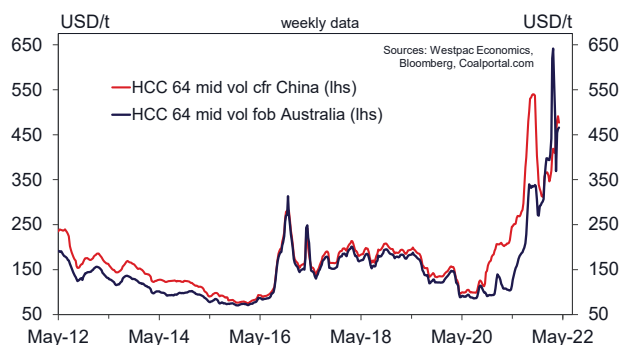
### Australian commodities in US\$

|                    | Current  | % change since | % change June 21 to |
|--------------------|----------|----------------|---------------------|
|                    | 4-May-22 | 24-Feb-22      | Feb-22              |
| Wheat              | 1,042    | 12             | 37                  |
| Crude Oil, Brent   | 105      | 9              | 29                  |
| Thermal Coal       | 343      | 36             | 78                  |
| Met Coal           | 482      | 18             | 143                 |
| Iron Ore           | 146      | 7              | -37                 |
| Nickel             | 30,935   | 24             | 37                  |
| Copper             | 9,407    | -5             | 6                   |
| Export Price Index | 413      | 8              | 14                  |

### EU gas prices surging before Ukraine



### Aust coal lost its premium to China

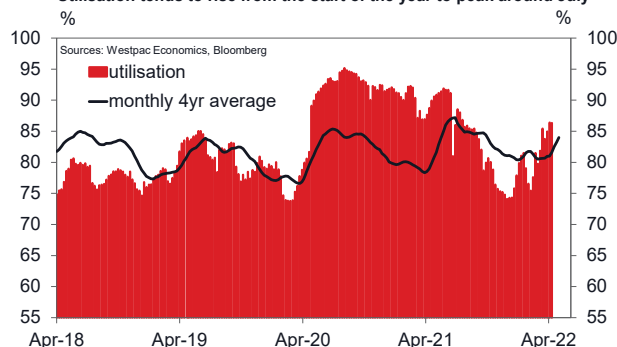


### Chinese steel production back to trend

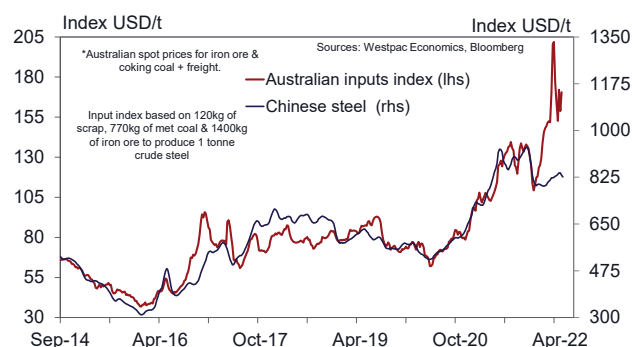


### Chinese blast furnaces

Utilisation tends to rise from the start of the year to peak around July



### Steel inputs vs. Chinese steel prices



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## USD gains temporary...

**Fears over Ukraine and inflation have seen the USD bid...**

Midway through our commentary last month, we emphasised that our baseline expectation for the US dollar to begin a downtrend in coming months was predicated on an assumption “that risks related to Ukraine dissipate through 2022”. The past month has been completely counter to this tenet however, with Russia threatening to halt the supply of gas to Europe unless purchasers pay in rubles while European authorities introduced yet another round of sanctions -- including a planned phasing out of Russian coal and oil imports. The fighting across large parts of Ukraine has also continued and, seemingly, there is no end in sight to the conflict.

**... to historically elevated levels above 100 this month.**

From 99.9 at the time of our last release, the US dollar index leapt to a high of 104 mid-month, a level it continues to trade near, currently 103.6. US rate expectations at fever pitch and the market's acute concerns over China's COVID-zero policies have also supported the US dollar.

**The concerns that have hit Euro and Sterling...**

Whereas a month ago, we expected the DXY index to trade at 99.0 in June and 97.4 come December, now we forecast 102.1 and 100.2 respectively. However, our end-2023 forecast is still around 95.5.

Obviously, key to both the US dollar's historic strength now and in the period ahead is weakness in both Euro and Sterling. For Euro, it is not only the immediate impact of the conflict on growth that matters (see page 20 for our revised views), but also the consequences for monetary policy.

Some in the market believe the ECB may raise rates by year end; we instead expect a few more months will prove necessary to make the case. Regardless, the starting point for the ECB is -0.50% against a fed funds rate currently at 0.875% on its way to 2.625% come December. Moreover, the probability of a rapid fire tightening cycle by the ECB remains extremely remote. On this point, note that the spread between the German 10-year Bund yield and the US Treasury's 10-year yield is currently close to -200bps and only expected to come in to -140bps by end-2023.

**.... are expected slowly to abate....**

Ahead of their May meeting, the growth and policy view was thought more favourable for Sterling, but with the Bank of England now forecasting 10%yr inflation in 2022 and no growth in 2023, the market is rightly concerned. Further tightening by the BoE is likely to be much more modest than in the US and, given the growth consequences, at best neutral for the currency.

**.... laying a foundation for a reversal.**

The circa 3% appreciation forecast for Sterling and Euro to year end is therefore set to rely more on risks to the regional outlook dissipating and a broadening of the global recovery, both increasing opportunities for investment and greater consumption of durables -- spending long held back by supply chains and the uncertainty clouding the global outlook. Through 2023, we see a continuation of this trend against the US dollar, from USD1.27 to USD1.34 and USD1.09 to USD1.15 (+5.5%). Of the two currencies, if the downside for the Continent from Russia's invasion of Ukraine were to reverse, Euro would outperform over the period.

**There are less reasons to be optimistic for Yen...**

When assessing the DXY trend, it is also important to recognise that the US dollar's recent gains have not only come as a result Euro and Sterling but also Japan's Yen. Over the period, USD/JPY has risen from JPY124 at the time our April Market Outlook to a mid-month high of JPY131, now JPY130. This has occurred primarily because, over the period, the Bank of Japan were as committed to holding interest rates down and continuing to expand their balance sheet as the FOMC was to doing the opposite. The 10-year yield spread between Japan and the US is a staggering 280bps as a result, and unlikely to narrow materially for the foreseeable future.

**... a currency hit by gaping policy differentials and energy costs.**

With the high price of energy also set to continue weighing on Yen thanks to Japan's reliance on imported fuels, Yen is only expected to see a partial recovery of 2022's depreciation from USD/JPY114, with USD/JPY forecast to fall from JPY130 to JPY121 end-2023.

**China meanwhile continues to hold considerable opportunity.**

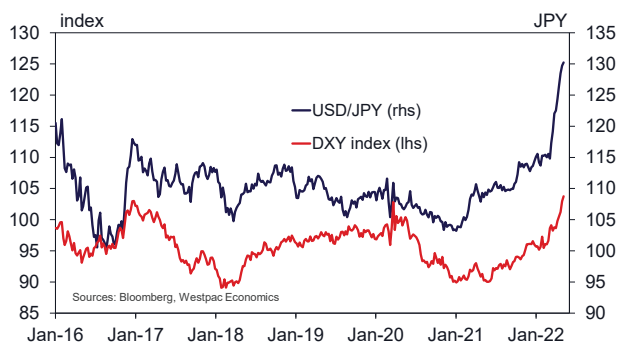
In stark contrast, the developing nations of Asia still hold considerable promise, particularly China. For all the headlines touting wide-spread economic malaise under the weight of authorities' COVID-zero strategy, USD/CNY has only marginally disappointed against the US dollar trend this month. Meanwhile, available data continues to speak to resilience, and the talking points of policy makers to promoting investment in pursuit of long-term growth and prosperity.

To be sure, we believe that the restrictive approach taken by authorities has to change -- preferably quickly given the low incidence of material health concerns but significant damage to sentiment. However, we also have to recognise Chinese authorities have an unparalleled capacity to quickly turn their economy through stimulus and co-ordination across all levels of government. If our growth view proves correct, see page 18, then CNY6.35 and CNY6.15 at end-2022 and 2023 respectively are readily achievable.

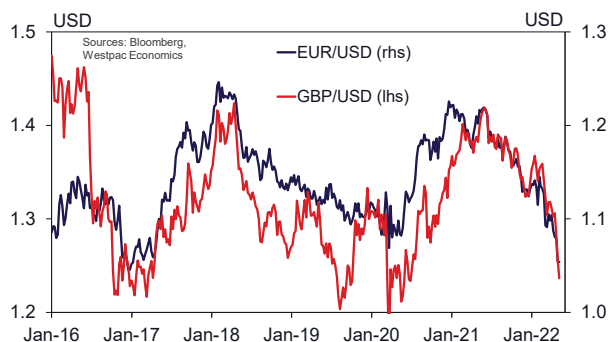
**Elliot Clarke**, CFA, Senior Economist

## ...assuming risks subside

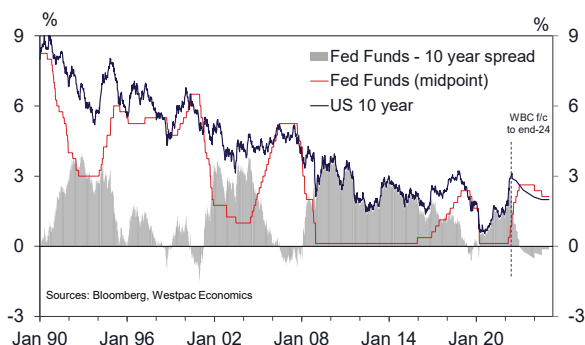
### Safe-haven flows strong support for USD



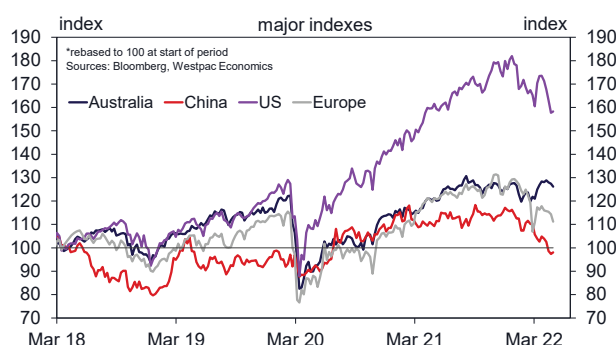
### EUR & GBP have most to lose from conflict



### US rate rises material change



### Equity markets hopeful on Russia and rates



### CNY has traded in line with USD trend of late



### Rest of Asia well positioned for recovery



Past performance is not a reliable indicator of future performance. The forecasts given above are predictive in character. Whilst every effort has been taken to ensure that the assumptions on which the forecasts are based are reasonable, the forecasts may be affected by incorrect assumptions or by known or unknown risks and uncertainties. The results ultimately achieved may differ substantially from these forecasts.

## The RBNZ brings forward rate hikes ...

**The RBNZ hiked the cash rate by 50bps in April ...**

The Reserve Bank of New Zealand hiked the Official Cash Rate by 50bps at its April policy meeting. That was the first 50bp hike since 2000, and a larger increase than we or most other analysts had expected. We now expect a follow-up 50 basis point hike at the May policy meeting, with further 25 basis point hikes at the four remaining reviews this year. That would take the OCR to a peak of 3% by November of this year (instead of mid-2023 as assumed in our previous forecast).

**... and we've brought forward our forecast for OCR hikes.**

The key factor underlying the RBNZ's more hawkish stance has been the rapid rise in inflation pressures and related concerns about the upside risk for inflation expectations. Consumer prices rose by 6.9% in the year to March. That's the highest annual rate of inflation that New Zealand has seen since 1990.

**Imported inflation and domestic operating costs have increased ...**

In part, the strength in inflation is due to global factors, including ongoing disruptions to supply chains and high transport costs. Those pressures were reflected in the 8.5% annual rise in tradables prices (which mainly relates to the prices of imported goods). At the same time, domestic inflation pressures are also running hot, with non-tradables inflation rising to 6% over the past year. New Zealand businesses have been reporting sharp increases in operating costs. That includes mounting upward pressure on wages as businesses struggle to attract and retain staff.

**... compounded by strong demand, boosted by stimulus.**

Importantly, the rise in operating costs has been compounded by strong demand in some key parts of the economy. That's notable for two key reasons. First, it's given businesses in sectors like construction greater scope to pass on cost increases into output prices, rather than taking a hit on margins.

