

# ECONOMIC IMPACT OF THE CORONAVIRUS PANDEMIC

5<sup>th</sup> SEPTEMBER 2020

---

**SAUL ESLAKE**  
CORINNA ECONOMIC ADVISORY PTY LTD

# What's new?

## The world

- ❑ 1,850,342 new Covid-19 cases were confirmed this week, the highest thus far apart from last week, bringing the cumulative total to 28.2mn – globally the 'second wave' is yet to peak, but it hasn't been as deadly as the 'first wave' ([slide 4](#))
- ❑ Infections appear to have peaked in some of the countries we've been highlighting over the past eight weeks, including the US, Brazil, Mexico, Colombia, Peru & South Africa – but are still rising in the 'four Is' – India, Indonesia, Iraq and Israel ([slide 5](#))
- ❑ Of the countries we follow closely only the UK has tightened restrictions in the past 10 days or so, while only NZ has eased them ([slide 13](#))
- ❑ With 62 countries now having released their Q2 GDP estimates (of the 95 who eventually will) we estimate that global GDP declined by 9.4% from Q2 2019 – the largest on record ([slide 18](#))
- ❑ Two economies (Macau & Peru) have reported declines of more than 30% cf. Q2 2019, four (India, Spain, the UK & Tunisia) of between 20 and 30%, and 27 of between 10 and 20%; only three (Vietnam, Georgia & China) have reported positive growth ([slide 19](#))
- ❑ US CPI inflation surprised on the upside in August, partly because of a jump in used car prices, but also reflecting increased prices of items used at home – although 'core' inflation remains below the Fed's (more flexible) target ([slide 31](#))
- ❑ With the US election only 52 days away, the sustained narrowing in Joe Biden's lead over Donald Trump in both opinion polls and betting odds since late July went into reverse this week ([slide 46](#))

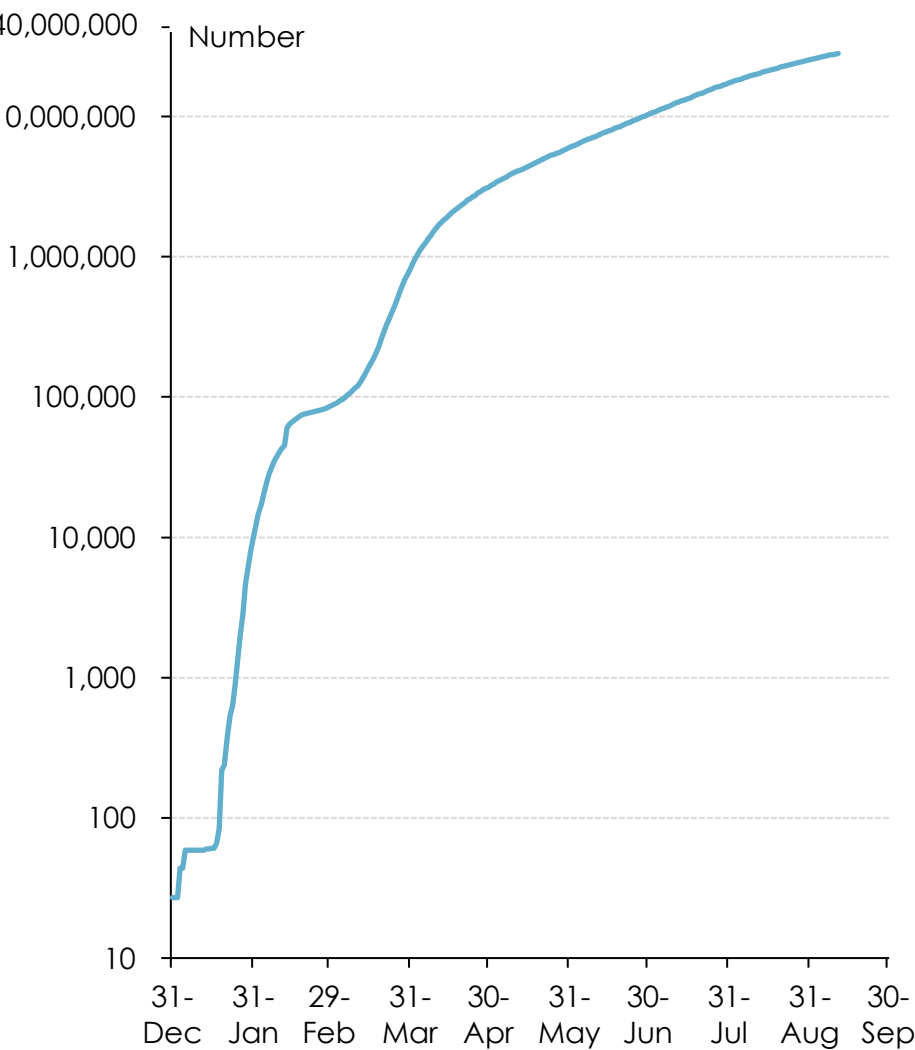
## Australia

- ❑ Australia recorded 'only' 429 new Covid-19 cases this week, the lowest since the last week of June; there were 1,515 active cases on Friday (the lowest numbers since 11<sup>th</sup> July); and this week's death toll of 60 was the lowest since the week ended 1<sup>st</sup> August ([slide 8](#))
- ❑ Victoria accounted for 352 (82%) of the new cases reported this week, the smallest percentage since the third week of June ([slide 9](#)); nevertheless the Victorian Government extended its 'lockdown' for another six weeks beyond the originally scheduled expiry date, prompting strong criticism from business and the Federal Government
- ❑ Business conditions (as measured by the National Australia Bank's well-regarded business survey) deteriorated in August, reversing most of the improvement that had been recorded in July ([slide 61](#)), despite which business confidence improved (in the sense of becoming less negative) in August ([slide 77](#))
- ❑ Consumer confidence improved significantly in September, reflecting more favourable assessments of both household finances and economic conditions now and in the future ([slide 77](#))
- ❑ Payroll employment rose in every state and territory except Victoria in the middle two weeks of August ([slide 72](#))
- ❑ Women and younger people have done much better than men and middle-aged people in regaining jobs lost during the first two months of the current recession ([slide 73](#)), so that there is no longer a 'gender' or 'age' gap in net job losses – although this may change when the level of JobKeeper payments step down at the beginning of October
- ❑ Data on the number of people on JobSeeker benefits for the fortnight ended 28<sup>th</sup> August were released this week (equivalent to 12% of the labour force), but weekly data continue to be a 'state secret' ([slide 67](#))

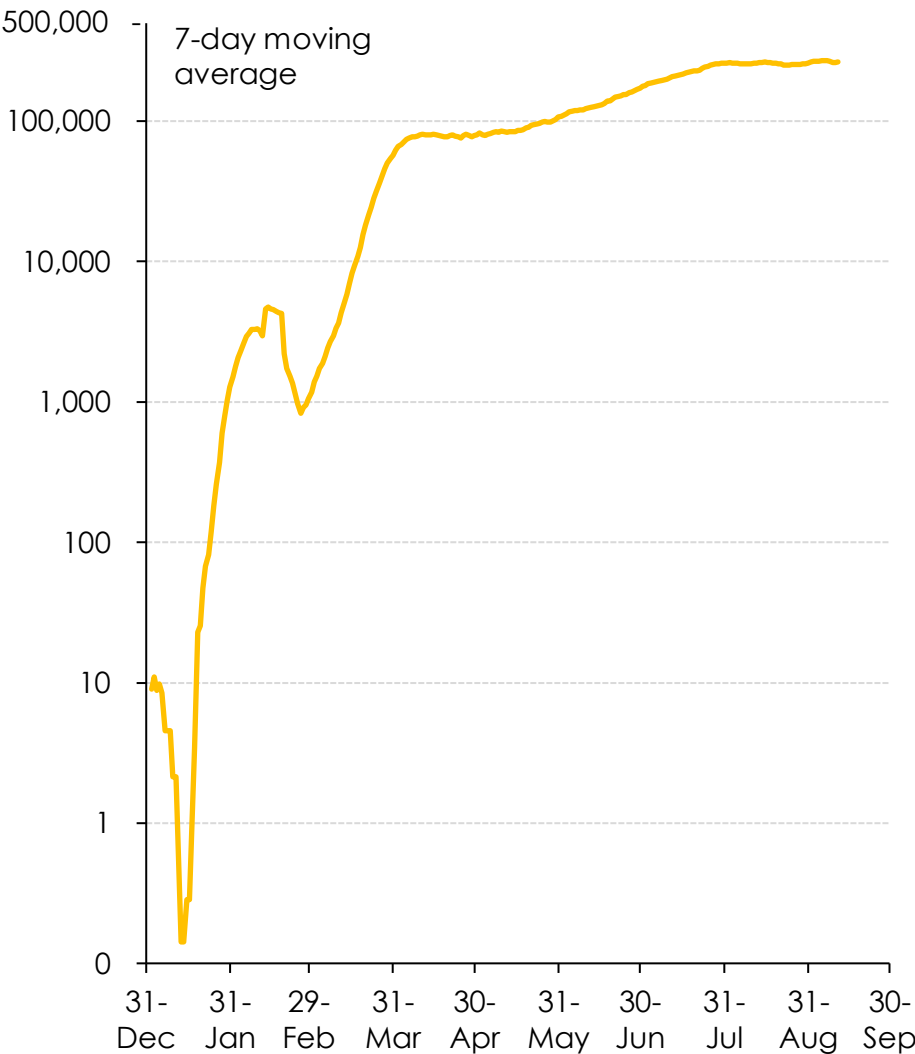
**The virus**

# The global ‘second wave’ still hasn’t peaked, with 1.85mn new cases this week the 2nd highest ever, although the weekly death toll has been stable

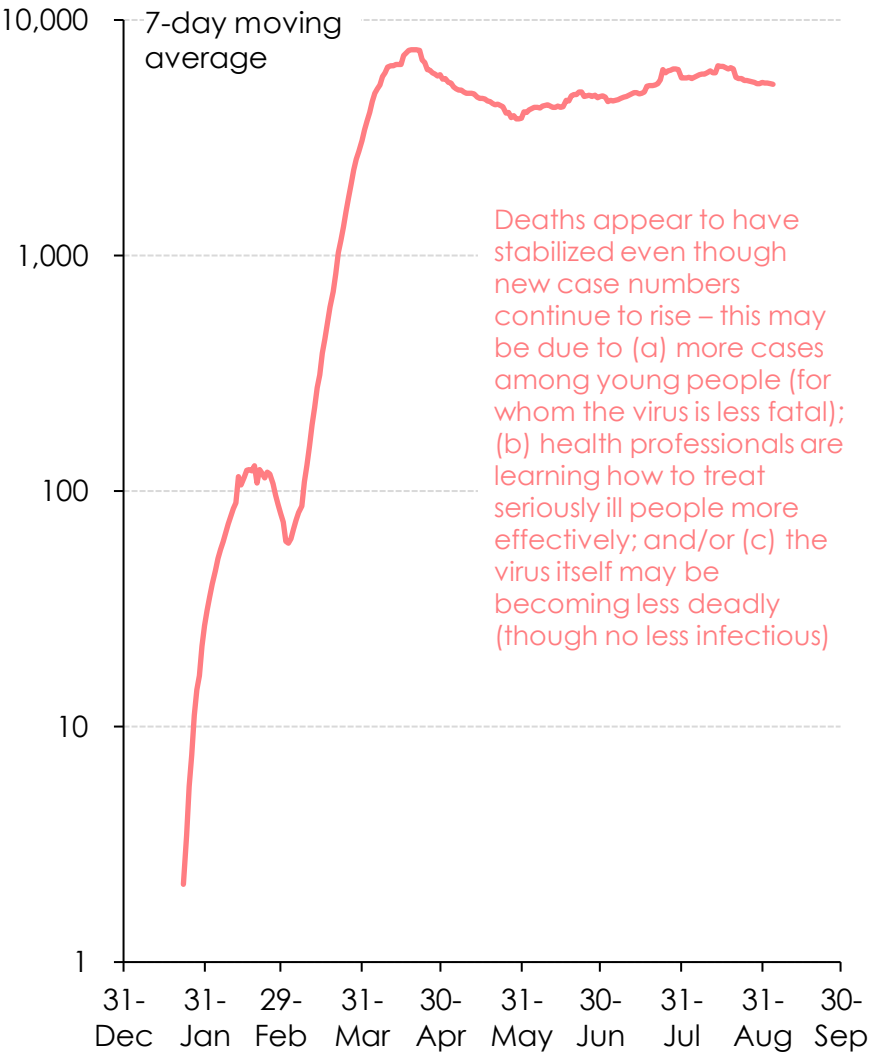
Cumulative confirmed cases – global total



New confirmed cases – global total



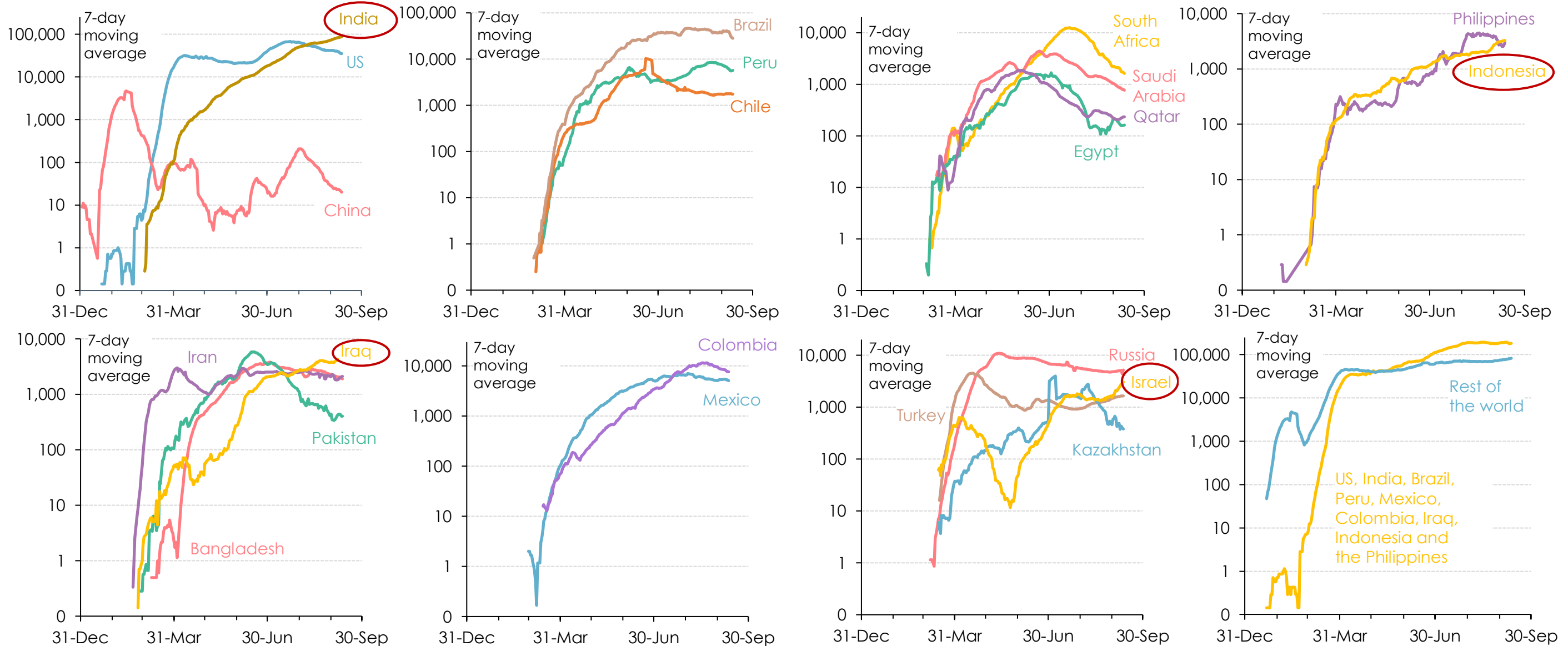
New deaths – global total



Note: All charts are on logarithmic scales. Data up to 11<sup>th</sup> September. Source: University of Oxford, [Our World in Data](#).

# Share of cases in 9 countries with 33% of world's population down to 69% from peak of 73% in mid-August, but cases still rising in “the four I’s”

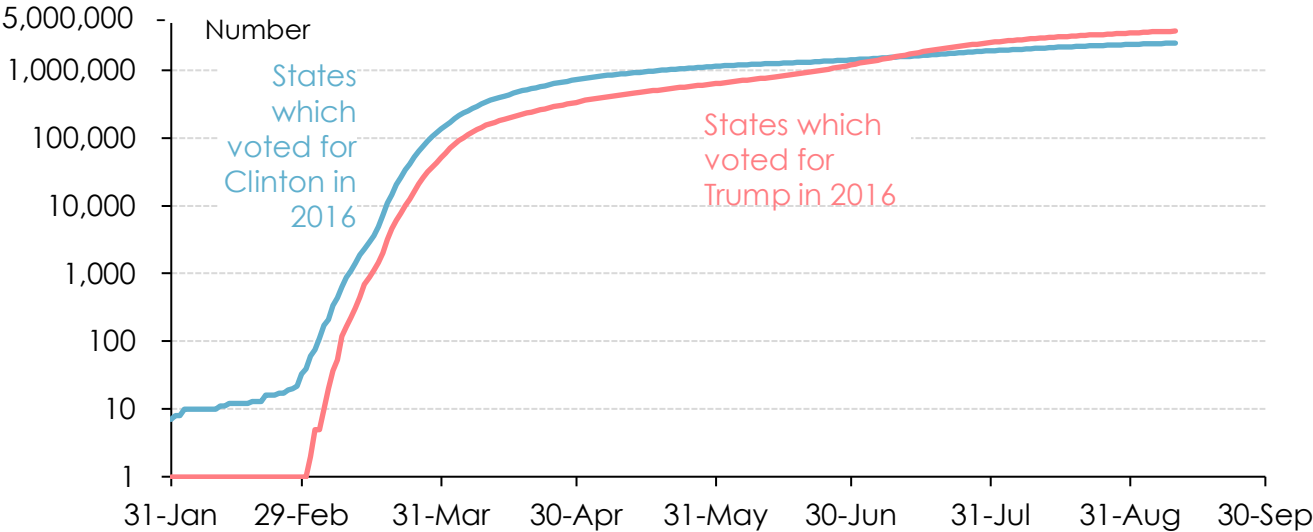
## Daily new cases – 22 countries with (mostly) large populations and large numbers of new cases



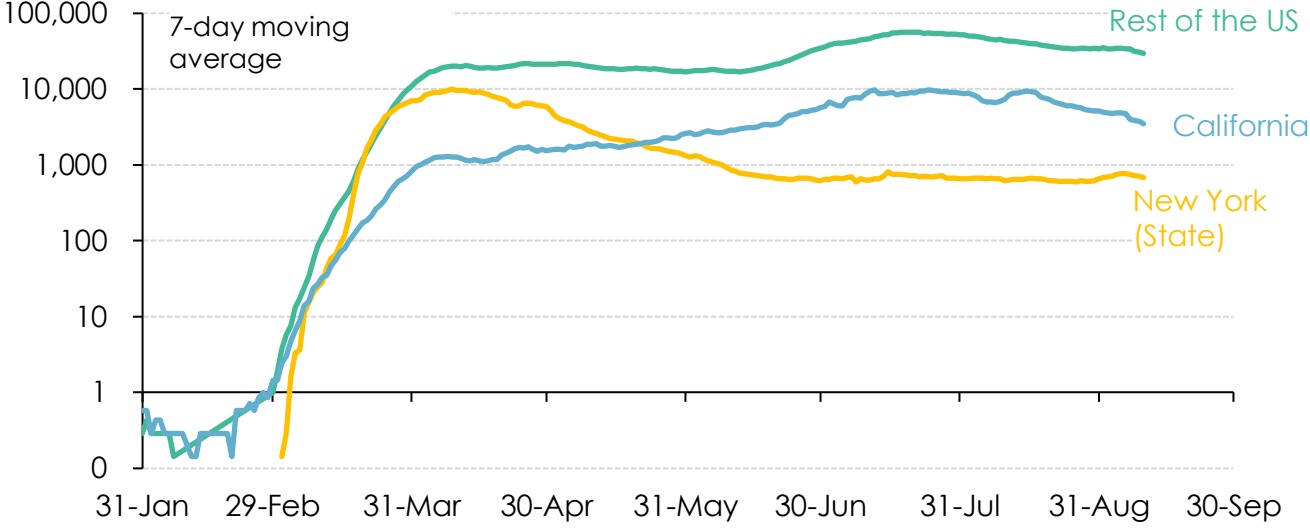
Note: All charts are on logarithmic scales. Data up to 11<sup>th</sup> September. Source: University of Oxford, [Our World in Data](#); Corinna.

# In the US, new Covid-19 cases in 'red states' continue to outnumber those in 'blue' states – although in aggregate new cases numbers are flattening

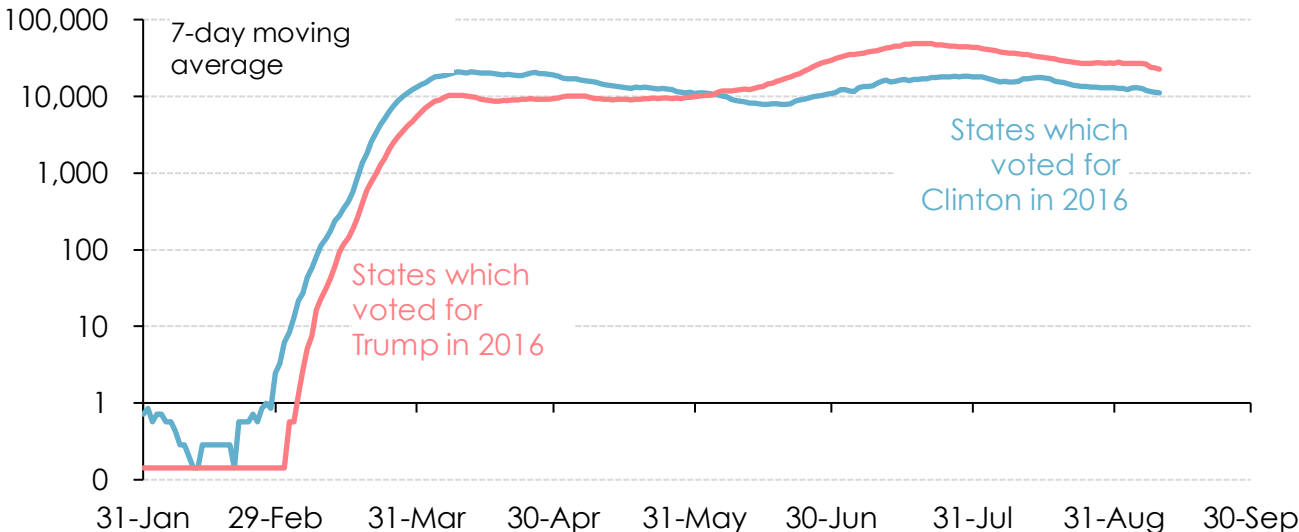
Cumulative cases, by 2016 Electoral College vote



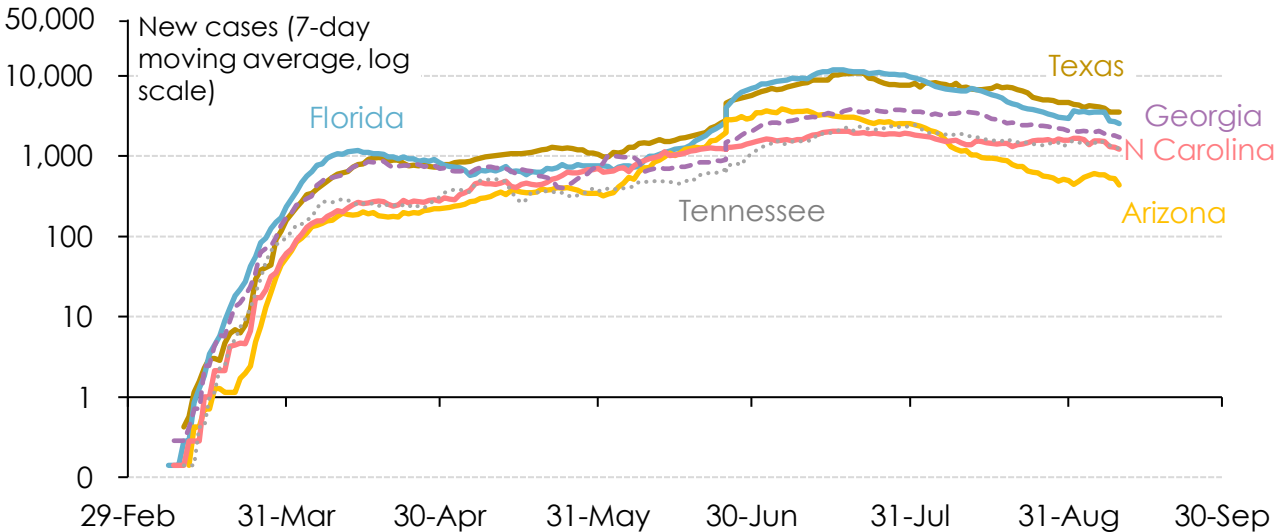
New cases – New York, California & the rest of the US



New cases, by 2016 Electoral College vote



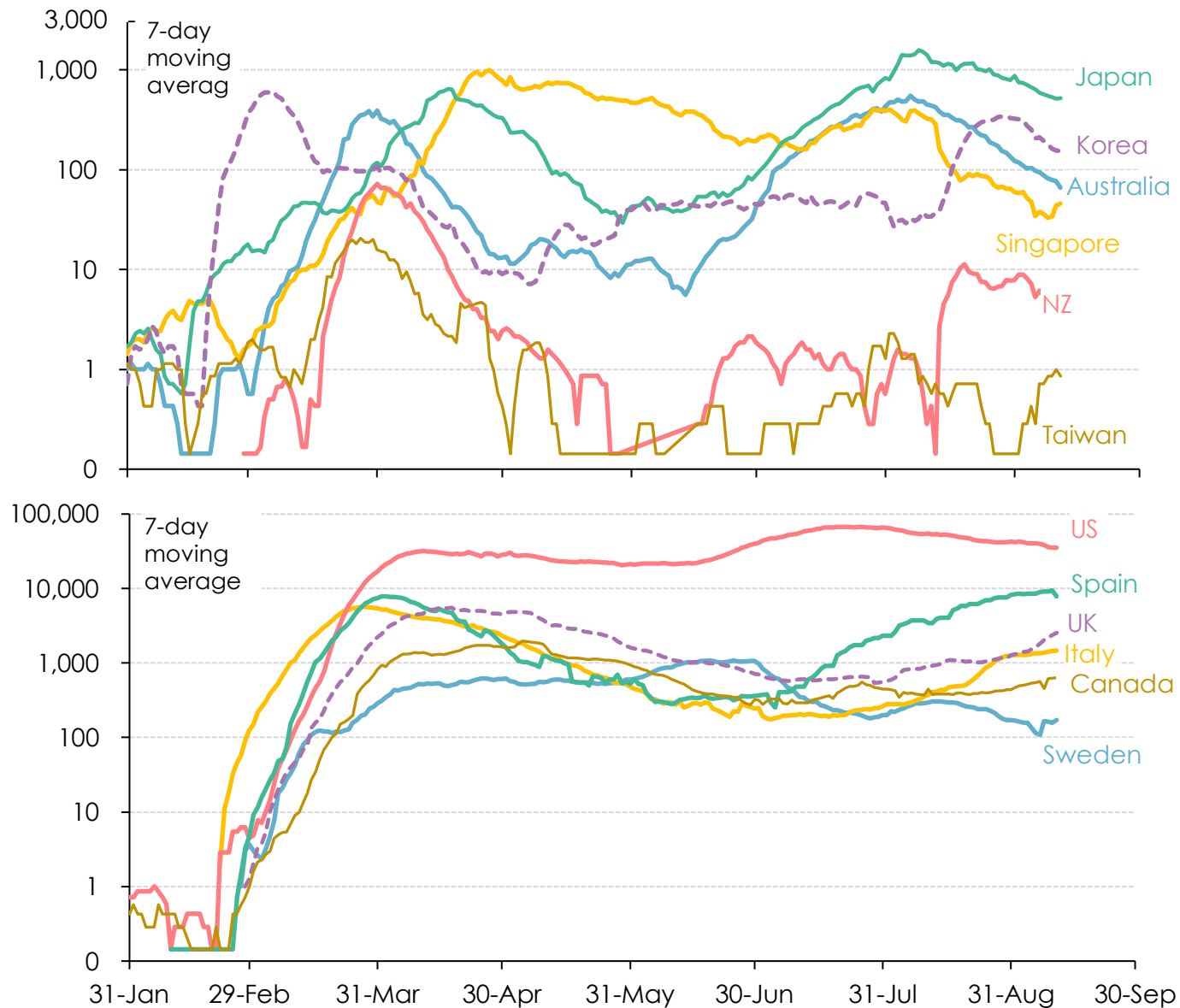
States with fastest recent increases in new cases



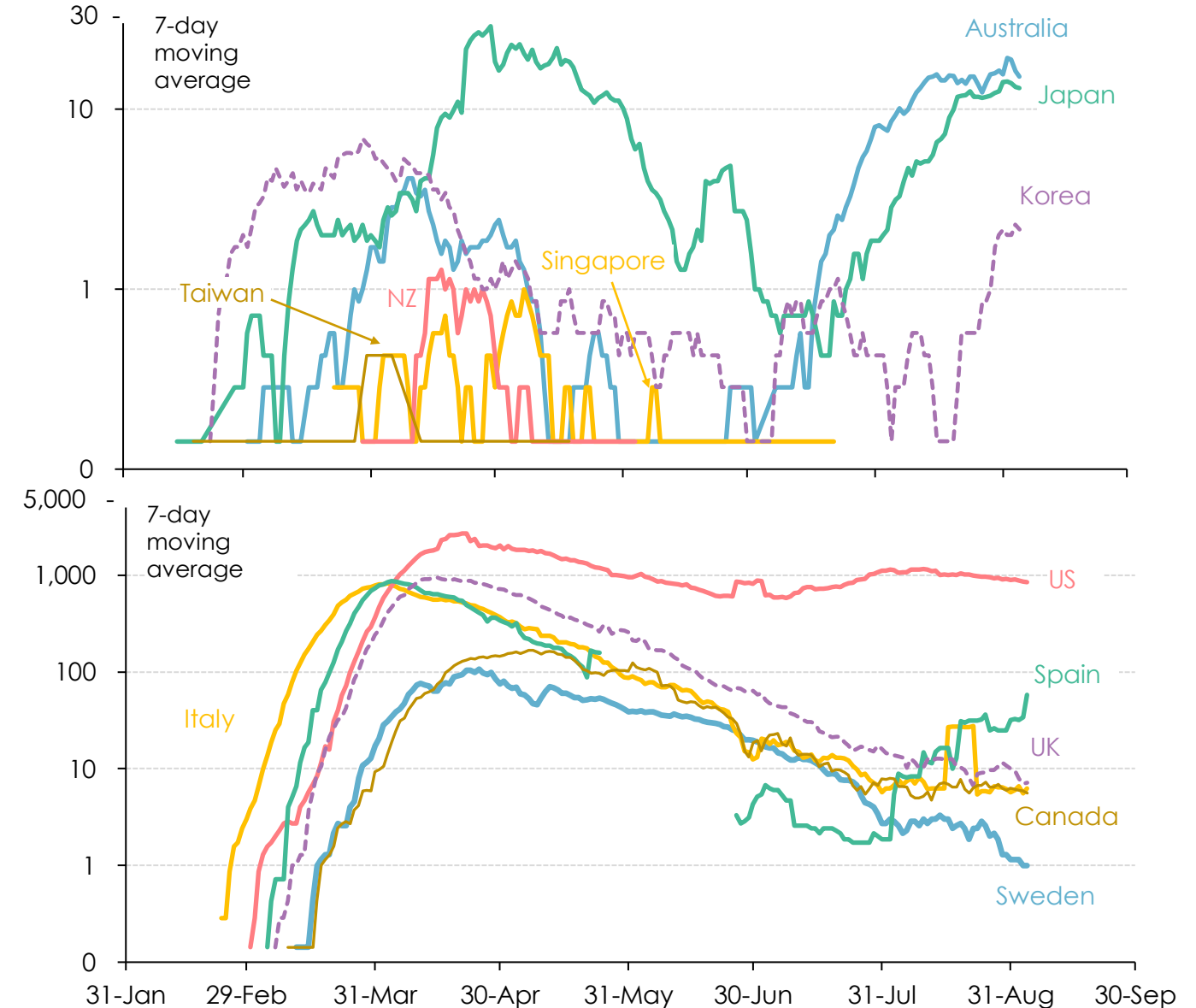
Note: All charts are on logarithmic scale. Cases for Maine (whose Electoral College votes are awarded separately by each of its two Congressional districts) are split by how each of its 16 counties voted in 2016. Sources: [USAFacts](#); [Centers for Disease Control and Prevention](#); Corinna. Latest data are for 10<sup>th</sup> September.

