

Global and Australian Economic & Market Outlook

Stephen Halmarick

Chief Economist Head of Global Economic & Markets Research stephen.halmarick@cba.com.au www.commbankresearch.com.au

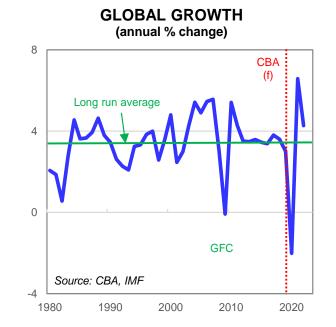
Prepared on 19 July 2021

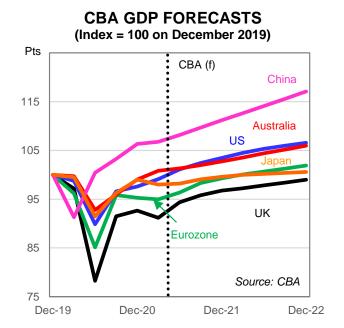


Global Outlook









We forecast the global The global recovery is economy to expand by a uneven. China has led the strong 6.6% in 2021 global recovery so far, but the after -2.1% in 2020. 2022 US is improving rapidly. Japan and the EU are lagging. growth is forecast at 4.2%. China growth led by a surge in US growth supported by large-scale fiscal policy industrial production and infrastructure – **supportive** support and quick roll-out of vaccines. for iron ore. Sources of risk clearly remain Climate change policy - Covid-19 surge in India and development now becoming growing trade tensions. more widespread.

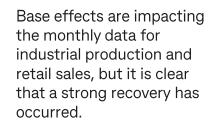




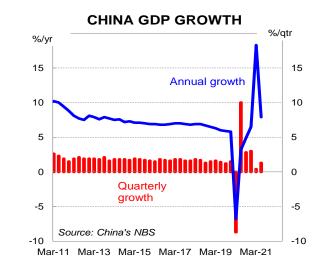
China growth returns to long-run potential

GDP Q2 21 came in at 7.9%/yr, with a step up in quarterly growth from 0.4%/qtr in Q1 21 to 1.3%/yr in Q2 21.

We have downgraded our 2021 and 2022 annual GDP growth forecasts to 8.6% and 5.4%, because of base effects.

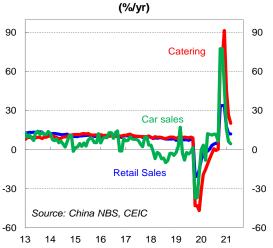


But the risks to China's growth outlook are skewed to the downside – supporting the PBoC decision to cut the RRR by 50bp in early July.









Commonwealth Bank of Australia



ECB

BoE

Fed RBNZ

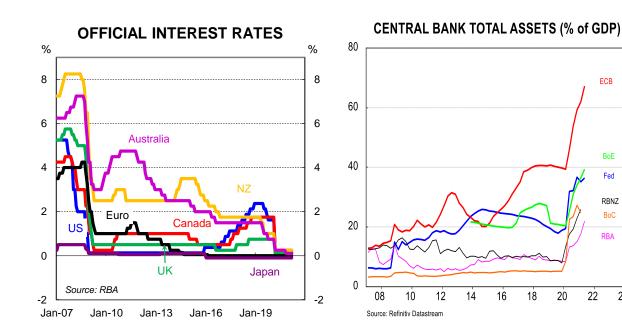
BoC

RBA

24

22

20



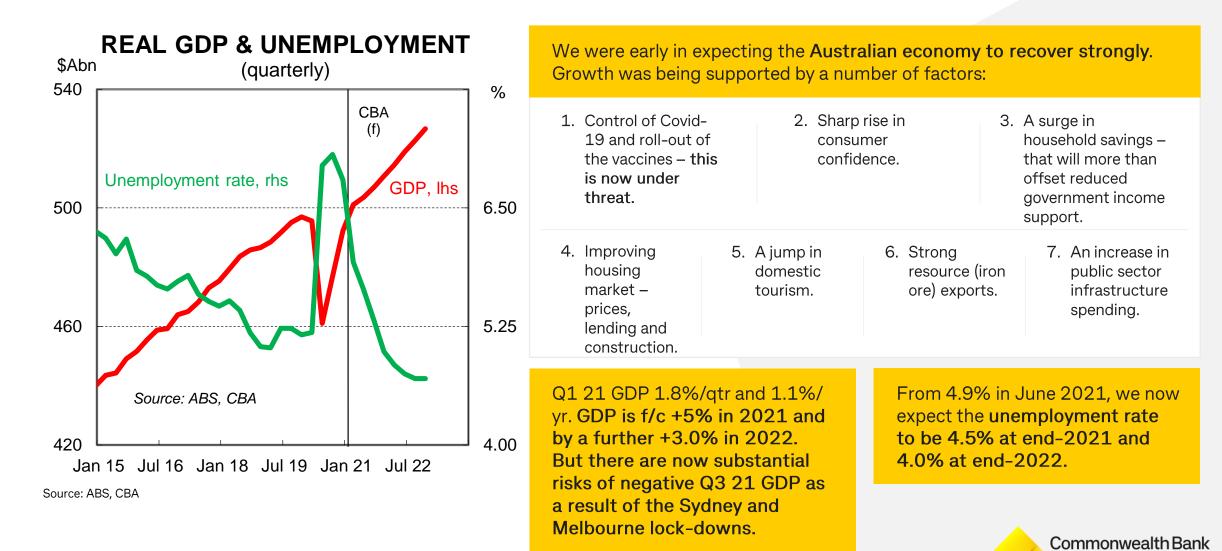
80 60	Major central banks got to 'whatever it takes' quickly at the outset of Covid-19.	The focus was on near-zero rates, balance-sheet expansion (QE), funding the banking system and ensuring the smooth functioning and liquidity of financial markets.
- 40 20	Interest rate increases are still some time offexcept for New Zealand. August 2021 rate hike expected.	But the pace of QE expansion is already beginning to slow in some countries.
	Bank of Canada was the first central bank to taper asset purchases , as has the RBNZ, BoE and RBA (in September).	US Fed expected to begin to taper QE in Q4 2021 and begin to lift the Fed Funds rate in Q1 23.