Second, if demand is strong, inflation is likely to remain elevated even when the current pressure on operating costs eventually eases off. That's especially important for the RBNZ, as a key factor underpinning the strength of household demand has been stimulus from low interest rates.

**At the same time, the labour market is running red hot.**

But it's not just inflation that is running red hot. Unemployment is just 3.2% - the lowest level on record - and it's set to drop even lower over the coming months. More generally, the New Zealand economy as a whole has come through the Delta and Omicron outbreaks in good shape, though conditions are mixed across sectors: firmness in construction activity, strong commodity export prices and resilient durables spending have all helped to offset the softness in customer facing industries like hospitality.

**The RBNZ has moved pre-emptively ...**

Given the prevalence of price and cost pressures, a growing number of households and businesses expect that inflation will linger at high levels for an extended period. That's got alarm bells ringing at the central bank. If those higher expectations spill over into wage and price setting decisions, the strength in inflation could be sustained for even longer. That would mean that even larger interest rate increases are needed to rein the inflation monster in. On this front, it's notable that we're already seeing growing upwards pressure on wage claims. In fact, in a recent Westpac survey of New Zealand households, around half of those aged 25 to 54 had either asked for a pay rise or were considering doing so, with similar numbers looking for a higher paying job.

**... to limit the upside risks for inflation expectations.**

In light of the upside risks for inflation expectations, the RBNZ decided that pre-emptive action now would reduce the risk of having to do even more in the longer term. However, the April policy statement also noted that the RBNZ remains comfortable with its projected OCR track from its February policy statement, which peaked at around 3.4% by the end of 2024. That's a notable contrast with financial market pricing, which had been factoring in a peak in the OCR closer to 4%.

**We expect further hikes over the coming months ...**

Local financial markets have been led around by offshore developments in recent weeks, where the trend has been towards pricing in more and faster interest rate hikes. There's a crucial difference though: most overseas central banks are only just starting their tightening cycles or have yet to begin. And to the extent that inflation is being driven by common factors globally, those central banks are at more risk of falling behind the curve and having to tighten much further than they intended.

**... however, with signs that rate hikes are already gaining traction ...**

However, the RBNZ's recent statement was meant as a reminder that it sets New Zealand policy for New Zealand conditions, and that it's already quite a way down the monetary tightening path. That's been seen most clearly in the housing market, with nationwide prices falling 5% since November as mortgage rates have pushed higher.

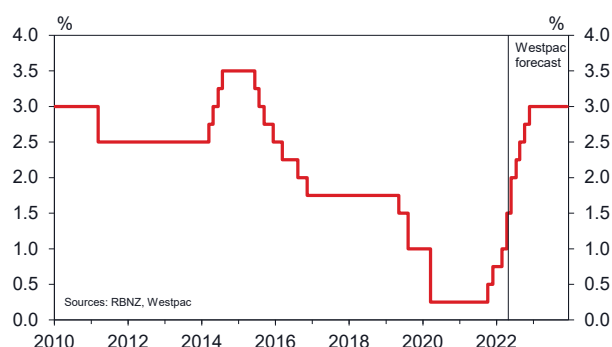
**... we doubt the cash rate will rise as far as markets expect.**

We expect further house price declines through the back half of the year as the cash rate continues to rise, and that will be important for the stance of monetary policy. The housing market plays a key role in shaping the strength of household demand more generally, and we expect that as the housing market continues to cool, demand related inflation pressures will also ease back. We've always placed more emphasis than the RBNZ does on the housing channel for monetary policy. For that reason, we're comfortable with keeping our peak OCR forecast at 3%, rather than moving towards the RBNZ's higher estimate.

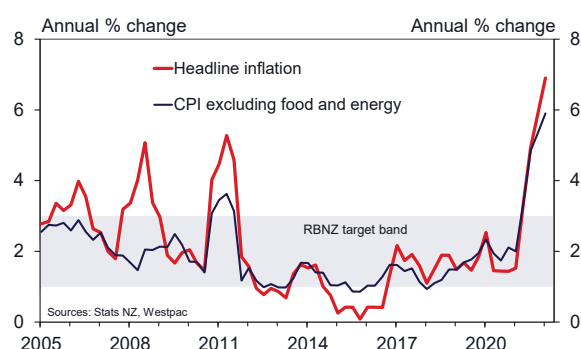
**Satish Ranchhod**, Senior Economist

## ... as inflation pressures surge

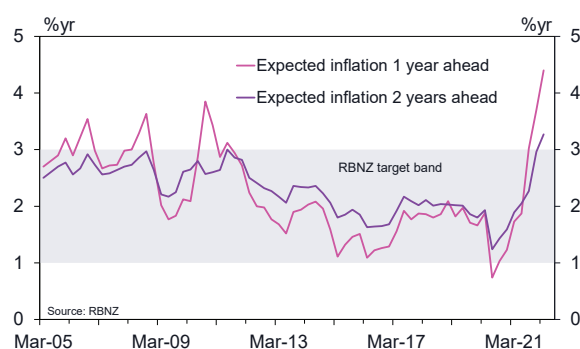
### RBNZ Official Cash Rate



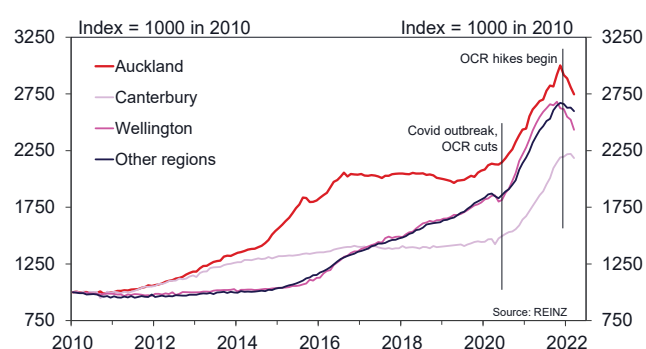
### Consumer price inflation



### RBNZ survey of expectations



### House price indices



|  | 2021  |      |       |       |       |       |       |       | 2022  |       |       |      |
|--|-------|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|------|
| Monthly data                                 | May   | Jun  | Jul   | Aug   | Sep   | Oct   | Nov   | Dec   | Jan   | Feb   | Mar   | Apr  |
| REINZ house sales %mth                       | -5.5  | -0.2 | -3.5  | -14.0 | -10.0 | 21.2  | -1.1  | -5.7  | -5.5  | -1.0  | -2.9  | -    |
| Residential building consents %mth           | -2.7  | 3.4  | 2.3   | 3.5   | -1.8  | -1.8  | 0.7   | 0.9   | -9.4  | 12.2  | 5.8   | -    |
| Electronic card transactions %mth            | 2.0   | 1.4  | 0.8   | -21.8 | 1.3   | 9.9   | 9.1   | 1.8   | 1.9   | -7.6  | 1.6   | -    |
| Private sector credit %yr                    | 5.4   | 6.4  | 7.1   | 7.0   | 7.3   | 7.6   | 7.7   | 7.5   | 7.3   | 7.3   | 6.9   | -    |
| Commodity prices %mth                        | 2.1   | 0.9  | -1.7  | -1.6  | 1.5   | 2.1   | 2.8   | -0.3  | 1.0   | 3.9   | 3.9   | -1.9 |
| Trade balance \$m                            | -419  | -93  | -458  | -1009 | -871  | -933  | -651  | -1146 | -1015 | -1152 | -1072 | -    |
| Quarterly data                               | Q2:20 |      | Q3:20 | Q4:20 | Q1:21 | Q2:21 | Q3:21 | Q4:21 | Q1:22 |       |       |      |
| Westpac McDermott Miller Consumer Confidence | 104.2 |      | 97.2  | 95.1  | 106.0 | 105.2 | 107.1 | 102.7 | 99.1  |       |       |      |
| Quarterly Survey of Business Opinion         | -39   |      | 0     | 1     | 2     | 25    | 12    | -3    | -9    |       |       |      |
| Unemployment rate %                          | 4.0   |      | 5.3   | 4.9   | 4.6   | 4.0   | 3.3   | 3.2   | 3.2   |       |       |      |
| CPI %yr                                      | 1.5   |      | 1.4   | 1.4   | 1.5   | 3.3   | 4.9   | 5.9   | 6.9   |       |       |      |
| Real GDP %yr                                 | -1.0  |      | -1.6  | -2.1  | -1.4  | 5.2   | 4.8   | 5.6   | -     |       |       |      |
| Current account balance % of GDP             | -1.5  |      | -0.7  | -0.8  | -2.5  | -3.3  | -4.4  | -5.6  | -     |       |       |      |

Sources: ANZ, Statistics NZ, REINZ, RBNZ, NZIER, Westpac Economics.

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## A recession need not be a fait accompli ...

**A 50bp hike in May will be followed by two more ...**

Guidance provided by the Federal Open Market Committee after their May meeting shows an intent to moderate demand to reduce inflation pressures; however, there was no outright fear of inflation. Importantly, the Committee is of the view that the US economy can remain strong while inflation is brought back into line with the medium-term target of 2.0%yr, from 8.5%yr at March on a headline CPI basis or 6.6%yr for PCE.

How is this expected to be achieved? In short, through the setting of appropriate financial conditions and the passage of time. While Chair Powell would not be drawn on a specific target for the fed funds rate, he noted in the press conference that the Committee felt the neutral medium-term range was likely to be 2.0-3.0%.

**... in June and July after which more modest 25bp hikes will be seen ...**

In increasing rates by 50bps at this meeting and specifying that additional 50bp hikes would be on the table at the next “couple” of meetings, the Committee and Chair Powell are making clear they want to quickly move much closer to neutral to give policy time to work through markets and the economy before any ‘fine tuning’ is undertaken.

To us, the above implies the FOMC have in mind a lift in the fed funds rate to around 2.50% and the maintenance of a 10-year yield above this level into year end. Combined with the assumed effect of up to \$95bn a month in quantitative tightening from September, in line with market expectations and purported to be the equivalent of a 25bp hike (albeit with wide bands of uncertainty), such a turn of events would see the FOMC’s overall stance of policy at or above neutral on the Committee’s estimates late 2022.

We instead expect that a fed funds rate of around 2.0% will, in time, prove neutral. As a result, the mooted actions of the Committee should see growth in the US economy moderate to a below-trend pace in 2023 as consumers rein in their spending and businesses take more of a ‘wait and see’ approach to investment. Still, like the Committee, we believe in the resilience of the US labour market and household balance sheets, and so view a stalling or persistent decline in domestic demand as unlikely over the forecast horizon.

**... to a peak of 2.625% at year end.**

Integrating the views of the Committee with our own, the most probable outlook for the fed funds rate from here is two further 50bp increases at the June and July meetings followed by 25bp increases into year end. This would take the mid-point of the fed funds range to 2.625%, 25bps higher than our prior estimate and roughly 15bps inside of the market’s end-2022 pricing. (Note however, the market consensus expects an increase to 3.25% in 2023 while we do not.)

**Time is necessary for inflation risks to subside and excess demand to moderate...**

Part of the reasoning for adapting our view in this way is that it will take time for the FOMC to feel confident excess demand is moderating and inflation is coming back under control. Specifically on inflation: it will likely not be until the September meeting that the Committee will have confirmation that headline CPI inflation is back near 4.0% on a six-month annualised basis; and November/December before a circa 3.0% outcome is seen, again on a six-month annualised basis.

**... after which two rate cuts are on the cards -- in 2024.**

Our profile for the US 10-year remains largely unchanged, with a 2.90% rate seen at June, 2.80% in September, 2.60% come December and 2.10% by end-2023. These views on rates and US growth combined with our expectations of a brighter outlook for the global economy in 2023 also argues for a sustained, broad-based US dollar downtrend developing in the second half of 2022 -- full detail of which is provided on page 12, in our discussion of Global FX.

**Risks to the outlook are likely to balance out between inflation and growth in time...**

In terms of the risks to the above views, Chair Powell was willing to clearly state the FOMC are not “actively considering” a 75bp hike and, with regards to inflation, are focused on reducing excess demand not seeking to offset the immediate effect of supply shocks points to limited upside risks to our view on interest rates.

Their desire to achieve a soft landing also implies that, if required, additional tightening would only be temporary – potentially seeing our two 2024 rate cuts brought forward and/or extended. In the next few months therefore, the pace and composition of job creation will again become as important as the structure and strength of inflation.