# A growing number of 'advanced' nations are experiencing 'second waves' of new cases – but Australia is one of the few also with a surge in deaths

## Daily new cases



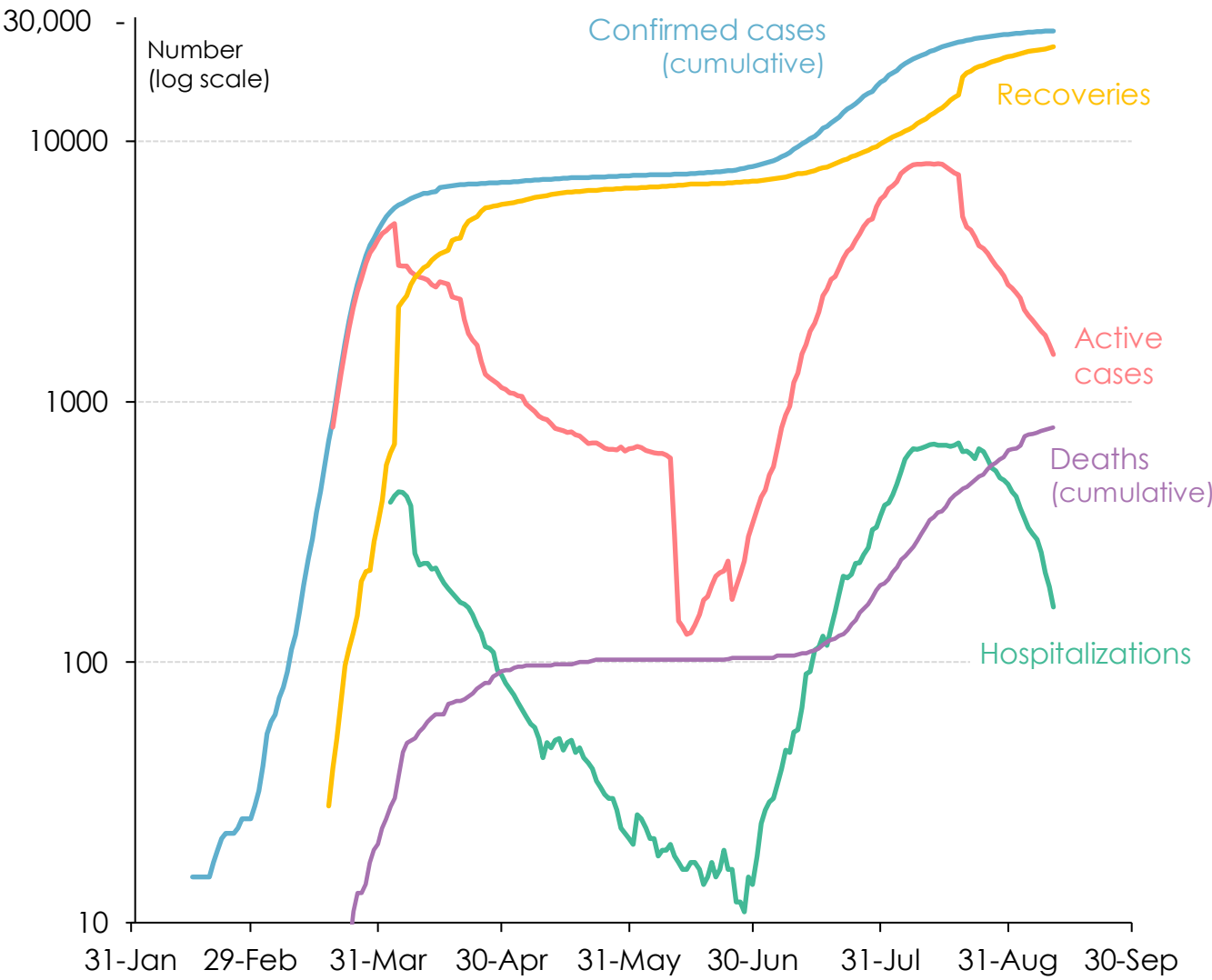
## Daily new deaths



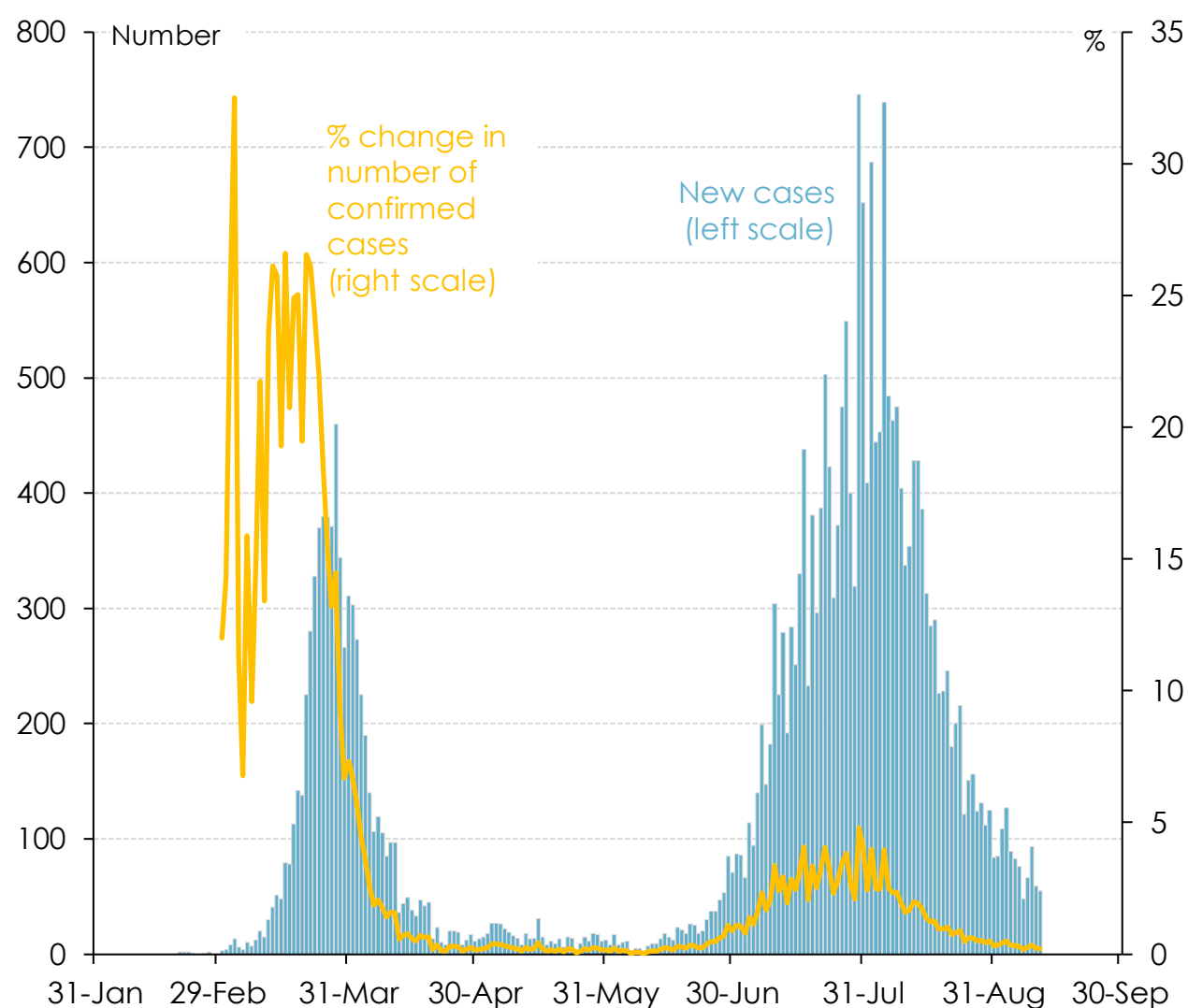
Note: All charts are on logarithmic scales. Data for new deaths in Spain between 25<sup>th</sup> May and 19<sup>th</sup> June not shown because of distortions caused by reclassifications on those dates. Data up to 11<sup>th</sup> September. Source: University of Oxford, [Our World in Data](#); Corinna.

# The number of new cases in Australia over the past week was the lowest since the last week of June, although the number of deaths is still rising

Cases, recoveries, hospitalizations and deaths



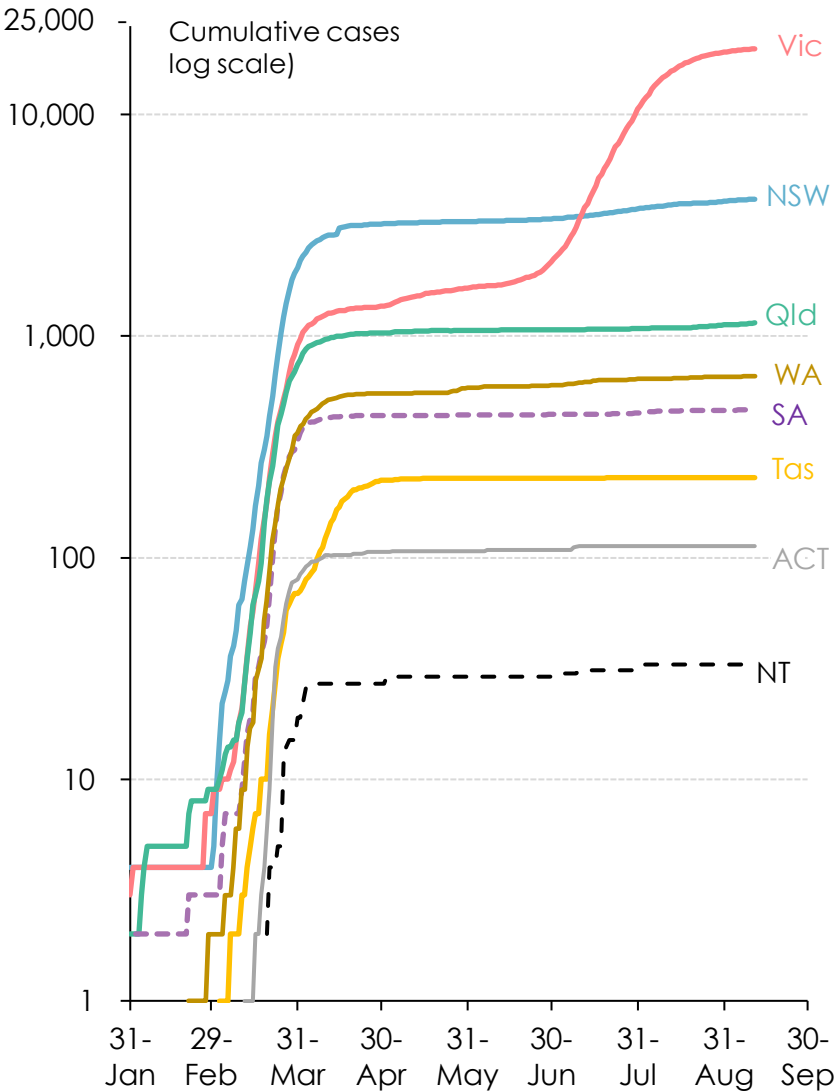
New cases



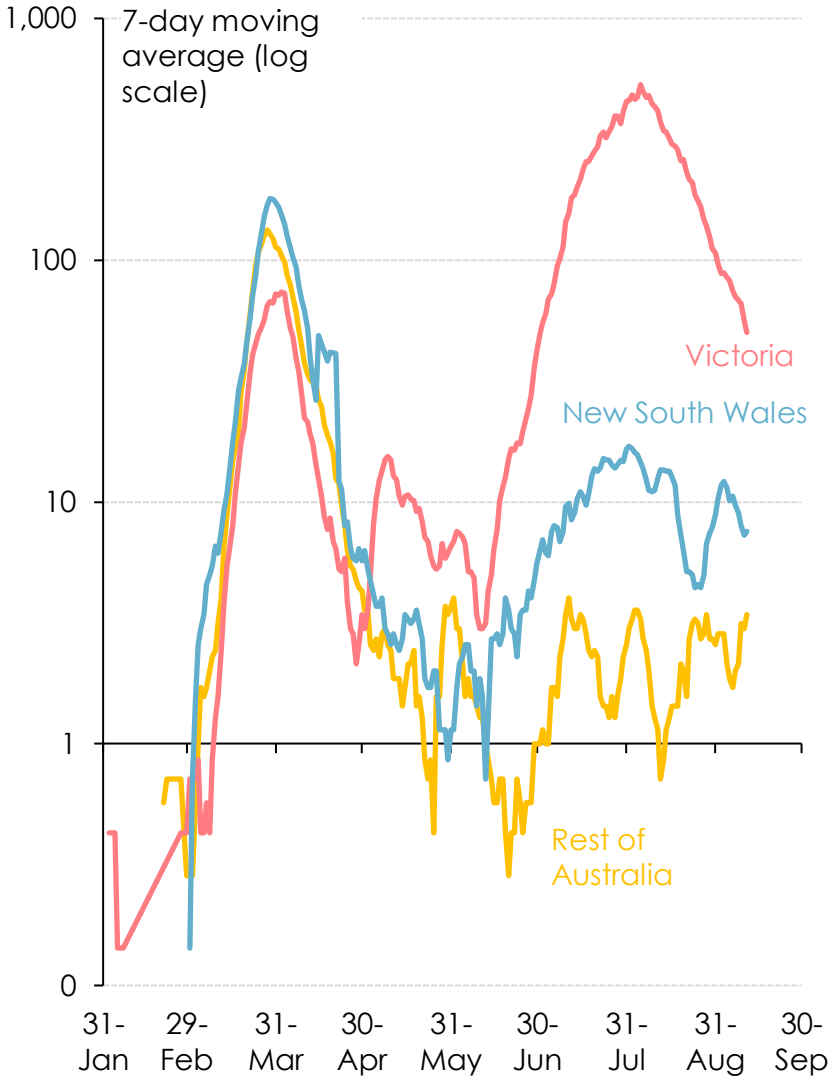
Note: Data up to 11<sup>th</sup> September. Source: [covid19data.com.au](https://covid19data.com.au).

# Victoria's "second wave" of infections peaked in the first week of August but still hasn't receded enough to allow the state to start 're-opening'

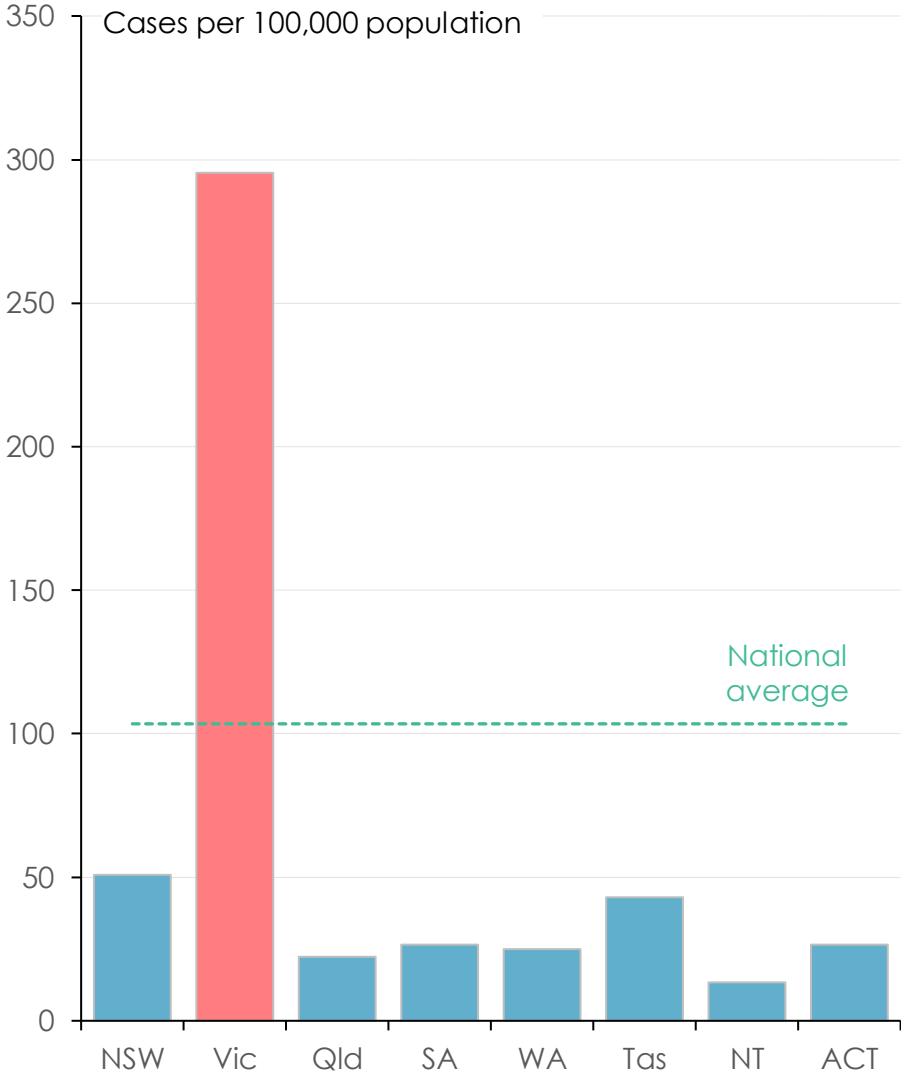
Cumulative cases, by State



New cases



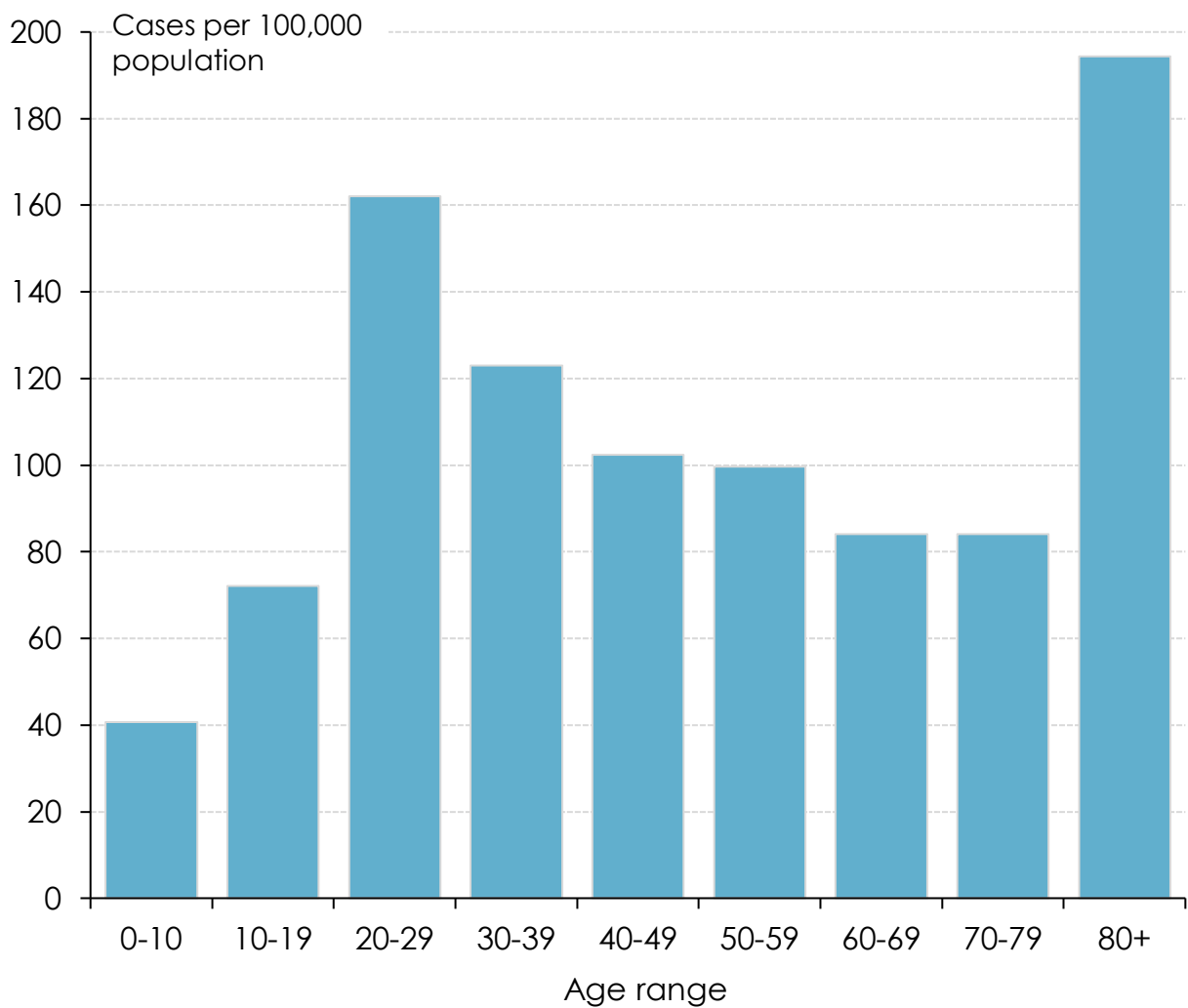
Cases per 100,000 population



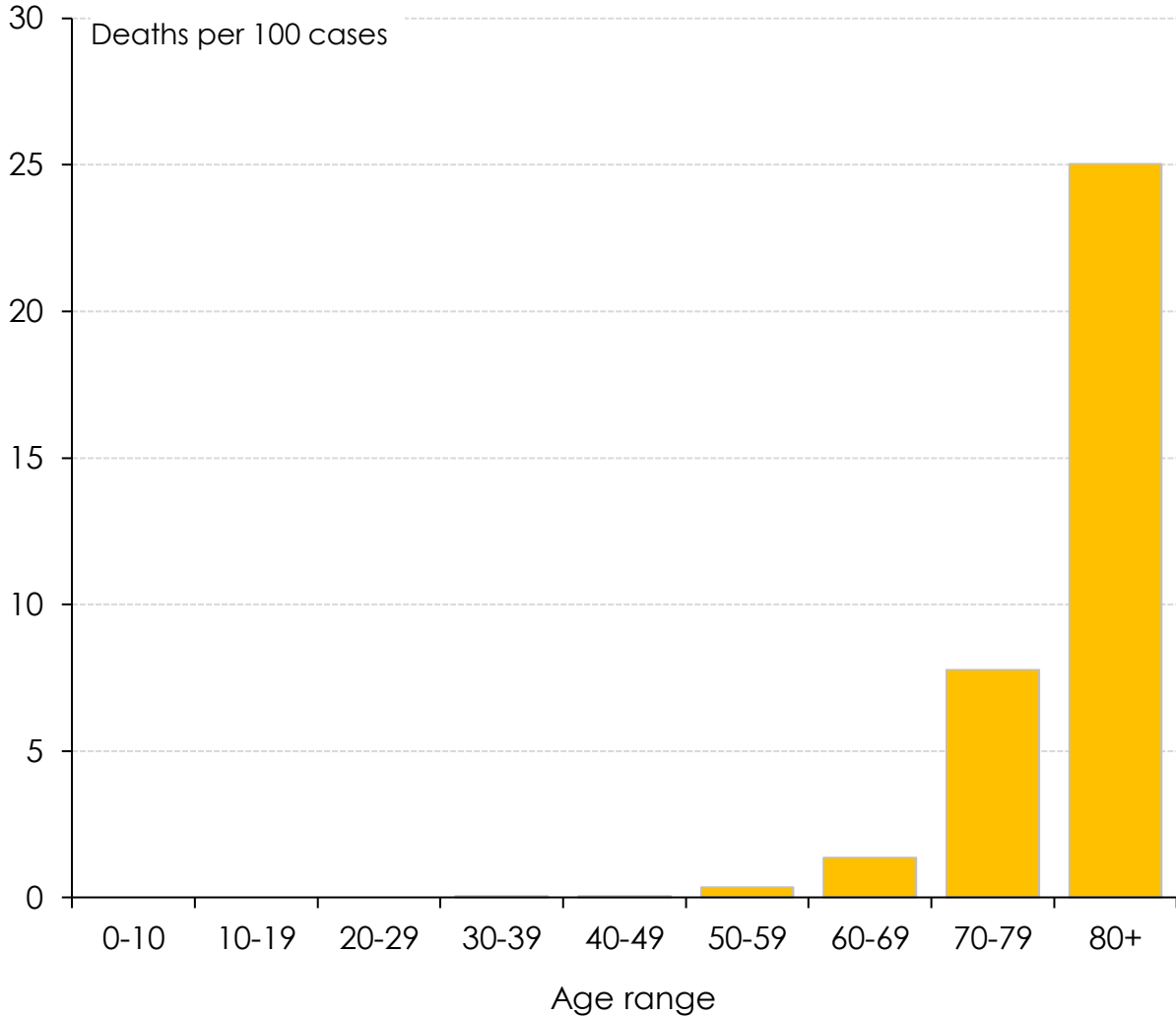
Note: Data up to 11<sup>th</sup> September. Source: [covid19data.com.au](https://covid19data.com.au).

# Infection rates now higher among people in their 20s & 30s than among those in their 40s though 70s, though fatality rates are higher for over-60s

Cumulative confirmed cases per 100,000 population, by age group



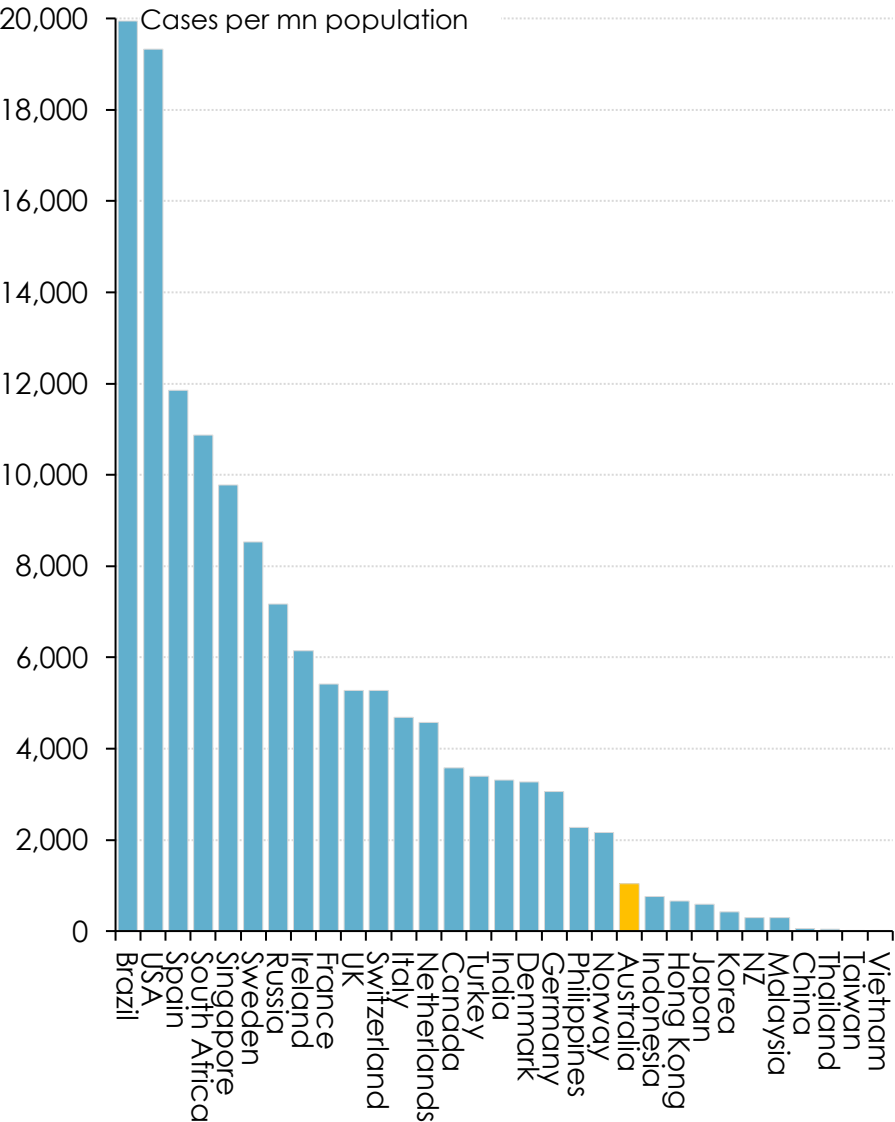
Deaths from Covid-19 per 100 cases, by age group



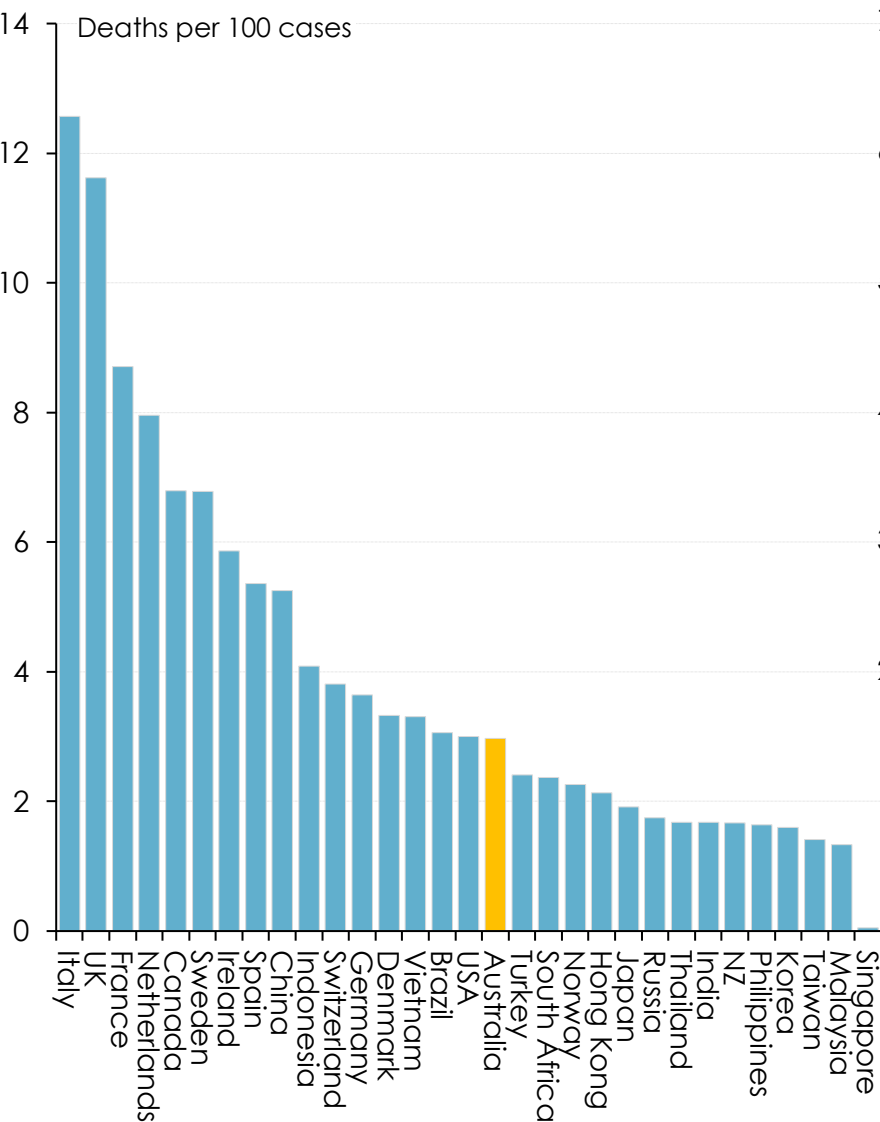
Note: Data up to 11<sup>th</sup> September. Source: Australian Government Department of Health, National Notifiable Diseases Surveillance System; ABS; Corinna.