Australian Outlook



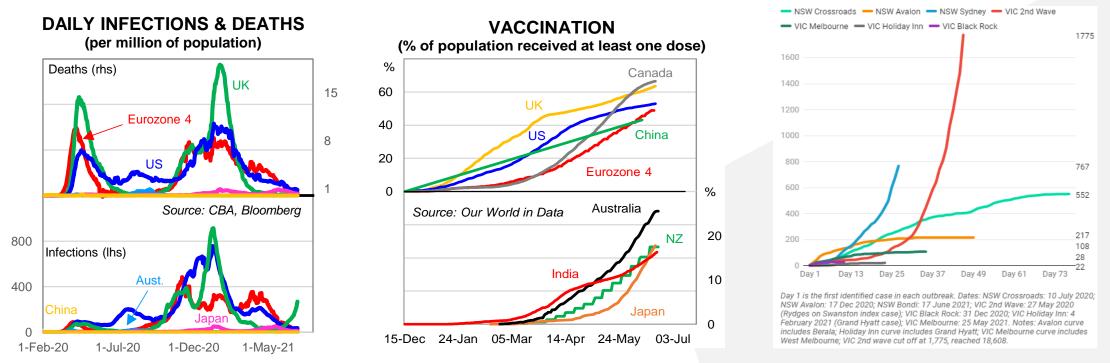
Australian economy growing strongly – before lockdowns



of Australia

7 Commonwealth Bank of Australia | The following information has been developed by the Global Economic & Markets Research team



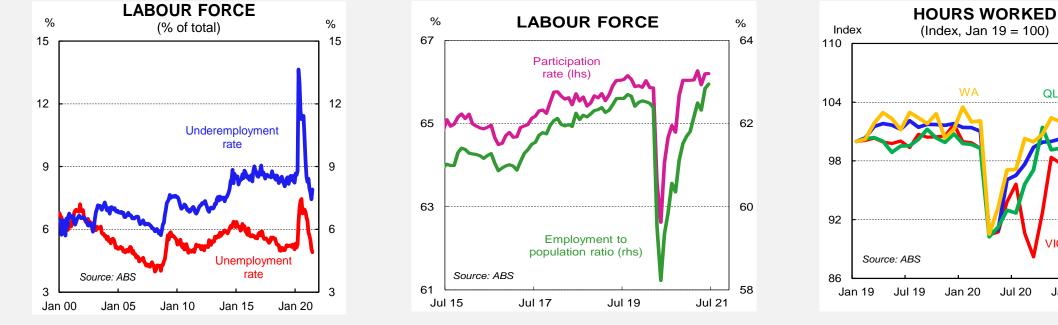


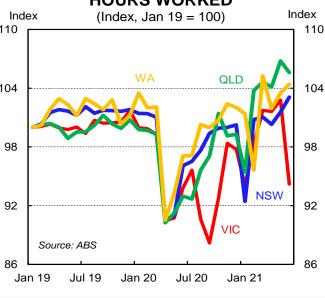
Australia has (had) done a very good job in limiting the number of Covid-19 cases.

- > But the vaccine roll-out has been poor.
- > The current lockdowns in Greater Sydney (and Melbourne) are a significant risk to the ongoing economic recovery.
- CBA data shows spending bounces back after lock-downs are lifted



Labour market recovery has been remarkable







The improvement in the labour market has been remarkable



After 857.1k jobs were lost in March-May, 1,016.4k jobs returned in June 2020-June 2021 - there are now more Australian employed that before Covid hit



The unemployment rate peaked at 'just' 7.5% in July 2020 and is down at 4.9% as at June 2021 - the lowest rate in 10 years!



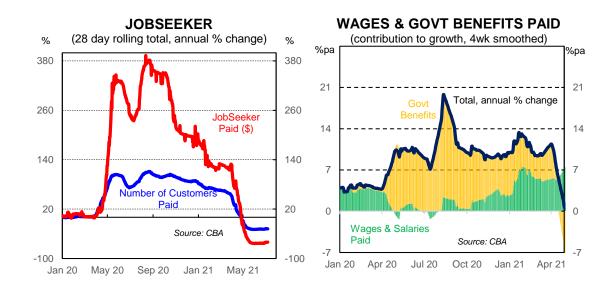
The participation rate surged back to its pre-Covid levels at 66.3% in March 2021 - a remarkable recovery as employment and confidence recover, but a touch lower at 66.2% in June.

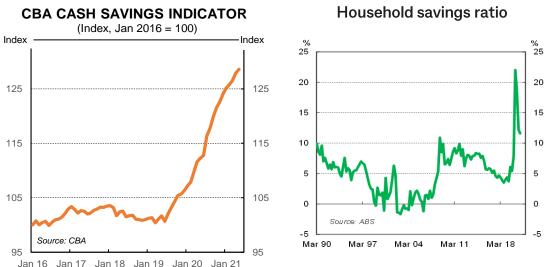


This supports our expectation of a 4.5% unemployment rate by yearend 2021 and 4.0% year end-2022



JobKeeper and government payments supported income







Total income flowing into CBA bank accounts **increased** during the Covid-19 recession!



The value of savings in CBA bank accounts has risen sharply



We estimate that Australians saved an excess of **\$A140bn over 2020 and Q1 2021**.



This high savings rate will support consumer spending through 2021 and beyond



Wages & salary payments (which included JobKeeper up to end March 2021) is rising again.

The number and value of JobSeeker payments coming into bank

accounts has now stablised - as people return to employment

As Covid-19 hit, income arriving into CBA bank accounts surged

on the back of government payments

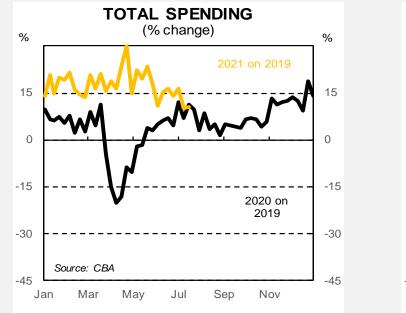


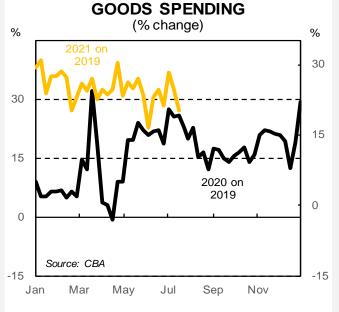
0

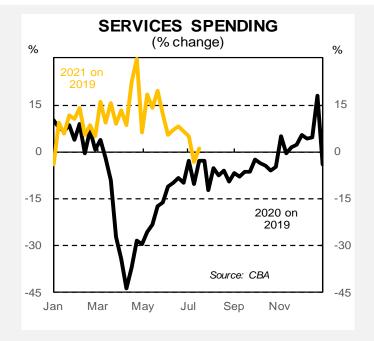
0

There was no discernible **impact on income from the end** of JobKeeper

CBA weekly credit/debit card spend









Annual growth in CBA household credit and debit card spending had been broadly tracking sideways in early 2021. We are now measuring spending relative to 2019 as the base-year.