**... though inflation expectations will continue to require careful monitoring.**

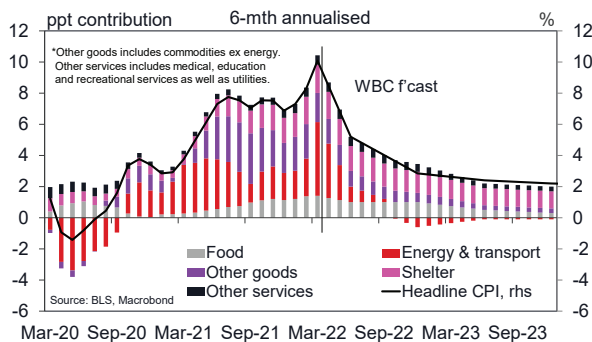
Before concluding, a final note of caution regarding sentiment and expectations. Throughout the normalisation process, the FOMC will be keen to keep longer-run expectations for inflation and wages well anchored and bring short-term expectations into line too. Any perceived challenge to achieving the inflation target in the medium-term is likely to first be met by tougher forward guidance, to tighten financial conditions, then (if necessary) through additional fed fund rate hikes. How expectations evolve will then be as important as the activity outcomes themselves.

**Elliot Clarke**, CFA, Senior Economist

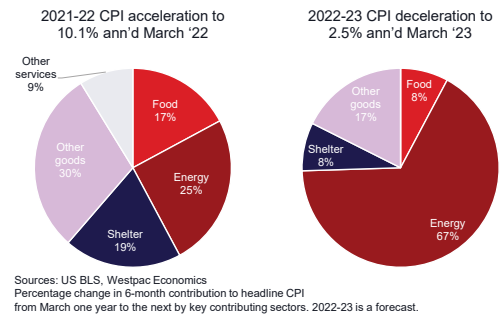


## ... if FOMC don't overplay their hand

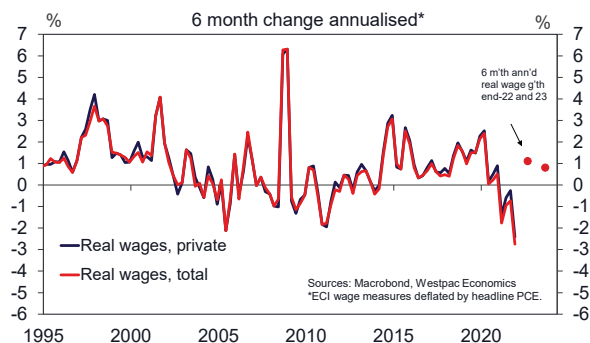
### US inflation to decelerate as supply improves



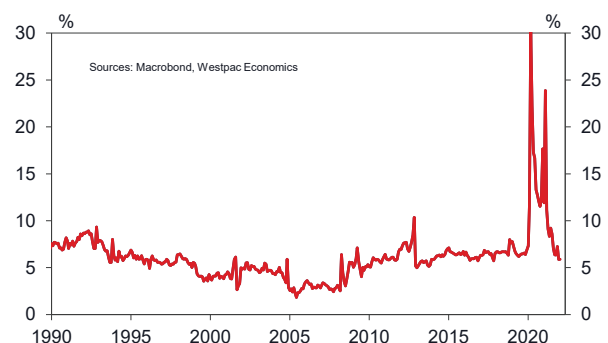
### Acceleration/ deceleration in US CPI 2021-2023



### US real wages to take until late-23 to recover



### Household savings rate near pre-pandemic lows



|                                 | 2021   |       |        |       |        |       |        |       | 2022   |       |         |      |
|---------------------------------|--------|-------|--------|-------|--------|-------|--------|-------|--------|-------|---------|------|
| Monthly data                    | May    | Jun   | Jul    | Aug   | Sep    | Oct   | Nov    | Dec   | Jan    | Feb   | Mar     | Apr  |
| PCE deflator %yr                | 4.0    | 4.0   | 4.2    | 4.2   | 4.4    | 5.1   | 5.6    | 5.8   | 6.0    | 6.3   | 6.6     | -    |
| Unemployment rate %             | 5.8    | 5.9   | 5.4    | 5.2   | 4.7    | 4.6   | 4.2    | 3.9   | 4.0    | 3.8   | 3.6     | -    |
| Non-farm payrolls chg '000      | 447    | 557   | 689    | 517   | 424    | 677   | 647    | 588   | 504    | 750   | 431     | -    |
| House prices* %yr               | 17.3   | 19.2  | 20.0   | 19.7  | 19.1   | 18.5  | 18.3   | 18.5  | 18.9   | 20.2  | -       | -    |
| Durables orders core 3mth %saar | 21.5   | 18.7  | 7.8    | 7.4   | 9.0    | 11.3  | 10.1   | 5.9   | 7.7    | 5.9   | 9.4     | -    |
| ISM manufacturing composite     | 61.6   | 60.9  | 59.9   | 59.7  | 60.5   | 60.8  | 60.6   | 58.8  | 57.6   | 58.6  | 57.1    | 55.4 |
| ISM non-manufacturing composite | 63.2   | 60.7  | 64.1   | 62.2  | 62.6   | 66.7  | 68.4   | 62.3  | 59.9   | 56.5  | 58.3    | 57.1 |
| Personal spending 3mth %saar    | 27.6   | 9.2   | 5.1    | 9.7   | 7.5    | 13.1  | 10.4   | 3.9   | 6.7    | 7.2   | 16.2    | -    |
| UoM Consumer Sentiment          | 82.9   | 85.5  | 81.2   | 70.3  | 72.8   | 71.7  | 67.4   | 70.6  | 67.2   | 62.8  | 59.4    | 65.2 |
| Trade balance USDbn             | -67.3  | -72.2 | -69.7  | -72.5 | -81.2  | -66.9 | -80.1  | -82.0 | -89.2  | -89.8 | -109.8  | -    |
| Quarterly data                  | Mar-21 |       | Jun-21 |       | Sep-21 |       | Dec-21 |       | Mar-22 |       | Jun-22f |      |
| Real GDP % saar                 | 6.3    |       | 6.7    |       | 2.3    |       | 6.9    |       | -1.4   |       | 3.2     |      |
| Current account USDbn           | -187.5 |       | -196.4 |       | -219.9 |       | -217.9 |       | -      |       | -       |      |

Sources: Government agencies, Bloomberg, \*S&P Case-Shiller 20-city measure.

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## Unparalleled resilience ...

### Q1 GDP comfortably beat market expectations ...

Q1 GDP was in line with our expectations at 1.3%qtr/4.8%yr but materially ahead of the market's forecast. While available partial data makes clear that authorities' COVID-zero policies are significantly impacting consumption and production, their impact was more than offset by historic strength in trade and resurgent business and local government investment in Q1.

We continue to have faith in the enduring benefits of the structural reforms introduced in recent years; however, in Q2 and Q3, it will be the traditional growth drivers of investment and trade in goods attempting to offset the ill effects of President Xi's tough stance against the virus.

### ... and is expected to show resilience in Q2 amid significant headwinds.

In Q2, COVID-19 restrictions are likely to knock momentum sharply lower given the proliferation of orders across Beijing and to a number of smaller cities as Shanghai remains in lockdown. Though manufacturing production is continuing in the affected regions, it is unlikely to be anywhere near capacity, with production logistics under considerable duress.

### Consumption will take time to gain momentum ...

As attested to by the services PMI falling 7pts in April, concern over the virus has not only affected consumption in the regions where restrictions are active, but elsewhere. On the information to hand, this weakness looks to have persisted into early May -- unfortunate timing given the Labour Day holidays could have acted as a catalyst for catch-up spending had the economy been clear of COVID-19.

Nonetheless, as was the case in Q1, we believe growth can remain positive in the June quarter (circa 2.0% annualised) before accelerating rapidly in the second half (to around 8.0% annualised), assuming restrictions against the virus are progressively removed.

### ... but in the interim, trade then investment will ...

Of the traditional supports for growth, trade is likely to be most significant in Q2, with the curbs on production having reduced the need for imports as global demand for output remained strong. Quantifying this strength's scale, March's trade balance was 50% higher than a year ago.

### ... offer strong support.

During Q2, support from local government infrastructure investment and businesses' capital expenditure will also build. As we have continued to emphasise year-to-date, credit growth remains favourable, up almost 17% at March versus the same period in 2021. Further, authorities' qualitative guidance to the banks and markets has increasingly been pro-investment, signalling an additional easing of lending standards across the economy. We expect the continued acceleration in investment activity to offset the inevitable drop-off in trade's support of growth as production-related import demand returns to normal. A hit to exports from global growth is a risk.

### Into the medium-term, pent-up demand; sentiment; income and increased capacity ...

The component of demand that is set to drive growth ahead in the second half of 2022 however is consumption. With the majority of affected workers kept in employment and income through production bubble arrangements, and having had their consumption plans curbed for over two years, once clear of the virus, household consumption will surely surge. This upturn in activity should receive additional, lasting support from the structural reforms around housing and education, introduced to bolster discretionary income and capacity expansion. Note, it also seems highly unlikely that authorities will be in a rush to encourage a return of holidays abroad or to reduce their promotion of Chinese brands versus foreign competitors, aiding domestic demand.

### ... are all set to support household spending.

So, while the mood of the market remains decidedly against China, we still have conviction that authorities can achieve growth near 5.5% in 2022. Moreover, this is a pace of growth we believe can be maintained for a number of years yet, seeing China's economy power ahead globally.

Elliot Clarke, CFA, Senior Economist

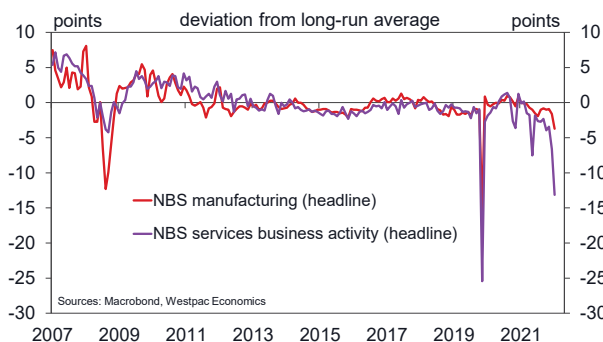
| Monthly data %yr             | 2021 |      |      |      |      |      |      |      | 2022 |      |      |      |
|------------------------------|------|------|------|------|------|------|------|------|------|------|------|------|
|                              | May  | Jun  | Jul  | Aug  | Sep  | Oct  | Nov  | Dec  | Jan  | Feb  | Mar  | Apr  |
| Consumer prices – headline   | 1.3  | 1.1  | 1.0  | 0.8  | 0.7  | 1.5  | 2.3  | 1.5  | 0.9  | 0.9  | 1.5  | -    |
| Money supply M2              | 8.3  | 8.6  | 8.3  | 8.2  | 8.3  | 8.7  | 8.5  | 9    | 9.8  | 9.2  | 9.7  | -    |
| Manufacturing PMI (official) | 51.0 | 50.9 | 50.4 | 50.1 | 49.6 | 49.2 | 50.1 | 50.3 | 50.1 | 50.2 | 49.5 | 47.4 |
| Fixed asset investment %ytd  | 15.4 | 12.6 | 10.3 | 8.9  | 7.3  | 6.1  | 5.2  | 4.9  | 4.9  | 12.2 | 9.3  | -    |
| Industrial production (IVA)  | 8.8  | 8.3  | 6.4  | 5.3  | 3.1  | 3.5  | 3.8  | 4.3  | 4.3  | 7.5  | 5.0  | -    |
| Exports                      | 27.7 | 32.0 | 19.2 | 25.4 | 27.9 | 26.8 | 21.7 | 20.9 | 24.2 | 6.3  | 14.7 | -    |
| Imports                      | 52.2 | 37.3 | 28.2 | 32.5 | 16.7 | 20.1 | 31.3 | 19.6 | 19.9 | 10.5 | -0.1 | -    |
| Trade balance USDbn          | 43.3 | 50.1 | 55.9 | 59.1 | 68.0 | 84.8 | 71.8 | 94.3 | 85.1 | 30.5 | 47.4 | -    |

| Quarterly data  | Q4:20 | Q1:21 | Q2:21 | Q3:21 | Q4:21 | Q1:22 |
|-----------------|-------|-------|-------|-------|-------|-------|
| Real GDP %yr    | 6.4   | 18.3  | 7.9   | 4.9   | 4.0   | 4.8   |
| Nominal GDP %yr | 7.0   | 21.2  | 13.6  | 9.8   | 9.4   | 8.9   |

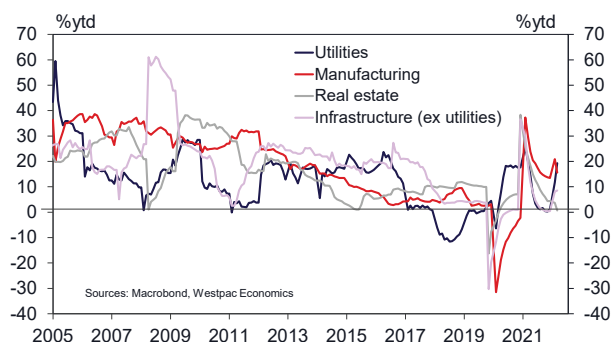
Sources: Government agencies, Bloomberg, Macrobond, Westpac Economics. Some data omitted from certain series due to Lunar New Year distortions. \*4qma