# Australia's infection and fatality rates remain, along with NZ's and most East Asian countries', low by international standards

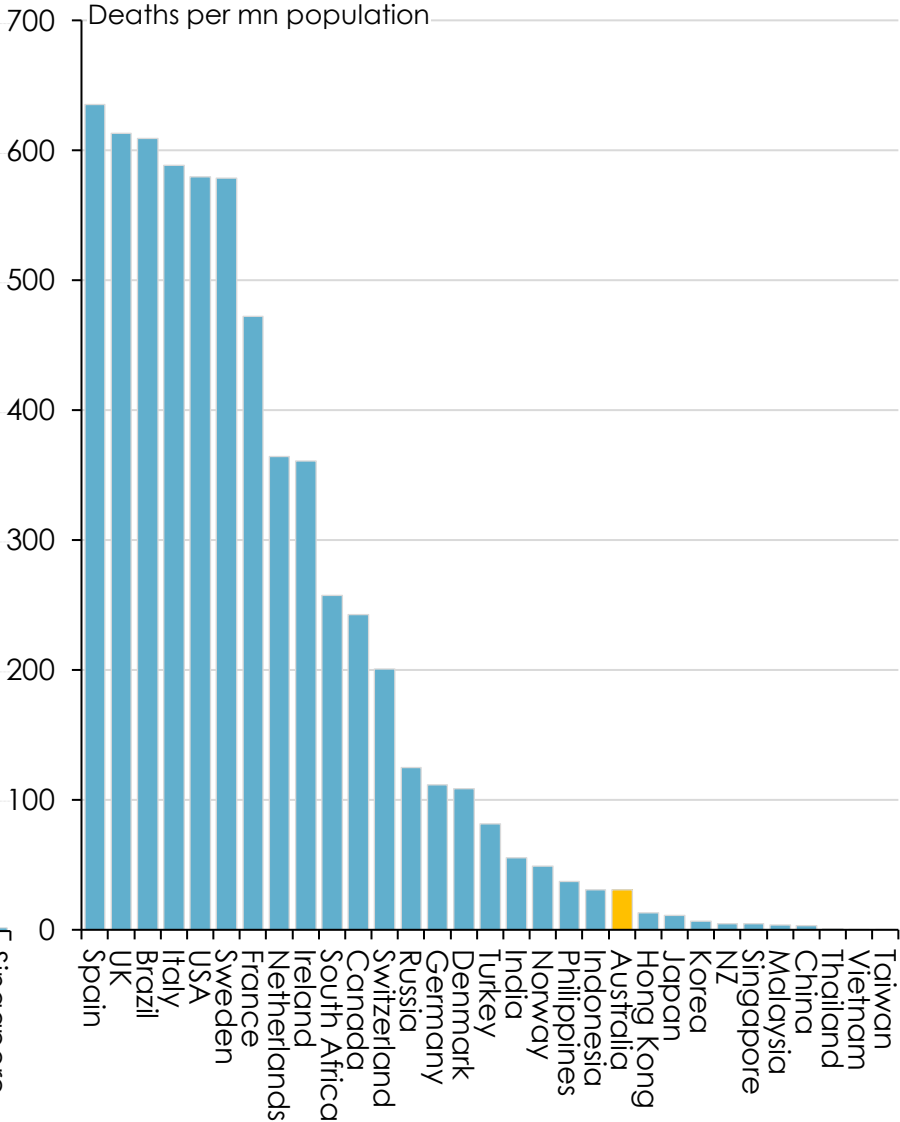
Apparent infection rate



Apparent fatality rate



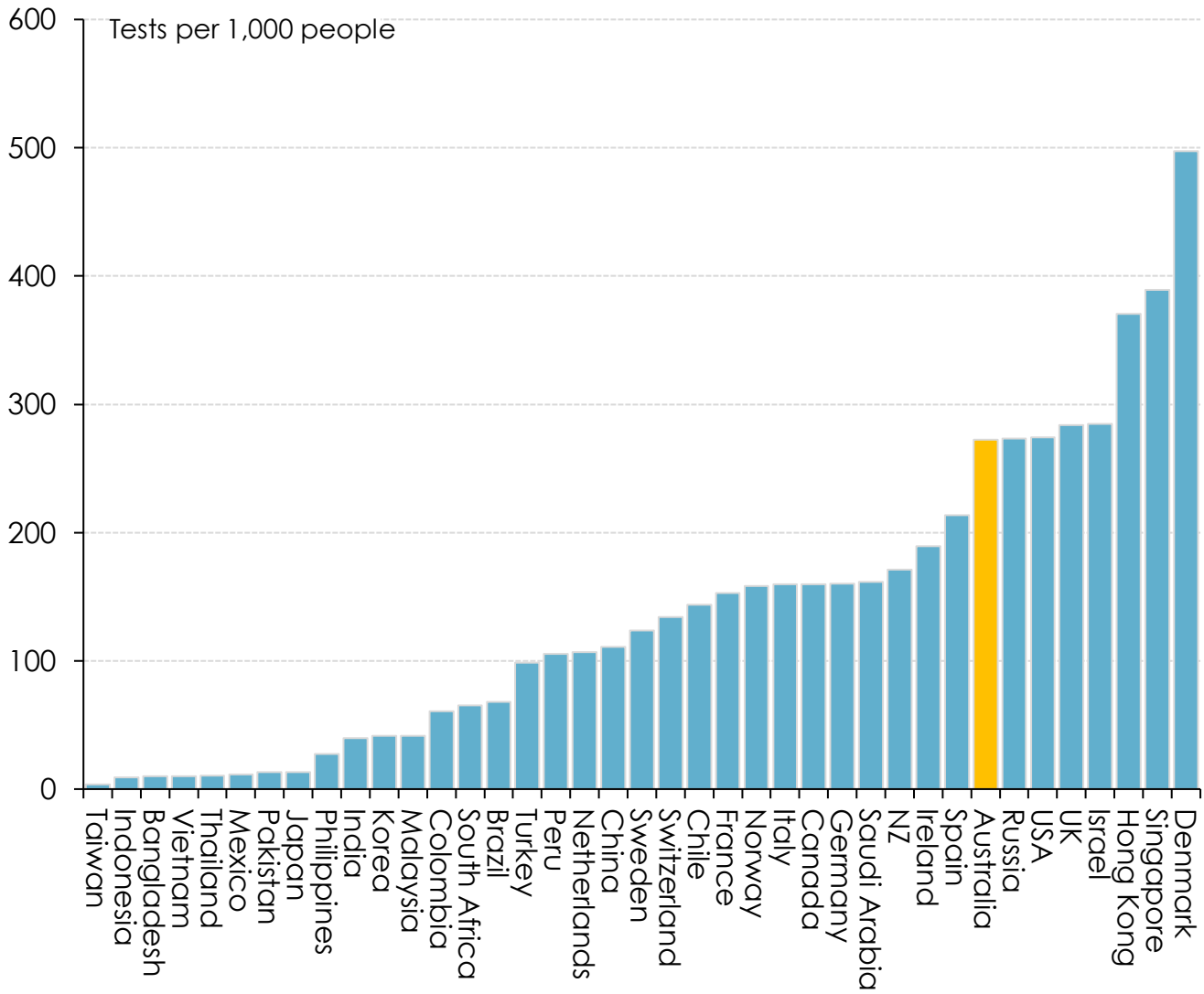
Death rate



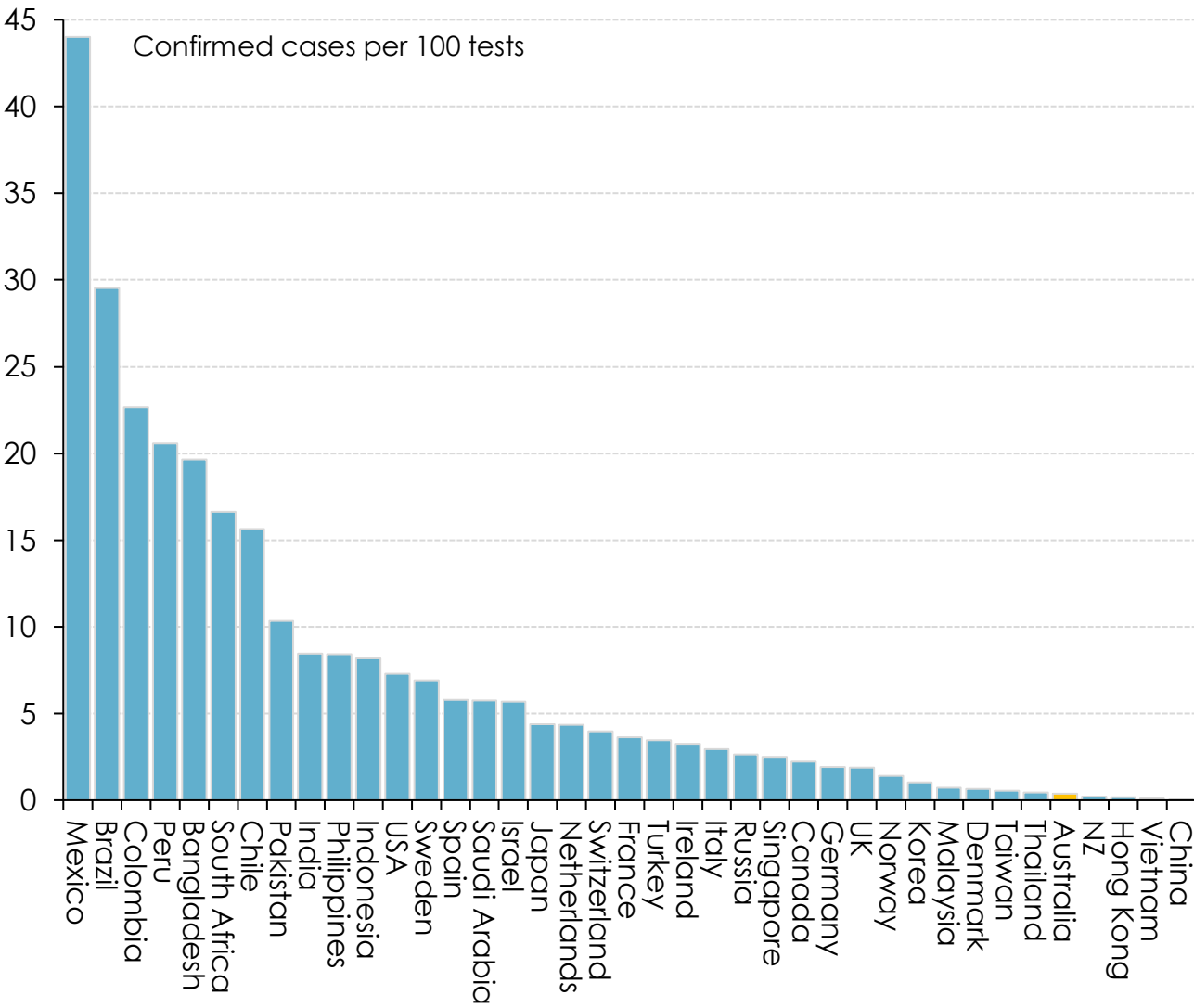
Note: Data up 11<sup>th</sup> September. Source: University of Oxford, [Our World in Data](#); Corinna.

# Australia's testing regime appears sufficiently broad for the low infection and death rates to be seen as 'credible' (ie not due to low testing)

Tests per thousand of population



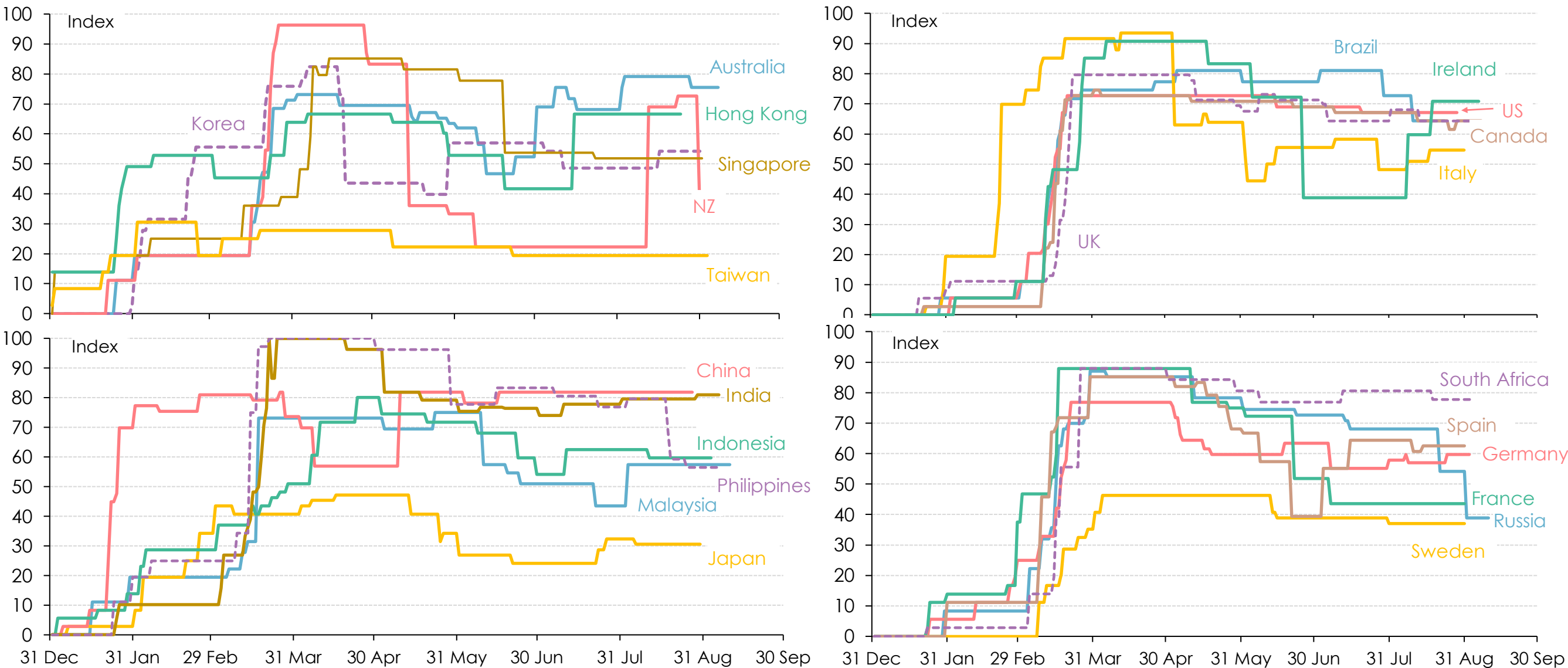
Confirmed cases per 100 tests



Note: Data up to 11<sup>th</sup> September. A high number of confirmed cases per 100 tests combined with a low number of tests per 000 population is *prima facie* evidence of an inadequate testing regime. Source: [Worldometers](#); Corinna.

# A few countries which have experienced ‘second waves’ have begun to ease restrictions in the past week

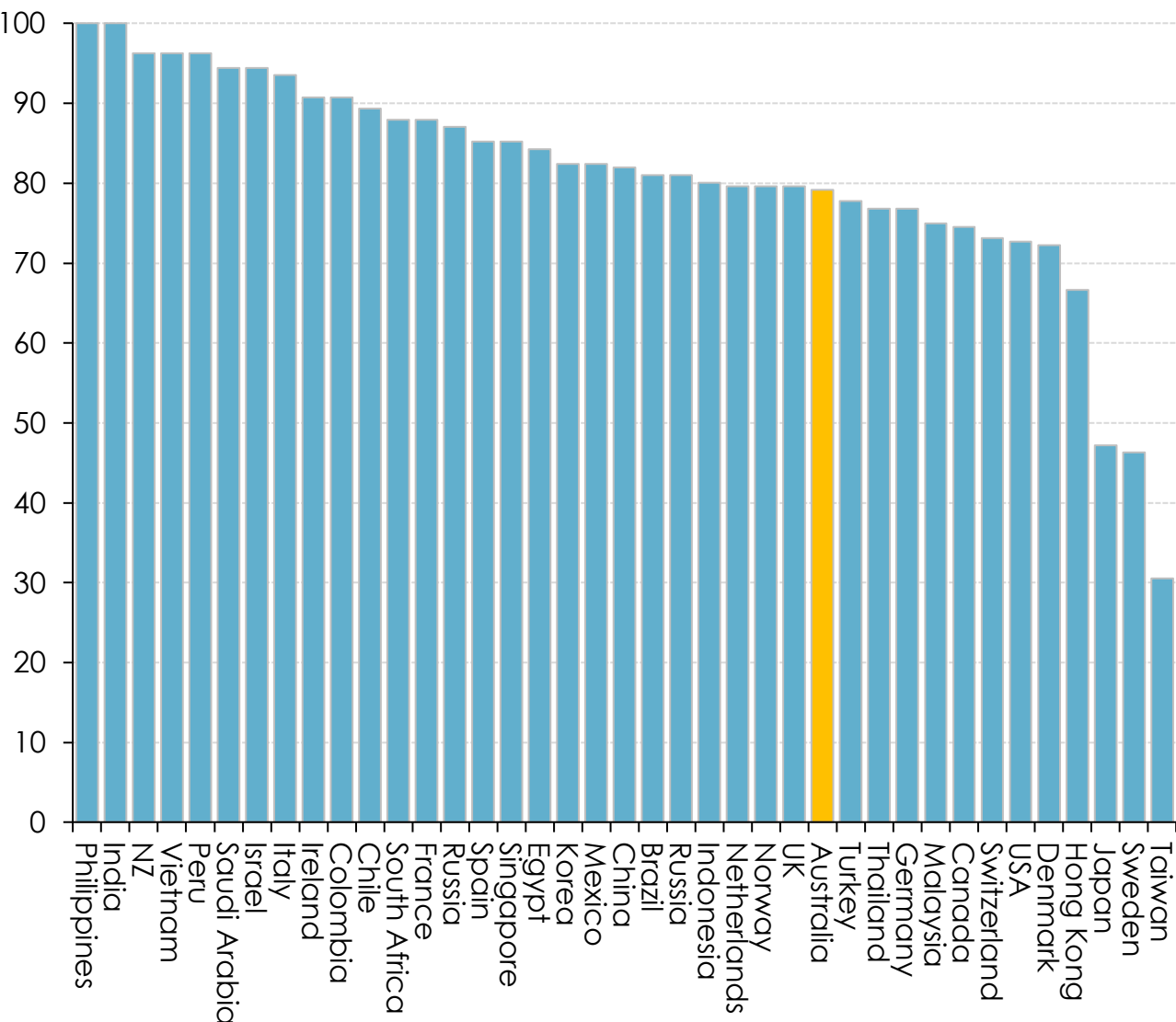
Timing and severity of government restrictions on movement and gathering of people



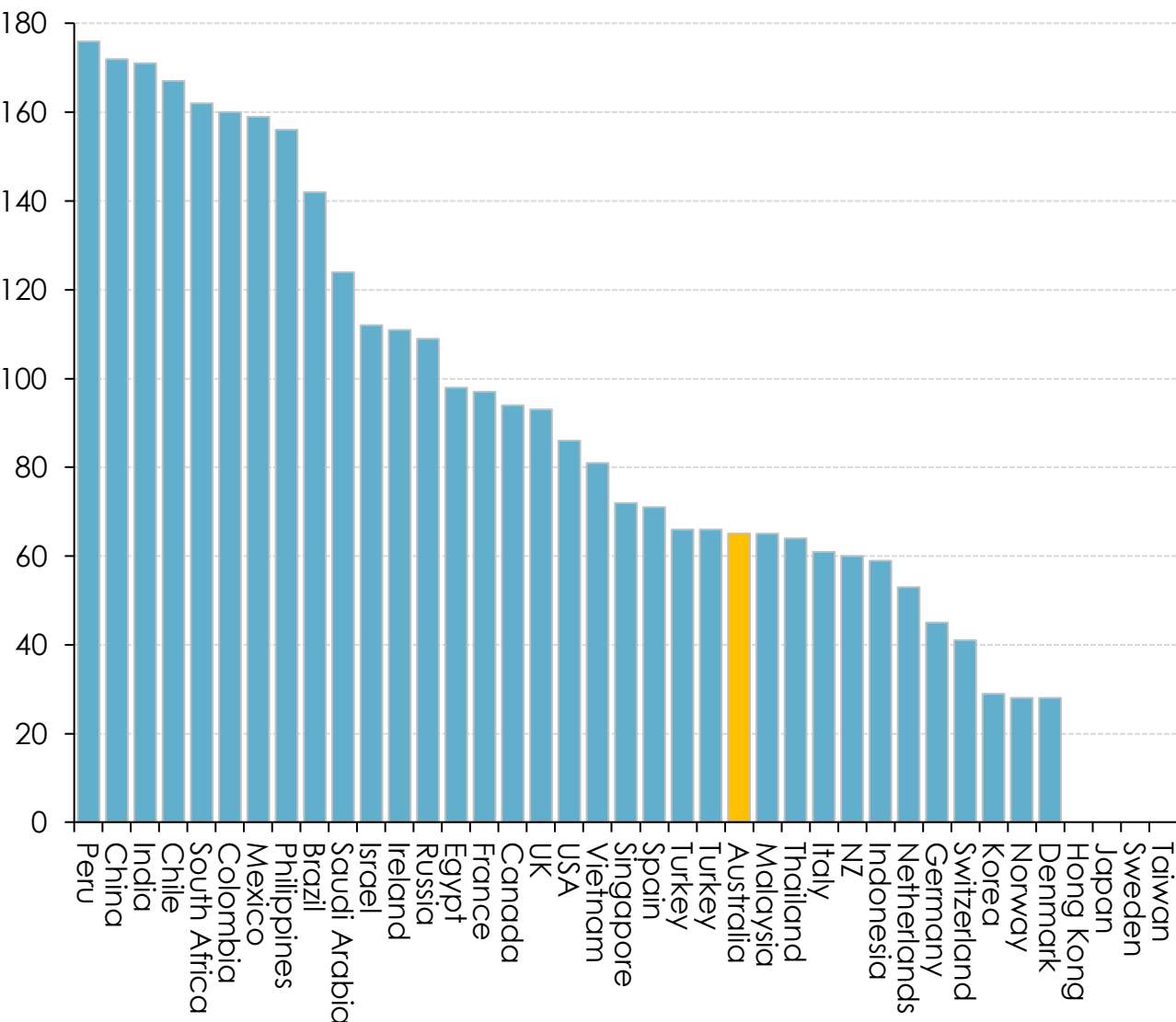
The Oxford COVID-19 Government Response Tracker collects publicly available information on 11 indicators of government response including school and workplace closures, public events cancellations, restrictions on public gatherings, stay at home requirements, public transport closures, domestic and international travel restrictions, public information campaigns, testing and contact tracing. Source: [Blavatnik School of Government, Oxford University](#). Data up to 24<sup>th</sup> August – 10<sup>th</sup> September.

# Australia's restrictions have been, on average, less stringent than in most other countries – though we have crept up the list a bit in the past 6 weeks

Highest level of restrictions imposed



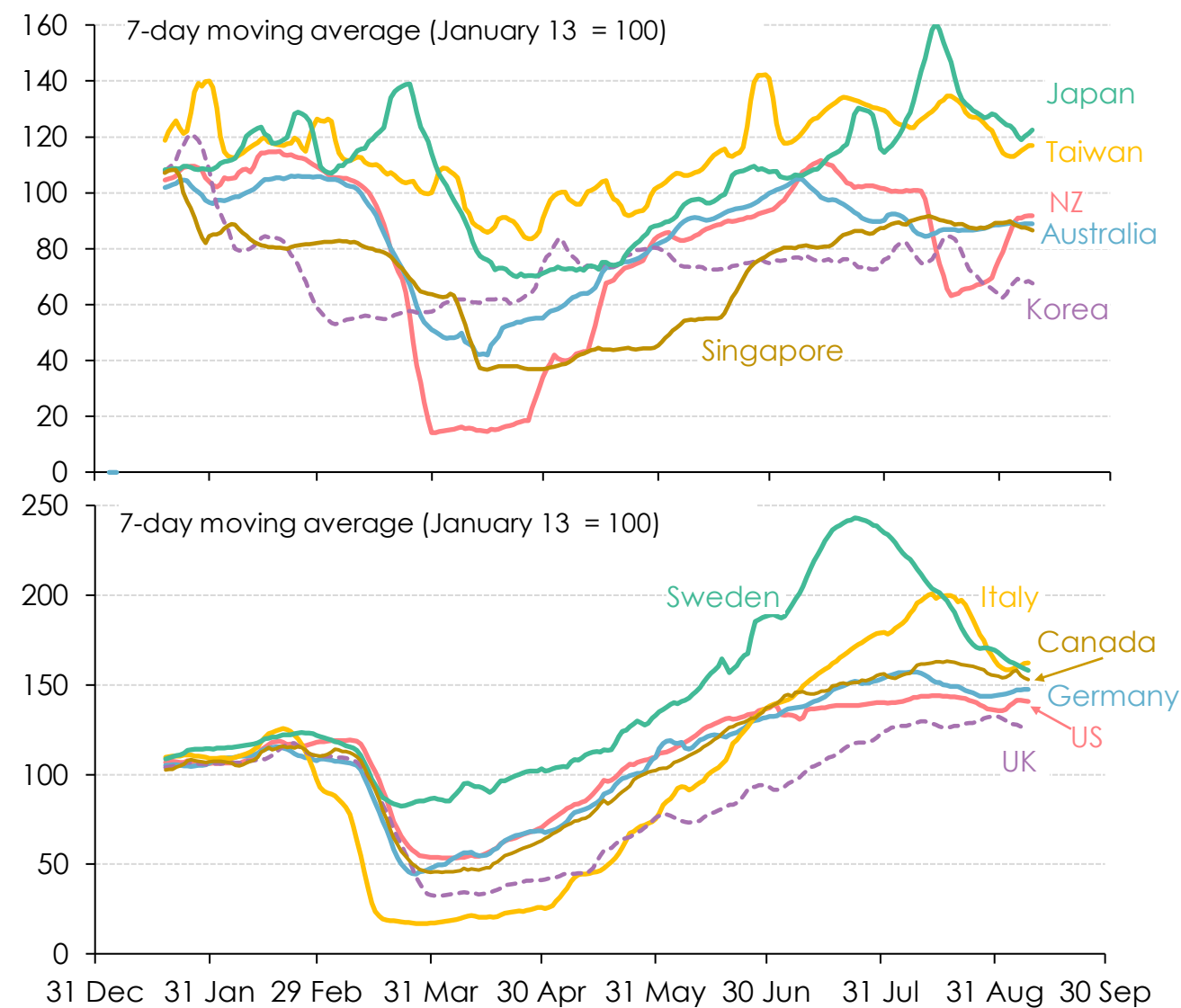
Number of days restrictions above 70 on Oxford index



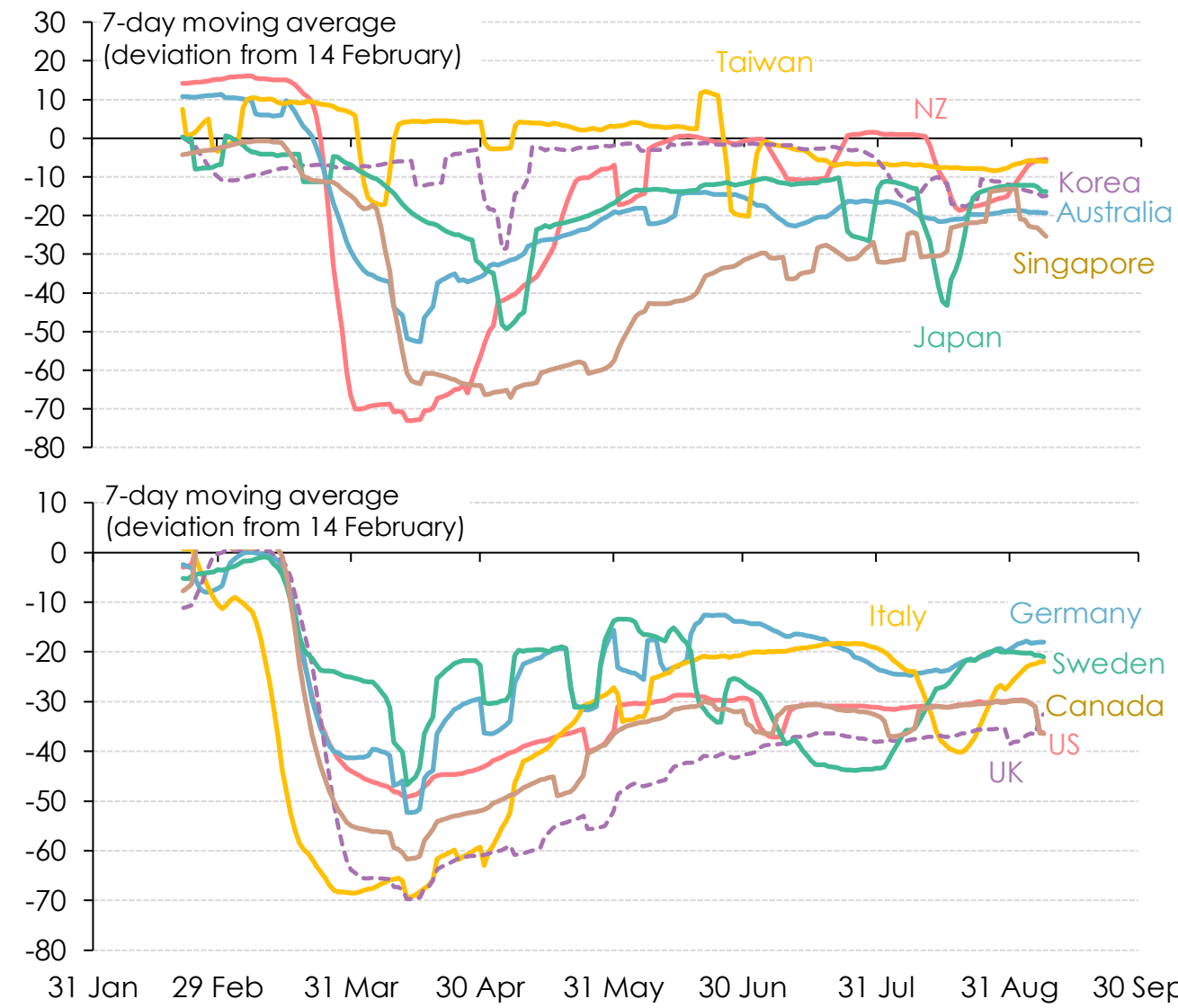
The Oxford COVID-19 Government Response Tracker collects publicly available information on 11 indicators of government response including school and workplace closures, public events cancellations, restrictions on public gatherings, stay at home requirements, public transport closures, domestic and international travel restrictions, public information campaigns, testing and contact tracing. Source: : [Blavatnik School of Government, Oxford University](#). Data up to 24<sup>th</sup> August – 10<sup>th</sup> September.

# The uptrend in mobility since April has begun to peter out in countries where restrictions have been re-imposed

Time spent driving



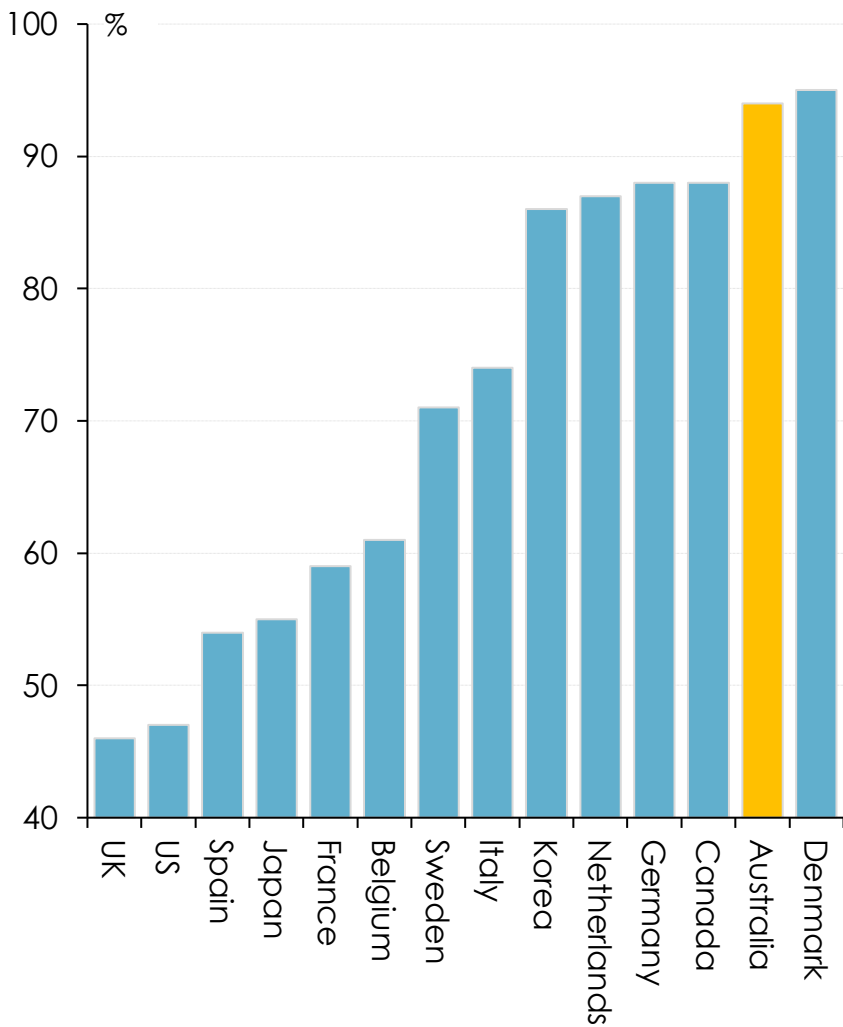
Time spent in work places



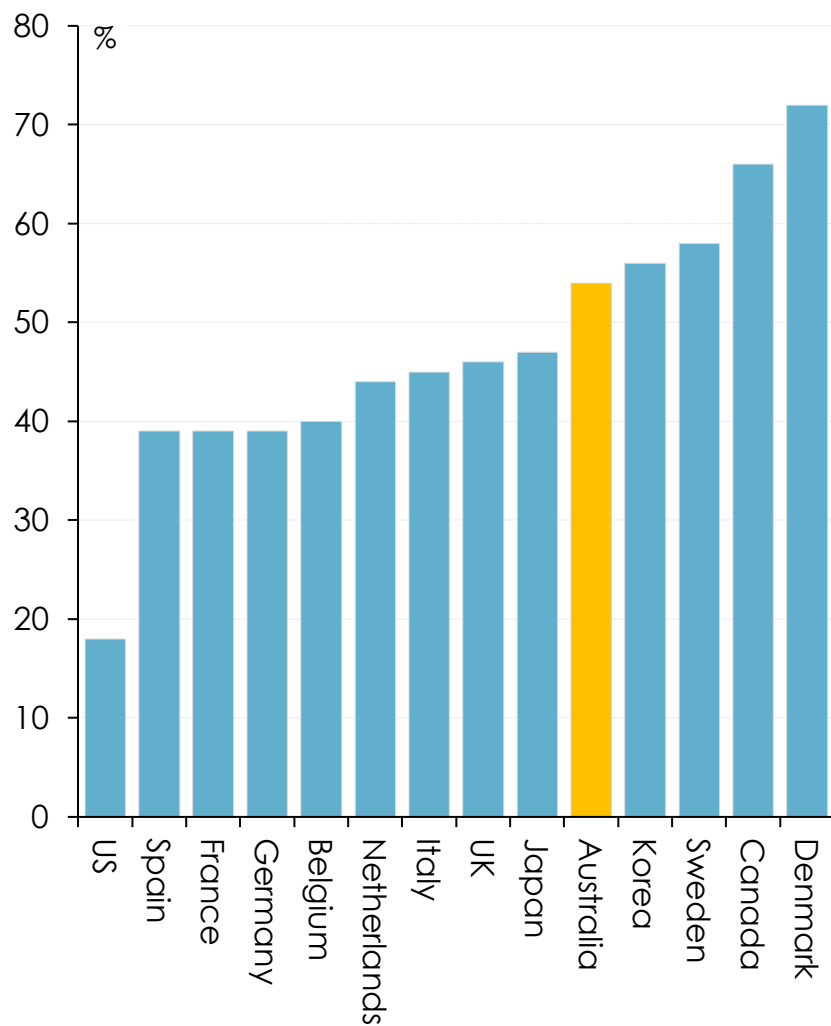
Note: these data will reflect normal seasonal variations in activities as well as the effects of government restrictions and individual responses to the risks posed by the virus. Sources: [Apple Mobility Trends Reports](#) (data up to 9<sup>th</sup> September); [Google Community Mobility Reports](#) (data up to 8<sup>th</sup> September).

# Australians seem very satisfied with their government's handling of Covid-19 – like Danes and Canadians but unlike Americans and Britons

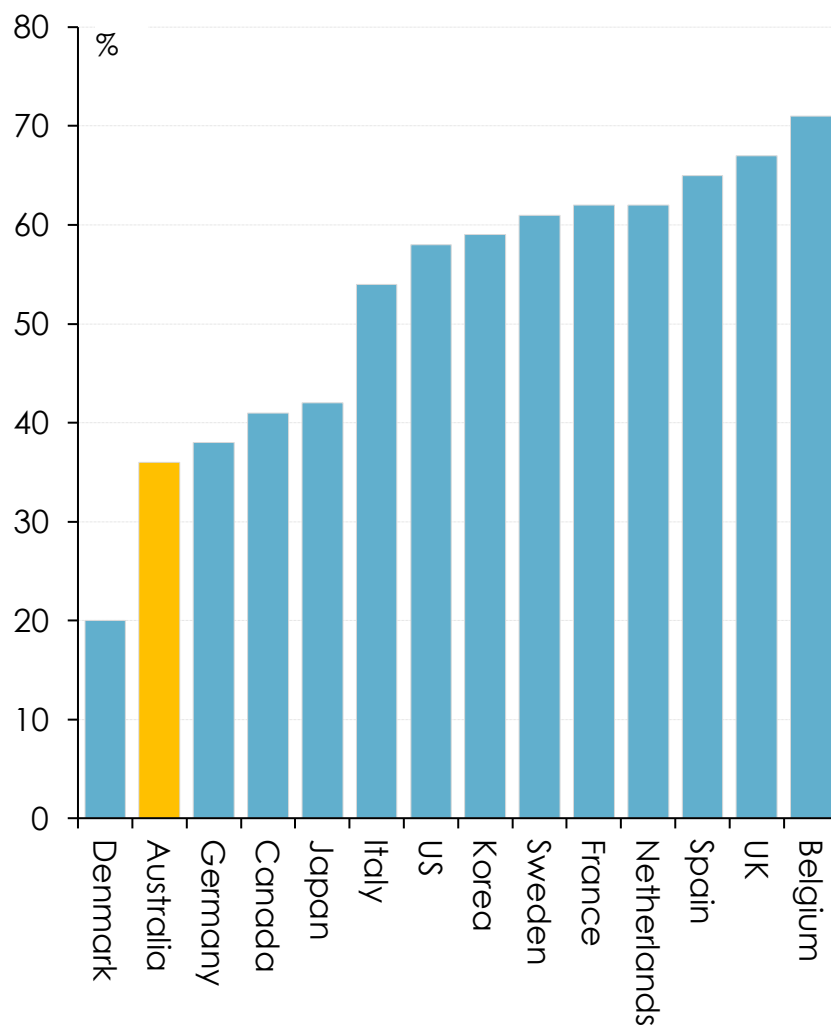
'My country has done a good job handling Covid-19'



'My country is now more united than before the outbreak'



'More international co-operation would have reduced cases'



Source: Pew Research Center: survey of 14,276 adults in 14 countries conducted between 10<sup>th</sup> June and 3<sup>rd</sup> August.