The annual pace of change in spending become very volatile, if we compare 2021 spending to the onset of the pandemic in 2020.



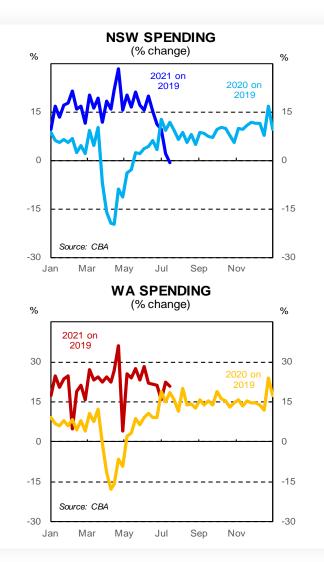
Total spending was up 10.5% to 16 July 2021 – relative to 2019. This is well below the 2021 average of 17% to date in 2021 and reflects the lockdown in NSW.

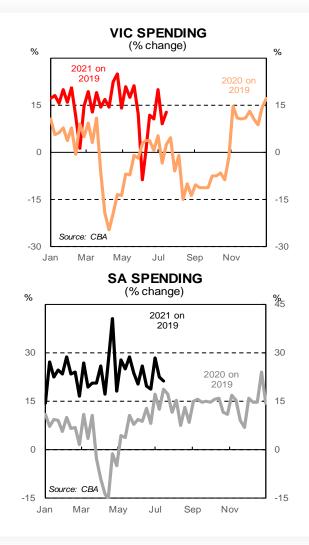


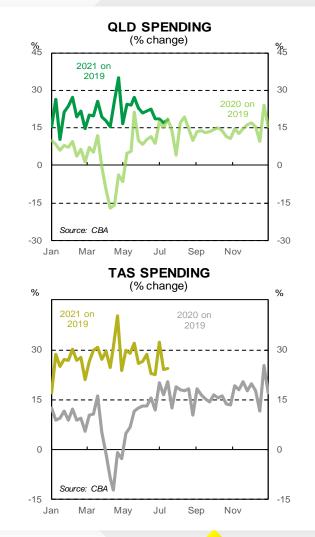
Goods spending was rising by 20% to 16 July 2021 v 2019. Services spending is now up just 1% to 2019.



CBA weekly credit/debit card spend

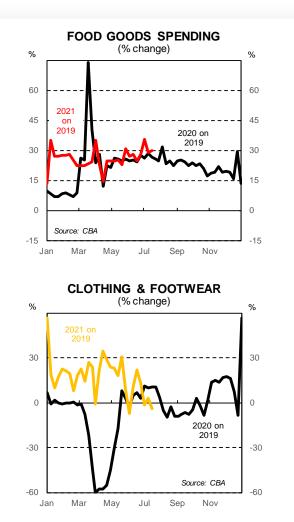


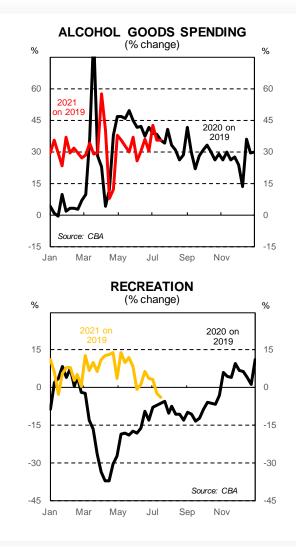


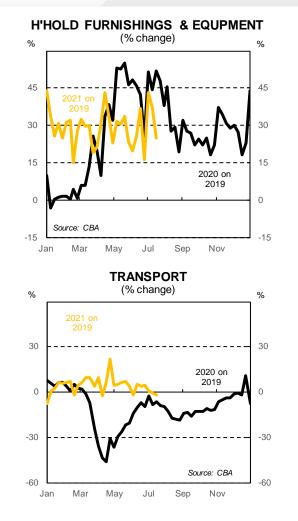


Commonwealth Bank of Australia

CBA weekly credit/debit card spend







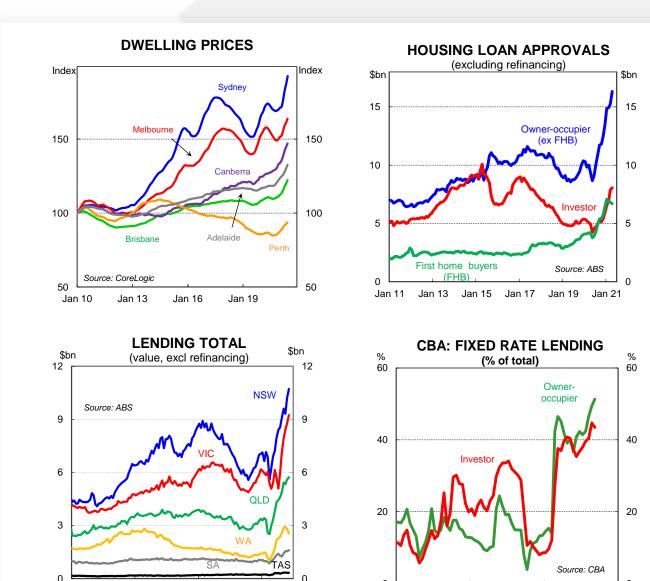
Commonwealth Bank of Australia

Home prices and lending rising strongly again

The housing market is being driven by low interest rates (especially fixed rates) and the recovery in employment and confidence.

Driven by an increase in owner-occupier lending, including new home buyers and now also investors. We expect residential prices to be up 14% for the two years ending 2022. We expect house prices to rise faster than apartments. New lending for housing was lower in April, partly reversing a large increase in March. Over the year lending is up by over 50%.

Investor lending is rising, but remains below its peaks of 2015-2017.