## ... and exceptional opportunity

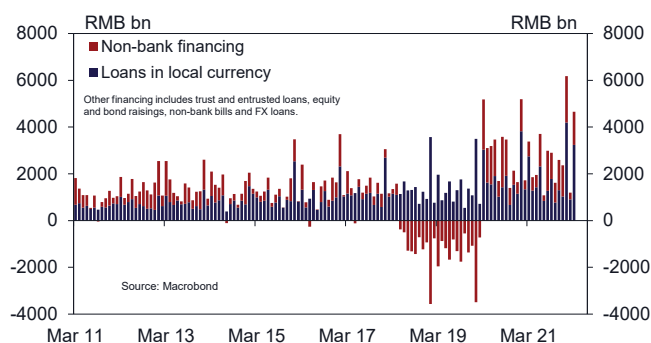
### Omicron a big negative for services



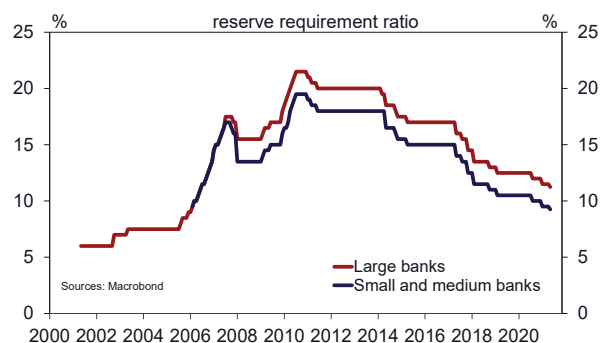
### But investment showing promise



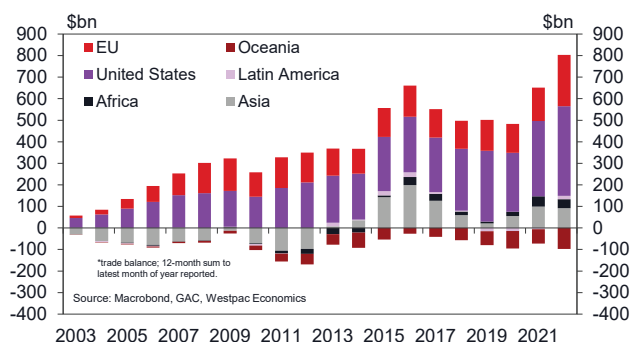
### Total financing +17% in '22 versus '21



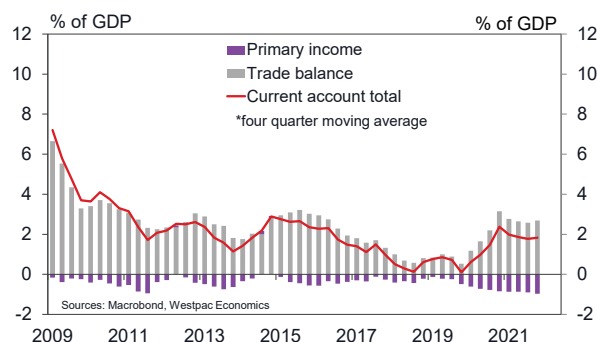
### PBOC can and will act as necessary



### Promise abounds for China's exporters



### Reduced service import demand lasting +ve



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## The balance of risks are tight...

### Russia's invasion of Ukraine stunted growth in Q1.

The first estimate of Q1 Euro Area GDP points to a stalling of economic activity in what was expected to be a year of above-trend growth and recovery. Overall, the bloc grew by 0.2% in the three months to March. Underlying this result, Germany and Spain narrowly avoided a contraction in the quarter with output rising 0.2% and 0.3% respectively. Meanwhile, France reported no improvement in activity and Italy contracted by 0.2%. The annual growth rate for the region (5.0%yr) benefits from the strong pandemic recovery to mid-2021 and thus does not accurately reflect the current risks facing the Euro Area economy. In stark contrast, the annualised pace of growth for 2022 currently sits at a mere 0.8%.

### Ongoing tensions are likely to weigh on activity through most of this year ...

This outcome clearly stems from Russia's invasion of Ukraine which resulted in the price of energy and other commodities surging to historic highs and sentiment being hit hard. Progress towards a peaceful resolution has effectively stalled as the EU and Russia attempt to gain an upper hand in negotiations through strategic military and economic operations.

### ... with supply-side issues dampening business confidence ...

The EU is close to finalising a sixth package of sanctions around Russian oil, in addition to implementing a ban on Russian coal which takes effect by August. Although Russia has since banned natural gas exports to Bulgaria and Poland, negotiations surrounding action on Russian gas imports are ongoing. Given its relative importance to European powerhouses such as Germany, an immediate and outright European ban on Russian gas is unlikely to occur in the near-term, though Russia may take the decision out of their hands. To minimise adverse economic impacts in time, the EU can transition away from Russian energy utilising renewable and non-Russian alternatives.

### ... and inflationary pressures threatening real incomes and consumer demand.

European businesses are rightly circumspect on the economic outlook. Ongoing supply-side disruptions have substantially weakened business investment and confidence, especially among manufacturers. Indeed, both the ZEW and Sentix sentiment surveys are on par with the dramatic lows seen during the worst of the pandemic, and weaker confidence already looks to be affecting activity. Notably, the ECB's Bank Lending Survey recently signalled a tightening of lending standards to businesses for the purpose of investment in new capacity. The banks being reluctant to lend for new investment by the private sector is an additional risk the Continent can ill afford.

### We now expect year-average growth to be 2.2% and 1.5% in 2022 and 2023.

The broadening of price pressures is also putting immense stress on households. Despite the tax relief designed to temper the lift in fuel prices and headline inflation, the latter still rose to a record 7.5%yr in April. The core measure of inflation meanwhile rose to 3.5%yr from 2.9%yr in March, well above the ECB's medium-term target of 2.0%yr. Although the labour market remains tight by historical standards, the ongoing risks to business confidence is a point of uncertainty for employment and wage growth alike. The key concern stemming from this development is persistent weakness, if not outright declines, in real incomes and a hit to consumer demand.

### The ECB's normalisation of policy is highly conditional on how these risks evolve.

In light of these factors, we have downgraded our growth forecasts for the Euro Area. With supply-related disruptions and inflationary pressures expected to weigh more heavily on business investment and consumer confidence in the near-term, we now anticipate year-average growth to print 2.2% in 2022 and 1.5% in 2023. Importantly, underlying these annual outcomes is essentially no growth in the economy for the remainder of this year before an above-trend recovery in 2023, assuming the current storm clouds pass.

### The Bank of England expect weaker growth and higher inflation for longer ...

The ECB are in a tight bind as they seek to balance the risks related to growth and inflation. Unsurprisingly, at the April policy meeting, President Lagarde placed emphasis on flexibility and optionality, providing no further clarification on the expected end of the Asset Purchase Programme (APP) in Q3. Assuming the economic recovery is not derailed by Russian aggression, supply issues should subside over the course of 2022. As business investment and consumption stabilise and the outlook strengthens into 2023, the ECB could begin to hike rates slowly from Q1.

### ... highlighting the incredible policy challenge that lies ahead.

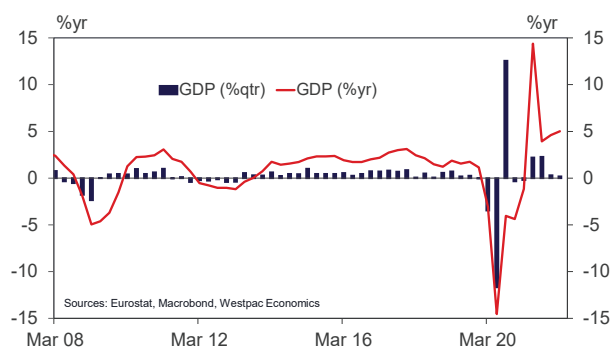
On the other hand, the Bank of England delivered a 25bp rate hike to 1.0% at their May meeting and surprised with warnings of a sharp slowdown in economic growth and a materially upgraded inflation outlook. The Bank now forecast annual growth to be flat in Q2 2023 and a mere 0.2% in Q2 2024, while headline inflation is expected to print at 9.1% in Q2 and peak above 10% in Q4 2022 before falling to 6.6% in Q2 2023 and 2.1% in Q2 2024.

This portrait of stagflation signals an incredible challenge for the Bank to anchor longer-term inflation expectations without causing a deep recession. We now expect the Bank to raise policy rates to reach 1.75% by year-end. Given the expected persistence of supply-driven inflation, tightening beyond this point would produce a great risk of enduring weakness in domestic demand, threatening a more severe and sustained output gap into the medium-term.

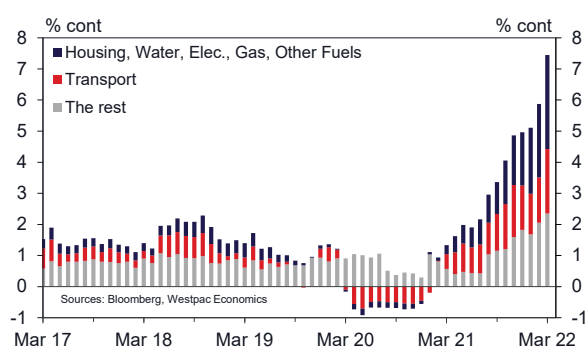
**Ryan Wells**, Economist

## ... between inflation and growth

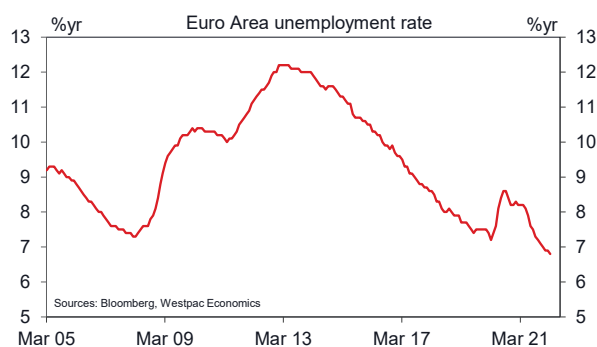
### Slow start to 2022 for the Euro Area



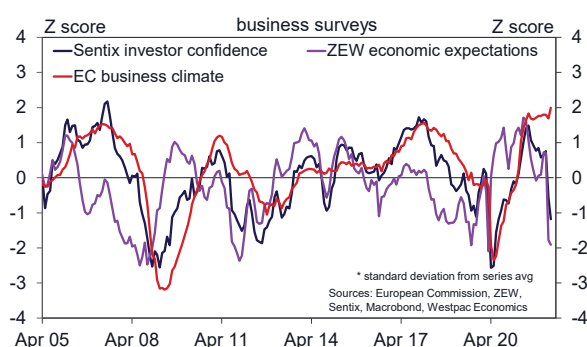
### CPI: energy prices account for half the jump