**The world**

# The world economy experienced has experienced its sharpest year-on-year contraction in at least 40, and probably almost 90, years

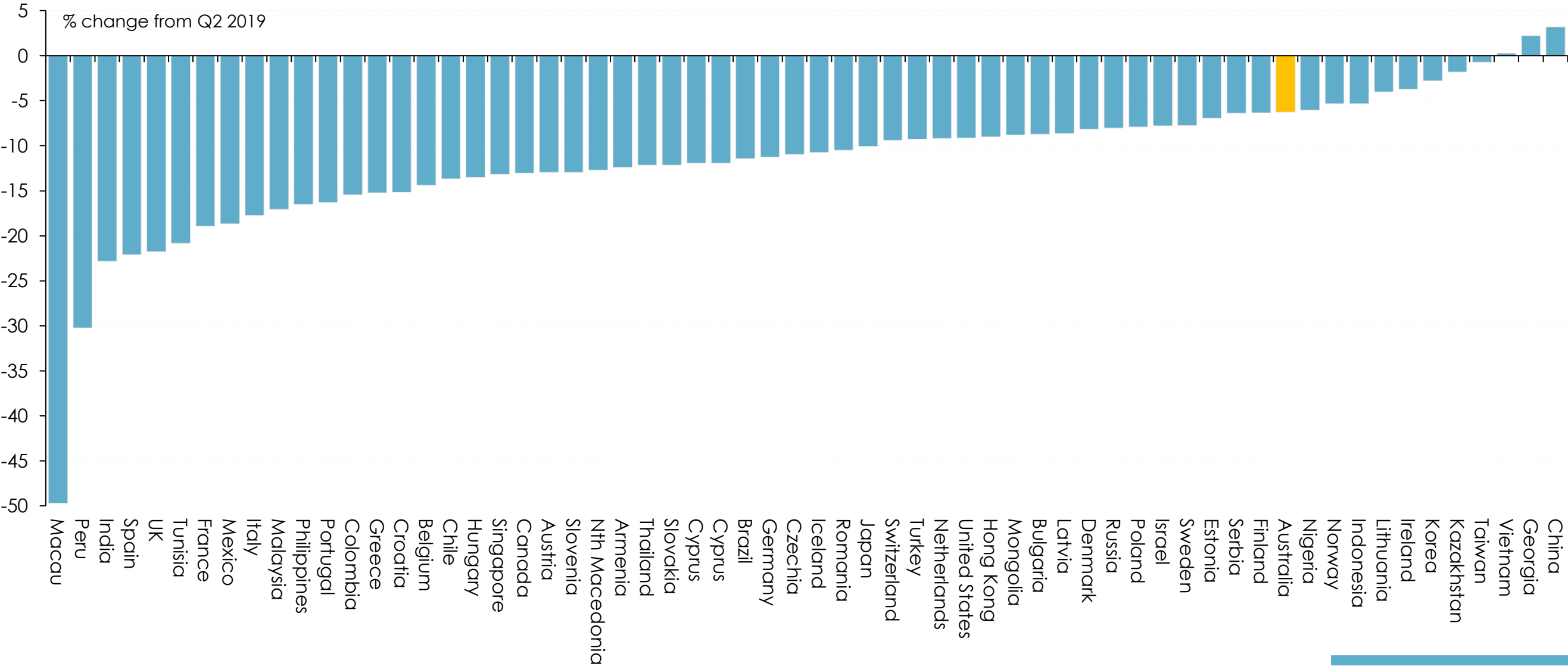
World and OECD area real GDP growth



Note: Estimates of global GDP growth compiled by Corinna using data for 95 countries accounting for 90% of 2018 world GDP as measured by the IMF; excludes constituents of the former USSR before 1993, the former Czechoslovakia before 1995, and the former Yugoslavia before 1998. (p) Estimate for Q2 is a preliminary estimate based on published results for the 62 countries shown in the [next slide](#); the only significant economies still missing from the 95 in the full data set are Argentina, Ukraine and Saudi Arabia. Sources: national statistical agencies and central banks; Eurostat; OECD; IMF; Corinna.

# Of the 62 economies which have reported Q2 GDP data so far, the worst contractions over the past year have been in Macau, Peru, India & Spain

Real GDP growth over the year to Q2 2020



Sources: national statistical agencies and central banks; Refinitiv Datastream; Corinna.

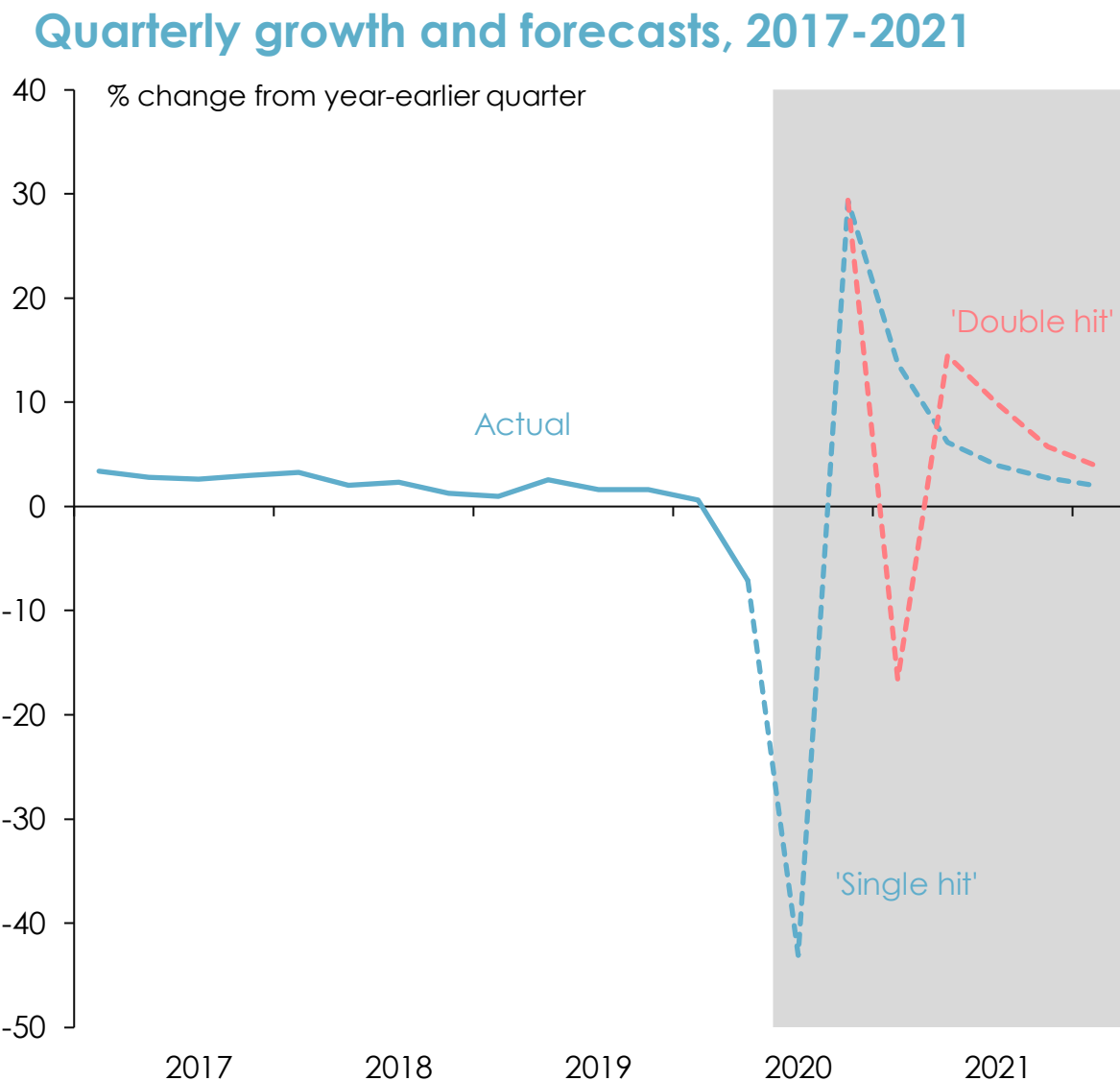
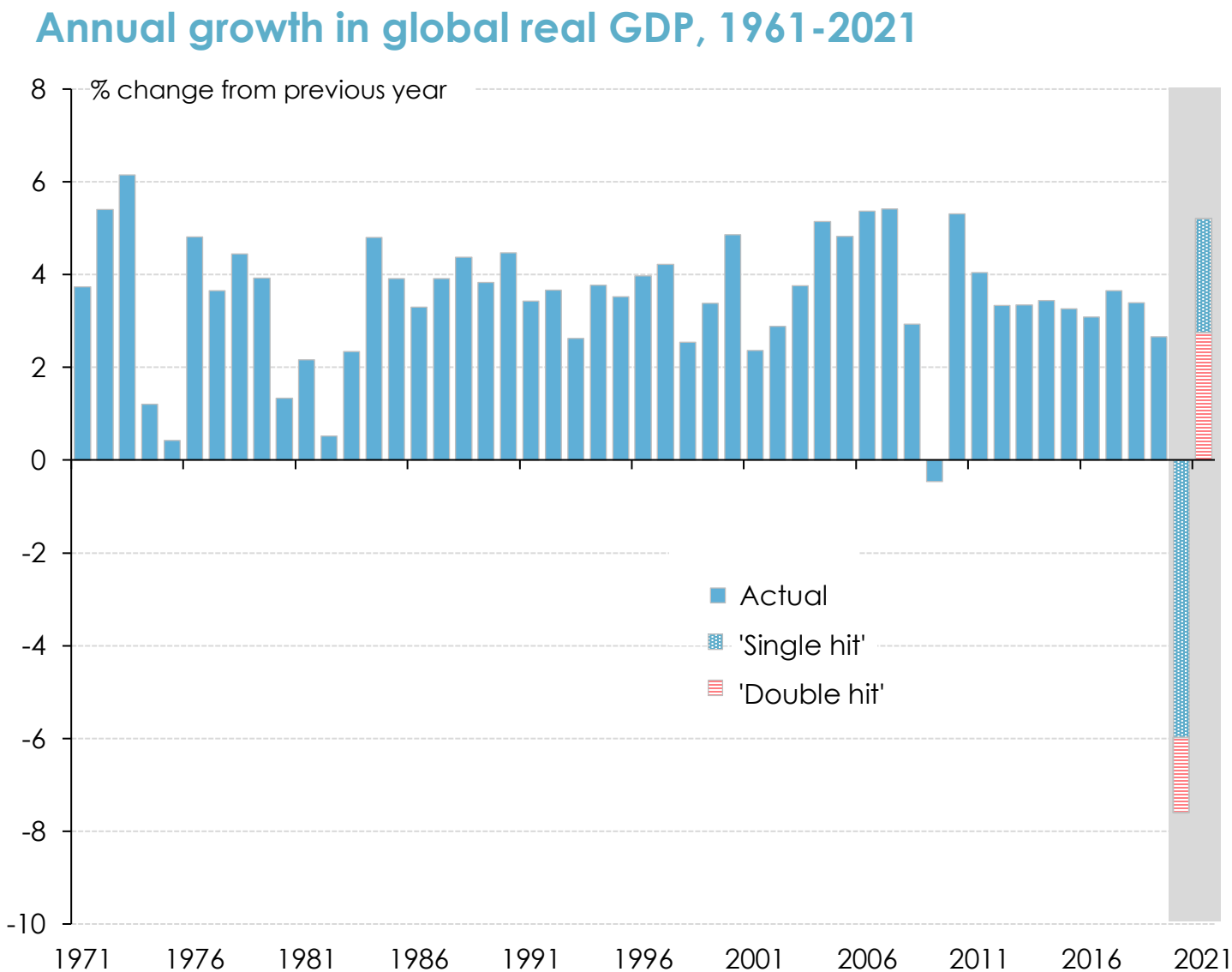
# All of the major international economic forecasting institutions expect 2020 to be the worst year for global growth since the 1930s

## Major global institutions' growth forecasts for 2020 and 2021 compared

	<i>Actual</i>	<i>IMF</i>		<i>World Bank</i>		<i>OECD*</i>		<i>Australian Treasury</i>	
	2019	2020	2021	2020	2021	2020	2021	2020	2021
US	2.3	-6.1	4.5	-6.1	4.0	-7.3	4.1	-8.0	4.8
China	6.1	1.2	9.2	1.0	6.9	-2.6	6.8	1.8	8.3
Euro area	1.2	-7.5	4.7	-9.1	4.5	-9.1	6.5	-8.8	5.0
India	4.2	1.9	7.4	-3.2	3.1	-3.7	7.9	-4.0	4.3
Japan	0.7	-5.2	3.0	-6.1	2.5	-6.0	2.1	-6.3	2.8
UK	1.4	-6.5	4.0	na	na	-11.5	9.0	na	na
Australia	1.8	-6.7	7.1	na	na	-5.0	4.1	-3.8	2.5
New Zealand	2.2	-7.2 <sup>†</sup>	5.9 <sup>†</sup>	na	na	-8.9	6.6	na	na
World	2.9	-3.0	5.8	-5.2	4.2	-6.0	5.2	-4.8	5.0
World trade	0.9	-11.0	8.4	-13.4	5.3	-9.5	6.0	na	na

\* OECD forecasts are their 'single hit' scenario to be consistent with the assumptions of the other institutions. <sup>†</sup> The IMF did not publish revised forecasts for New Zealand in its latest WEO publication. Sources: International Monetary Fund (IMF), *World Economic Outlook*, 24<sup>th</sup> June 2020; The World Bank, *Global Economic Prospects*, 8<sup>th</sup> June 2020; Organization for Economic Co-operation & Development (OECD), *Economic Outlook*, Volume 2020 Issue 1, 10<sup>th</sup> June 2020; Australian Treasury, *Economic and Fiscal Update*, 23<sup>rd</sup> July 2020.

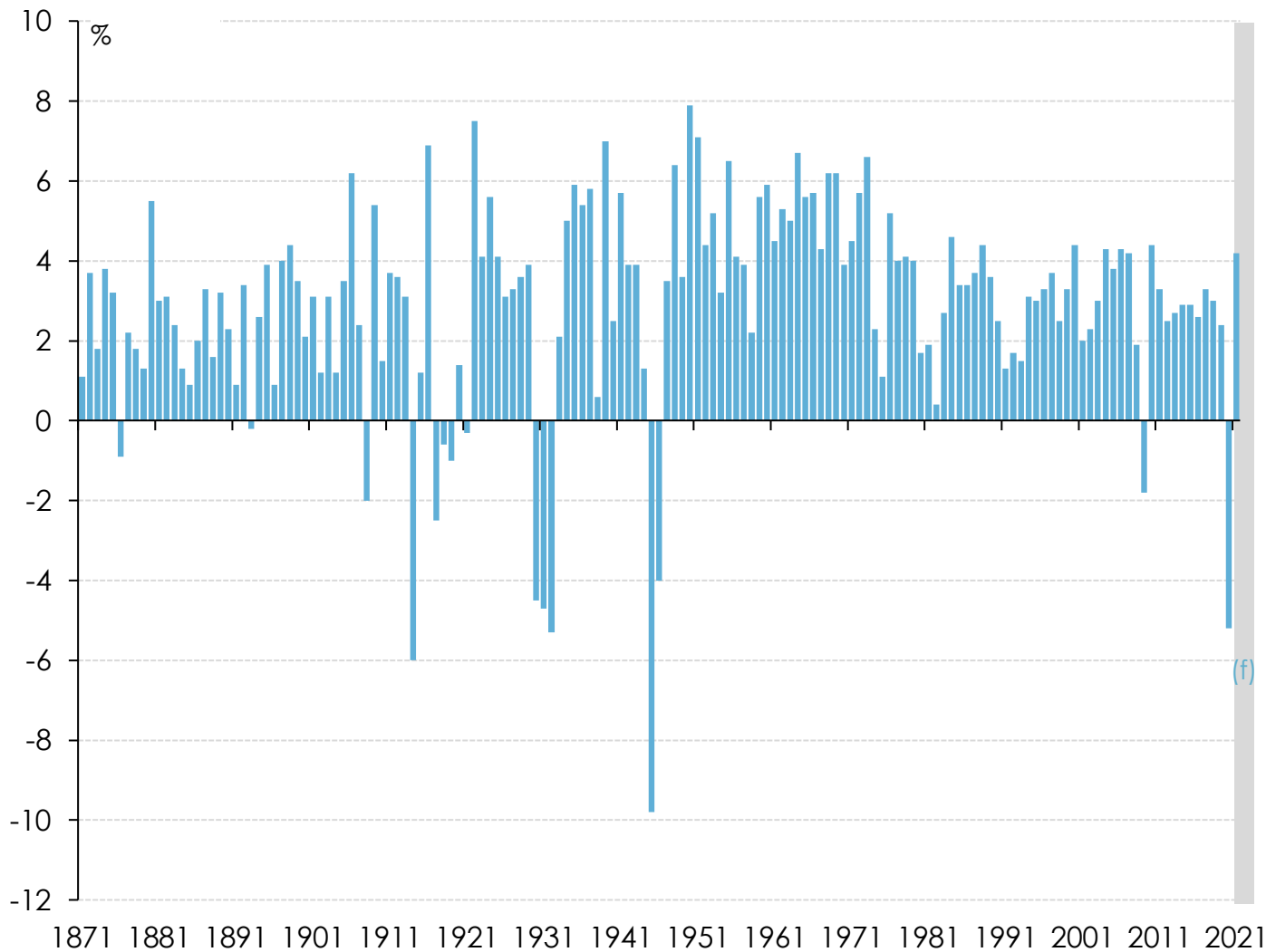
# The OECD forecasts a 6% decline in world GDP this year, followed by a 5.2% rebound in 2021 – or -7.2% followed by +2.8% if there's a 'second wave'



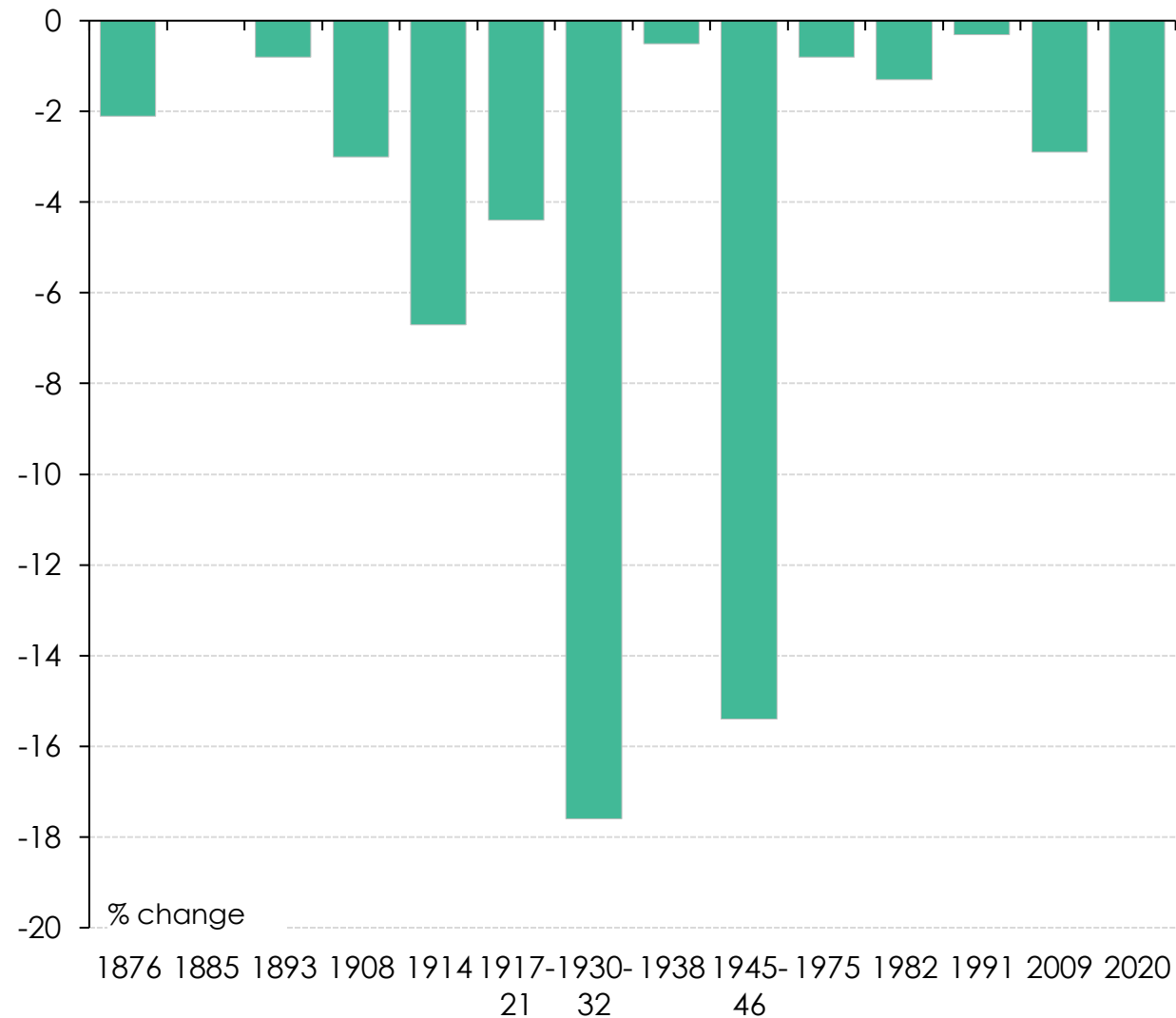
Note: The 'double hit' scenario assumes a 'second wave' of Covid-19 infections and deaths "in all economies towards the end of this year", while the 'single hit' scenario assumes this 'second wave is avoided'. The OECD regards each scenario as "equally likely". Source: OECD, *Economic Outlook*, No. 107, Volume 2020 Issue 1, 10<sup>th</sup> June 2020.

# The World Bank forecasts a 5.2% decline in world GDP this year, with a 4.2% increase in 2021 - the 4<sup>th</sup> worst global downturn in 150 years

Growth in global real GDP, 1871-2001



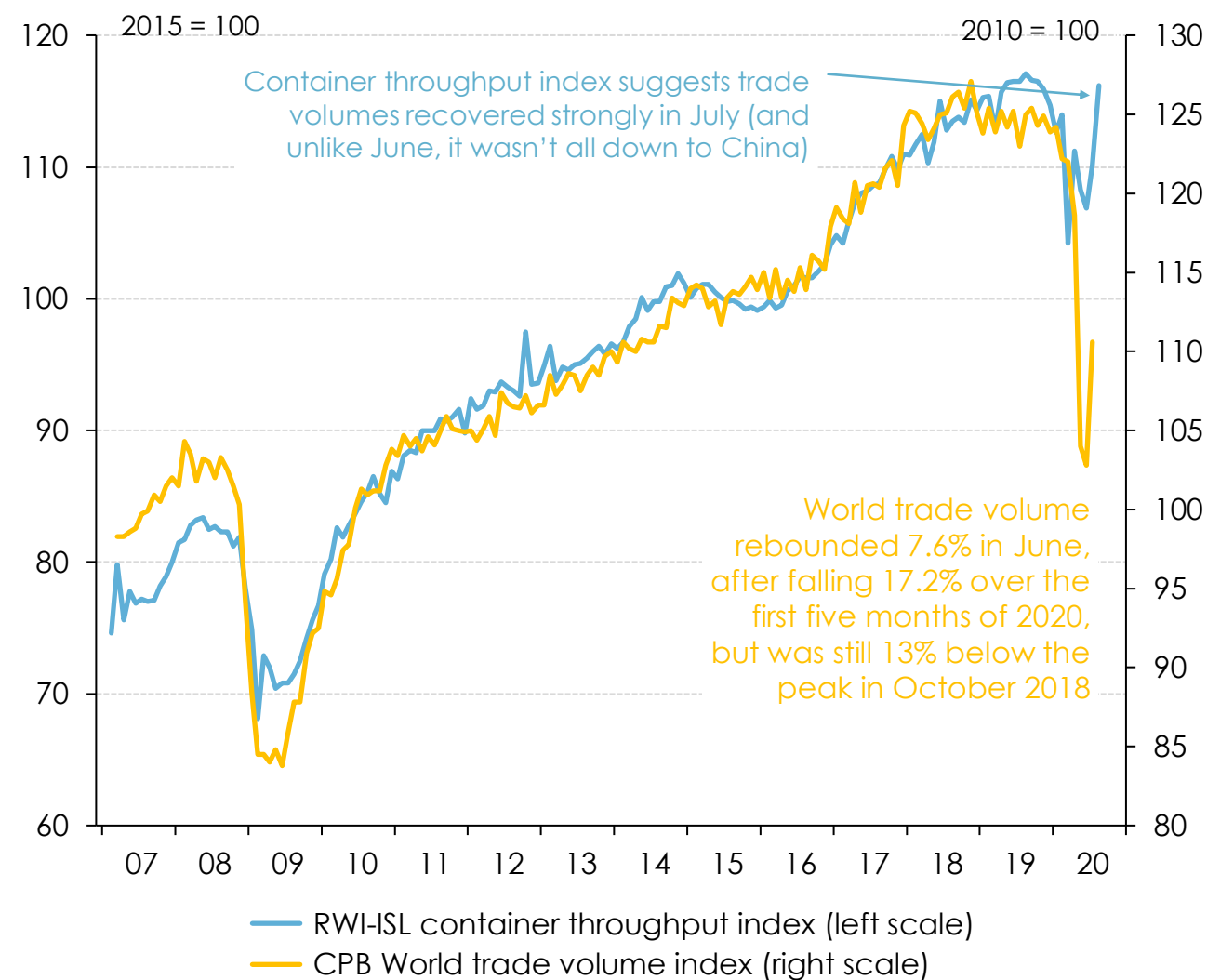
Cumulative decline in real per capita GDP during global recessions



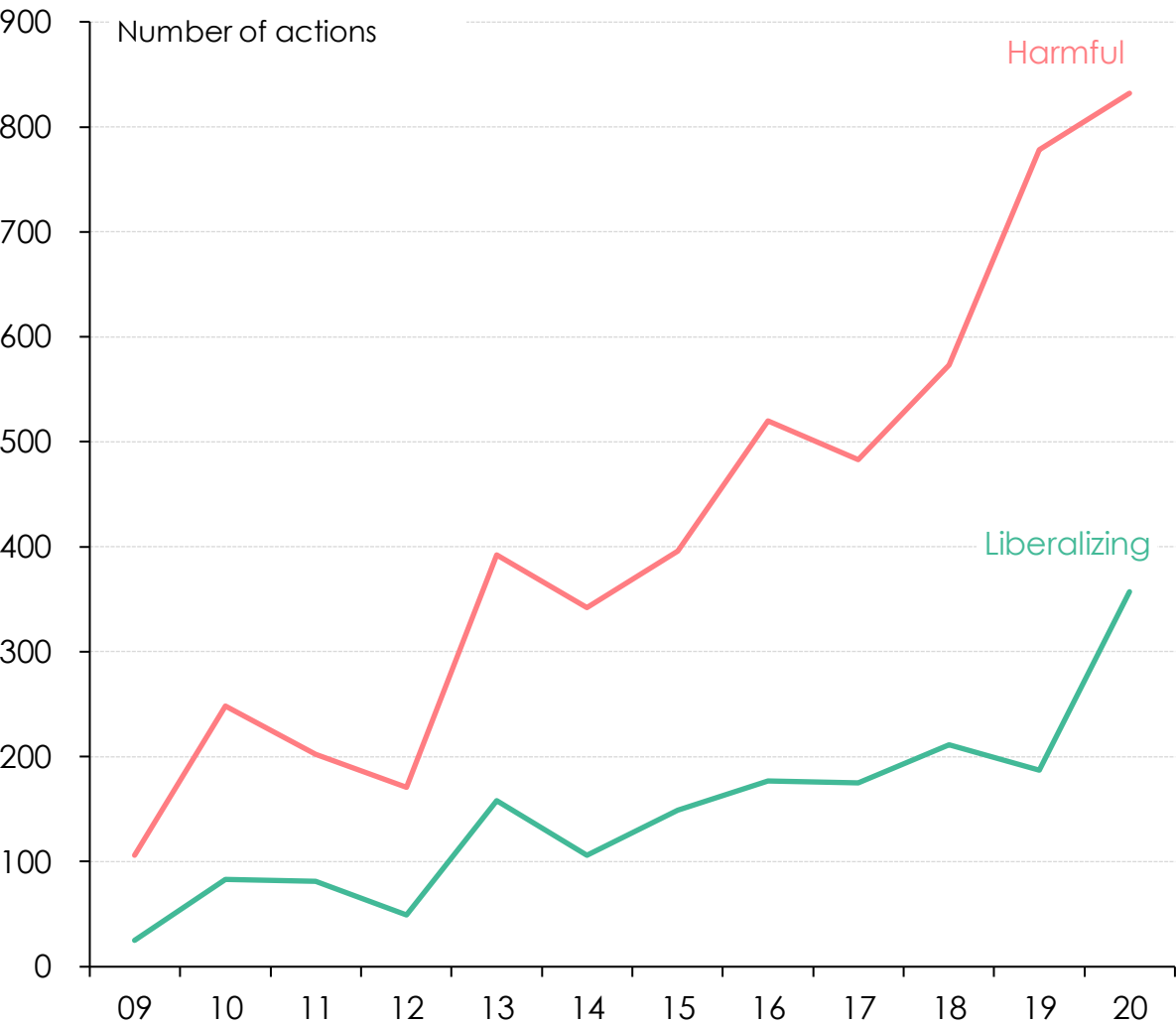
Source: The World Bank, *Global Economic Prospects*, 8<sup>th</sup> June 2020.