Jan 16

Jan 18

Jan 20

Commonwealth Bank of Australia

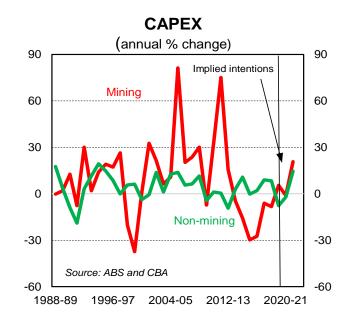
Jan 11

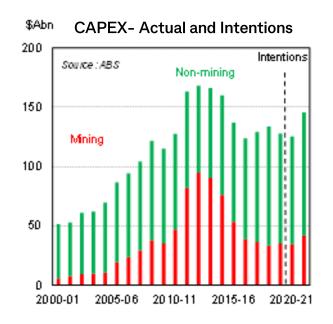
Jan 14

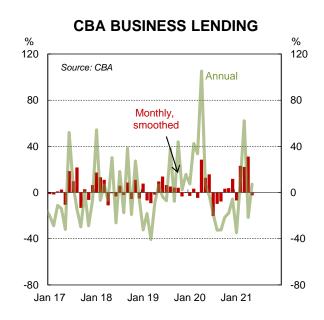
Jan 17

Jan 20











Business capex rose by a solid 6.3% in Q1 21. Mining investment rose by 4.1%/qtr., while non-mining investment rose by a strong 7.1%/qtr.



The latest capital spending survey for 2020/21 now imply a small fall of just -2.1% for the year.



The second estimate for 2021/22 implies a much more impressive increase in capex of 15%/yr.



Business lending showed a solid and promising lift in both February and March 2021. Stronger business investment would help to support the economic recovery.

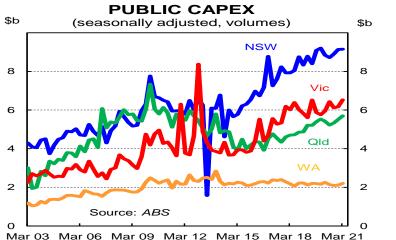




Infrastructure boom is ongoing

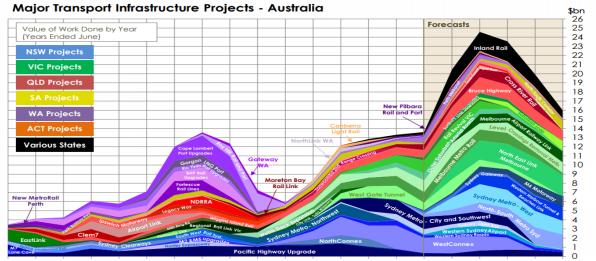
Australia has been experiencing a strong infrastructure spending boom for a number of years.

The Budget announcement of an extra \$A15.2bn on infrastructure spending is a welcome development. Increased infrastructure spending (bringing forward some activity) will be a critical part of the economic recovery and expected to be reinforced in State budgets.



Mar 03 Mar 06 Mar 09 Mar 12 Mar 15 Mar 18 Mar 21

Australian transport infrastructure projects – market opportunities



2006 2007 2008 2009 2010 2011 2012 2013 2014 2015 2016 2017 2018 2019 2020 2021 2022 2023 2024 2025 2026 Note: This chart includes projects with a value of work done greater than \$300 million in any single year Source: Macromonitor, January 2021



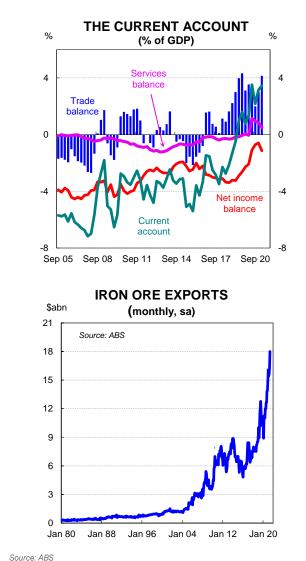


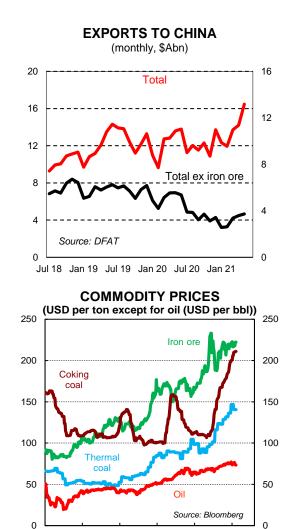
External sector is performing well

Exports to China have remained strong due to iron ore. Exports of other goods such as wine, barely, wood, coal and crustaceans have fallen due to trade sanctions

Australia – China trade tensions are unlikely to disappear and we are just part of the larger US-China trade tensions.

China remains heavily dependent on Australia for iron ore. Australia exports 80% of its iron ore to China. China gets 60% of its iron ore from Australia.