### Policy has kept labour market in good shape



### Sentiment more broadly also requires support



|                                 | 2021      |           |           |          |         |         |         |      | 2022 |      |       |       |
|---------------------------------|-----------|-----------|-----------|----------|---------|---------|---------|------|------|------|-------|-------|
| Europe                          | May       | Jun       | Jul       | Aug      | Sep     | Oct     | Nov     | Dec  | Jan  | Feb  | Mar   | Apr   |
| Eur consumer prices %yr         | 2.0       | 1.9       | 2.2       | 3.0      | 3.4     | 4.1     | 4.9     | 5.0  | 5.1  | 5.9  | 7.5   | 7.5   |
| Eur unemployment rate %         | 8.1       | 7.9       | 7.6       | 7.5      | 7.3     | 7.2     | 7.1     | 7.0  | 6.9  | 6.9  | 6.8   | -     |
| Eur industrial production %yr   | 21.4      | 11.0      | 8.4       | 5.5      | 4.1     | 0.1     | -1.3    | 1.8  | -1.5 | 2.0  | -     | -     |
| Eur retail sales volumes %yr    | 8.5       | 5.6       | 3.3       | 1.3      | 2.7     | 1.6     | 8.4     | 2.3  | 8.4  | 5.0  | -     | -     |
| Eur consumer confidence         | -5.2      | -1.8      | -3.7      | -5.2     | -3.8    | -5.4    | -8.2    | -9.3 | -9.7 | -9.5 | -21.6 | -22.0 |
| Eur current account balance €bn | 25.5      | 31.3      | 33.0      | 16.9     | 23.3    | 5.1     | 7.2     | 10.0 | 21.6 | 20.8 | -     | -     |
| United Kingdom                  |           |           |           |          |         |         |         |      |      |      |       |       |
| UK consumer price index %yr     | 2.1       | 2.5       | 2.0       | 3.2      | 3.1     | 4.2     | 5.1     | 5.4  | 5.5  | 6.2  | 7.0   | -     |
| UK unemployment rate % (ILO)    | 4.8       | 4.7       | 4.6       | 4.5      | 4.3     | 4.2     | 4.1     | 4.1  | 3.9  | 3.8  | -     | -     |
| UK industrial production %yr    | 23.7      | 9.8       | 4.8       | 3.3      | 1.9     | 0.3     | 0.2     | 1.0  | 3.0  | 1.6  | -     | -     |
| UK retail sales volumes %yr     | 23.4      | 8.7       | 1.9       | 0.5      | -0.7    | -1.3    | 3.5     | -1.6 | 9.6  | 7.2  | 0.9   | -     |
| UK consumer confidence          | -9        | -9        | -7        | -8       | -13     | -17     | -14     | -15  | -19  | -26  | -31   | -38   |
| Quarterly data                  |           |           |           |          |         |         |         |      |      |      |       |       |
|                                 | Q3:20     | Q4:20     | Q1:21     | Q2:21    | Q3:21   | Q4:21   | Q1:22   |      |      |      |       |       |
| Eur GDP %qtr/%yr                | 12.6/-4.0 | -0.3/-4.3 | -0.1/-0.9 | 2.2/14.6 | 2.2/4.1 | 0.3/4.7 | 0.2/5.0 |      |      |      |       |       |
| UK GDP %qtr/%yr                 | 17.6/-7.7 | 1.5/-6.3  | -1.2/-5.0 | 5.6/24.5 | 0.9/6.9 | 1.3/6.6 | -       |      |      |      |       |       |
| UK current account balance £bn  | -7.9      | -26.8     | -12.4     | -11.3    | -28.9   | -7.3    | -       |      |      |      |       |       |

Source: Official agencies.

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## Australia

### Interest rate forecasts

|                            | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|----------------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| Cash                       | 0.35           | 0.75   | 1.25   | 1.75   | 2.00   | 2.25   | 2.25   | 2.25   |
| 90 Day BBSW                | 0.92           | 0.95   | 1.45   | 1.95   | 2.20   | 2.45   | 2.45   | 2.45   |
| 3 Year Swap                | 3.36           | 3.25   | 3.15   | 3.10   | 3.00   | 2.90   | 2.80   | 2.75   |
| 3 Year Bond                | 3.04           | 3.05   | 2.95   | 2.90   | 2.80   | 2.70   | 2.60   | 2.55   |
| 10 Year Bond               | 3.51           | 3.30   | 3.15   | 2.90   | 2.65   | 2.50   | 2.40   | 2.30   |
| 10 Year Spread to US (bps) | 44             | 40     | 35     | 30     | 25     | 20     | 20     | 20     |

Sources: Bloomberg, Westpac Economics.

### Currency forecasts

|               | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|---------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| <b>AUD vs</b> |                |        |        |        |        |        |        |        |
| USD           | 0.7125         | 0.74   | 0.75   | 0.76   | 0.77   | 0.78   | 0.79   | 0.80   |
| JPY           | 92.94          | 95.5   | 96.0   | 95.8   | 96.3   | 96.7   | 96.4   | 96.8   |
| EUR           | 0.6759         | 0.69   | 0.69   | 0.70   | 0.69   | 0.69   | 0.69   | 0.70   |
| NZD           | 1.1072         | 1.10   | 1.10   | 1.10   | 1.10   | 1.10   | 1.10   | 1.11   |
| CAD           | 0.9140         | 0.94   | 0.95   | 0.95   | 0.95   | 0.97   | 0.99   | 1.00   |
|               |                |        |        |        |        |        |        |        |
| GBP           | 0.5759         | 0.59   | 0.60   | 0.60   | 0.60   | 0.60   | 0.60   | 0.60   |
| CHF           | 0.7023         | 0.72   | 0.72   | 0.73   | 0.74   | 0.74   | 0.75   | 0.76   |
| DKK           | 5.0292         | 5.15   | 5.17   | 5.19   | 5.16   | 5.14   | 5.16   | 5.18   |
| SEK           | 7.0896         | 7.25   | 7.28   | 7.31   | 7.27   | 7.24   | 7.27   | 7.29   |
| NOK           | 6.7504         | 6.91   | 6.94   | 6.97   | 6.94   | 6.90   | 6.93   | 6.96   |
| ZAR           | 11.39          | 11.6   | 11.7   | 11.8   | 11.9   | 11.9   | 12.0   | 12.1   |
|               |                |        |        |        |        |        |        |        |
| SGD           | 0.9869         | 1.02   | 1.03   | 1.03   | 1.03   | 1.04   | 1.05   | 1.06   |
| HKD           | 5.5931         | 5.74   | 5.81   | 5.89   | 5.97   | 6.05   | 6.12   | 6.20   |
| PHP           | 37.89          | 38.1   | 37.9   | 37.6   | 37.3   | 36.7   | 37.1   | 37.5   |
| THB           | 24.45          | 24.4   | 24.4   | 24.3   | 24.3   | 23.8   | 24.1   | 24.4   |
| MYR           | 3.1095         | 3.07   | 3.09   | 3.11   | 3.13   | 3.14   | 3.18   | 3.22   |
| CNY           | 4.7313         | 4.85   | 4.84   | 4.83   | 4.81   | 4.84   | 4.86   | 4.92   |
| IDR           | 10335          | 10545  | 10613  | 10716  | 10819  | 10920  | 11053  | 11185  |
| TWD           | 21.00          | 20.6   | 20.6   | 20.8   | 21.1   | 21.3   | 21.5   | 21.8   |
| KRW           | 907            | 888    | 885    | 882    | 878    | 874    | 884    | 895    |
| INR           | 55.03          | 55.9   | 55.9   | 55.9   | 56.2   | 56.6   | 56.9   | 57.6   |

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## Australia

### Activity forecasts\*

|                               | 2021       |             |            | 2022       |            |            |            | Calendar years |            |            |            |
|-------------------------------|------------|-------------|------------|------------|------------|------------|------------|----------------|------------|------------|------------|
| %qtr / yr avg                 | Q2         | Q3          | Q4         | Q1f        | Q2f        | Q3f        | Q4f        | 2020           | 2021       | 2022f      | 2023f      |
| Private consumption           | 1.1        | -4.8        | 6.3        | 0.3        | 2.8        | 1.8        | 1.2        | -5.8           | 4.8        | 6.1        | 4.6        |
| Dwelling investment           | 0.5        | 0.4         | -2.2       | 0.6        | 4.4        | 2.9        | 1.3        | -5.7           | 9.2        | 4.4        | 2.9        |
| Business investment*          | 2.7        | -1.4        | -0.3       | 1.2        | 2.5        | 2.3        | 1.7        | -4.5           | 5.2        | 4.5        | 6.3        |
| Private demand *              | 1.5        | -3.7        | 4.2        | 0.5        | 2.7        | 1.8        | 1.2        | -5.3           | 5.8        | 5.5        | 4.4        |
| Public demand *               | 1.9        | 3.5         | -0.4       | 1.1        | 0.9        | 0.8        | 0.8        | 6.0            | 6.0        | 4.4        | 3.2        |
| Domestic demand               | 1.6        | -1.7        | 2.9        | 0.6        | 2.2        | 1.6        | 1.1        | -2.5           | 5.9        | 5.2        | 4.6        |
| Stock contribution            | -0.1       | -1.2        | 0.9        | 0.0        | 0.0        | 0.0        | 0.0        | 0.0            | 0.5        | 0.1        | 0.0        |
| GNE                           | 1.5        | -2.9        | 3.8        | 0.7        | 2.2        | 1.6        | 1.0        | -2.5           | 6.5        | 5.2        | 4.1        |
| Exports                       | -3.1       | 1.5         | -1.5       | -0.5       | 3.2        | 2.0        | 1.5        | -9.8           | -1.6       | 2.1        | 7.8        |
| Imports                       | 1.2        | -2.8        | -0.9       | 5.2        | 3.8        | 2.8        | 2.4        | -13.0          | 5.8        | 8.5        | 10.8       |
| Net exports contribution      | -0.9       | 0.9         | -0.2       | -1.1       | -0.1       | -0.1       | -0.2       | 0.4            | -1.5       | -1.2       | -0.5       |
| <b>Real GDP %qtr / yr avg</b> | <b>0.8</b> | <b>-1.9</b> | <b>3.4</b> | <b>0.2</b> | <b>1.9</b> | <b>1.4</b> | <b>0.9</b> | <b>-2.2</b>    | <b>4.7</b> | <b>4.4</b> | <b>3.4</b> |
| <b>%yr end</b>                | <b>9.6</b> | <b>4.0</b>  | <b>4.2</b> | <b>2.5</b> | <b>3.7</b> | <b>7.1</b> | <b>4.5</b> | <b>-0.8</b>    | <b>4.2</b> | <b>4.5</b> | <b>2.5</b> |
| Nominal GDP %qtr              | 3.2        | -0.6        | 3.4        | 2.3        | 3.2        | 1.6        | 0.5        |                |            |            |            |
| %yr end                       | 16.7       | 11.1        | 10.2       | 8.6        | 8.5        | 10.8       | 7.7        | 0.8            | 10.2       | 7.7        | 1.9        |

### Other macroeconomic variables

|                               | 2021 |      |      | 2022 |      |      |      | Calendar years |      |       |       |
|-------------------------------|------|------|------|------|------|------|------|----------------|------|-------|-------|
| % change                      | Q2   | Q3   | Q4   | Q1f  | Q2f  | Q3f  | Q4f  | 2020           | 2021 | 2022f | 2023f |
| Employment (2)                | 1.1  | -0.7 | 0.6  | 2.0  | 0.8  | 0.7  | 0.5  | -              | -    | -     | -     |
| %yr                           | 6.5  | 3.6  | 2.2  | 2.9  | 2.6  | 4.0  | 3.9  | -1.0           | 2.2  | 3.9   | 1.7   |
| Unemployment rate % (2)       | 5.1  | 4.6  | 4.7  | 4.1  | 3.7  | 3.3  | 3.2  | 6.8            | 4.7  | 3.2   | 3.4   |
| Wages (WPI) (2)               | 0.4  | 0.6  | 0.7  | 0.8  | 0.8  | 0.8  | 1.0  | -              | -    | -     | -     |
| %yr                           | 1.7  | 2.2  | 2.3  | 2.5  | 2.9  | 3.1  | 3.4  | 1.4            | 2.3  | 3.4   | 4.0   |
| CPI Headline (2)              | 0.8  | 0.8  | 1.3  | 2.1  | 0.9  | 1.0  | 1.5  | -              | -    | -     | -     |
| %yr                           | 3.8  | 3.0  | 3.5  | 5.1  | 5.2  | 5.4  | 5.6  | 0.9            | 3.5  | 5.6   | 2.6   |
| Core inflation trimmed mean   | 0.5  | 0.7  | 1.0  | 1.4  | 1.0  | 1.0  | 1.0  | -              | -    | -     | -     |
| %yr (2)                       | 1.6  | 2.1  | 2.6  | 3.7  | 4.2  | 4.5  | 4.4  | 1.2            | 2.6  | 4.4   | 3.0   |
| Current account AUDbn         | 22.4 | 22.0 | 12.7 | 12.0 | 16.0 | 12.0 | 4.0  | 51.0           | 76.8 | 44.0  | -45.0 |
| % of GDP                      | 4.1  | 4.1  | 2.3  | 2.1  | 2.7  | 2.0  | 0.7  | 2.6            | 3.5  | 1.9   | -1.8  |
| Terms of trade annual chg (1) | 24.0 | 22.3 | 10.2 | 7.8  | 2.5  | -0.4 | -0.1 | -0.3           | 17.7 | 2.4   | -13.0 |

Calendar year changes are (1) period average for GDP, terms of trade, unless otherwise stated (2) through the year for inflation, wages and employment. Unemployment is year end.

\* GDP & component forecasts are reviewed following the release of quarterly national accounts.

\*\* Business investment and government spending adjusted to exclude the effect of private sector purchases of public sector assets.