# World merchandise trade volumes rebounded in June but are still 13% below their October 2018 peak

## World trade volumes and container throughput



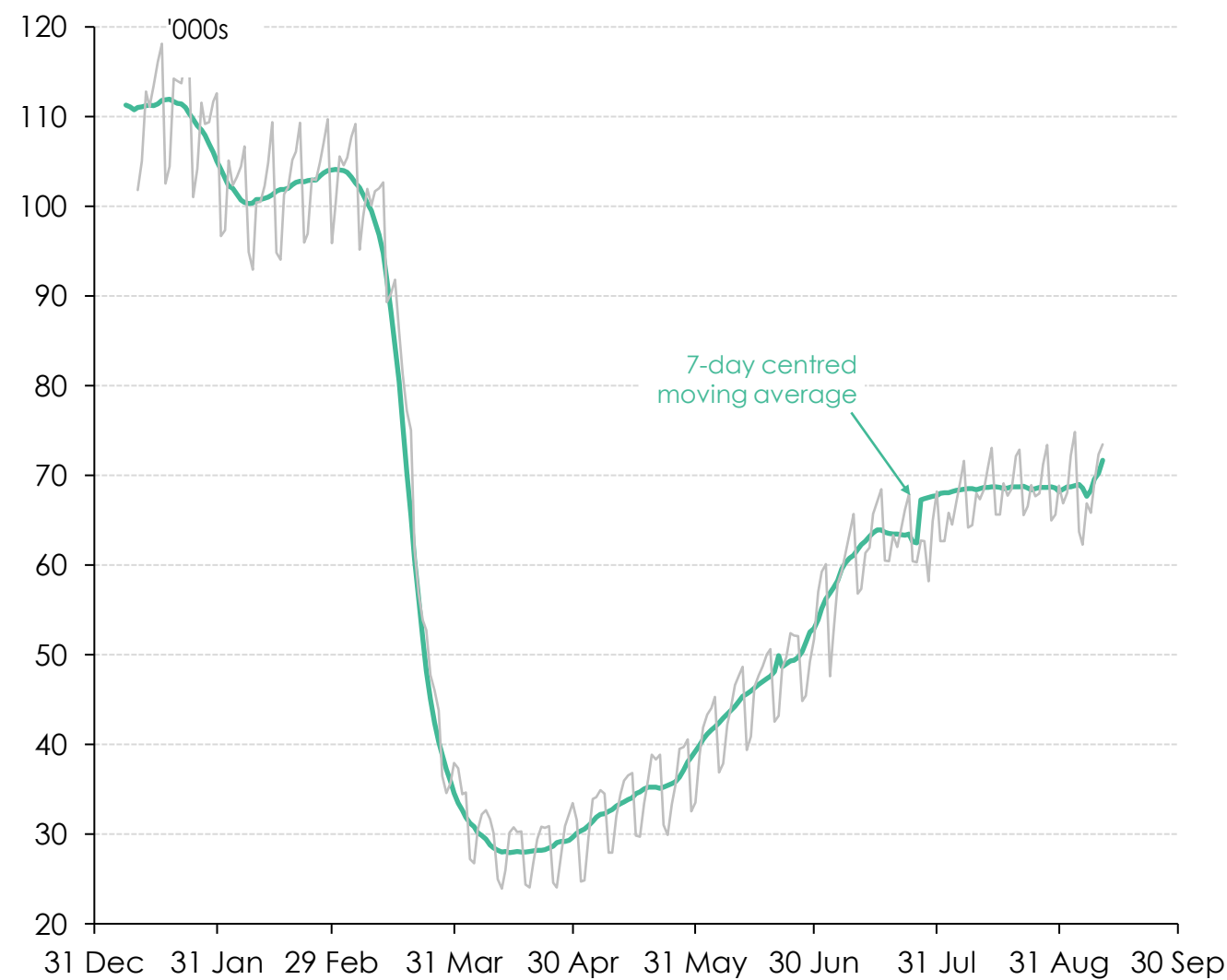
## Pro- and anti-trade policy interventions



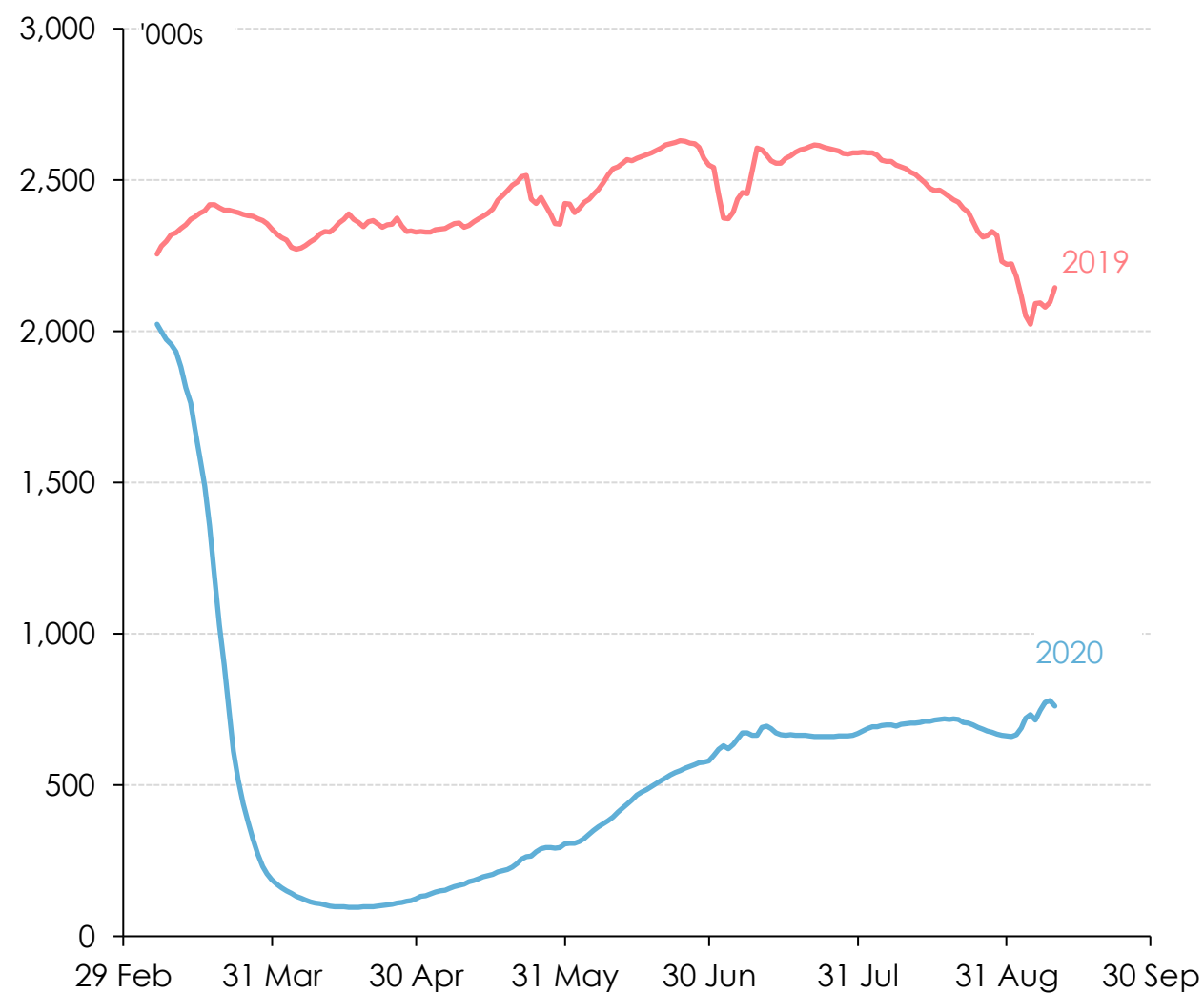
Note: The shipping container throughput index is based on reports from 91 ports around the world handling over 60% of global container shipping.  
Sources: CPB Netherlands Economic Planning Bureau, [World Trade Monitor](#); Institute of Shipping Economics & Logistics (ISL) and RWI Leibniz-Institut für Wirtschaftsforschung (RWI) [Container Throughput Index](#); Centre for Economic Policy Research, [Global Trade Alert](#) Global Dynamics (latest report 28<sup>th</sup> August).

# Aviation picked up a bit over the past week, both globally and (for the first time since early July) in the US as well

Daily commercial flights worldwide

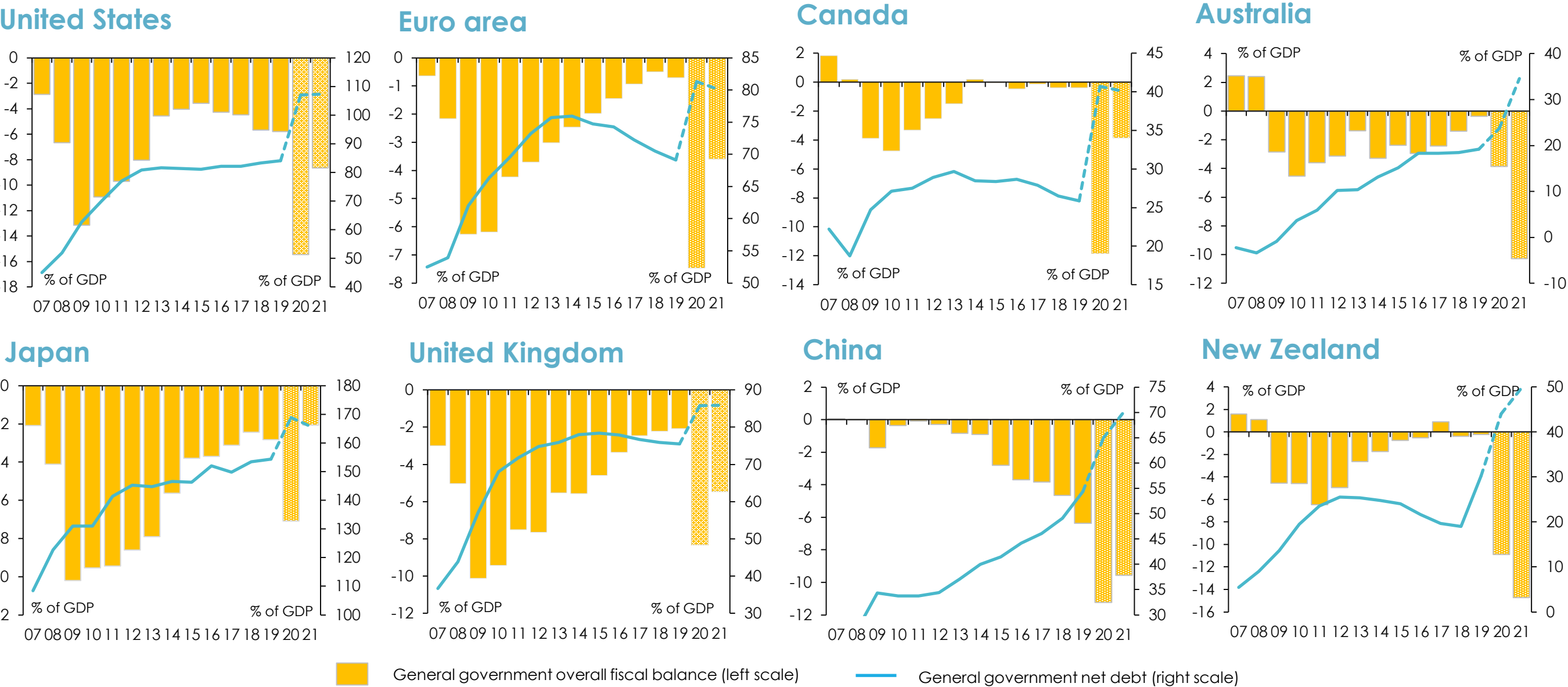


Daily US TSA security checks



Note: Commercial flights include commercial passenger flights, cargo flights, charter flights, and some business jet flights. Data up to 11<sup>th</sup> September for daily commercial flights, 10<sup>th</sup> September for TSA checks. Sources: [Flightradar24.com](https://www.flightradar24.com); [US Transport Safety Administration](https://www.transportation.gov/aviation) (at last, something useful produced by aviation 'security'!!!)

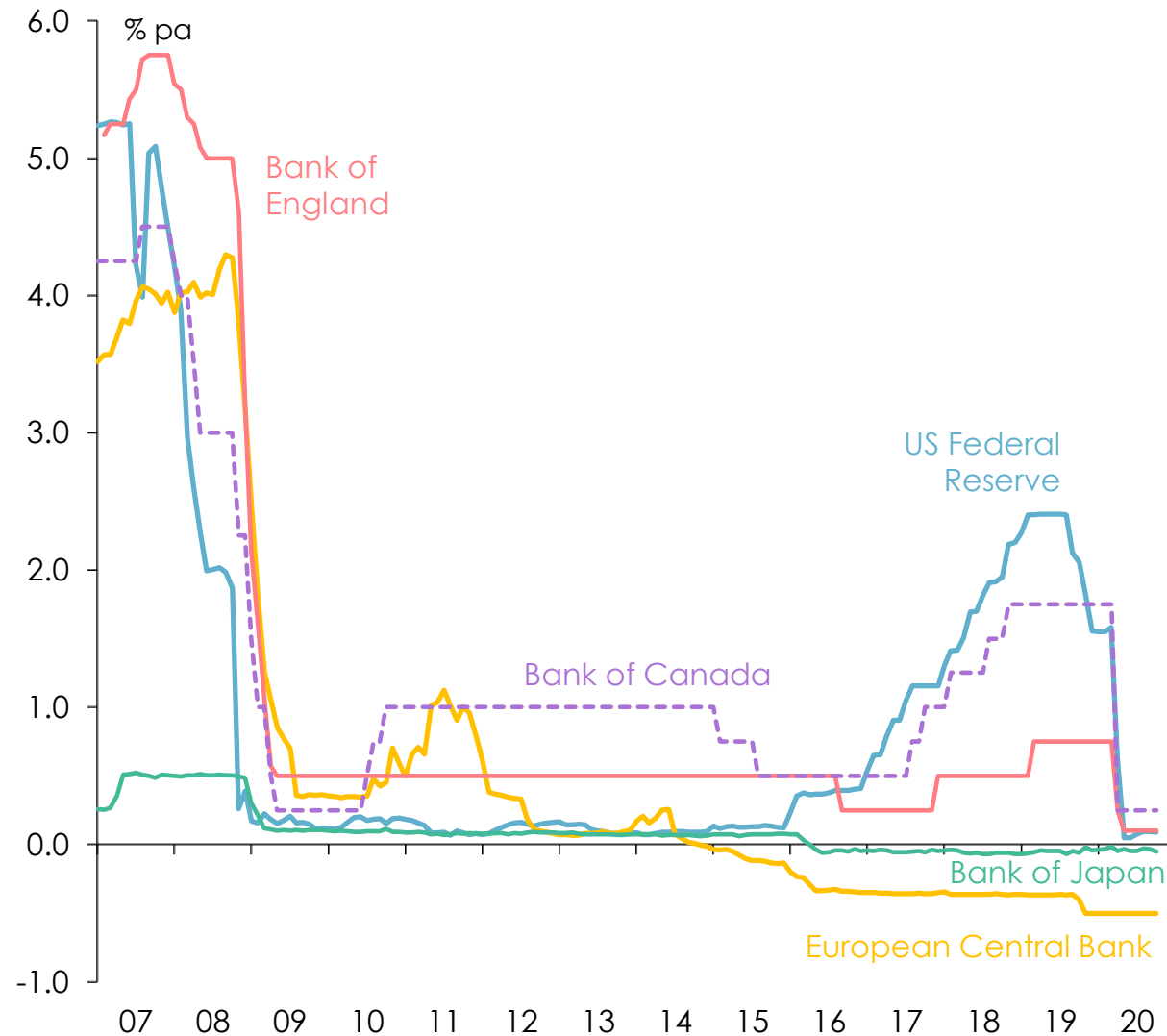
# Governments around the world are doing more by way of fiscal stimulus than they did during the global financial crisis



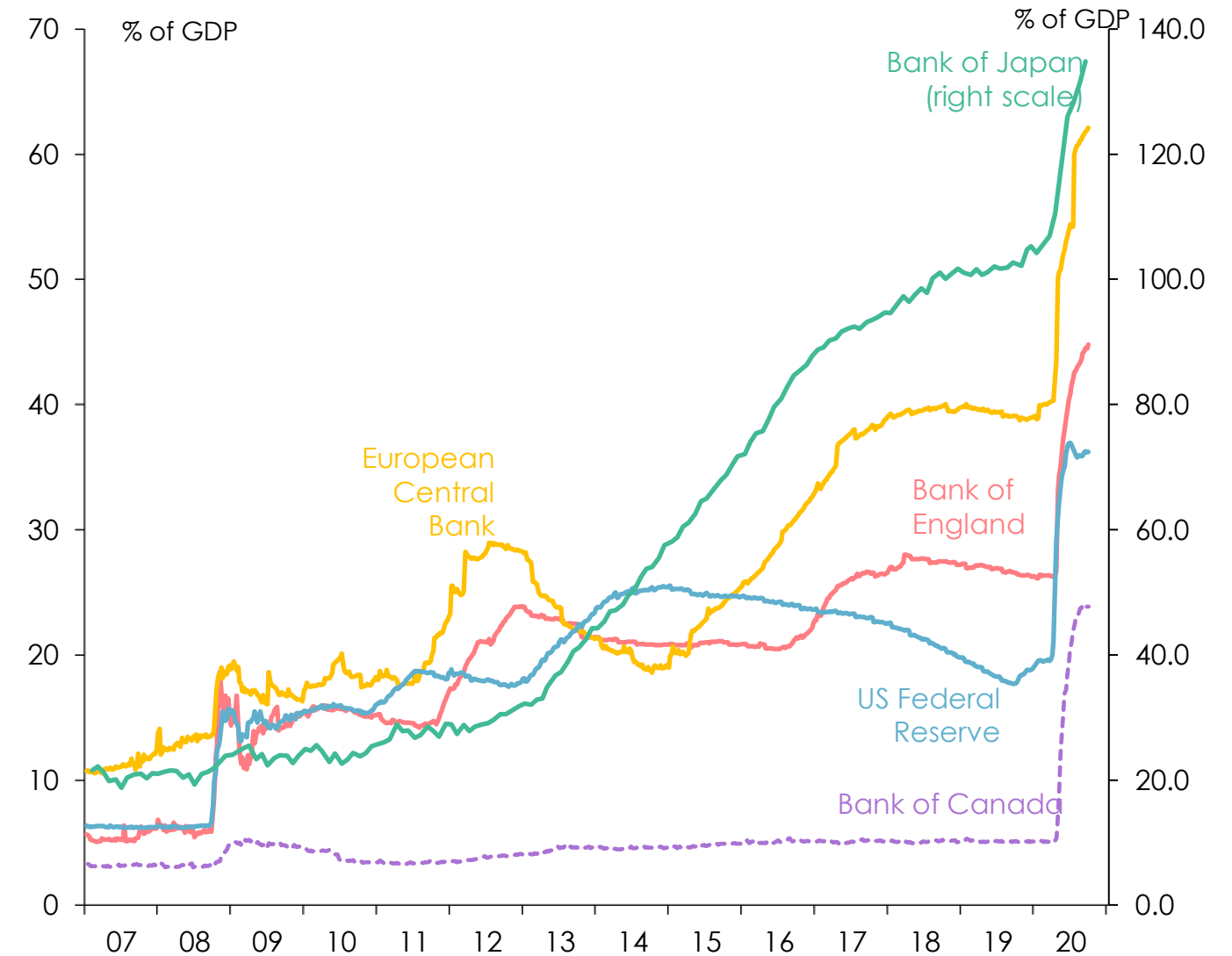
Note: UK data does not include the measures announced by the Chancellor on 8<sup>th</sup> July; China debt is gross debt, not net; Australian data are for the federal government only and are for fiscal years ended 30<sup>th</sup> June; NZ data are for fiscal years ended 31<sup>st</sup> March. Sources: International Monetary Fund, [Fiscal Monitor](#), April 2020, and [World Economic Outlook](#), June 2020; Australian Government, [Economic and Fiscal Update](#), July 2020; New Zealand Treasury, [Budget Economic and Fiscal Update](#), May 2020.

# Major central banks have cut interest rates to record lows, and done more 'quantitative easing' than during the global financial crisis

## Major central bank policy interest rates



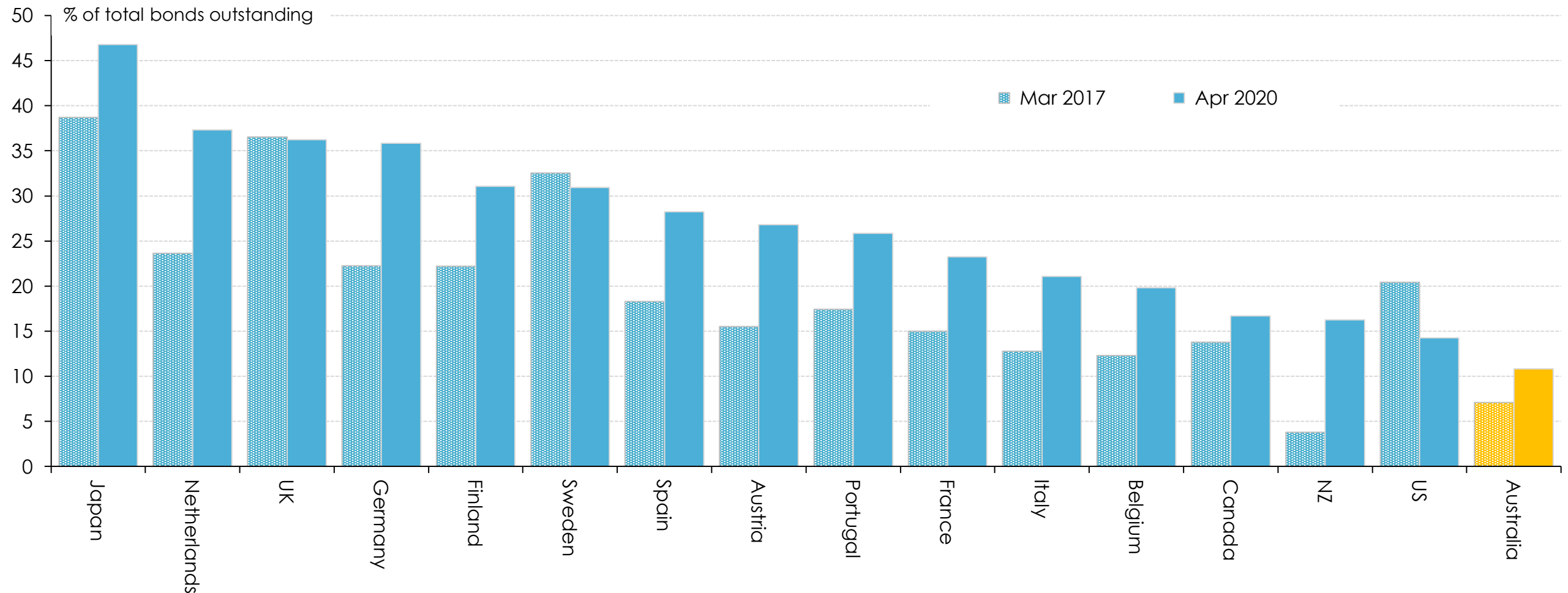
## Major central bank balance sheets



Note: estimates of European Central Bank assets as a pc of GDP for weeks since the beginning of April have been revised upwards by around 5 pc points of GDP following the publication by Eurostat this week of estimates of Q2 nominal GDP (as happened with estimates of Bank of England assets as a pc of GDP three weeks ago). Estimates of US Fed, and BoJ assets as a pc of GDP were also revised up with the use of Q2 nominal GDP as the denominator, but less sharply.  
Sources: US Federal Reserve; European Central Bank; Bank of Japan; Bank of England; Bank of Canada; national statistical agencies; Corinna.

# Central banks now hold significant proportions of total government debt in a growing number of countries

## Central bank holdings of central government bonds



Sources: Surprisingly, the RBA does not disclose its holdings of Australian Government bonds in its weekly balance sheet statement (see RBA Statistical Table A1. Hence the figure shown here for Australia at March 2017 was derived from ABS *Finance and Wealth*, and that for April 2020 by adding to RBA holdings as per the December 2019 issue of *Finance and Wealth*, disclosed RBA purchases of Australian Government bonds up to end-April, divided by the amount of Australian Government securities outstanding disclosed in the Government's *Monthly Financial Statement*. The figures for RBNZ holdings of NZ government securities are published in Table r1 on the RBNZ's website while figures for total NZ government securities outstanding are in Table D30. All others are from OECD, *Economic Outlook* No. 107 (June 2020) and No. 104 (June 2017).

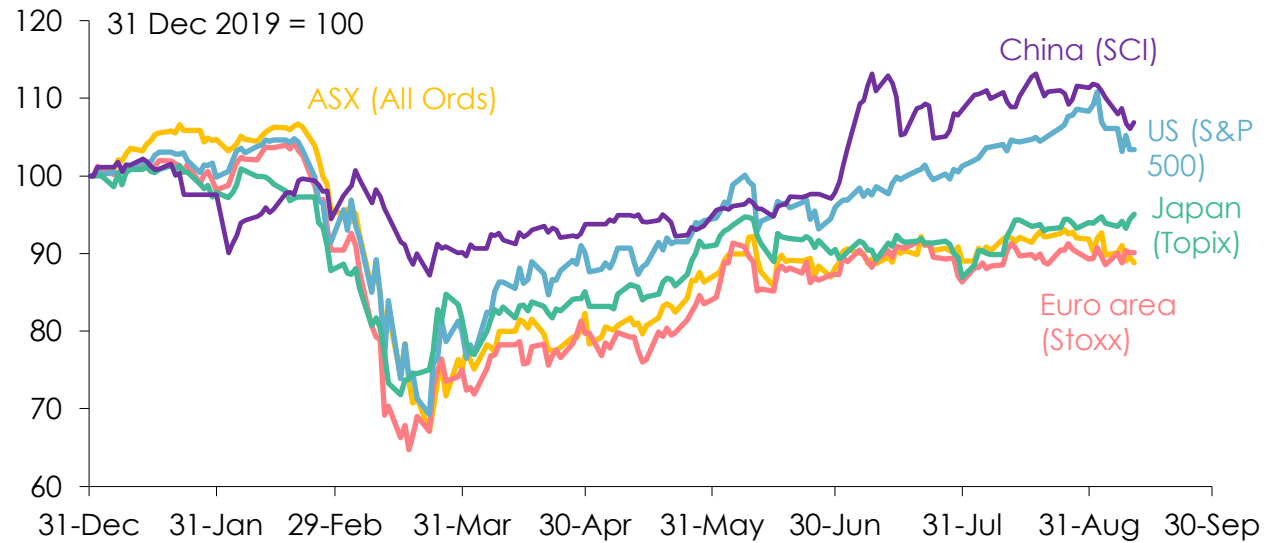
# US Federal Reserve Chair Jerome Powell last month signalled what looks like a significant shift in its monetary policy-making framework

- ❑ The Fed's policy-setting Open Market Committee last month approved changes to its [\*Statement on Longer-Run Goals and Monetary Policy Strategy\*](#), which Jerome Powell enlarged on in his address to the (virtual) Jackson Hole policy conference hosted by the Kansas City Fed
- ❑ The Fed has adjusted its inflation target from “2%” to “an average of 2% over time”
  - this sounds a bit like the RBA's long-standing ‘flexible inflation target’ of ‘2-3% on average over the course of the cycle’
  - but the Fed is actually a bit more specific, spelling out that “following periods when inflation has been running persistently below 2%” (which it has been since 2012) “appropriate monetary policy will likely aim to achieve inflation moderately above 2% for some time”
- ❑ The Fed has also (significantly) changed the way it interprets the “maximum employment” part of its ‘dual mandate’
  - the new Statement emphasizes that “maximum employment is a broad and inclusive goal” and that monetary policy decisions will be informed by its assessments of the “*shortfalls* of employment from its maximum level” rather than (as previously) “*deviations* from its maximum level” (emphasis in the original)
  - Powell explained in his speech that this means that “employment can run at or above real-time estimates of its maximum level without causing concern, unless accompanied by signs of unwanted increases in inflation or the emergence of other risks that could impede the attainment of our goals” (other risks probably refers to risks to financial stability)
- ❑ This amounts to an abandonment of former Fed Chairman William McChesney Martin's famous 1955 dictum that the Fed's job is “to take away the punch bowl just as the party gets going” – or, as others have put it, not waiting until it can see “the whites of inflation's eyes” before starting to raise interest rates
  - it might also be a tacit acknowledgement on Powell's part that it was (with the benefit of hindsight) a mistake to have raised interest rates by as much as it did between 2017 and 2019

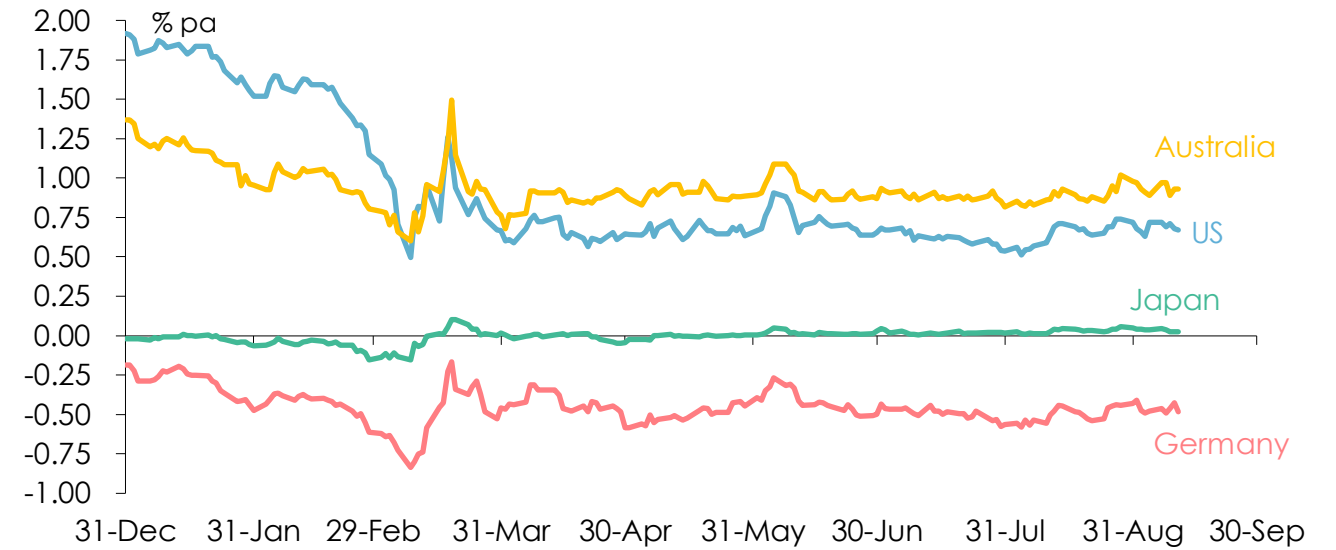
Note: Jerome Powell's speech is [here](#).

# The tech stocks sell-off continued this week, though European & Japanese stocks rose; neither bonds nor major currencies moved much