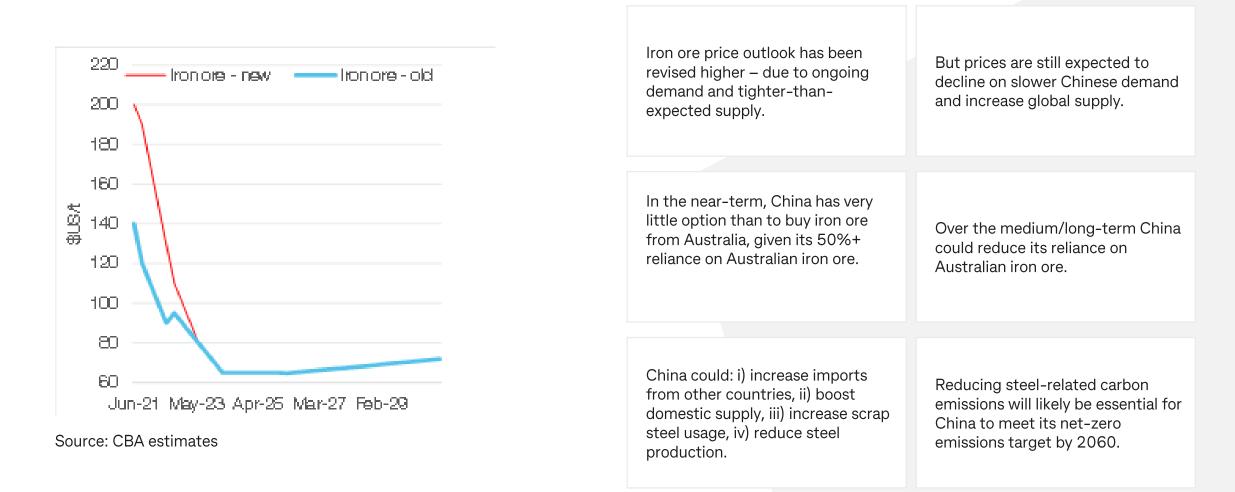




Mar 20 Jun 20 Sep 20 Dec 20 Mar 21 Jul 21







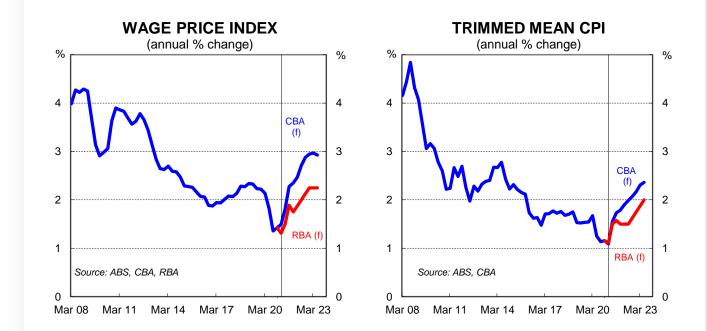




÷ × + =

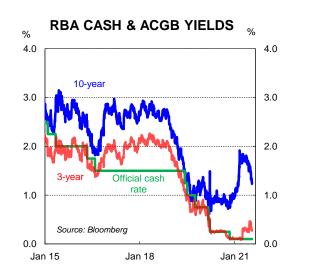
Inflation to move gradually into 2%-3% target

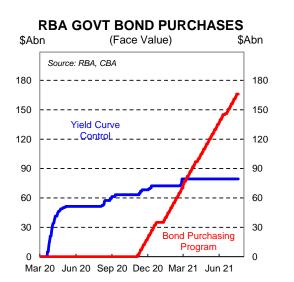
- Wage growth rose to 1.5%/yr in Q1 21, up from the 22 year low of 1.4%/yr in Q4 20.
- Wage growth is expected to rise to 2.9% at year end 2022 as the labour market recovery continues.
 - Headline inflation was **lower-than-expected** at 1.1%/yr in Q1 21, but partly due to government Covid-19 support policies in education and housing
 - Headline inflation will **jump to 3.5% in Q2 21**, but is forecast back down at 1.9%/yr in Q4 21 and then 2.3% by year-end 2022.
- Underlying inflation is expected to move up gradually to 2.2% by year-end 2022.





RBA – Policy transition underway





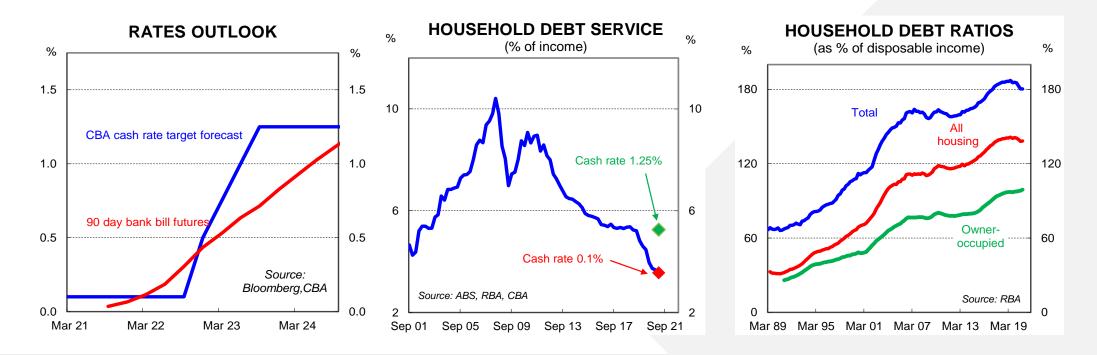
The RBA eased monetary policy in 2020 across a suite of measures and provided support to the economy, the Commonwealth and State governments and the banking system. In July the RBA begun the journey to unwind its unconventional monetary policy – maintaining YCC at the Apr-24 bond and 'tapering' the QE program.

- Cash rate at 0.1% and ES rate at 0%. RBA says that the inflation and wages condition needed to raise the cash rate "will not be met before 2024." But the economic recovery and significant fiscal policy support challenge this view – and we expect the first rate hike in November 2022.
- The Term Funding Facility (TFF) for Australian banks, provided funds for a fixed 3yr term at 0.1%. The TFF ended on 30 June 2021 – with a total of around \$A188bn drawn from this facility.

- 3. The bond purchase or QE program. QE1 was \$A100bn from Nov 20-April 21. QE2 is \$A100bn (\$A5bn/week) from April-August 2021. QE3 will 'taper' to \$A4bn/week for 10 weeks from Sept-11 Nov 21. We expect further tapering in QE3 to May 2022 could be delayed by lockdowns!
- 4. Yield Curve Control (YCC). Targeting the 3yr bond (April 2024) at 0.1%. RBA has announced YCC will remain with the April 24 bond and not shift to new 3yr benchmark of Nov 24.



RBA to hike in November 2022; stopping point 1.25%



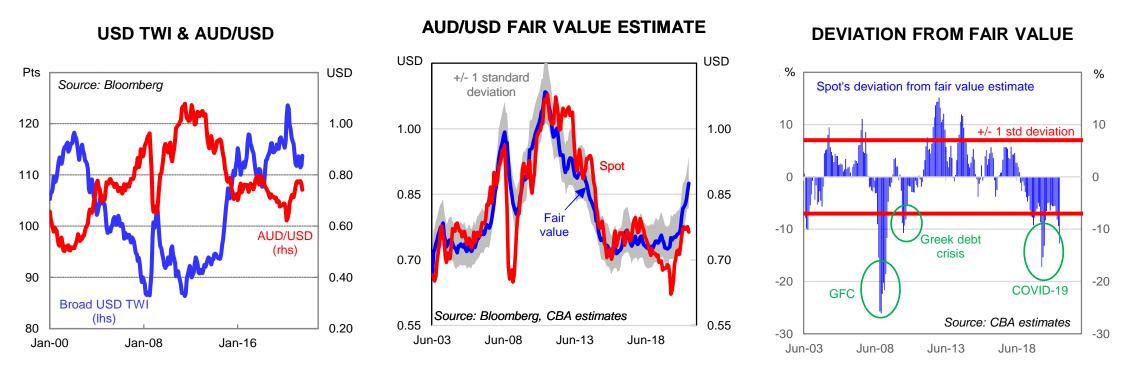
> We expect the conditions to be met for a rate hike in November 2022, with a 15bp move to 0.25%.