### Macroeconomic variables – recent history

|                               | 2021  |       |       |       |       |       | 2022  |       |       |       |      |  |
|-------------------------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|------|--|
| Monthly data                  | Jun   | Jul   | Aug   | Sep   | Oct   | Nov   | Dec   | Jan   | Feb   | Mar   | Apr  |  |
| Employment '000 chg           | 29    | -1    | -150  | -146  | -50   | 373   | 71    | 28    | 77    | 18    | -    |  |
| Unemployment rate %           | 4.9   | 4.6   | 4.5   | 4.6   | 5.2   | 4.6   | 4.2   | 4.2   | 4.0   | 4.0   | -    |  |
| Westpac-MI Consumer Sentiment | 107.2 | 108.8 | 104.1 | 106.2 | 104.6 | 105.3 | 104.3 | 102.2 | 100.8 | 96.6  | 95.8 |  |
| Retail trade %mth             | -1.4  | -2.6  | -1.7  | 1.7   | 4.6   | 7.1   | -4.1  | 1.6   | 1.8   | 1.6   | -    |  |
| Dwelling approvals %mth       | -5.0  | -7.5  | 6.9   | -2.8  | -13.8 | 1.4   | 9.3   | -26.6 | 42.0  | -18.5 | -    |  |
| Credit, private sector %yr    | 3.1   | 4.0   | 4.7   | 5.3   | 5.7   | 6.6   | 7.2   | 7.6   | 7.9   | 7.8   | -    |  |
| Trade balance AUDbn           | 11.4  | 12.8  | 12.2  | 10.7  | 10.5  | 9.3   | 8.2   | 12.4  | 7.4   | 9.3   | -    |  |

Past performance is not a reliable indicator of future performance. The forecasts given above are predictive in character. Whilst every effort has been taken to ensure that the assumptions on which the forecasts are based are reasonable, the forecasts may be affected by incorrect assumptions or by known or unknown risks and uncertainties. The results ultimately achieved may differ substantially from these forecasts.

## New Zealand

### Interest rate forecasts

|                        | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|------------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| Cash                   | 1.50           | 2.00   | 2.50   | 3.00   | 3.00   | 3.00   | 3.00   | 3.00   |
| 90 Day Bill            | 2.12           | 2.40   | 2.90   | 3.10   | 3.10   | 3.10   | 3.10   | 3.10   |
| 2 Year Swap            | 3.94           | 4.00   | 3.90   | 3.80   | 3.70   | 3.50   | 3.30   | 3.10   |
| 10 Year Bond           | 3.82           | 3.80   | 3.70   | 3.50   | 3.30   | 3.20   | 3.10   | 3.00   |
| 10 Year Spread to US   | 75             | 90     | 90     | 90     | 90     | 90     | 90     | 90     |
| 10 Year Spread to Aust | 31             | 50     | 55     | 60     | 65     | 70     | 70     | 70     |

Sources: Bloomberg, Westpac Economics.

### Currency forecasts

|               | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|---------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| <b>NZD vs</b> |                |        |        |        |        |        |        |        |
| USD           | 0.6436         | 0.67   | 0.68   | 0.69   | 0.70   | 0.71   | 0.72   | 0.72   |
| JPY           | 83.94          | 86.4   | 87.0   | 86.9   | 87.5   | 88.0   | 87.8   | 87.1   |
| EUR           | 0.6106         | 0.63   | 0.63   | 0.63   | 0.63   | 0.63   | 0.63   | 0.63   |
| AUD           | 0.9031         | 0.91   | 0.91   | 0.91   | 0.91   | 0.91   | 0.91   | 0.90   |
| CAD           | 0.8255         | 0.85   | 0.86   | 0.86   | 0.87   | 0.88   | 0.90   | 0.90   |
| GBP           | 0.5201         | 0.54   | 0.54   | 0.54   | 0.55   | 0.55   | 0.55   | 0.54   |
| CNY           | 4.2836         | 4.39   | 4.39   | 4.38   | 4.38   | 4.40   | 4.43   | 4.43   |

^ Approximate market forward price for NZD/USD, not a forecast. Sources: Bloomberg, Westpac Economics.

### Activity forecasts\*

|   | 2021       |            |            | 2022       |            |            |            | Calendar years |            |            |            |
|---|------------|------------|------------|------------|------------|------------|------------|----------------|------------|------------|------------|
| % change                                    | Q2         | Q3         | Q4         | Q1f        | Q2f        | Q3f        | Q4f        | 2020           | 2021       | 2022f      | 2023f      |
| Private consumption                         | 7.4        | 6.5        | 6.2        | 3.7        | -0.5       | 2.2        | 2.9        | -1.1           | 6.2        | 2.9        | 2.1        |
| Government consumption                      | 8.3        | 9.1        | 10.2       | 9.5        | 7.8        | 5.8        | 2.1        | 6.8            | 10.2       | 2.1        | 0.6        |
| Residential investment                      | 16.5       | 13.5       | 10.8       | 7.6        | 1.0        | 5.7        | 8.7        | -3.2           | 10.8       | 8.7        | 5.8        |
| Business investment                         | 2.4        | 3.3        | 9.1        | 8.4        | 4.2        | 7.4        | 3.4        | -8.7           | 9.1        | 3.4        | 5.8        |
| Stocks (ppt contribution)                   | 0.4        | 1.4        | 1.6        | 0.7        | 0.4        | -0.9       | -0.9       | -0.8           | 1.6        | -0.9       | 0.2        |
| GNE   | 7.9        | 8.5        | 9.4        | 6.6        | 2.4        | 3.0        | 2.3        | -1.8           | 9.4        | 2.3        | 2.8        |
| Exports                                     | -11.0      | -7.2       | -3.0       | 5.1        | 0.6        | 0.6        | 2.2        | -12.7          | -3.0       | 2.2        | 12.4       |
| Imports                                     | -4.7       | 6.7        | 15.7       | 18.8       | 14.1       | 9.1        | 5.0        | -16.1          | 15.7       | 5.0        | 3.7        |
| <b>GDP (production)</b>                     | <b>5.2</b> | <b>4.8</b> | <b>5.6</b> | <b>5.3</b> | <b>1.3</b> | <b>2.9</b> | <b>3.4</b> | <b>-2.1</b>    | <b>5.6</b> | <b>3.4</b> | <b>4.8</b> |
| Employment annual %                         | 1.5        | 4.1        | 3.5        | 2.8        | 2.2        | 0.7        | 0.9        | 0.6            | 3.5        | 0.9        | 0.9        |
| Unemployment rate % s.a.                    | 4.0        | 3.3        | 3.2        | 3.2        | 3.1        | 3.0        | 3.0        | 4.9            | 3.2        | 3.0        | 3.3        |
| Labour cost index, all sect incl o/t, ann % | 2.1        | 2.4        | 2.6        | 3.0        | 3.4        | 3.6        | 4.0        | 1.6            | 2.6        | 4.0        | 4.1        |
| <b>CPI annual %</b>                         | <b>3.3</b> | <b>4.9</b> | <b>5.9</b> | <b>6.9</b> | <b>6.4</b> | <b>5.2</b> | <b>4.3</b> | <b>1.4</b>     | <b>5.9</b> | <b>4.3</b> | <b>2.7</b> |
| Current account balance % of GDP            | -3.3       | -4.4       | -5.6       | -5.8       | -6.5       | -6.5       | -6.1       | -0.8           | -5.6       | -6.1       | -5.5       |
| Terms of trade annual %                     | -0.1       | 5.2        | 2.6        | 6.5        | 4.3        | 2.7        | 1.0        | -1.6           | 2.6        | 1.0        | -1.0       |

Sources: Statistics NZ, Westpac Economics.

Past performance is not a reliable indicator of future performance. The forecasts given above are predictive in character. Whilst every effort has been taken to ensure that the assumptions on which the forecasts are based are reasonable, the forecasts may be affected by incorrect assumptions or by known or unknown risks and uncertainties. The results ultimately achieved may differ substantially from these forecasts.

## Commodity prices

| End of period                        | Latest (6 May)*** | Jun-22     | Sep-22     | Dec-22     | Mar-23     | Jun-23     | Sep-23     | Dec-23     | Mar-24     | Jun-24     | Sep-24     |
|--------------------------------------|-------------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|
| Australian commodities index#        | 411               | 425        | 408        | 371        | 339        | 320        | <b>304</b> | <b>290</b> | <b>268</b> | <b>255</b> | <b>242</b> |
| <b>Bulk commodities index#</b>       | <b>707</b>        | <b>715</b> | <b>662</b> | <b>562</b> | <b>503</b> | <b>469</b> | <b>442</b> | <b>415</b> | <b>369</b> | <b>346</b> | <b>323</b> |
| iron ore finesTSI @ 62% US\$/t       | 146               | 146        | 130        | 115        | 109        | 106        | 103        | 100        | 97         | 94         | 91         |
| Qld coking coal index (US\$/t)       | 482               | 475        | 425        | 375        | 325        | 300        | 275        | 250        | 225        | 200        | 175        |
| Newcastle spot thermal coal (US\$/t) | 337               | 330        | 275        | 250        | 200        | 175        | 157        | 149        | 110        | 100        | 90         |
| crude oil (US\$/bbl) Brent ICE       | 105               | 120        | 115        | 110        | 105        | 100        | 90         | 85         | 80         | 75         | 70         |
| LNG in Japan US\$mmbtu               | 13.98             | 15.8       | 19.5       | 18.4       | 16.5       | 15.5       | 14.8       | 13.3       | 12.5       | 11.8       | 11.1       |
| gold (US\$/oz)                       | 1,873             | 2,000      | 1,975      | 1,925      | 1,825      | 1,775      | 1,725      | 1,675      | 1,625      | 1,600      | 1,590      |
| <b>Base metals index#</b>            | <b>254</b>        | <b>268</b> | <b>263</b> | <b>252</b> | <b>241</b> | <b>231</b> | <b>222</b> | <b>212</b> | <b>204</b> | <b>192</b> | <b>182</b> |
| copper (US\$/t)                      | 9,480             | 10,000     | 10,000     | 9,750      | 9,500      | 9,250      | 9,000      | 8,750      | 8,500      | 8,250      | 7,838      |
| aluminium (US\$/t)                   | 2,925             | 3,200      | 3,200      | 3,200      | 3,100      | 3,000      | 2,800      | 2,700      | 2,600      | 2,300      | 2,147      |
| nickel (US\$/t)                      | 31,099            | 33,000     | 30,000     | 26,000     | 23,000     | 22,000     | 21,000     | 20,000     | 18,900     | 18,300     | 18,100     |
| zinc (US\$/t)                        | 4,005             | 4,200      | 4,000      | 3,750      | 3,500      | 3,250      | 3,150      | 3,000      | 2,806      | 2,639      | 2,472      |
| lead (US\$/t)                        | 2,251             | 2,300      | 2,250      | 2,200      | 2,100      | 2,000      | 1,900      | 1,779      | 1,658      | 1,555      | 1,451      |
| <b>Rural commodities index#</b>      | <b>193</b>        | <b>197</b> | <b>195</b> | <b>186</b> | <b>167</b> | <b>158</b> | <b>147</b> | <b>143</b> | <b>135</b> | <b>128</b> | <b>120</b> |
| <b>NZ commodities index ##</b>       | <b>406</b>        | <b>394</b> | <b>394</b> | <b>377</b> | <b>361</b> | <b>352</b> | <b>344</b> | <b>338</b> | <b>334</b> | <b>330</b> | <b>330</b> |
| dairy price index ^^                 | 395               | 372        | 377        | 348        | 324        | 315        | 309        | 305        | 301        | 299        | 299        |
| whole milk powder US\$/t             | 3,916             | 4,114      | 4,188      | 3,900      | 3,792      | 3,700      | 3,650      | 3,600      | 3,550      | 3,500      | 3,500      |
| skim milk powder US\$/t              | 4,130             | 4,339      | 4,267      | 3,500      | 3,347      | 3,200      | 3,150      | 3,100      | 3,050      | 3,000      | 3,000      |
| lamb leg UKp/lb                      | 706               | 703        | 696        | 685        | 670        | 652        | 631        | 613        | 598        | 589        | 589        |
| bull beef US\$/lb                    | 307               | 307        | 307        | 301        | 291        | 277        | 266        | 259        | 257        | 257        | 257        |
| log price index ##                   | 187               | 182        | 173        | 170        | 169        | 167        | 166        | 166        | 165        | 165        | 165        |
| strong wool US\$/kg                  | 167               | 161        | 161        | 161        | 161        | 161        | 161        | 161        | 161        | 161        | 161        |