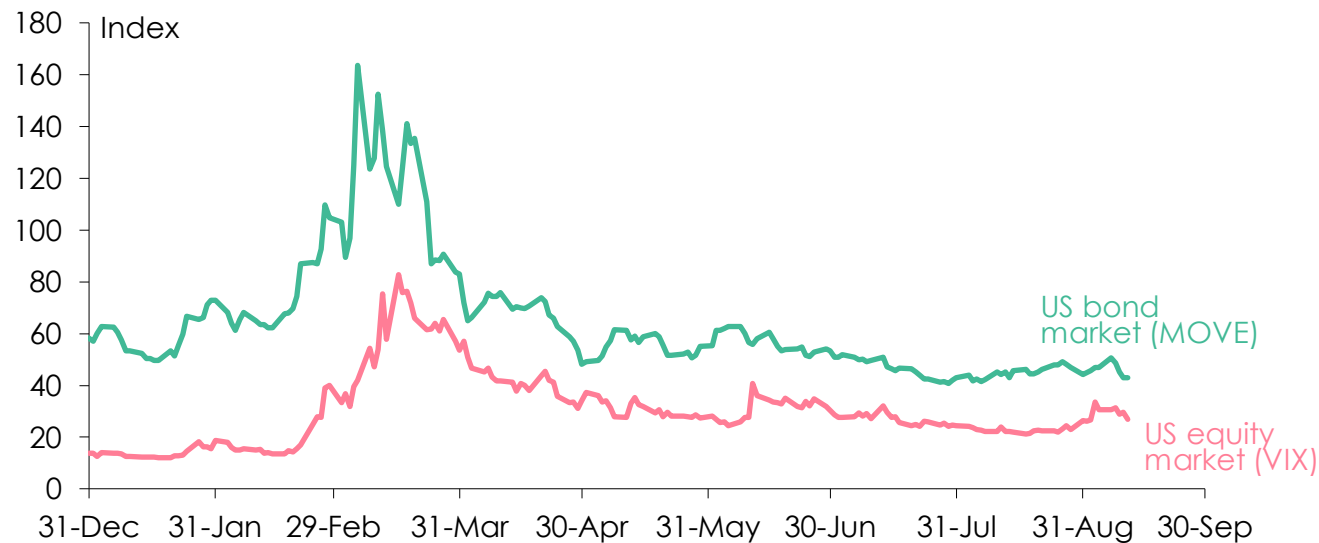
## Stock markets



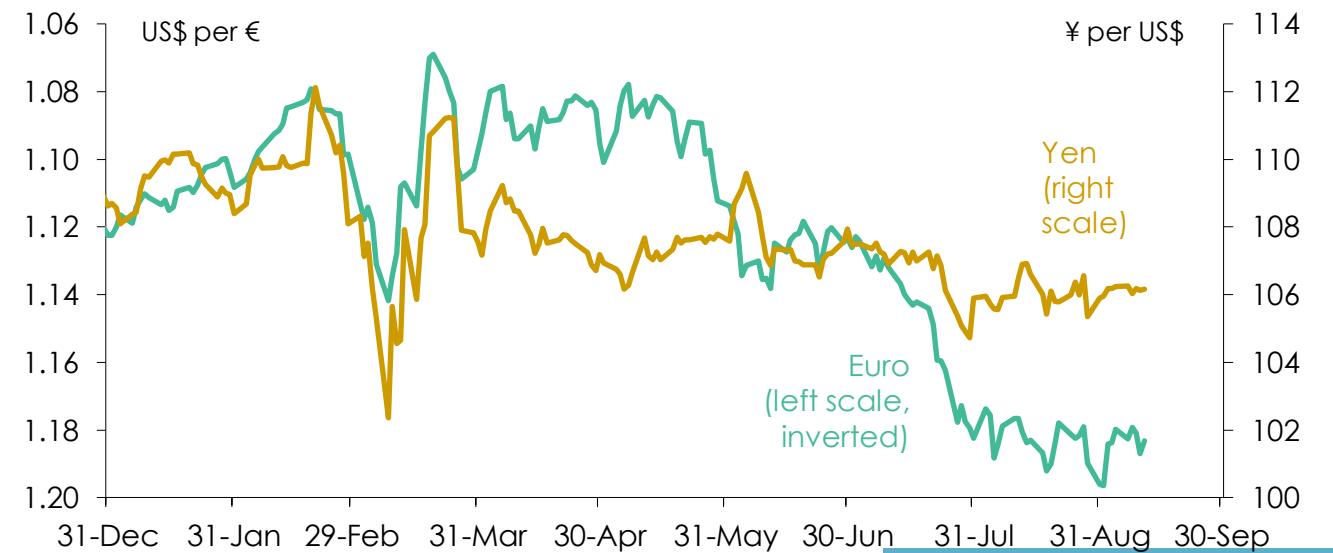
## 10-year bond yields



## Measures of market volatility



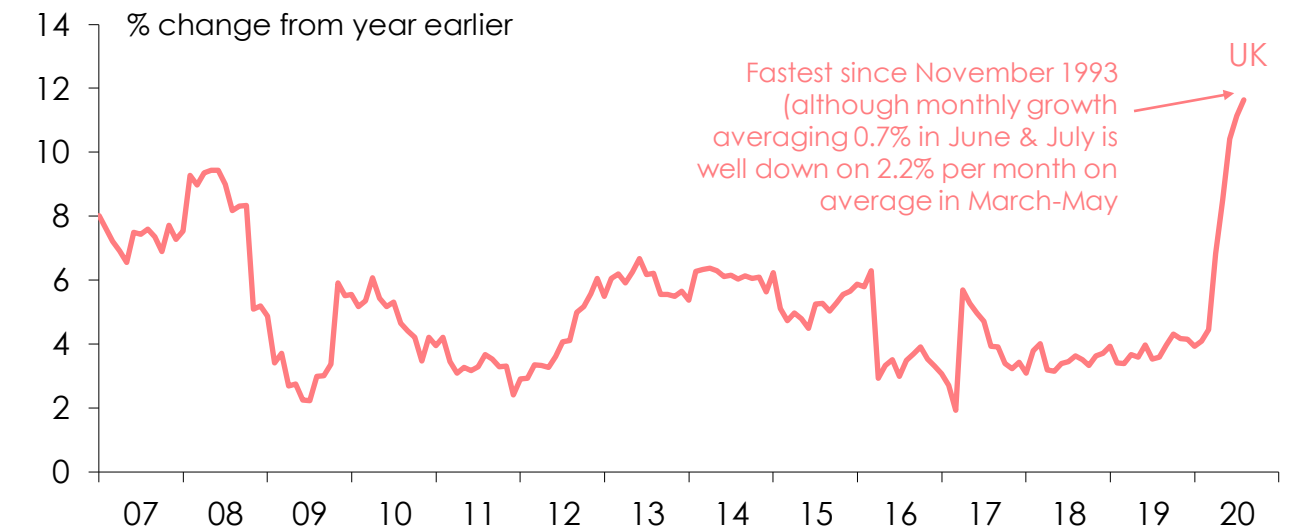
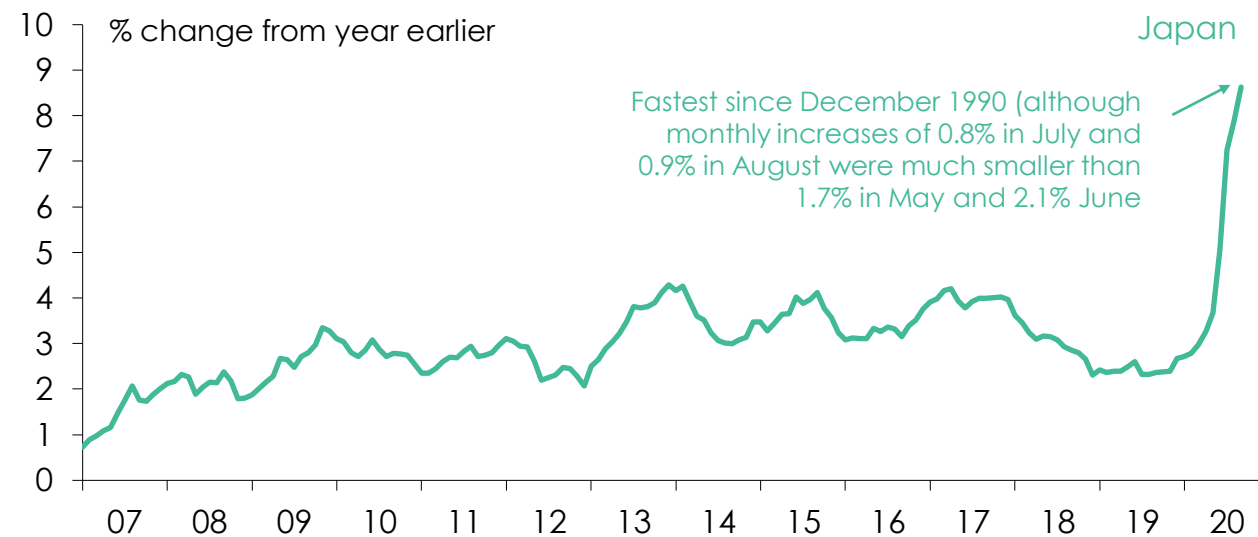
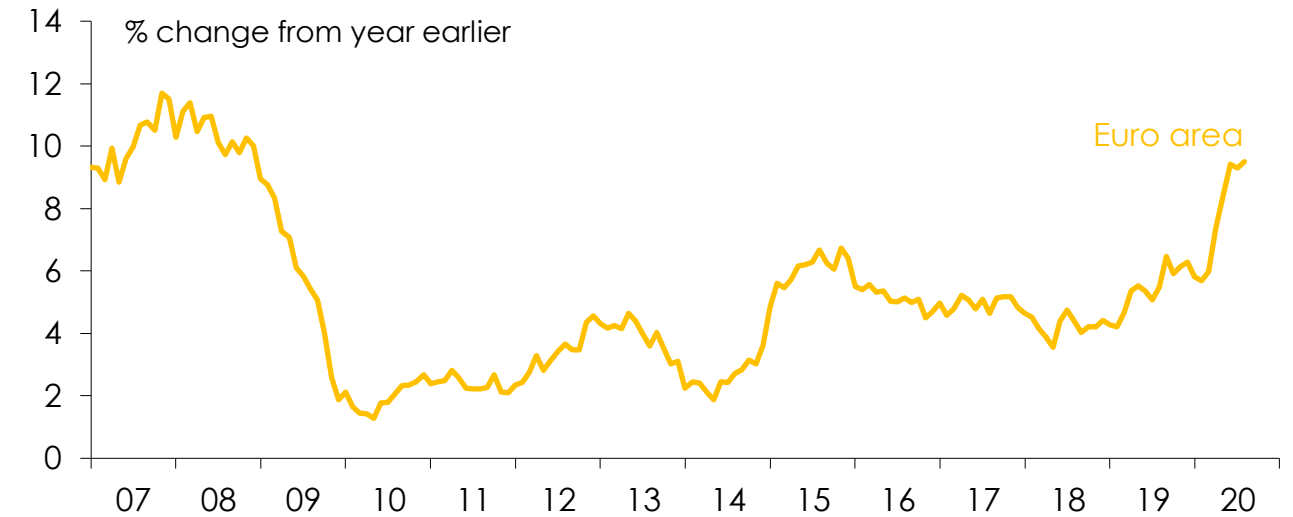
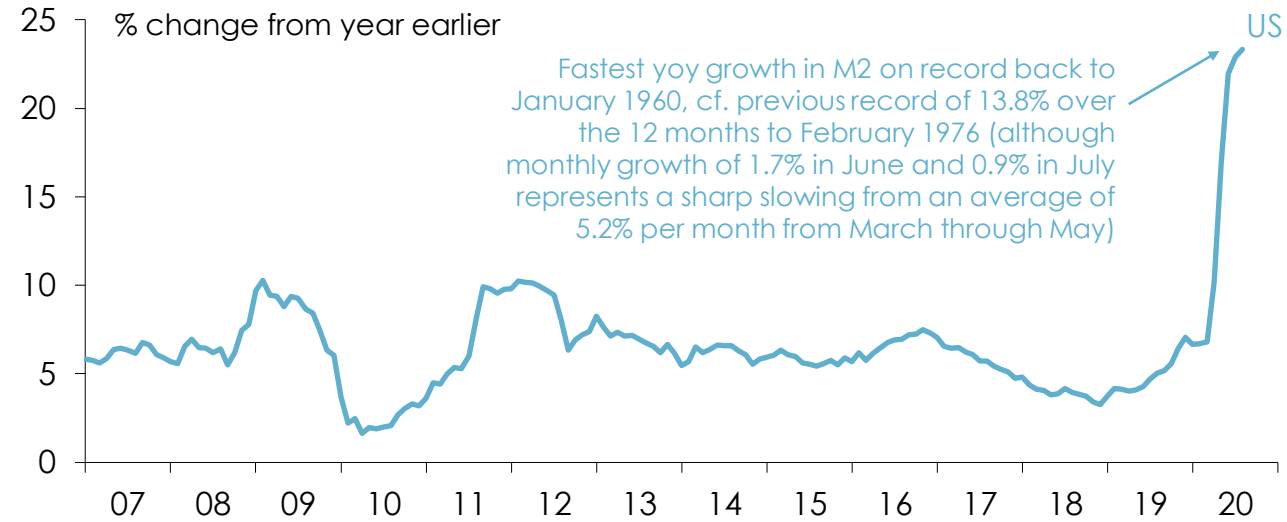
## US dollar vs euro and yen



Source: Refinitiv Datastream. Data up to 11<sup>th</sup> September.

# 'Quantitative easing' has prompted a more rapid acceleration in money supply growth than it did during the global financial crisis ...

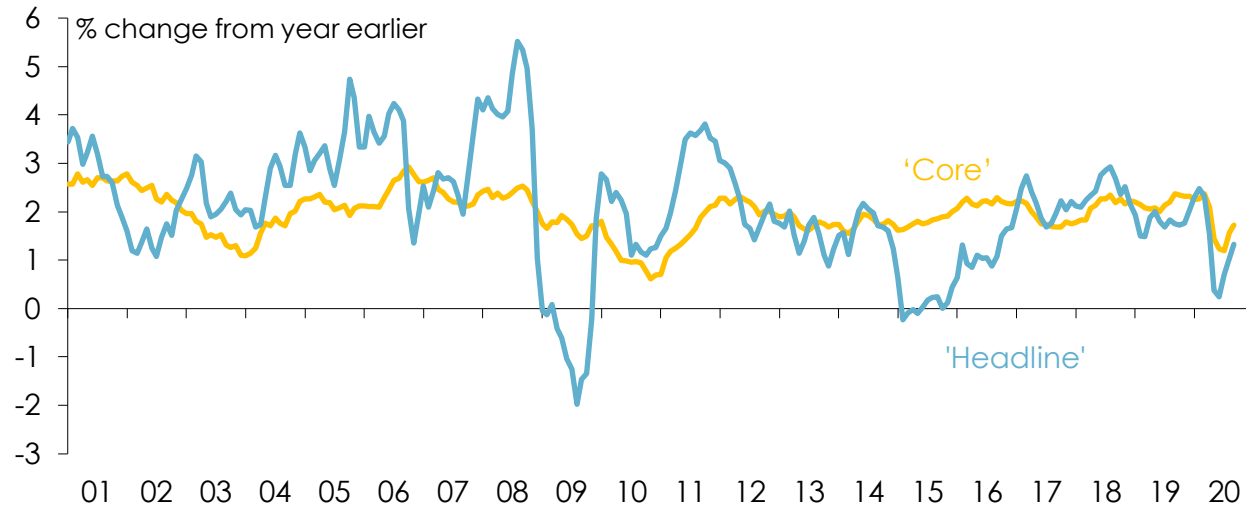
## M2 money supply growth



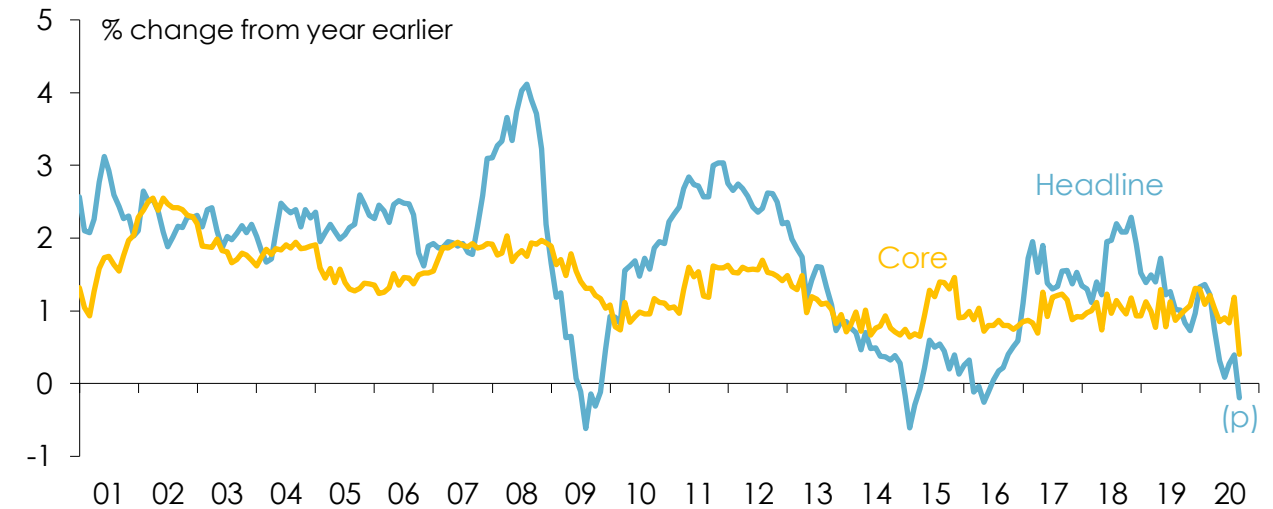
Note: Japan is M2+CDs. Sources: US Federal Reserve; European Central Bank; Bank of Japan; Bank of England.

# ...but so far at least, inflation has remained below central bank targets – although both ‘headline’ and ‘core’ US inflation ticked up in July & August

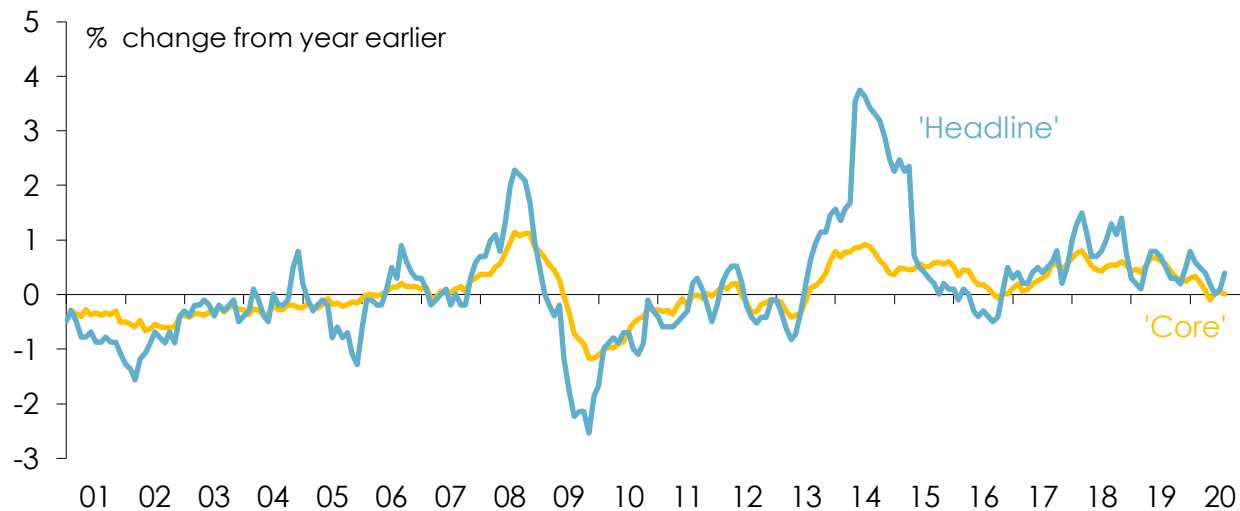
## ‘Headline’ and ‘core’ inflation - US



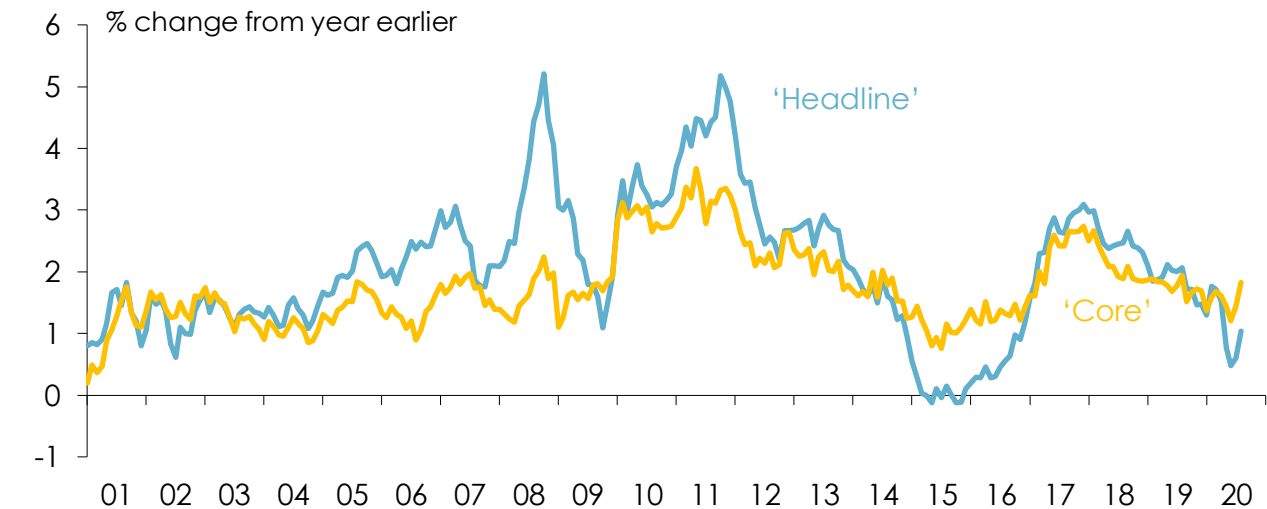
## ‘Headline’ and ‘core’ inflation – Euro area



## ‘Headline’ and ‘core’ inflation - Japan

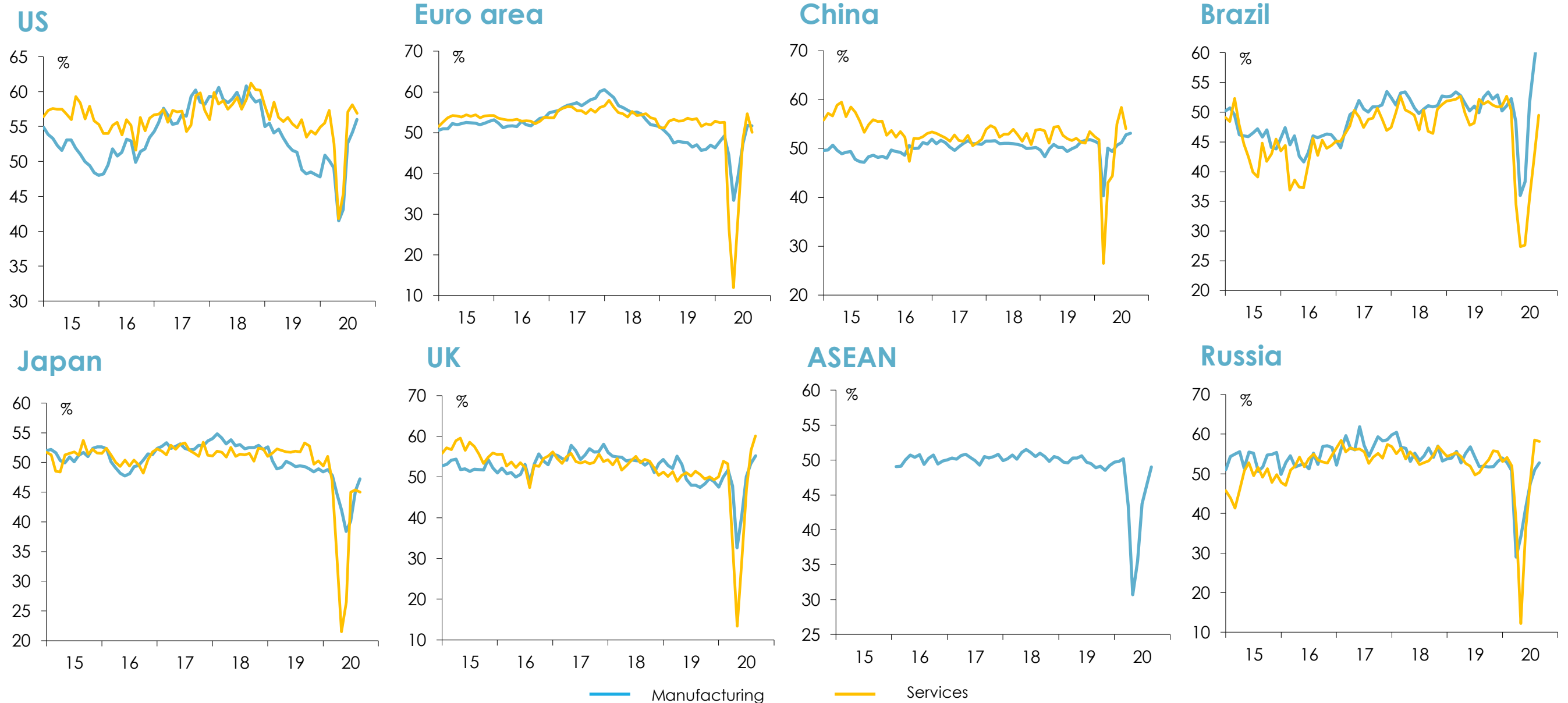


## ‘Headline’ and ‘core’ inflation – UK



Note: ‘Core’ inflation is the CPI excluding food & energy in the US; excluding food, energy, alcohol & tobacco in the euro area; and excluding energy & seasonal foods in the UK. The ‘core’ inflation measure for Japan is the weighted median CPI calculated by the Bank of Japan. Sources: US Bureau of Labor Statistics; Eurostat; Statistics Bureau of Japan; Bank of Japan; UK Office for National Statistics.

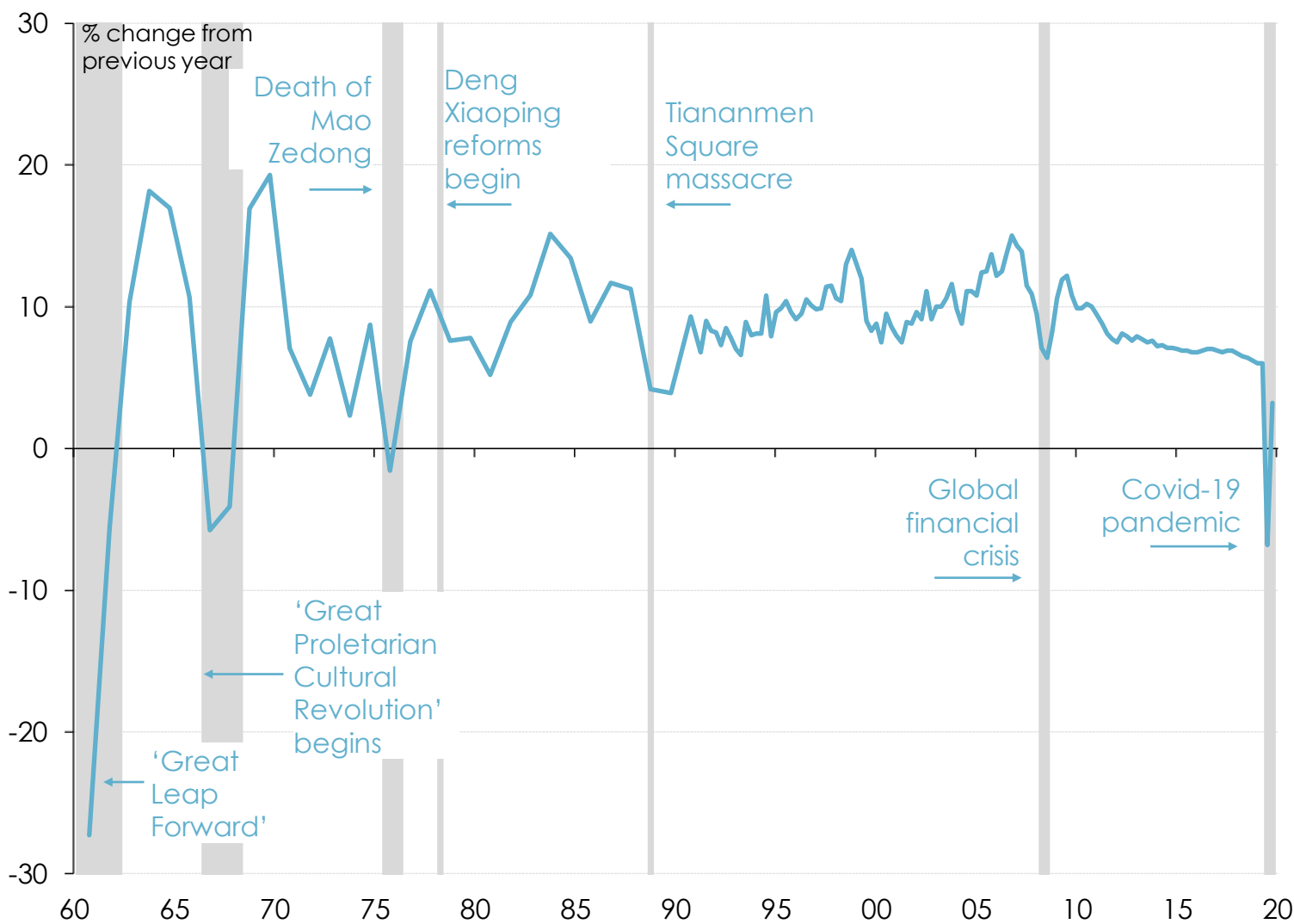
# Purchasing managers' indices (PMIs) point to continued expansion in both manufacturing and services sectors in major economies in August



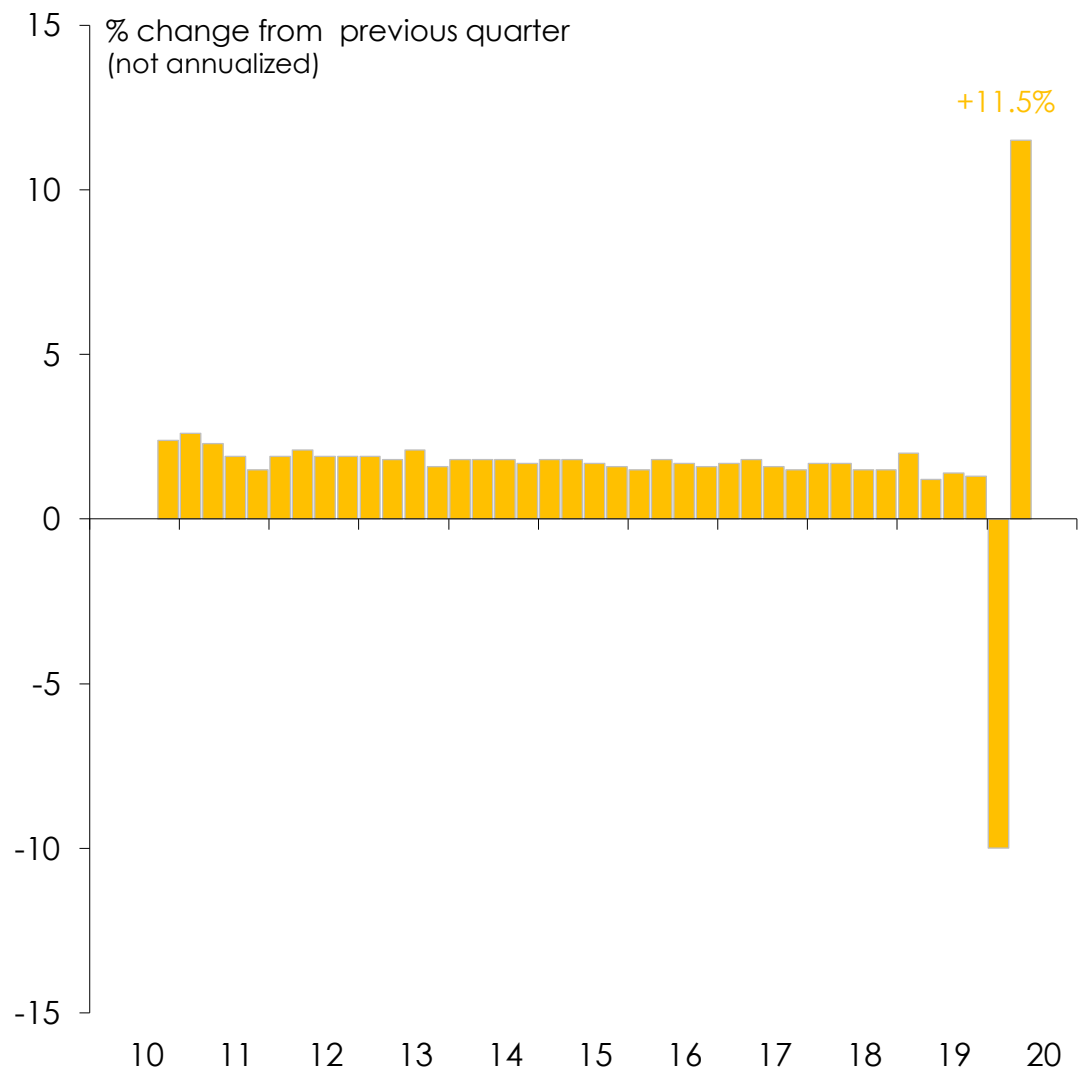
Note: Purchasing Managers' Indexes (PMIs) are derived from surveys of senior executives, who are asked to report whether various dimensions of business activity recorded an increase, decrease or no change compared with the previous month. A reading of 50 indicates an overall increase cf. the previous month, and a reading of less than 50 indicates a decrease. Latest data are for August. See also PMIs for other Asia-Pacific economies on [slide 40](#). Sources: US Institute of Supply Management; INH Markit; Caixin; Refinitiv Datastream.

# China's economy rebounded strongly in Q2 from what had been the worst downturn in almost 60 years in Q1

Real GDP growth, from year earlier, 1961-2020



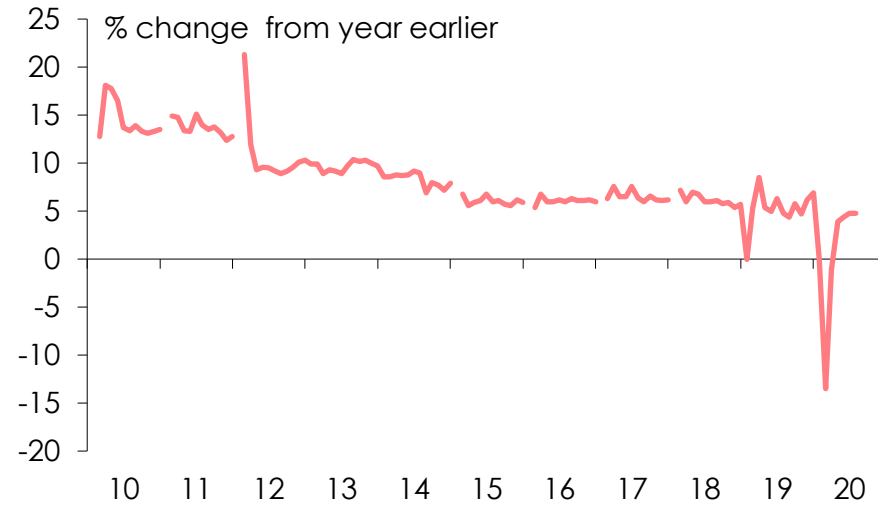
Quarterly real GDP growth, 2010-2020



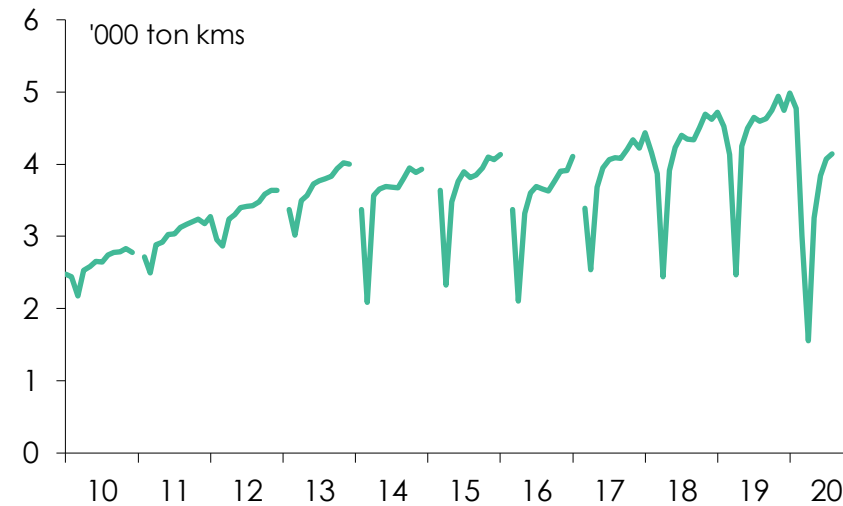
Note: In the left-hand chart, GDP growth rates are annual averages up to the December quarter of 1991, and then quarter-on-corresponding-quarter-of-previous-year thereafter. Sources: China National Bureau of Statistics.