- > By end-2022 we have wages growth close to 3% and inflation back in the 2%-3% target range.
- \succ Cash rate expected to be 0.5% by end-2022.
- Neutral interest rate peak of 1.25% expected by year-end 2023.





AUD to stay undervalued



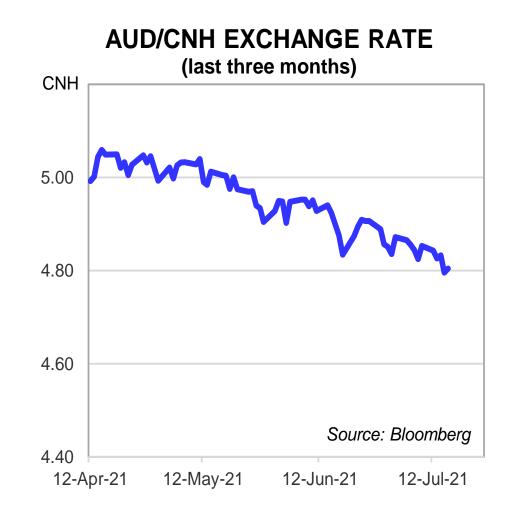
- At \$US0.73-\$UD0.74, AUD/USD is well below the fair value range.
- More US rate hikes can be priced in, supporting further gains in the USD and weigh on AUD/USD.
- > We expect AUD/USD to fall deeper into undervaluation this year because of temporary USD strength.
- AUD is forecast at \$US0.72 at year-end 2021, but then back up at \$US0.80 ay year-end 2022.







- We forecast AUD/CNH to decline over the next few quarters to 4.68, driven by AUD weakness.
- But as economies outside the US recovers, we expect AUD/CNH to return to its uptrend over 2022.
- In the near term, we expect broad USD strength to weigh more on AUD than CNH. Weaker Australian commodity prices and the RBA's dovish policy stance will also bear down on AUD.
- Easing economic momentum in China is a key downside risk to AUD/CNH.





Important Disclosures & Disclaimer

Professional Investors Disclaimer

For information on relevant disclosures regarding the substantial shareholdings, recent deal roles or beneficial interests of the Commonwealth Bank of Australia ABN 48 123 123 124 AFSL 234945 (Bank), please access the <u>Disclosures tab</u> within the Global Economic & Markets Research (GEMR) Portal.

IMPORTANT INFORMATION AND DISCLAIMER FOR ALL INVESTORS

GEMR has prepared this report. GEMR is a business unit of the Bank. References to the "Group" are to the Bank and its subsidiaries (including Commonwealth Securities Limited ABN 60 067 254 300 AFSL 238814, Commonwealth Australia Securities LLC and CBA Europe Ltd) and includes the directors, employees and representatives of the Bank and its subsidiaries.

The information contained in this report is made available only for persons who are sophisticated or professional investors and should not to be construed as providing investment advice. Reliance should not be placed on the information contained in this report to make an investment decision.

This report is published solely for informational purposes and is not to be construed as an act of solicitation, or an offer, to buy or sell any securities or other financial instruments. The information in this report does not constitute a personal recommendation, nor does it take into account your particular investment objectives, financial situations, or needs. You should consider whether any advice or recommendation in this report is suitable for your particular circumstances, and if appropriate, seek professional advice, including independent financial, tax and legal advice.

The Bank believes that the information contained in this report is correct and any opinions, conclusions or recommendations made are reasonably held, and are based on the information available at the time of its compilation. The Bank does not make, nor provide, any representation or warranty, either expressed or implied, as to the accuracy, reliability or completeness of any statement made in this report. Any opinions, conclusions or recommendations made by the Bank are subject to change without notice and may differ, or be contrary, to the opinions, conclusions or recommendations expressed by other business units within the Group. The Bank is under no obligation to update, or keep current, the information in this report.

Liability Disclaimer

The Group does not accept any liability for any loss or damage arising out of the use of all, or any part, of this report.

Forward-Looking Statements, Valuations, Projections and Forecasts

Any valuations, projections and/or forecasts contained in this report are based on a number of assumptions and estimates that are subject to contingencies and uncertainties. The inclusion of any such valuations, projections and/or forecasts in this report should not be regarded as a representation or warranty by, or on behalf of, the Group or any person or entity within the Group that such valuations, projections and forecasts, or their underlying assumptions and estimates, will be met or realised. Past performance is not a reliable indicator of future performance.

Financial Markets Product Risk

Foreign currency rates of exchange may adversely affect the value, price or income of any security or other financial instrument mentioned in this report. In addition, investors in securities whose values are influenced by the currency of the underlying security, effectively assume currency risk.

of Australia

Financial markets products have an element of risk. The level of risk is dependent on the product's specific attributes and how it is used. Potential investors should note that the financial product/s discussed in this report may be sophisticated financial products that involves dealing in derivatives. The Bank will enter into transactions on the understanding that the customer has:

- i. Made their own independent decision to enter into the transaction;
- ii. Determined that the transaction is appropriate;
- iii. Ensured they have the knowledge to evaluate and capacity to accept the terms, conditions and risks; and
- iv. Is not relying on any communication (including this report) from the Bank as advice.

Foreign exchange market pricing ranges in the Bank's GEMR reports are indicative ranges only and not a guarantee of actual foreign exchange prices being executed by the Bank.

Data of the Bank

Any reference made to the term 'CBA data' means the proprietary data of the Bank that is sourced from the Bank's internal systems and may include, but is not limited to, credit card transaction data, merchant facility transaction data and applications for credit. The Bank takes reasonable steps to ensure that its proprietary data is accurate and any opinions, conclusions or recommendations made in reliance of its data are reasonably held, or are made, as at the time of compilation of this report.

The statistics contained in this report only take into account CBA data. The Bank makes no representation or warranty as to the completeness of the data as it may not reflect all trends in the market.

All customer data used, or represented, in this report is anonymised and aggregated before analysis and is used, and disclosed, in accordance with the Group's Privacy Policy.

Analyst Certification and Disclaimer

Each GEMR Analyst primarily responsible for the content of this report, in whole or in part, confirms that with respect to each security or issuer that the GEMR Analyst covered in this report:

- i. All of the views expressed accurately reflect his/her personal views about those securities or issuers; and
- ii. No part of his/her compensation was, is, or will be, directly or indirectly, related to the specific recommendations or views expressed by that GEMR Analyst in the report.