| Annual averages                   | levels     |            |            |            | % change    |             |             |              |
|-----------------------------------|------------|------------|------------|------------|-------------|-------------|-------------|--------------|
|                                   | 2020       | 2021       | 2022f      | 2023f      | 2020        | 2021        | 2022f       | 2023f        |
| Australian commodities index#     | <b>214</b> | <b>306</b> | <b>403</b> | <b>320</b> | <b>-2.0</b> | <b>43.1</b> | <b>31.6</b> | <b>-20.7</b> |
| <b>Bulk commodities index#</b>    | <b>347</b> | <b>509</b> | <b>661</b> | <b>506</b> | <b>0.8</b>  | <b>46.7</b> | <b>29.9</b> | <b>-23.4</b> |
| iron ore fines @ 62% USD/t        | 108        | 159        | 136        | 106        | 16.6        | 46.6        | -14.3       | -22.5        |
| LNG in Japan \$mmbtu              | 7.8        | 10.3       | 16.9       | 15         | -28.0       | 31.0        | 64.3        | -8.5         |
| ave coking coal price (US\$/t)    | 108        | 143        | 400        | 303        | -30.9       | 33.2        | 179.5       | -24.3        |
| ave thermal price (US\$/t)        | 57         | 99         | 228        | 146        | -24.1       | 74.4        | 130.5       | -35.9        |
| iron ore fines contracts (US\$/t) | 138        | 239        | 192        | 173        | 11.7        | 72.8        | -19.7       | -9.7         |
| coal coking contracts (US\$/t)    | 126        | 205        | 445        | 321        | -31.5       | 62.5        | 116.9       | -27.9        |
| crude oil (US\$/bbl) Brent ICE    | 44         | 70         | 109        | 97         | -31.2       | 60.2        | 55.4        | -11.0        |
| gold (US\$/oz)                    | 1,779      | 1,801      | 1,944      | 1,771      | 27.3        | 1.2         | 7.9         | -8.9         |
| <b>Base metals index#</b>         | <b>151</b> | <b>213</b> | <b>263</b> | <b>227</b> | <b>-2.6</b> | <b>41.1</b> | <b>23.6</b> | <b>-13.7</b> |
| copper (US\$/t)                   | 6,191      | 9,297      | 9,978      | 9,208      | 2.8         | 50.2        | 7.3         | -7.7         |
| aluminium (US\$/t)                | 1,721      | 2,477      | 3,220      | 2,942      | -4.7        | 44.0        | 30.0        | -8.6         |
| nickel (US\$/t)                   | 13,837     | 18,452     | 29,826     | 22,000     | -0.6        | 33.4        | 61.6        | -26.2        |
| zinc (US\$/t)                     | 2,276      | 3,006      | 3,972      | 3,288      | -9.9        | 32.1        | 32.1        | -17.2        |
| lead (US\$/t)                     | 1,832      | 2,190      | 2,288      | 1,980      | -8.6        | 19.6        | 4.5         | -13.5        |
| <b>Rural commodities index#</b>   | <b>117</b> | <b>150</b> | <b>192</b> | <b>154</b> | <b>-7.8</b> | <b>28.0</b> | <b>27.6</b> | <b>-19.8</b> |
| <b>NZ commodities index ##</b>    | <b>297</b> | <b>359</b> | <b>391</b> | <b>349</b> | <b>-0.7</b> | <b>21.2</b> | <b>8.8</b>  | <b>-10.7</b> |
| dairy price index ##              | 257        | 322        | 370        | 313        | -2.8        | 25.2        | 14.9        | -15.5        |
| whole milk powder US\$/t          | 2,975      | 3,843      | 4,185      | 3,715      | -4.6        | 29.2        | 8.9         | -11.2        |
| skim milk powder US\$/t           | 2,717      | 3,332      | 4,191      | 3,240      | 5.8         | 22.6        | 25.8        | -22.7        |
| lamb leg UKp/lb                   | 506        | 599        | 698        | 648        | -1.4        | 18.4        | 16.5        | -7.2         |
| bull beef US\$/lb                 | 234        | 279        | 307        | 277        | -3.0        | 19.0        | 10.0        | -9.7         |
| log price index ##                | 156        | 179        | 174        | 167        | -5.2        | 14.8        | -2.7        | -4.2         |
| strong wool US\$/kg               | 144        | 173        | 165        | 161        | -30.2       | 20.4        | -4.5        | -2.7         |

# Chain weighted index: weights are Australian export shares. \* Australian export prices fob - ABS 5432.0 Merchandise Trade Exports. \*\* WCFI - Westpac commodities futures index. \*\*\* Weekly averages except for the Bulks Index. ^ AWEX market prices. Sources for all tables: Westpac Economics, Bloomberg ##ANZ NZ commodity price index ^^ GlobalDairyTrade

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## United States

### Interest rate forecasts

|              | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|--------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| Fed Funds*   | 0.875          | 1.375  | 2.125  | 2.625  | 2.625  | 2.625  | 2.625  | 2.625  |
| 10 Year Bond | 3.07           | 2.90   | 2.80   | 2.60   | 2.40   | 2.30   | 2.20   | 2.10   |

Sources: Bloomberg, Westpac Economics. \* +12.5bps from the Fed Funds lower bound (overnight reverse repo rate).

### Currency forecasts

|               | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|---------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| <b>USD vs</b> |                |        |        |        |        |        |        |        |
| DXI index     | 103.59         | 102.1  | 101.2  | 100.2  | 98.7   | 97.2   | 96.2   | 95.3   |
| JPY           | 130.43         | 129    | 128    | 126    | 125    | 124    | 122    | 121    |
| EUR           | 1.0542         | 1.07   | 1.08   | 1.09   | 1.11   | 1.13   | 1.14   | 1.15   |
| AUD           | 0.7125         | 0.74   | 0.75   | 0.76   | 0.77   | 0.78   | 0.79   | 0.80   |
| NZD           | 0.6436         | 0.67   | 0.68   | 0.69   | 0.70   | 0.71   | 0.72   | 0.72   |
| CAD           | 1.2825         | 1.27   | 1.26   | 1.25   | 1.24   | 1.24   | 1.25   | 1.25   |
| GBP           | 1.2373         | 1.25   | 1.26   | 1.27   | 1.28   | 1.30   | 1.32   | 1.34   |
| CHF           | 0.9857         | 0.97   | 0.97   | 0.96   | 0.95   | 0.95   | 0.95   | 0.95   |
| ZAR           | 15.98          | 15.7   | 15.6   | 15.5   | 15.4   | 15.3   | 15.2   | 15.1   |
| SGD           | 1.3850         | 1.38   | 1.37   | 1.35   | 1.34   | 1.33   | 1.33   | 1.32   |
| HKD           | 7.8493         | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   |
| PHP           | 52.40          | 51.5   | 50.5   | 49.5   | 48.5   | 47.0   | 47.0   | 46.9   |
| THB           | 34.31          | 33.0   | 32.5   | 32.0   | 31.5   | 30.5   | 30.5   | 30.5   |
| MYR           | 4.3630         | 4.15   | 4.12   | 4.09   | 4.06   | 4.03   | 4.03   | 4.02   |
| CNY           | 6.6556         | 6.55   | 6.45   | 6.35   | 6.25   | 6.20   | 6.15   | 6.15   |
| IDR           | 14505          | 14250  | 14150  | 14100  | 14050  | 14000  | 13991  | 13981  |
| TWD           | 29.50          | 27.8   | 27.5   | 27.4   | 27.4   | 27.3   | 27.3   | 27.2   |
| KRW           | 1273           | 1200   | 1180   | 1160   | 1140   | 1120   | 1119   | 1118   |
| INR           | 76.52          | 75.5   | 74.5   | 73.5   | 73.0   | 72.5   | 72.0   | 72.0   |

### Activity forecasts\*

|                              | 2021 |      | 2022 |      | 2023 |      |      | Calendar years |      |       |       |
|------------------------------|------|------|------|------|------|------|------|----------------|------|-------|-------|
| % annualised, s/adj          | Q3   | Q4   | Q1   | Q2f  | Q3f  | Q4f  | Q1f  | 2020           | 2021 | 2022f | 2023f |
| Private consumption          | 2.0  | 2.5  | 2.7  | 3.0  | 2.3  | 1.8  | 1.8  | -3.8           | 7.9  | 3.1   | 1.7   |
| Dwelling investment          | -7.7 | 2.1  | 2.1  | 3.2  | 3.2  | 3.2  | 3.2  | 6.8            | 9.2  | 0.3   | 3.0   |
| Business investment          | 1.6  | 2.9  | 9.2  | 7.3  | 6.4  | 6.4  | 6.4  | -5.2           | 8.0  | 6.4   | 5.1   |
| Public demand                | 0.9  | -2.6 | -2.7 | 0.8  | 1.2  | 1.2  | 1.2  | 2.5            | 0.5  | -0.8  | 1.1   |
| Domestic final demand        | 1.4  | 1.7  | 2.7  | 3.2  | 2.7  | 2.4  | 2.4  | -2.6           | 6.7  | 2.8   | 2.2   |
| Inventories contribution ppt | 2.1  | 5.3  | -0.7 | 0.0  | -0.6 | -0.2 | -0.2 | -0.6           | 0.1  | 0.9   | 0.9   |
| Net exports contribution ppt | -1.5 | -0.7 | -3.9 | -0.3 | -0.3 | -0.3 | -0.3 | -0.2           | -1.9 | -1.4  | -0.3  |
| GDP                          | 2.3  | 6.9  | -1.4 | 3.2  | 2.0  | 2.1  | 2.1  | -3.4           | 5.7  | 2.6   | 1.8   |
| %yr annual chg               | 4.9  | 5.5  | 3.6  | 2.7  | 2.6  | 1.5  | 1.5  | -              | -    | -     | -     |

### Other macroeconomic variables

|                           |      |      |      |      |      |      |      |      |      |      |      |
|---------------------------|------|------|------|------|------|------|------|------|------|------|------|
| Non-farm payrolls mth avg | 565  | 586  | 585  | 500  | 350  | 250  | 200  | -759 | 514  | 421  | 138  |
| Unemployment rate %       | 5.1  | 4.2  | 3.8  | 3.6  | 3.6  | 3.6  | 3.7  | 8.1  | 5.4  | 3.7  | 4.1  |
| CPI headline %yr          | 1.4  | 1.3  | 2.7  | 5.3  | 5.4  | 7.1  | 7.2  | 1.3  | 7.1  | 3.7  | 2.3  |
| PCE deflator, core %yr    | 3.7  | 4.9  | 5.1  | 4.1  | 4.0  | 3.1  | 3.1  | 1.5  | 4.9  | 3.1  | 2.1  |
| Current account %GDP      | -2.6 | -2.6 | -2.6 | -2.6 | -2.6 | -2.5 | -2.5 | -2.5 | -2.4 | -2.4 | -2.4 |

Sources: Official agencies, Factset, Westpac Economics

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## Europe & the United Kingdom

### Interest rate forecasts

|                       | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|-----------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| <b>Euro area</b>      |                |        |        |        |        |        |        |        |
| ECB Policy Rate       | -0.50          | -0.50  | -0.50  | -0.50  | 0.00   | 0.00   | 0.25   | 0.25   |
| 10 Year Bund          | 1.04           | 1.10   | 1.10   | 1.00   | 0.85   | 0.80   | 0.75   | 0.70   |
| 10 Year Spread to US  | -202           | -180   | -170   | -160   | -155   | -150   | -145   | -140   |
| <b>United Kingdom</b> |                |        |        |        |        |        |        |        |
| BoE Bank Rate         | 1.00           | 1.25   | 1.50   | 1.75   | 1.75   | 1.75   | 1.75   | 1.75   |
| 10 Year Gilt          | 1.96           | 1.95   | 1.90   | 1.75   | 1.65   | 1.65   | 1.65   | 1.65   |
| 10 Year Spread to US  | -110           | -95    | -90    | -85    | -75    | -65    | -55    | -45    |

Sources: Bloomberg, Westpac Economics.