# The production side of the Chinese economy rebounded strongly in the June quarter

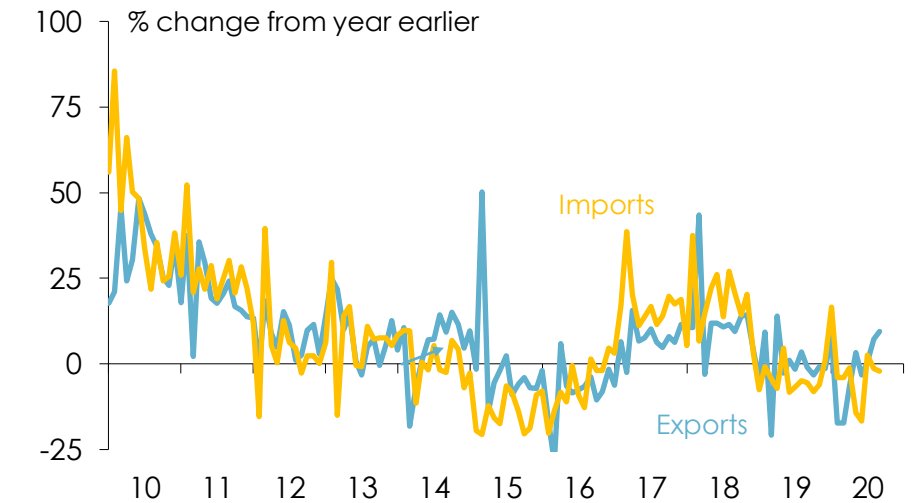
## Industrial production



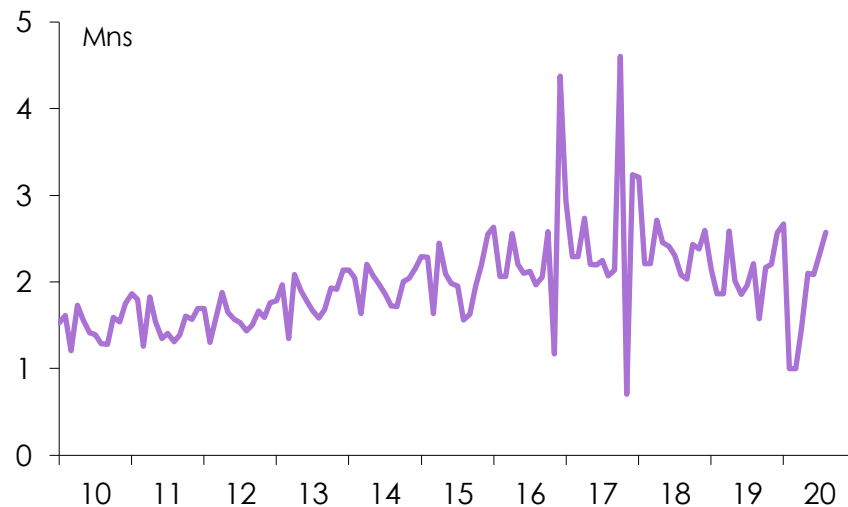
## Freight traffic volumes



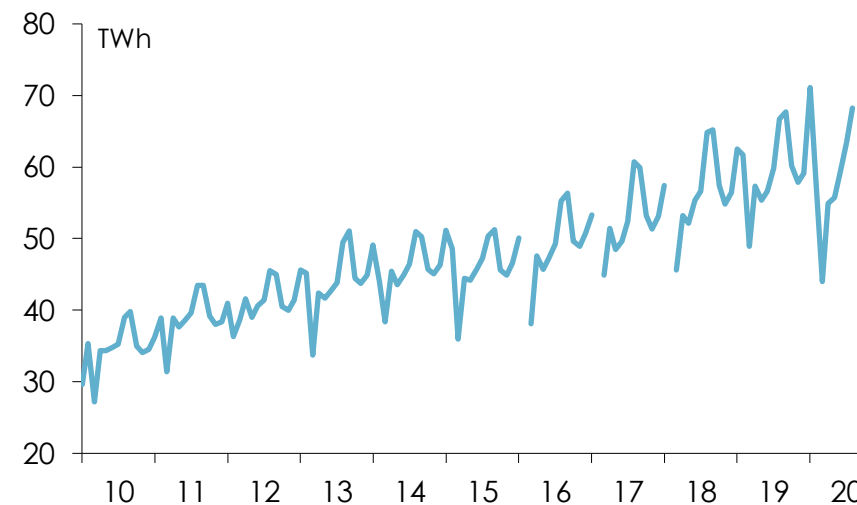
## Merchandise trade



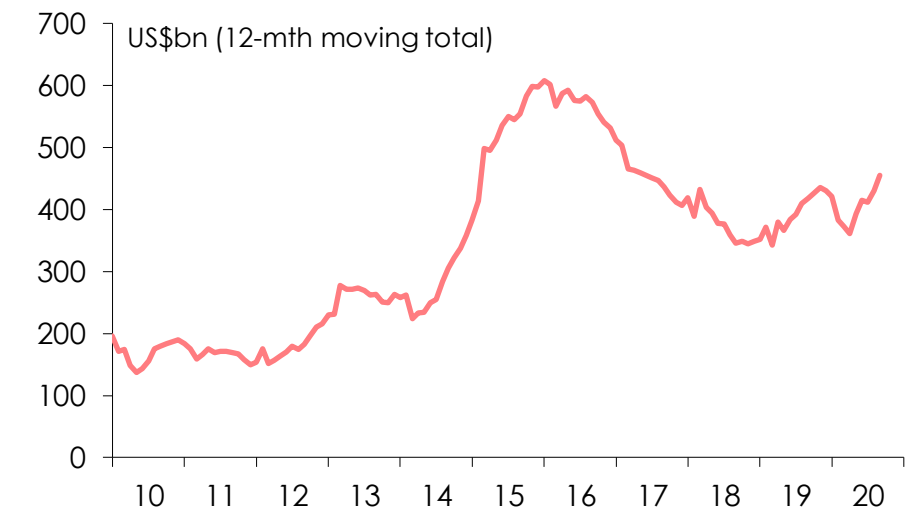
## Motor vehicle production



## Primary electricity production



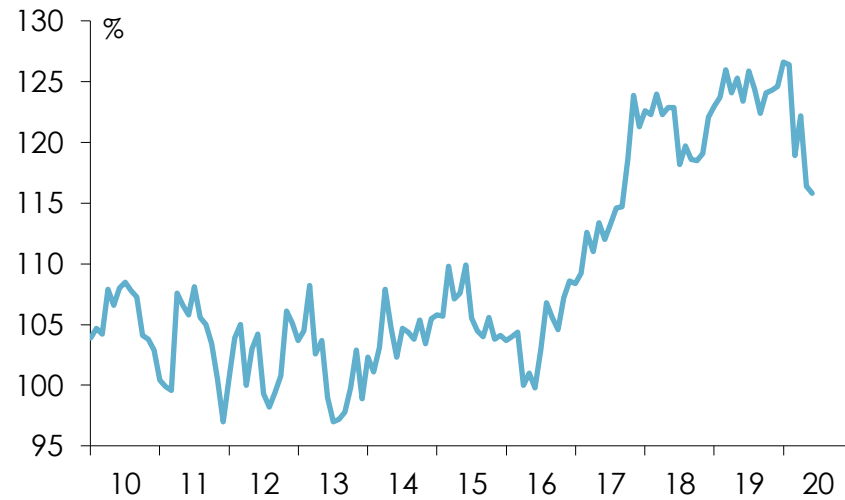
## Merchandise trade balance



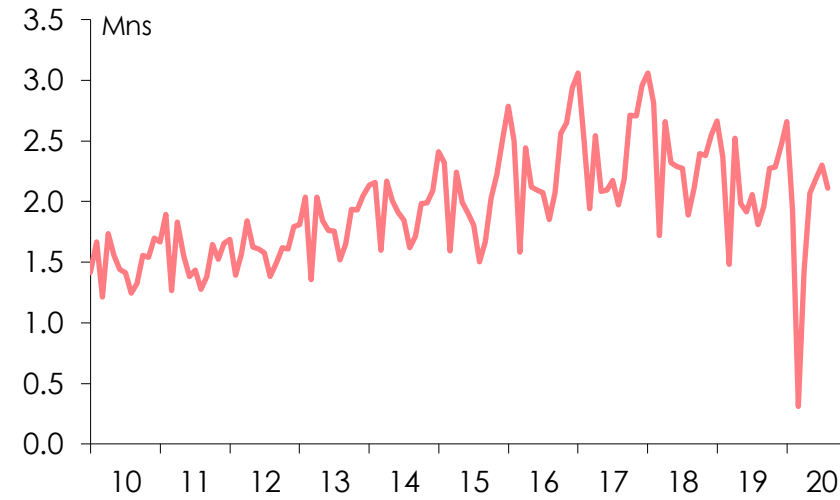
Sources: China National Bureau of Statistics; China Association of Automobile Manufacturers; China General Administration of Customs. Latest trade data are for August; others are July.

# However the 'demand' side of the Chinese economy – both household and business – is recovering rather more gradually

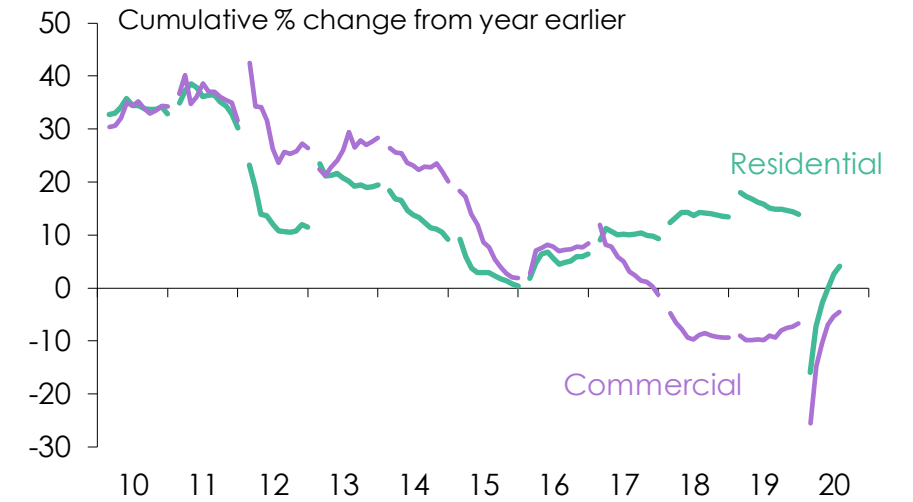
## Consumer sentiment



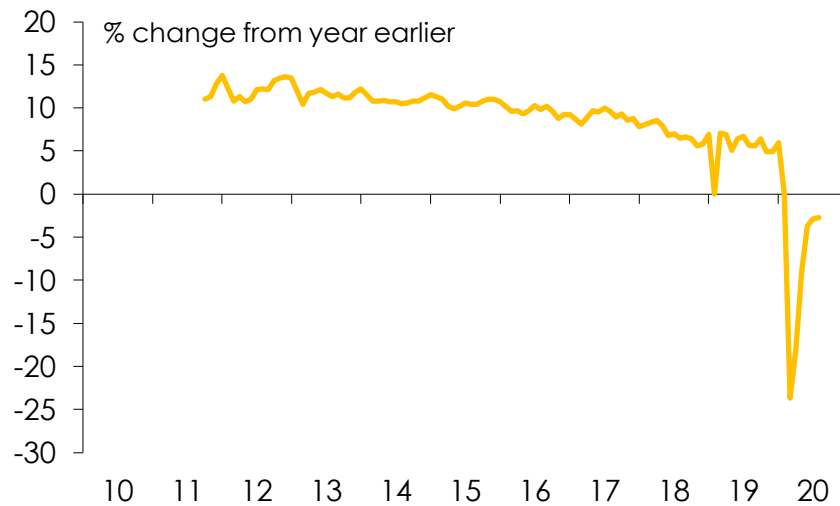
## Motor vehicle sales



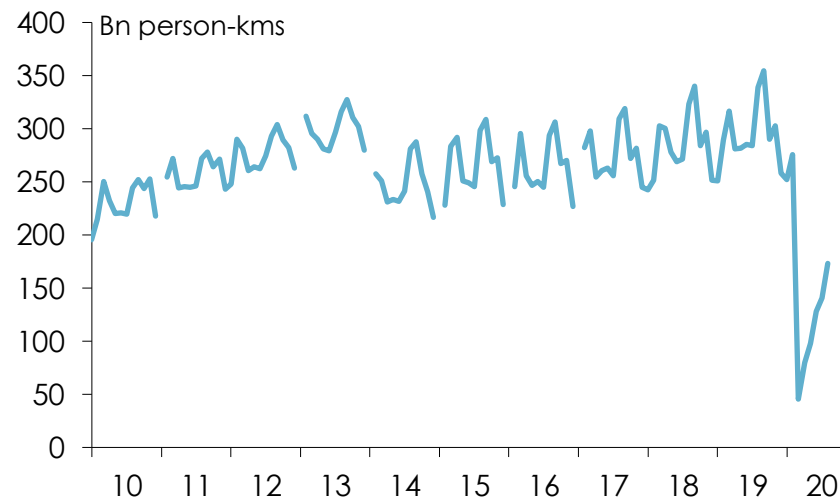
## Real estate investment



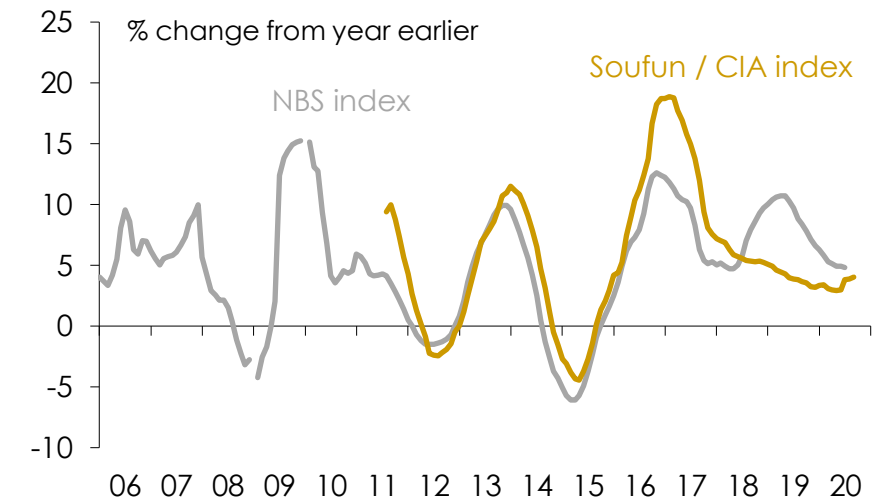
## Retail sales volume



## Passenger traffic volumes



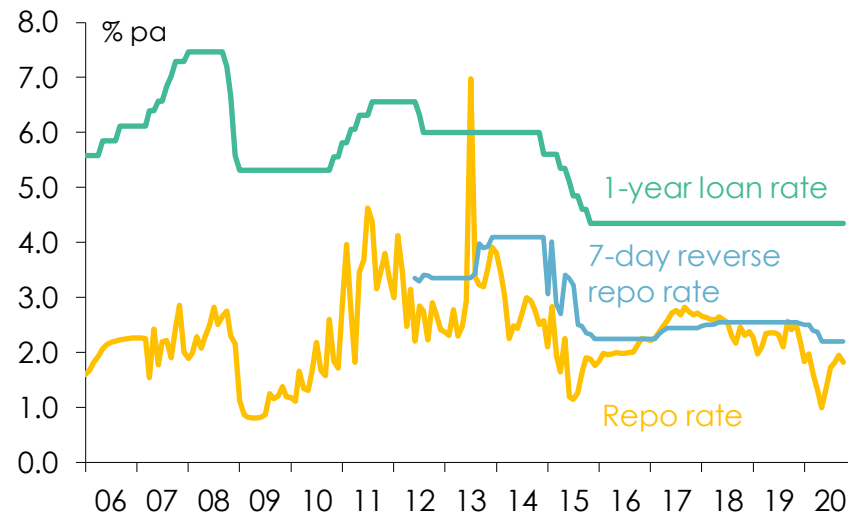
## Residential real estate prices



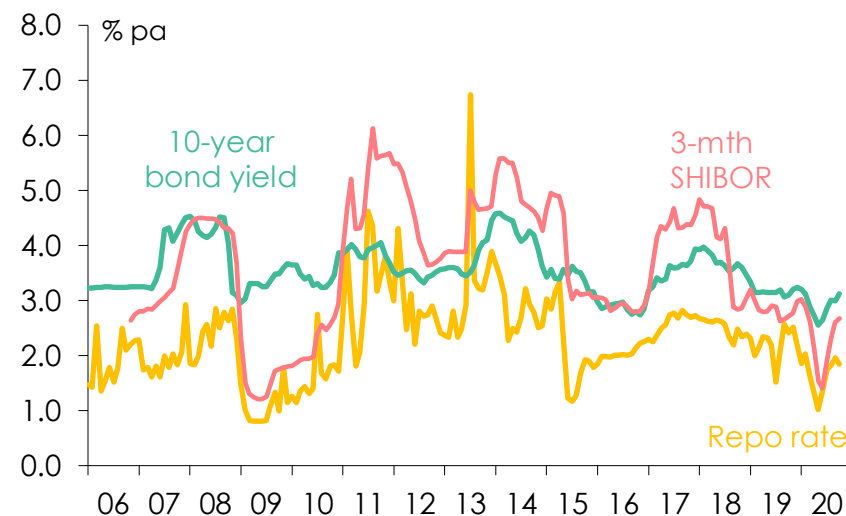
Sources: China National Bureau of Statistics; China Association of Automobile Manufacturers; China Index Academy. Latest data are for July, except for consumer sentiment index and passenger traffic volumes, which are for June.

# The PBoC has been more cautious about stimulus than it was in 2008-09 or 2015-16, perhaps because it's still concerned about financial stability

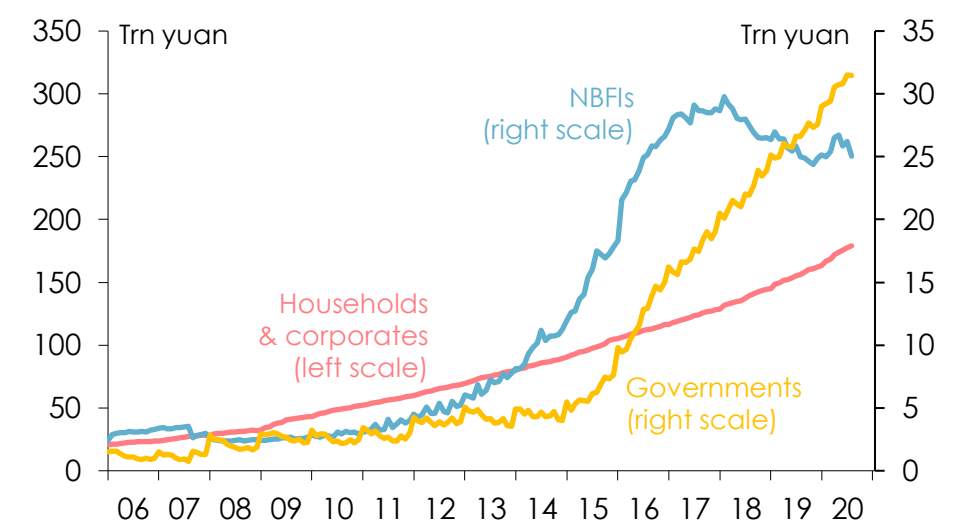
## PBoC policy interest rates



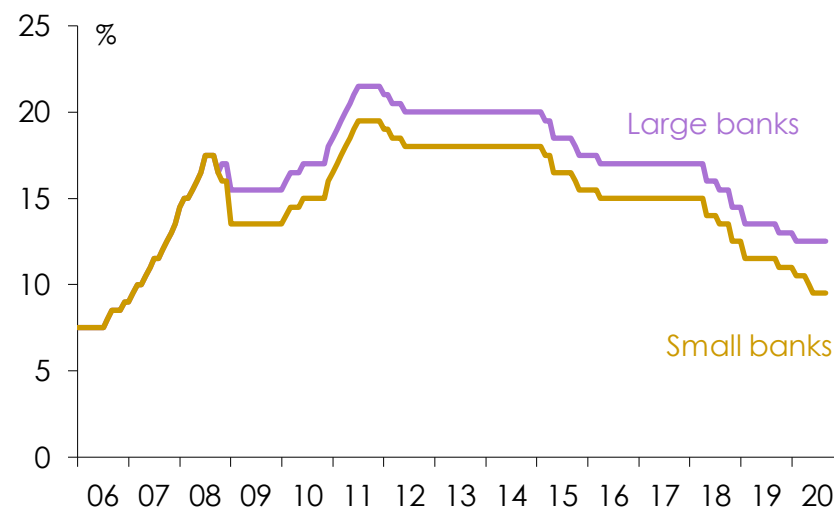
## Market interest rates



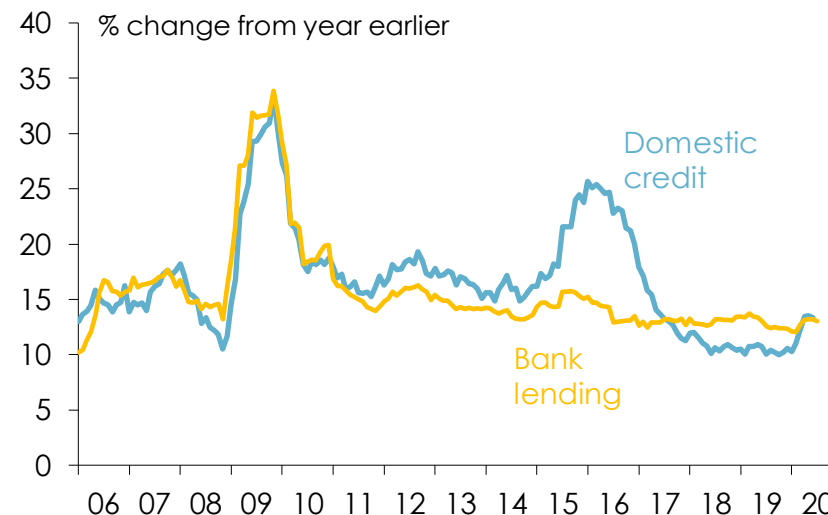
## Depository corporation assets



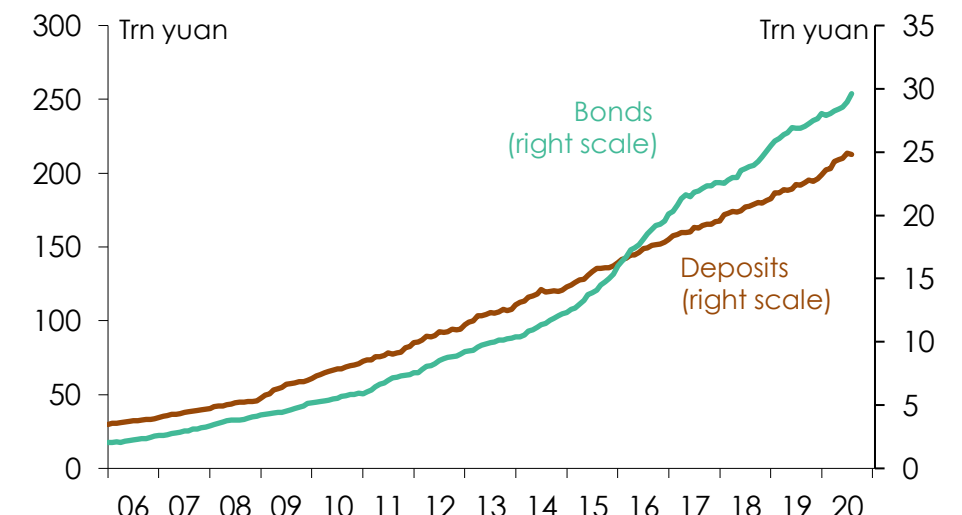
## Bank reserve requirement ratios



## Credit growth



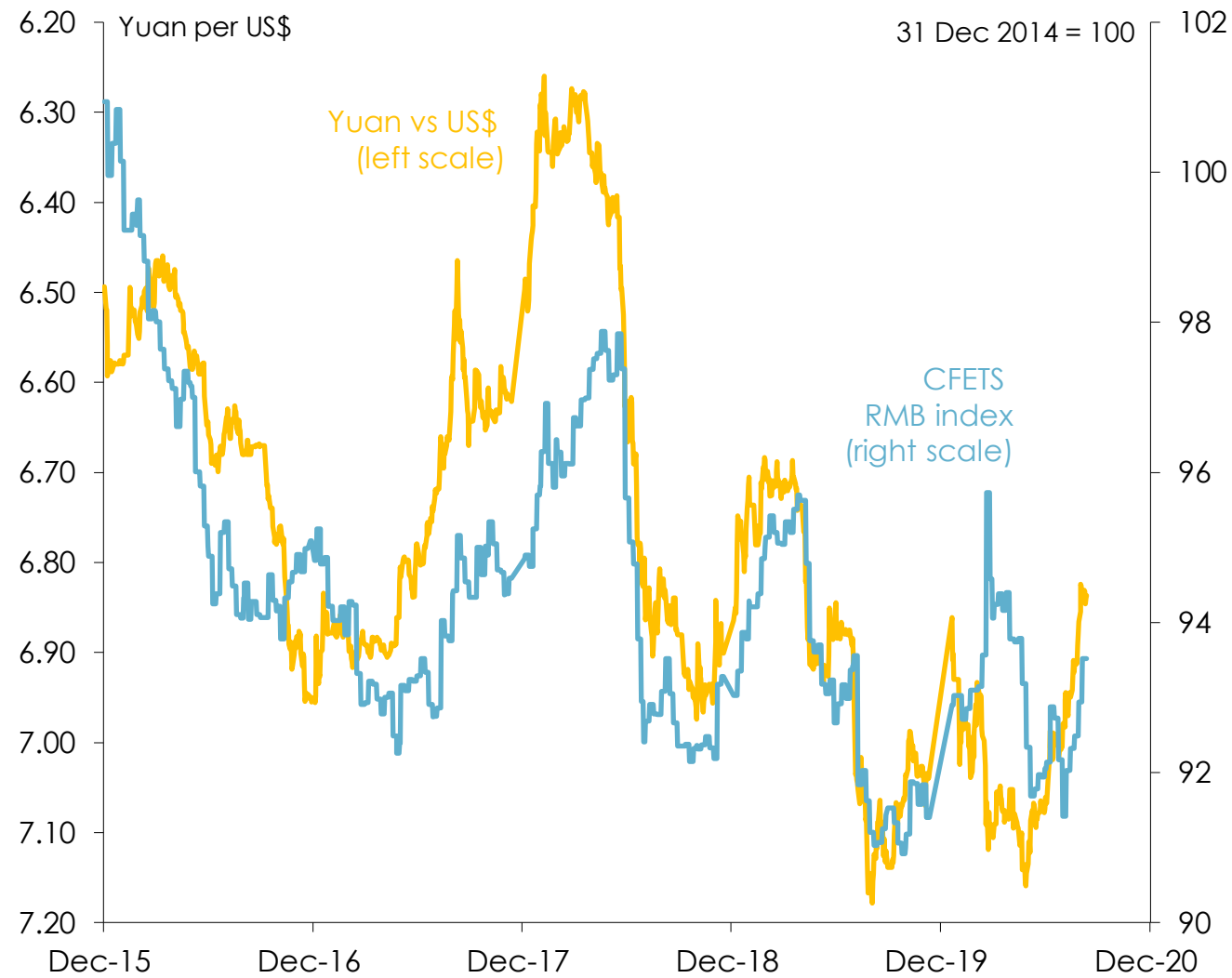
## Depository corporation liabilities



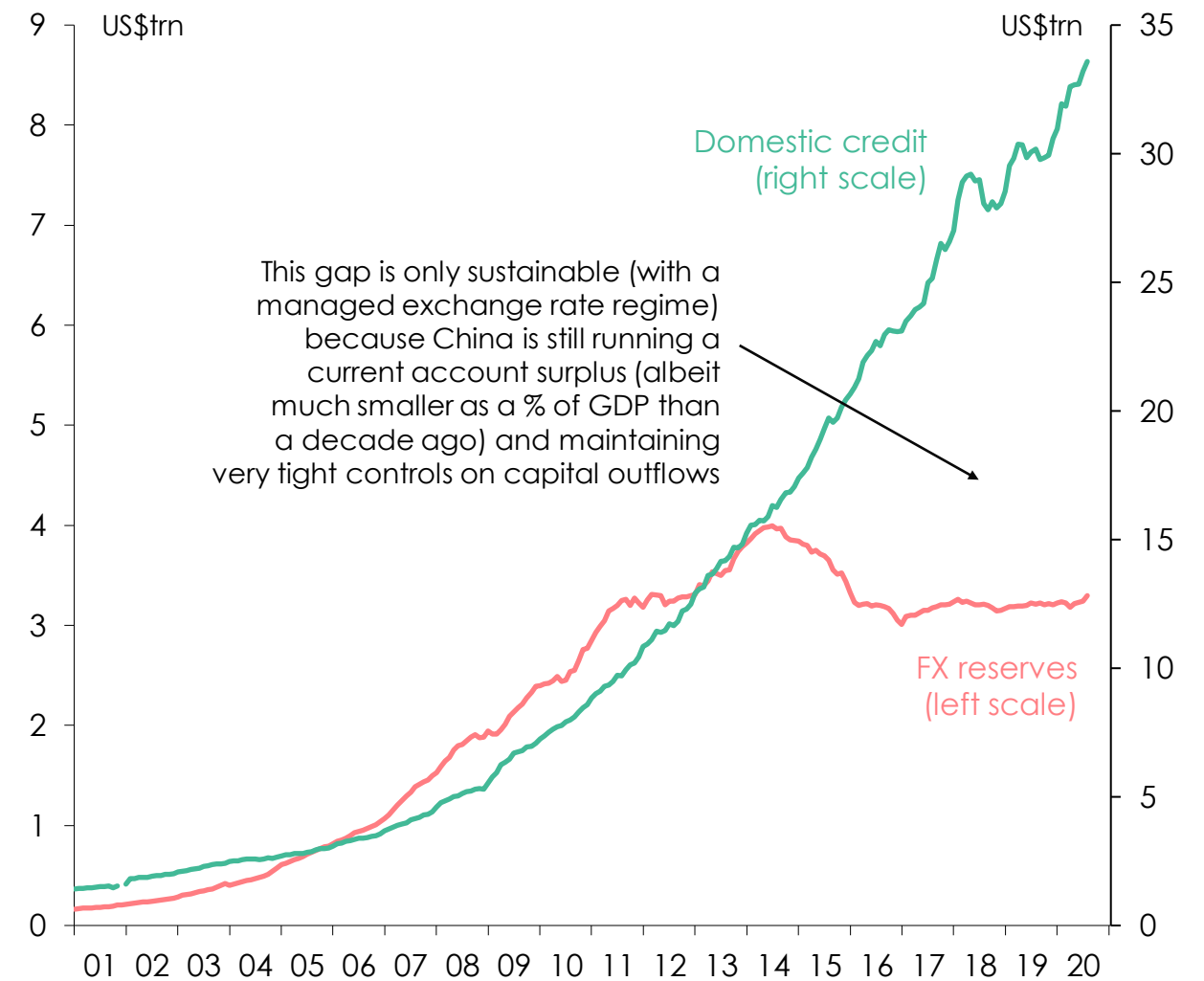
Note: 'SHIBOR' is the Shanghai Inter-Bank Offered Rate. Sources: Refinitiv Datastream; People's Bank of China. Latest interest data are for the week ended 14<sup>th</sup> August; latest credit and financial system data are for July.

# This week the Rmb rose 1.% in trade-weighted terms despite barely moving against the US\$, though it's up 4½% against the US\$ since the end of May

## Chinese yuan vs US\$ and trade-weighted index



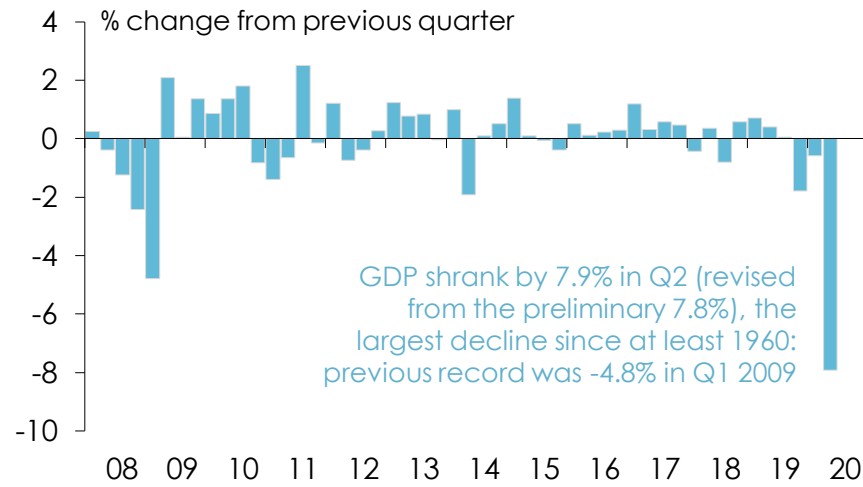
## FX reserves and domestic credit



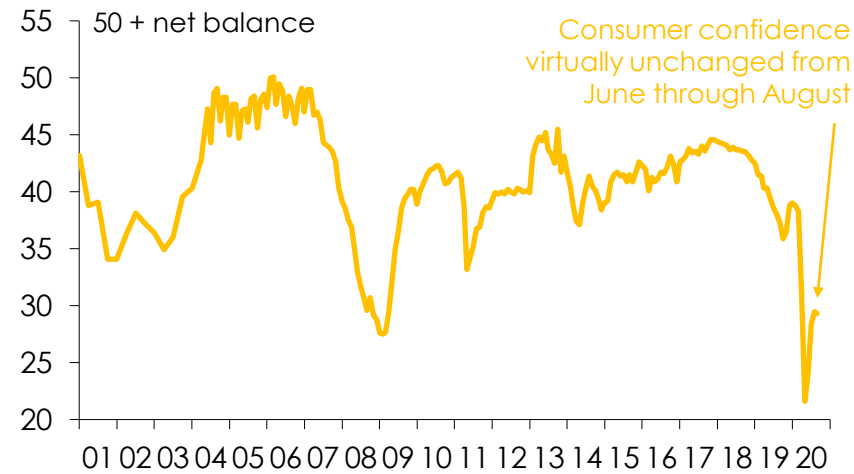
Sources: Refinitiv Datastream; China Foreign Exchange Trading System; People's Bank of China. Exchange rates up to 11<sup>th</sup> September; credit and FX reserves data up to July.