Each GEMR Analyst responsible for the preparation of this report may interact with trading desk personnel, sales personnel and other constituents for the purpose of gathering, synthesizing, and interpreting market information to form an independent view. Each GEMR Analyst responsible for the preparation of this report may not hold, or trade in, securities that are the subject of this report or where they have offered a recommendation. Each GEMR Analyst must disclose, and receive approval, for all outside business interests from Compliance and the Head of GEMR prior to commencing the activity or within a week of joining the Group. The compensation of each GEMR Analyst involved in the preparation of this report is determined exclusively by GEMR management.

Conflicts of Interest

The Group may from time to time, have long or short positions in, and buy or sell, securities or derivatives that are referred to in this report. The Group may also engage in transactions in a manner that is inconsistent with recommendations, if any, contained in this report.

Relevant disclosures relating to the Bank's relevant holdings, positions and roles may be accessed on the <u>GEMR Website</u>.

Directors or employees of the Group may serve, or may have served, as officers or directors of any company mentioned within this report.

25 Commonwealth Bank of Australia | The following information has been developed by the Global Economic & Markets Research team



Fees

Unless otherwise required and agreed to separately, we do not charge any fees for any information provided in this report. You may be charged fees in relation to the financial products or services the Bank provides. These fees are set out in the relevant Financial Services Guide (FSG), relevant Product Disclosure Statements (PDS), relevant Terms & Conditions, and/or relevant contract.

Employees of the Bank's GEMR team receive a salary but do not receive any commissions or fees. However, employees of the GEMR team may be eligible for a bonus payment from the Bank. The payment made to employees of the GEMR team is based on a number of factors relating to their overall performance during the year, which includes how well they meet client service standards. Employees of the GEMR team may also receive benefits from clients, which may include but is not limited to tickets to sporting and cultural events, corporate promotional merchandise and other similar benefits.

Complaints

If you have a complaint, the Bank's dispute resolution process can be accessed in Australia on 13 22 21 or internationally on +61 2 9841 7000.

ADDITIONAL INFORMATION FOR CLIENTS INSIDE AUSTRALIA

This report is made available for informational purposes only. It is not a prospectus or other disclosure document (as defined in the Corporations Act 2001 (Cth), Australia (Corporations Act)) that has been, or will be filed, with the Australian Securities & Investments Commission. This report is only made available for persons who are sophisticated investors or professional investors (as those terms are defined by section 708(8) or (10) and (11) of the Corporations Act or who otherwise is not a retail investor (as defined in sections 761G and 761GA of the Corporations Act).

ADDITIONAL INFORMATION FOR CLIENTS OUTSIDE OF AUSTRALIA

This report is not directed to, nor is intended for distribution to or use by, any person or entity, who is a citizen or resident of, or located in, any locality, state, country or jurisdiction where such distribution, publication availability or use would be contrary to any applicable law/s or regulation/s or would subject any entity within the Group to any registration or licencing requirement within such jurisdiction.

Canadian Investors

The information contained herein is not, and under no circumstances is to be construed as, a prospectus, an advertisement, a public offering, an offer to sell securities described herein, or solicitation of an offer to buy securities described herein, in Canada or any province or territory thereof.

In Canada, the information contained herein is intended solely for distribution to **Permitted Clients** (as such term is defined in National Instrument 31-103) with whom Commonwealth Australia Securities LLC (the US Broker-Dealer), a broker-dealer registered with the US Securities and Exchange Commission and a member of the Financial Industry Regulatory Authority (FINRA) (CRD# 136321), deals pursuant to the international dealer exemption. To the extent that the information contained herein references securities of an issuer incorporated, formed or created under the laws of Canada or a province or territory of Canada, any trades in such securities may not be conducted through the US Broker-Dealer.

Commonwealth Bank

of Australia

Notice of Negative Consent to counterparties that are Permitted Clients to receive Fixed Income Research

Counterparties that are Permitted Clients but are not registered under the securities legislation of a jurisdiction in Canada as an advisor or dealer, must acknowledge:

- i. The US Broker–Dealer is not registered in the local jurisdiction of the counterparty;
- ii. The US Broker–Dealer is a US Broker–Dealer registered with the US Securities and Exchange Commission;
- iii. Substantially all of the assets of the US Broker-Dealer are outside of Canada; and
- iv. There may be difficulty enforcing legal rights against the US Broker-Dealer because of the above.

European Investors

This report is made available in the United Kingdom and Europe only for persons who are Eligible Counterparties or Professional Clients, and not Retail Clients as defined by the Financial Conduct Authority (FCA) rules and by MiFID II (Directive 2014/65/EU). The Bank is registered in England (No. BR250 and FRN 139185) and is authorised by the Prudential Regulatory Authority and is subject to regulation by the Financial Conduct Authority and limited regulation by the Prudential Regulation Authority. Details about the extent of the Bank's regulation by the Regulation Authority are available from the Bank on request. CBA Europe Ltd is registered in England (No. 05687023 and FRN 454330) and is authorised and regulated by the Financial Conduct Authority.

Under MiFID II and FCA rules, the Bank may be required to charge fees for the information provided in this report.

Hong Kong Investors

The contents of this report have not been reviewed by any regulatory authority in Hong Kong. This report has been approved for distribution in Hong Kong by the Bank, Hong Kong branch office, which is a registered institution with the Hong Kong Monetary Authority to carry out Type 1 (Dealing in securities) and Type 4 (Advising on securities) regulated activities under the Securities & Futures Ordinance.

You are advised to exercise caution in relation to the report. If you are in any doubt about any of the contents of this report, you should obtain independent professional advice. This report is only being made available to persons who are:

- i. Professional Investors as defined in the Securities and Futures Ordinance (cap 571) of Hong Kong; or
- ii. To whom an offer of securities may be made in Hong Kong without the need for a prospectus under section 2 and the Seventeenth Schedule of the Companies Ordinance (Cap. 32 of the Laws of Hong Kong) (Companies Ordinance) pursuant to the exemptions for offers in respect of which the minimum consideration payable by any person is not less than HK\$500,000 or its equivalent in another currency.

Under no circumstances is this report, nor any part of it, to be construed as, a prospectus (as defined in the Companies Ordinance) or an advertisement of securities in Hong Kong. The securities referred to in the report have not been, nor will they be, qualified for sale to the public under applicable Hong Kong securities laws except on a basis that is exempt from the prospectus requirements of those securities laws.



Japanese Investors

This report is made available only for institutional customers. The Bank, Tokyo Branch is a licensed banking business authorised by the Japan Financial Services Agency.