### Currency forecasts

|                    | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|--------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| <b>euro vs</b>     |                |        |        |        |        |        |        |        |
| USD                | 1.0542         | 1.07   | 1.08   | 1.09   | 1.11   | 1.13   | 1.14   | 1.15   |
| JPY                | 137.50         | 138    | 138    | 137    | 139    | 140    | 139    | 139    |
| GBP                | 0.8520         | 0.86   | 0.86   | 0.86   | 0.87   | 0.87   | 0.86   | 0.86   |
| CHF                | 1.0391         | 1.04   | 1.04   | 1.05   | 1.06   | 1.07   | 1.08   | 1.09   |
| DKK                | 7.4401         | 7.44   | 7.44   | 7.44   | 7.44   | 7.44   | 7.44   | 7.44   |
| SEK                | 10.4884        | 10.5   | 10.5   | 10.5   | 10.5   | 10.5   | 10.5   | 10.5   |
| NOK                | 9.9866         | 10.0   | 10.0   | 10.0   | 10.0   | 10.0   | 10.0   | 10.0   |
| <b>sterling vs</b> |                |        |        |        |        |        |        |        |
| USD                | 1.2373         | 1.25   | 1.26   | 1.27   | 1.28   | 1.30   | 1.32   | 1.34   |
| JPY                | 161.39         | 161    | 161    | 160    | 160    | 161    | 161    | 162    |
| CHF                | 1.2196         | 1.21   | 1.22   | 1.22   | 1.22   | 1.24   | 1.25   | 1.27   |
| AUD                | 0.5759         | 0.59   | 0.60   | 0.60   | 0.60   | 0.60   | 0.60   | 0.60   |

Source: Bloomberg, Westpac Economics.

### Activity forecasts\*

| Annual average % chg         | 2018 | 2019 | 2020  | 2021 | 2022f | 2023f |
|------------------------------|------|------|-------|------|-------|-------|
| Eurozone GDP                 | 1.9  | 1.3  | -6.6  | 5.3  | 2.2   | 1.5   |
| private consumption          | 1.5  | 1.3  | -8.0  | 3.5  | 2.5   | 2.0   |
| fixed investment             | 3.2  | 5.7  | -8.4  | 3.6  | 3.5   | 3.5   |
| government consumption       | 1.2  | 1.8  | 1.4   | 3.8  | 3.0   | 2.0   |
| net exports contribution ppt | 0.4  | -0.5 | -0.7  | 1.0  | 0.6   | 0.4   |
| Germany GDP                  | 1.6  | 0.6  | -5.5  | 2.9  | 1.5   | 2.0   |
| France GDP                   | 1.8  | 1.5  | -8.5  | 7.0  | 1.3   | 1.8   |
| Italy GDP                    | 0.8  | 0.3  | -9.0  | 6.6  | 1.8   | 1.2   |
| Spain GDP                    | 2.4  | 2.0  | -11.0 | 5.1  | 4.0   | 4.2   |
| Netherlands GDP              | 2.4  | 1.7  | -4.5  | 5.1  | 2.0   | 2.0   |
| memo: United Kingdom GDP     | 1.3  | 1.4  | -9.9  | 7.2  | 3.7   | 0.0   |

Past performance is not a reliable indicator of future performance. The forecasts given above are predictive in character. Whilst every effort has been taken to ensure that the assumptions on which the forecasts are based are reasonable, the forecasts may be affected by incorrect assumptions or by known or unknown risks and uncertainties. The results ultimately achieved may differ substantially from these forecasts.

## Asia

### China

| Calendar years              | 2017 | 2018 | 2019 | 2020 | 2021f | 2022f | 2023f |
|-----------------------------|------|------|------|------|-------|-------|-------|
| Real GDP                    | 6.9  | 6.7  | 6.0  | 2.3  | 8.1   | 5.3   | 5.5   |
| Consumer prices             | 1.8  | 1.9  | 4.5  | 0.2  | 1.5   | 2.2   | 2.4   |
| Producer prices             | 4.9  | 0.9  | -0.5 | -0.4 | 10.3  | 5.5   | 1.5   |
| Industrial production (IVA) | 6.6  | 6.2  | 5.7  | 2.8  | 9.6   | 5.5   | 5.4   |
| Retail sales                | 10.2 | 9.0  | 8.0  | -3.9 | 12.5  | 7.0   | 8.0   |
| Money supply M2             | 8.2  | 8.1  | 8.7  | 10.1 | 9.0   | 9.5   | 8.5   |
| Fixed asset investment      | 7.2  | 5.9  | 5.4  | 2.9  | 4.9   | 6.0   | 5.5   |
| Exports                     | 12.7 | -4.4 | 6.3  | 13.5 | 28.7  | 6.0   | 6.0   |
| Imports                     | 8.7  | -7.6 | 11.8 | 2.4  | 30.7  | 6.0   | 5.0   |
| Trade balance USDbn         | 420  | 351  | 421  | 524  | 945   | 710   | 781   |

Source: Macrobond.

### Chinese interest rates & monetary policy

|                           | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|---------------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| Required reserve ratio %* | 11.25          | 11.00  | 11.00  | 11.00  | 11.00  | 11.00  | 11.00  | 11.00  |
| Loan Prime Rate, 1-year   | 3.70           | 3.70   | 3.70   | 3.70   | 3.70   | 3.70   | 3.70   | 3.70   |

\* For major banks.

### Japanese interest rates & monetary policy

|                                   | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|-----------------------------------|----------------|--------|--------|--------|--------|--------|--------|--------|
| Basic balance deposit rate*       | 0.10           | 0.10   | 0.10   | 0.10   | 0.10   | 0.10   | 0.10   | 0.10   |
| Policy-rate balance deposit rate* | -0.10          | -0.10  | -0.10  | -0.10  | -0.10  | -0.10  | -0.10  | -0.10  |
| 10 Year JGB                       | 0.24           | 0.24   | 0.24   | 0.24   | 0.24   | 0.25   | 0.30   | 0.35   |

\* The Bank of Japan introduced a three-tier interest rate structure for bank deposits in January 2016.

### Currency forecasts

|     | Latest (6 May) | Jun-22 | Sep-22 | Dec-22 | Mar-23 | Jun-23 | Sep-23 | Dec-23 |
|-----|----------------|--------|--------|--------|--------|--------|--------|--------|
| JPY | 130.43         | 129    | 128    | 126    | 125    | 124    | 122    | 121    |
| SGD | 1.3850         | 1.38   | 1.37   | 1.35   | 1.34   | 1.33   | 1.33   | 1.32   |
| HKD | 7.8493         | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   | 7.75   |
| PHP | 52.40          | 51.5   | 50.5   | 49.5   | 48.5   | 47.0   | 47.0   | 46.9   |
| THB | 34.31          | 33.0   | 32.5   | 32.0   | 31.5   | 30.5   | 30.5   | 30.5   |
| MYR | 4.3630         | 4.15   | 4.12   | 4.09   | 4.06   | 4.03   | 4.03   | 4.02   |
| CNY | 6.6556         | 6.55   | 6.45   | 6.35   | 6.25   | 6.20   | 6.15   | 6.15   |
| IDR | 14505          | 14250  | 14150  | 14100  | 14050  | 14000  | 13991  | 13981  |
| TWD | 29.50          | 27.8   | 27.5   | 27.4   | 27.4   | 27.3   | 27.3   | 27.2   |
| KRW | 1273           | 1200   | 1180   | 1160   | 1140   | 1120   | 1119   | 1118   |
| INR | 76.52          | 75.5   | 74.5   | 73.5   | 73.0   | 72.5   | 72.0   | 72.0   |

Source: Bloomberg, Westpac Economics.

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## Economic growth forecasts (year average) #

| Real GDP %ann                | 2017       | 2018       | 2019        | 2020        | 2021e      | 2022f      | 2023f      |
|------------------------------|------------|------------|-------------|-------------|------------|------------|------------|
| <b>World</b>                 | <b>3.8</b> | <b>3.6</b> | <b>2.8</b>  | <b>-3.3</b> | <b>5.5</b> | <b>3.4</b> | <b>3.3</b> |
| United States                | 2.3        | 3.0        | 2.2         | -3.5        | 5.7        | 2.6        | 1.8        |
| Japan                        | 1.7        | 0.6        | 0.3         | -4.8        | 1.8        | 2.2        | 1.4        |
| Euro zone                    | 2.6        | 1.9        | 1.3         | -6.6        | 4.9        | 2.2        | 1.5        |
| <b>Group of 3</b>            | <b>2.4</b> | <b>2.3</b> | <b>1.6</b>  | <b>-4.8</b> | <b>4.9</b> | <b>2.4</b> | <b>1.6</b> |
| United Kingdom               | 1.7        | 1.3        | 1.4         | -9.9        | 7.2        | 3.7        | 0.0        |
| Canada                       | 3.0        | 2.4        | 1.9         | -5.4        | 4.8        | 3.6        | 3.0        |
| Australia                    | 2.4        | 2.8        | 2.0         | -2.2        | 4.7        | 4.5        | 3.5        |
| New Zealand                  | 3.1        | 3.2        | 2.4         | -2.1        | 5.6        | 3.4        | 4.8        |
| <b>OECD total</b>            | <b>2.4</b> | <b>2.3</b> | <b>-0.8</b> | <b>-1.8</b> | <b>3.9</b> | <b>2.4</b> | <b>1.8</b> |
| China                        | 6.9        | 6.7        | 5.8         | 2.3         | 8.1        | 5.3        | 5.5        |
| Korea                        | 3.2        | 2.9        | 2.0         | -1.0        | 4.0        | 2.5        | 2.7        |
| Taiwan                       | 3.3        | 2.8        | 3.0         | 3.1         | 6.5        | 3.5        | 3.3        |
| Hong Kong                    | 3.8        | 2.8        | -1.2        | -6.1        | 6.4        | 1.5        | 2.8        |
| Singapore                    | 4.5        | 3.5        | 1.3         | -5.4        | 7.9        | 4.2        | 3.0        |
| Indonesia                    | 5.1        | 5.2        | 5.0         | -2.1        | 3.7        | 5.1        | 5.5        |
| Thailand                     | 4.2        | 4.2        | 2.3         | -6.1        | 1.6        | 3.5        | 4.5        |
| Malaysia                     | 5.8        | 4.8        | 4.3         | -5.6        | 3.2        | 6.0        | 5.5        |
| Philippines                  | 6.9        | 6.3        | 6.0         | -9.5        | 5.6        | 6.8        | 6.5        |
| Vietnam                      | 6.9        | 7.1        | 7.0         | 2.9         | 2.6        | 7.0        | 7.2        |
| <b>East Asia</b>             | <b>6.1</b> | <b>5.9</b> | <b>5.1</b>  | <b>0.7</b>  | <b>6.8</b> | <b>5.0</b> | <b>5.2</b> |
| East Asia ex China           | 4.7        | 4.4        | 3.7         | -2.4        | 4.2        | 4.5        | 4.7        |
| <b>NIEs*</b>                 | <b>3.4</b> | <b>2.9</b> | <b>1.9</b>  | <b>-0.8</b> | <b>5.4</b> | <b>2.9</b> | <b>2.9</b> |
| India                        | 6.8        | 6.5        | 4.0         | -8.0        | 9.0        | 8.0        | 6.5        |
| Russia                       | 1.8        | 2.8        | 2.0         | -3.1        | 4.5        | -12.0      | -1.0       |
| Brazil                       | 1.3        | 1.8        | 1.4         | -4.1        | 4.8        | 0.5        | 2.0        |
| South Africa                 | 1.4        | 0.8        | 0.2         | -6.4        | 5.5        | 2.0        | 1.8        |
| Mexico                       | 2.1        | 2.2        | -0.1        | -8.2        | 4.8        | 2.3        | 2.2        |
| Argentina                    | 2.8        | -2.6       | -2.1        | -9.9        | 9.5        | 2.5        | 2.2        |
| Chile                        | 1.2        | 3.7        | 1.0         | -5.8        | 12.0       | 2.5        | 2.0        |
| CIS^                         | -5.8       | 2.7        | 1.2         | -1.9        | 4.3        | 0.5        | 0.5        |
| Middle East                  | 1.8        | 1.4        | 1.3         | 3.2         | 2.8        | 2.8        | 2.7        |
| C & E Europe                 | -0.6       | 0.1        | -1.3        | -8.9        | 4.5        | 3.8        | 2.0        |
| Africa                       | 3.1        | 3.2        | 3.2         | -1.9        | 3.4        | 4.0        | 4.0        |
| <b>Emerging ex-East Asia</b> | <b>2.6</b> | <b>2.9</b> | <b>1.9</b>  | <b>-3.5</b> | <b>5.3</b> | <b>2.6</b> | <b>3.2</b> |
| Other countries              | 12.7       | 5.6        | 5.0         | 0.4         | 2.2        | 5.7        | 5.0        |
| <b>World</b>                 | <b>3.8</b> | <b>3.6</b> | <b>2.8</b>  | <b>-3.3</b> | <b>5.5</b> | <b>3.4</b> | <b>3.3</b> |

#Regional and global groupings are weighted using PPP exchange rates updated to reflect ICP 2011 benchmark revisions.\* "NIEs" signifies "Newly Industrialised Economies" as defined by the IMF, viz; Republic of Korea, Hong Kong SAR, Taiwan Province of China, and Singapore. ^ CIS is the Commonwealth of Independent States, including Mongolia. Sources: IMF, Westpac Economics.

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