Korean Investors

The Bank is not licensed to engage in a financial investment business in Korea and nothing in this report shall constitute a recommendation of, offer to sell or marketing of any financial investment product in Korea and is only provided to the addressee at its request.

Malaysian Investors

This report is intended only for the addressee and is provided to the addressee at its request. This report is not to be distributed or circulated to the public nor should copies of this report be made or distributed or circulated, nor should information in this report be used in any way or quoted or published in any publication or in the media. The information contained in this report should not be considered as constituting investment advice or a proposal to make available, or to offer for subscription or purchase, or an invitation to apply or subscribe for or purchase any security or enter into any derivative described herein. The addressee must inform themselves about, seek appropriate advice regarding, and observe any restrictions or prohibitions imposed under the relevant laws of Malaysia.

New Zealand Investors

The information contained in this report is made available in New Zealand only for persons who are wholesale investors as defined in the Financial Markets Conduct Act 2013 (New Zealand).

People's Republic of China Investors

This report is not an offer to buy or sell financial products or services, nor the solicitation of any offer to buy or sell financial products or services. The financial products referenced in this material may not be offered or sold to any person in the People's Republic of China (**PRC**), excluding the Hong Kong Special Administrative Region, Macau Special Administrative Region and Taiwan to whom it is unlawful to make the offer or solicitation. Such products are not and will not be registered with, authorised by, nor approved by any PRC authorities. It shall be the sole responsibility of the recipient of this report to verify his/her eligibility to get access to this report, to purchase any financial products, to obtain any required approval, quota and/or registration and to comply with all applicable regulatory requirements under all applicable legal or regulatory regimes. This report is for the intended recipients only and may not be forwarded or presented to any other persons without the prior consent of the Bank.



Singaporean Investors

The Bank's, Singapore Branch is established in Singapore as a branch of the Australian incorporated legal entity, and operates as a Wholesale Bank with a Banking Licence under the Banking Act, issued by the Monetary Authority of Singapore. The information in any Communication is made available only to persons who are Accredited Investors, Institutional Investors or Expert Investors as defined in the Securities and Futures Act (Singapore), and has not been prepared for, and must not be distributed to or replicated in any form to, anyone who is not an Accredited Investor, Institutional Investor or Expert Investor or Expert Investor as defined in Regulation 2(1) of the Financial Advisers Regulations (FAR), the Bank is obliged to disclose to you that in the provision of any financial advisory services to you, it is exempted under Regulations 28, 34 and 35 of the FAR from complying with the business conduct provisions of 26 (False and misleading statement by licensed financial advisers), 27 (Recommendations by licensed financial advisers), 29 (Obligations to furnish information to the Authority) and 36 (Licensed financial adviser to disclose certain interests in specified products) of the Financial Advisers Act.

Taiwanese Investors

The Bank is not licensed to engage in a security or financial services business in Taiwan and nothing in this report shall constitute a recommendation of, offer to sell or marketing of any investment product within Taiwan.

Thailand Investors

This report is only available to institutional investors.

US Investors

This report is made available for informational purposes only. The products described herein are not available to retail investors. General macro research may be distributed in the United States by the Bank's New York Branch. The information contained herein is not intended to be an exhaustive discussion of the strategies or concepts mentioned herein or tax or legal advice. Investments and strategies are discussed in this report only in general terms and not with respect to any particular security, derivative or transaction, and any specific investments may entail significant risks including exchange rate risk, interest rate risk, credit risk and prepayment risk among others. There also may be risks relating to lack of liquidity, volatility of returns and lack of certain valuation and pricing information. International investing entails risks that may be presented by economic uncertainties of foreign countries as well as the risk of currency fluctuations. Investors interested in the strategies or concepts described in this report should consult their tax, legal or other adviser, as appropriate.

In the United States, securities products and services are provided solely by or through the US Broker-Dealer a broker-dealer registered with the US Securities and Exchange Commission and a member of FINRA. The US Broker-Dealer is a wholly-owned, but non-guaranteed, subsidiary of the Bank. The US Broker-Dealer does not make markets or otherwise engage in any trading in the securities of the subject companies described in our reports. In the United States, research covering debt securities is only made available to persons who qualify as Qualified Institutional Buyers as defined under Rule 144A of the US Securities Act of 1933, as amended (the **Act**) and otherwise abide by the terms of the Notice of Negative Consent below.

Notice of Negative Consent to Qualified Institutional Buyer to Receive Institutional Debt Research



FINRA adopted Rule 2242, "Debt Research Analysts and Debt Research Reports," to address conflicts of interest relating to the publication and distribution of debt research reports. Rule 2242(j) exempts debt research distributed solely to eligible institutional investors (Institutional Debt Research) from most of the Rule's provisions regarding supervision, coverage determinations, budget and compensation determinations and all of the disclosure requirements applicable to debt research reports distributed to retail investors.

This notice serves to inform you of the US Broker-Dealer's intent to distribute Institutional Debt Research to you while relying on the exemption provided under FINRA Rule 2242. You have separately certified that:

i. You are, or you are authorized to act on behalf of, a Qualified Institutional Buyer (as defined under Rule 144A of the Act).

ii. You:

(1) are capable of evaluating investment risks independently, both in general and with regard to particular transactions and investment strategies involving a security or securities (including a debt security or debt securities); and

(2) are exercising independent judgment in evaluating the recommendations of the US Broker-Dealer pursuant to FINRA Rule 2111.

i. You agree to promptly advise the US Broker-Dealer if any of the representations or warranties referred to in this notice ceases to be true. Based on the aforementioned certifications by you, the US Broker-Dealer is permitted to provide Institutional Debt Research to you under the exemptions provided by FINRA 2242(j). Unless notified by you in writing to the contrary prior to your receipt of our Institutional Debt Research, the Bank will consider you to have given your consent to the receipt of such Institutional Debt Research.

The Bank is a swap dealer provisionally registered with the US Commodity Futures Trading Commission and is a member of the National Futures Association in such capacity (NFA ID 0249150). In the United States, swaps, and products and strategies involving swaps are not suitable for investment by counterparties that are not "eligible contract participants" (as defined in the US Commodity Exchange Act (CEA)) and the regulations adopted thereunder; or (ii) entities that have any investors who are not "eligible contract participants." Each hedge fund or other investment vehicle that purchases the products must be operated by a registered commodity pool operator as defined under the CEA and the regulations adopted thereunder or a person who has qualified as being exempt from such registration requirement.



Thank you