# Japan entered its fourth recession since 2000 after hiking its GST rate last October, and the pandemic has worsened it

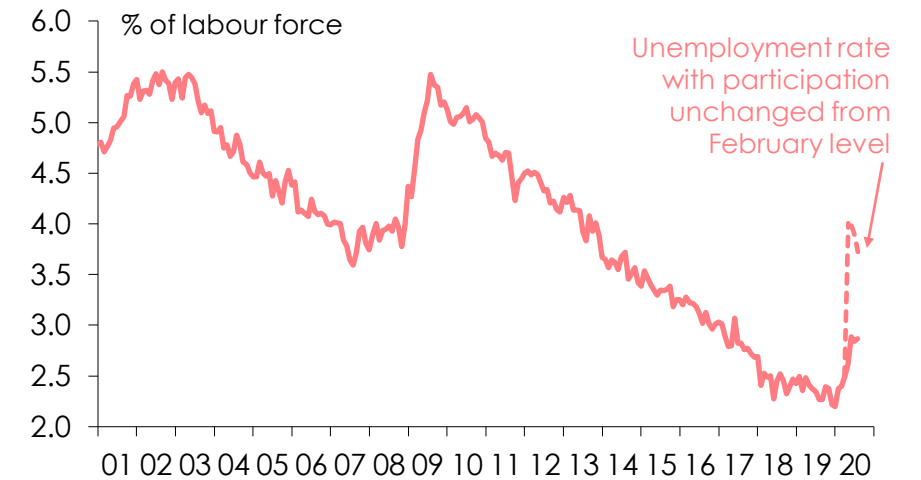
## Real GDP



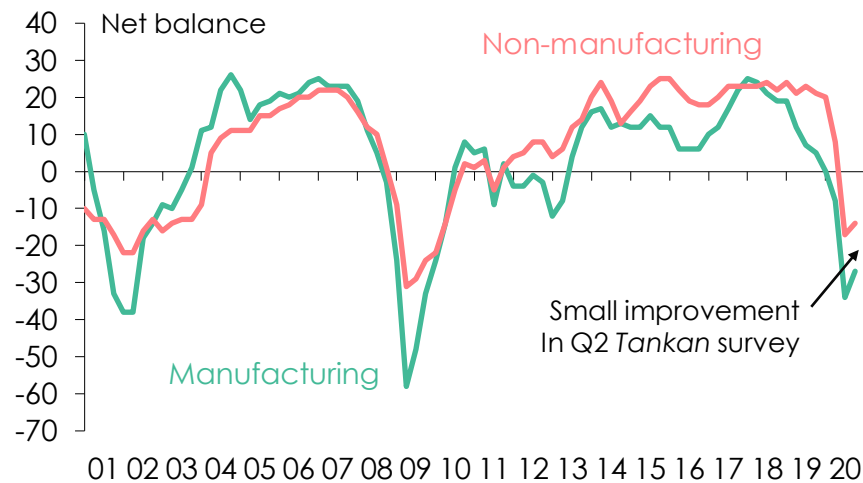
## Consumer confidence



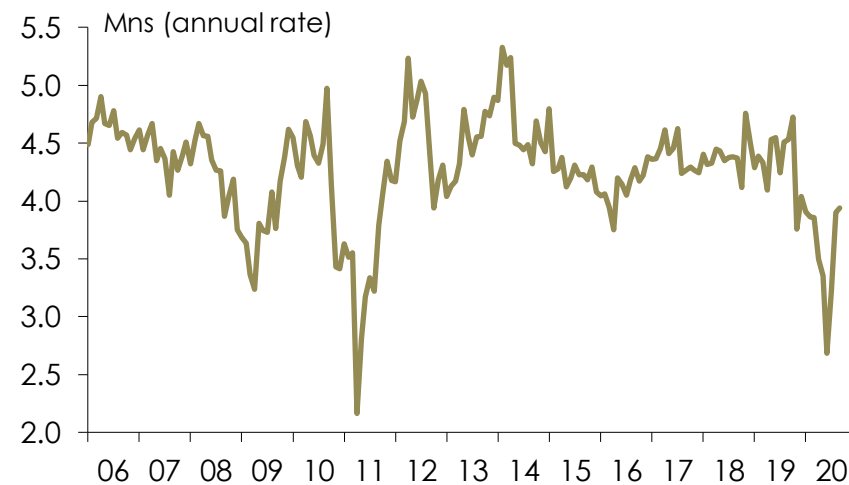
## Unemployment



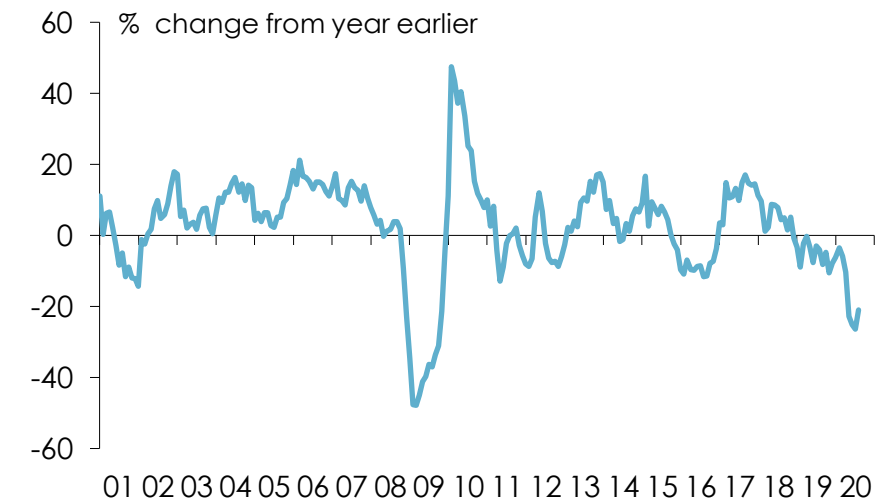
## Business conditions – large firms



## Motor vehicle sales



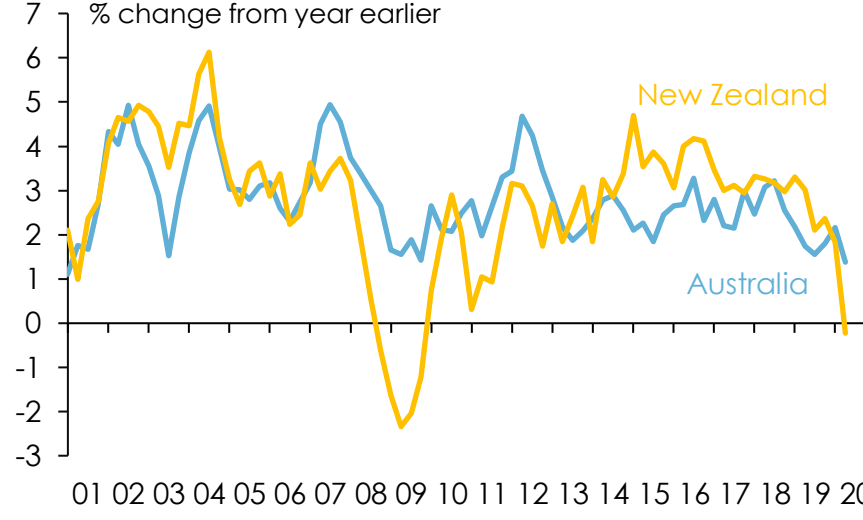
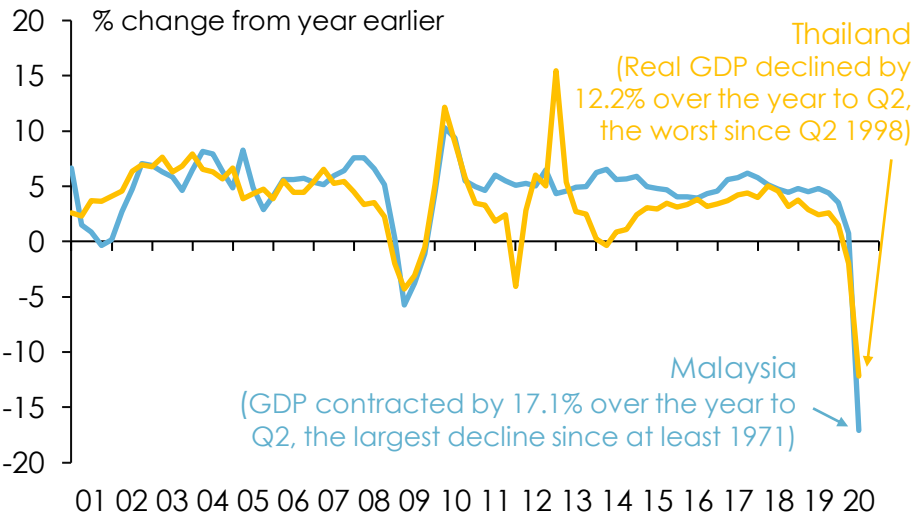
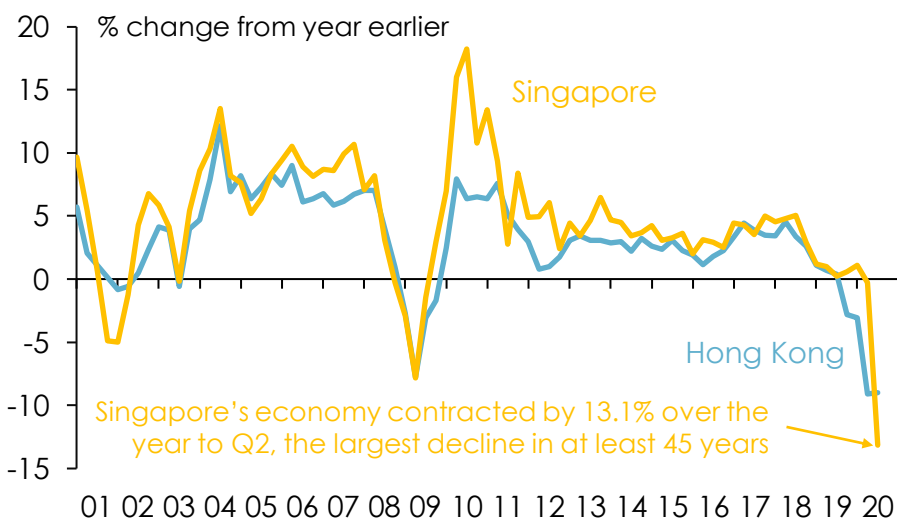
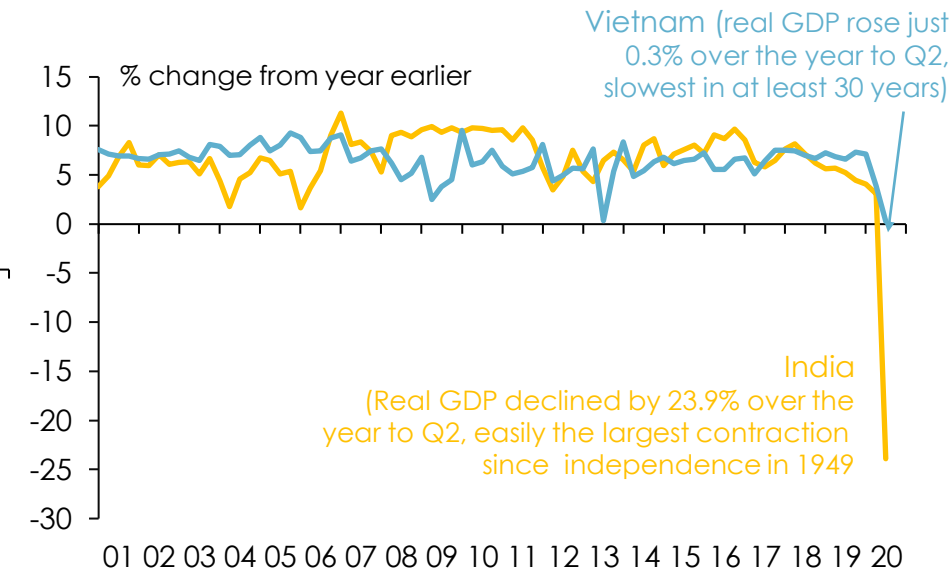
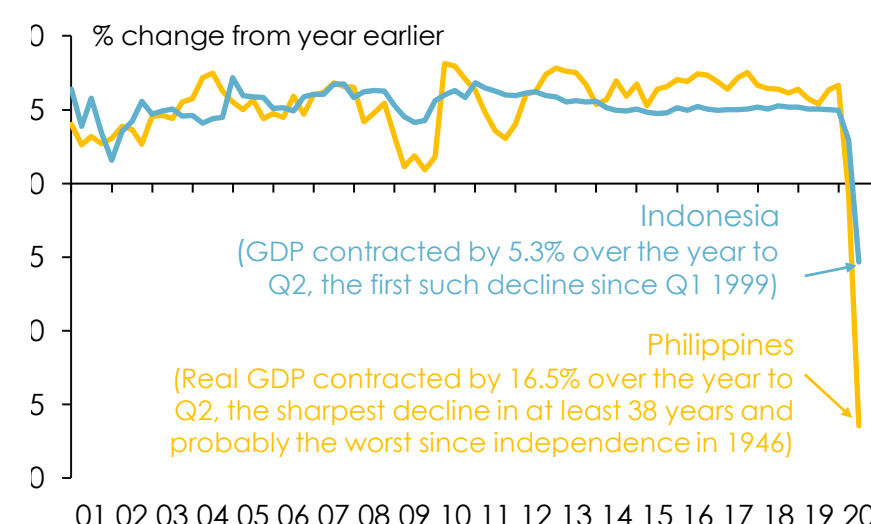
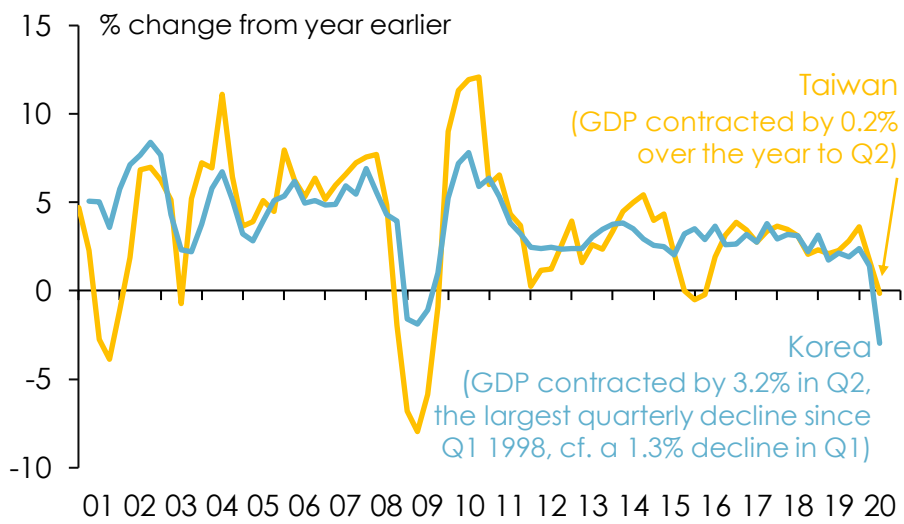
## Merchandise export volumes



Sources: Japan Cabinet Office; Bank of Japan; Japan Automobile Dealers' Association; Ministry of Health, Labour & Welfare.

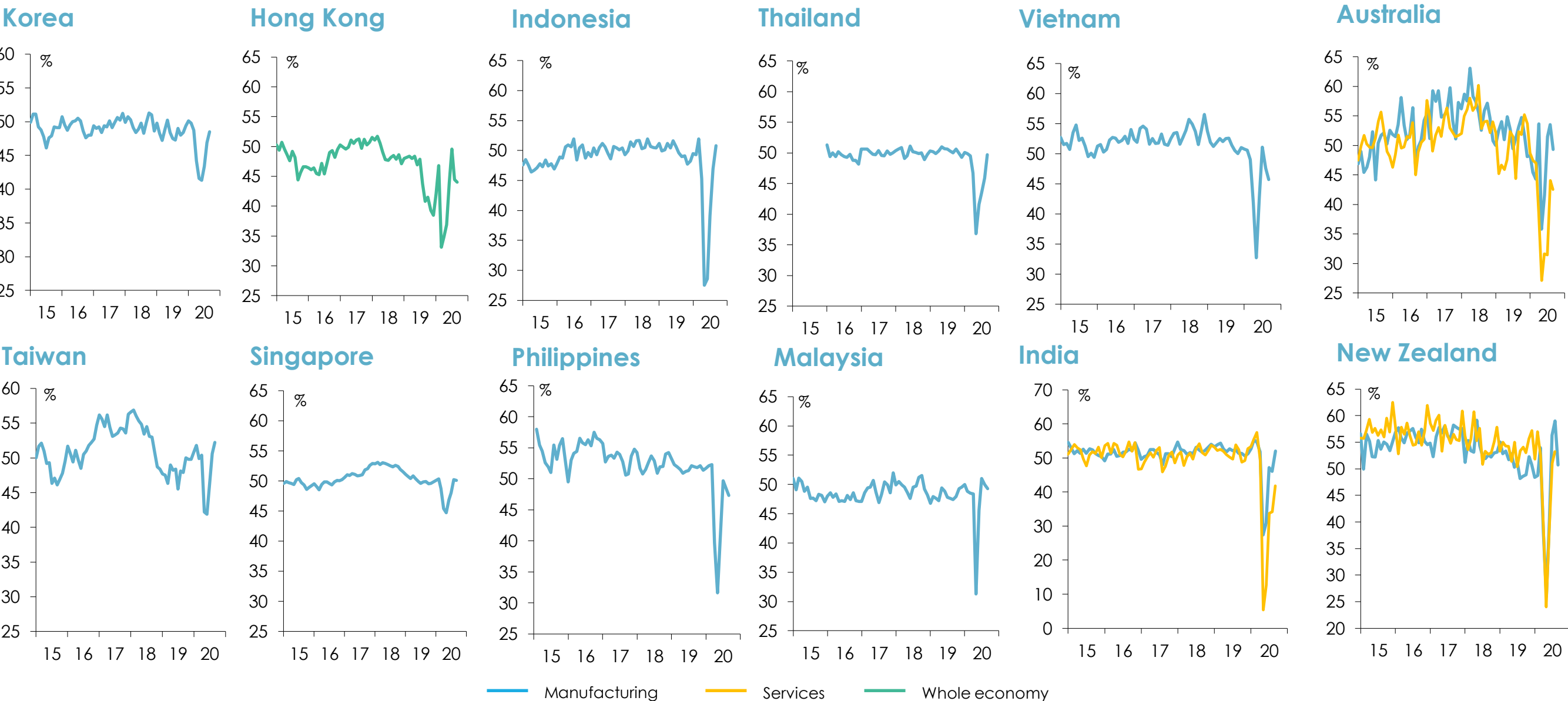
# All other Asian economies which have so far reported Q2 GDP numbers, except Vietnam, have experienced outright contractions from Q2 2019

## Real GDP growth – Asia-Pacific economies



Sources: Bank of Korea; Taiwan Directorate-General of Budget, Accounting & Statistics; Hong Kong Census & Statistics Department; Singapore Ministry of Trade and Industry; Department of Statistics Malaysia; Office of the National Economic & Social Development Council of Thailand; Statistics Indonesia; Philippine Statistics Authority; General Statistics Office of Viet Nam; India Ministry of Statistics & Programme Implementation; Australian Bureau of Statistics; Statistics New Zealand. New Zealand's Q2 GDP figures will be released on 17<sup>th</sup> September.

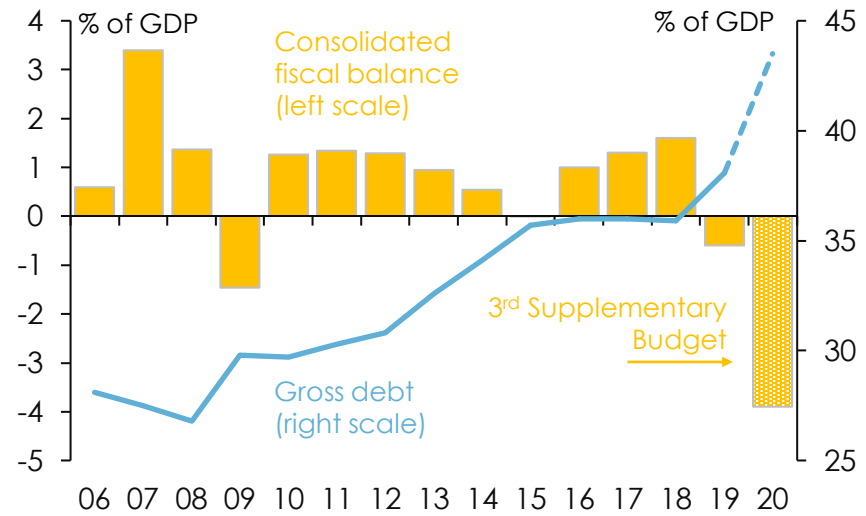
# Manufacturing PMIs rose further in August in most Asia-Pacific economies except for Philippines, Vietnam, Australia & NZ: India services also still weak



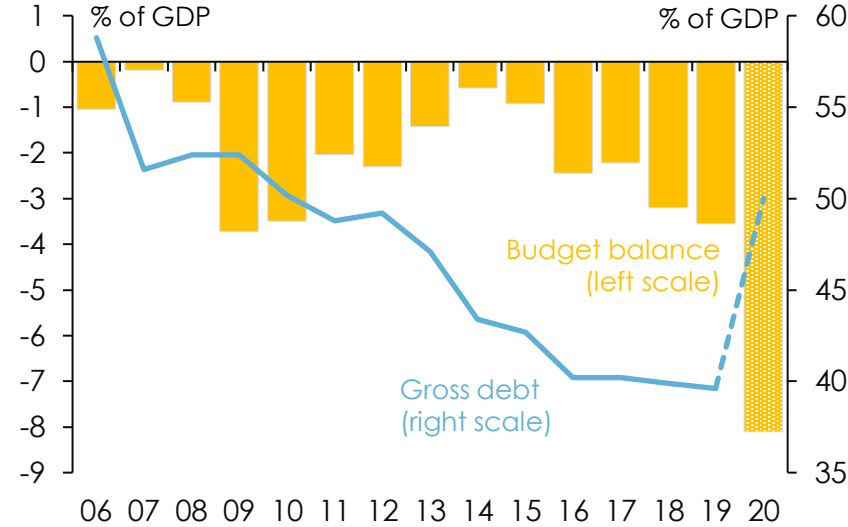
Note: Purchasing Managers' Indexes (PMIs) are derived from surveys of senior executives, who are asked to report whether various dimensions of business activity recorded an increase, decrease or no change compared with the previous month. A reading of 50 indicates an overall increase cf. the previous month, and a reading of less than 50 indicates a decrease. Latest data are for August, except for New Zealand services, July.  
Sources: IHS Markit; Singapore Institute of Purchasing & Materials Management; Australian Industry Group; Business NZ; Refinitiv Datastream.

# The Korean and Philippines central banks have engaged in different variants of 'quantitative easing' ...

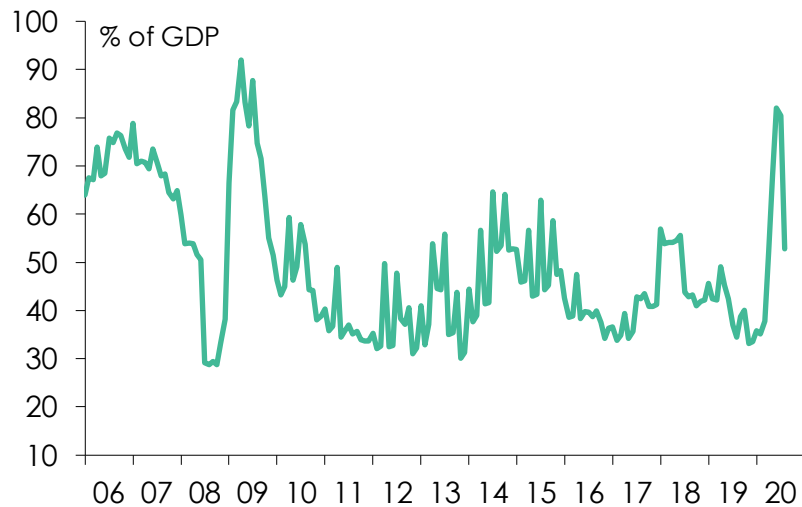
## Korea central government budget



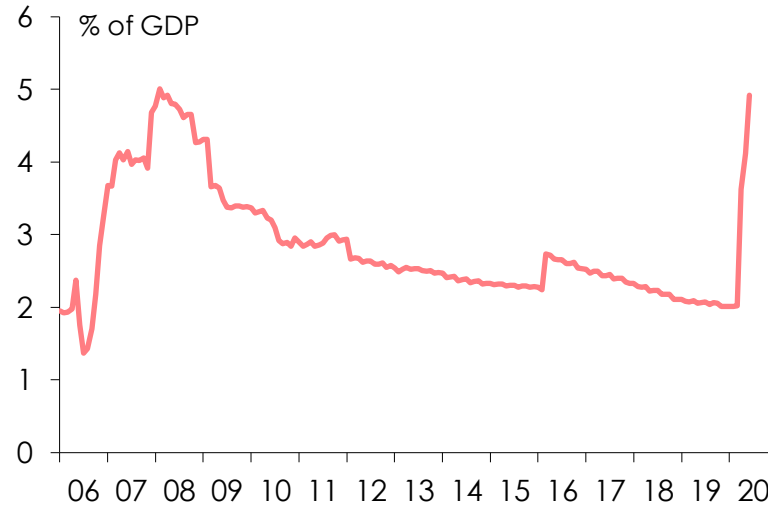
## Philippines NG budget



## BoK domestic assets



## BSP claims on national gov't

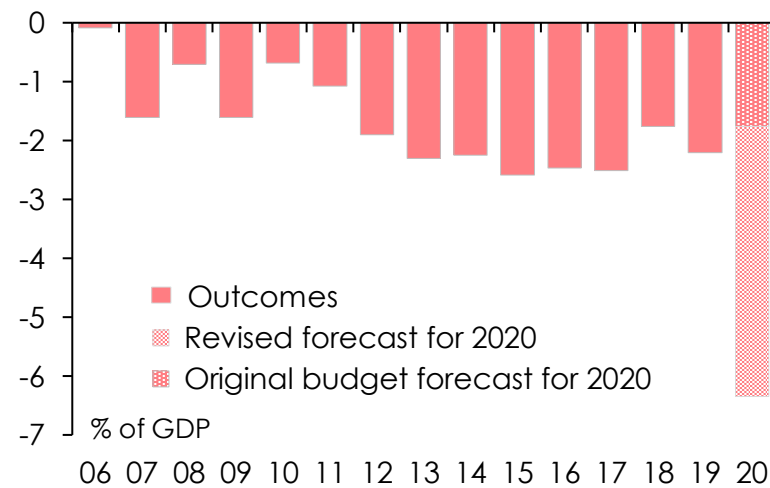


- ❑ The Bank of Korea has cut its policy rate by 100bp so far this year to a record low of 0.50%
- ❑ After its last rate cut in May, Governor Lee Ju-Yeol indicated the BoK was considering using 'unconventional monetary tools' to support growth
  - since March, the BoK has been willing to supply 'unlimited liquidity' to financial institutions, accepting a wider range of collateral in repos
  - In April the BoK lent ₩8 trn to a ₩10 trn SPV established to buy corporate bonds and CP
- ❑ BoK's total domestic assets more than doubled between end-February and end-May – reflecting increased holdings of bonds, reverse repos and lending to both government and the private sector – but fell back to 53% in July, as loans were repaid and repos reversed
- ❑ The Philippines National Government (NG) expects its budget deficit to reach 8.1% of GDP this year, and public debt to rise to 50% of GDP
- ❑ In March, the BSP purchased ₱300bn (US\$6bn) of bonds directly from the Treasury Bureau under a 6-mth repo arrangement, and reportedly bought another ₱500bn in the secondary market through to the end of July

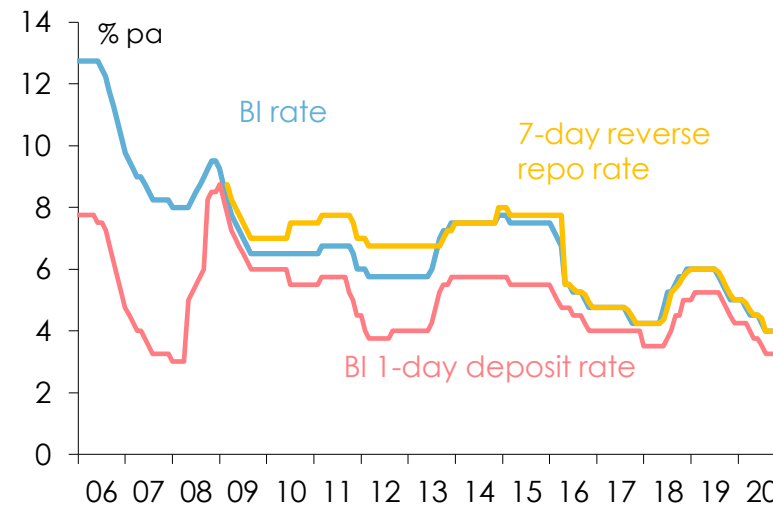
Sources: Korean Ministry of Economy and Finance; Bank of Korea; Philippines Development Budget Co-ordination Committee; Bureau of the Treasury; Bangko Sentral ng Pilipinas.

# ... as has Bank Indonesia, but its independence could be at risk from proposals currently under consideration

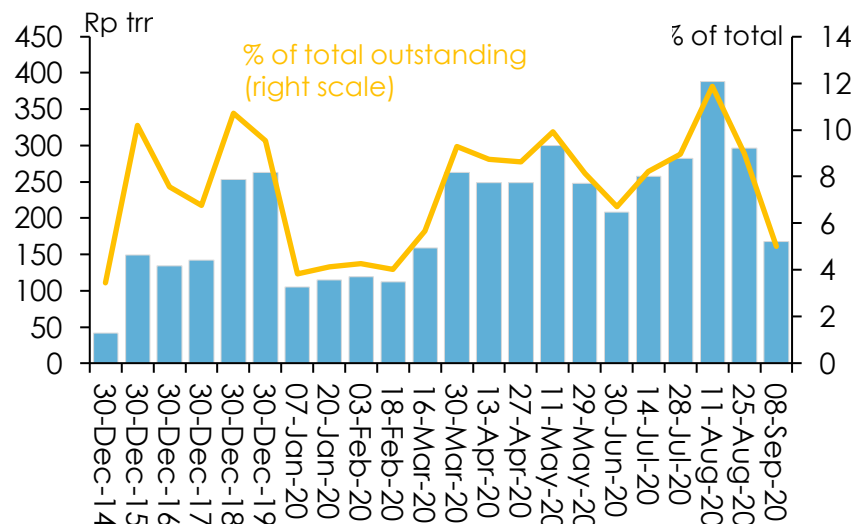
## Indonesia budget deficit



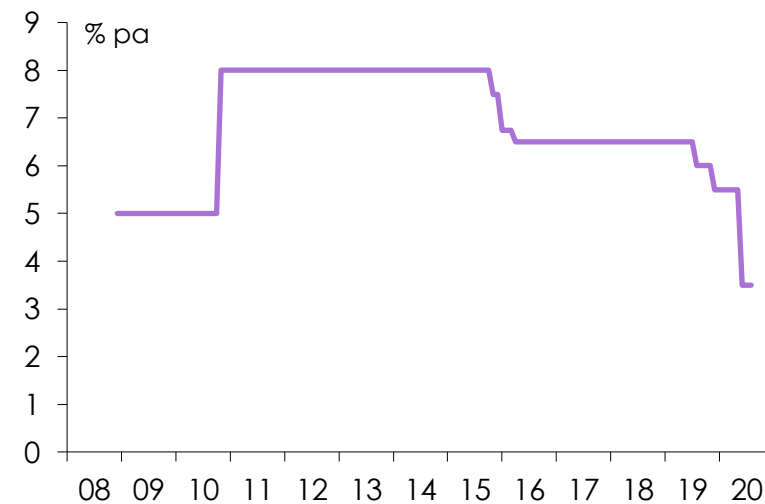
## BI monetary policy rates



## BI holdings of tradeable SBNs



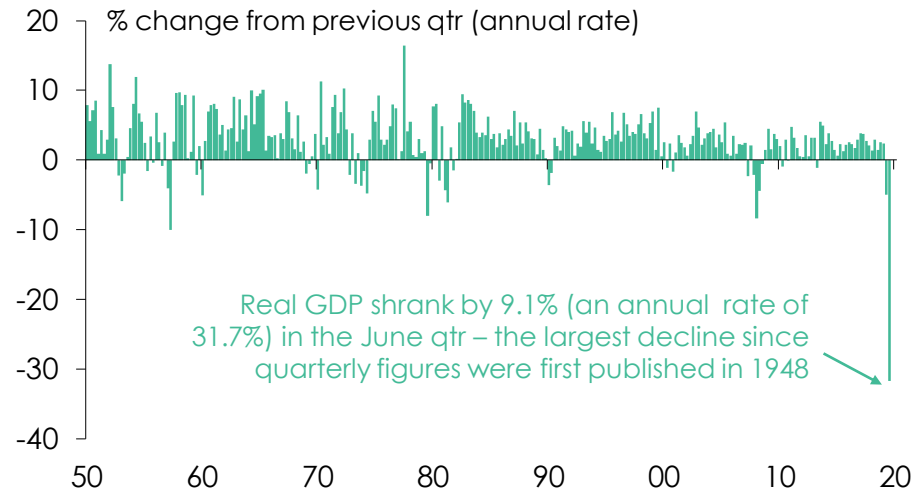
## Bank reserve requirement ratio



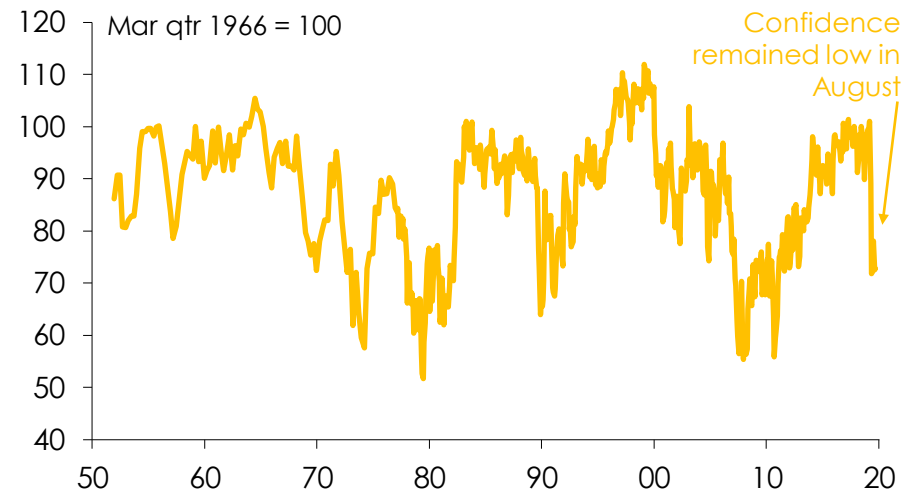
- ❑ In July, the Indonesian Government and Bank Indonesia (BI) formally agreed a 'burden-sharing' scheme under which BI will directly purchase bonds equivalent to 25% of this year's budget financing requirement (and return the interest received to the Government), as well as subsidizing interest payments on other bonds
- ❑ Finance Minister Sri Mulyani Indrawati and, separately, a group of parliamentarians, have proposed a 'Perppu' ('Decree in lieu of Law') on 'Financial System Reform' which would, among other things:
  - give BI an employment mandate in addition to its inflation target;
  - give the Finance Minister and other ministers voting rights on the BI's policy-making board
  - 'allow' BI to purchase zero-coupon government bonds 'at a discount, and to provide 'temporary financing' to offset revenue shortfalls of up to 20% of revenue projections
  - transfer responsibility for bank supervision to BI from the Financial Services Authority (OJK)
- ❑ There's nothing untoward about the first or fourth of these proposals – but the second is worrying, and the third could be as well

# The US economy experienced its sharpest contraction since the 1930s in the first half of 2020, although growth has turned moderately positive in Q3

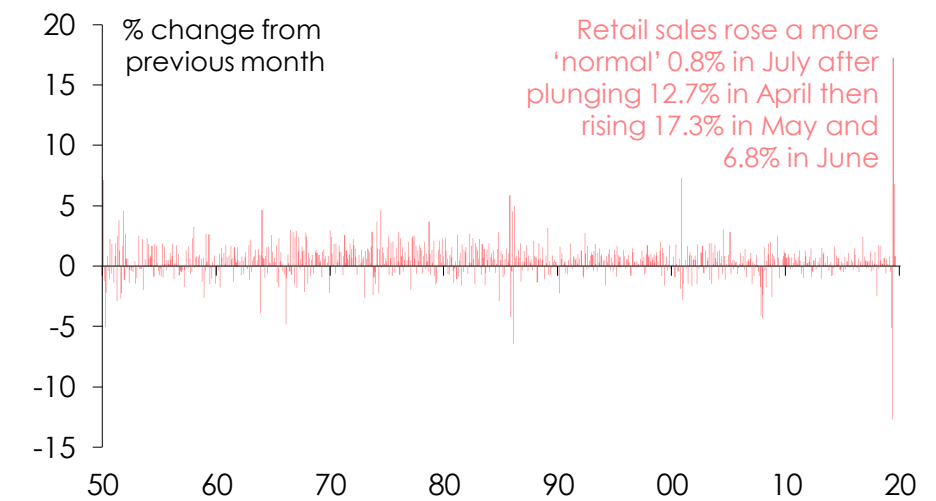
## Real GDP



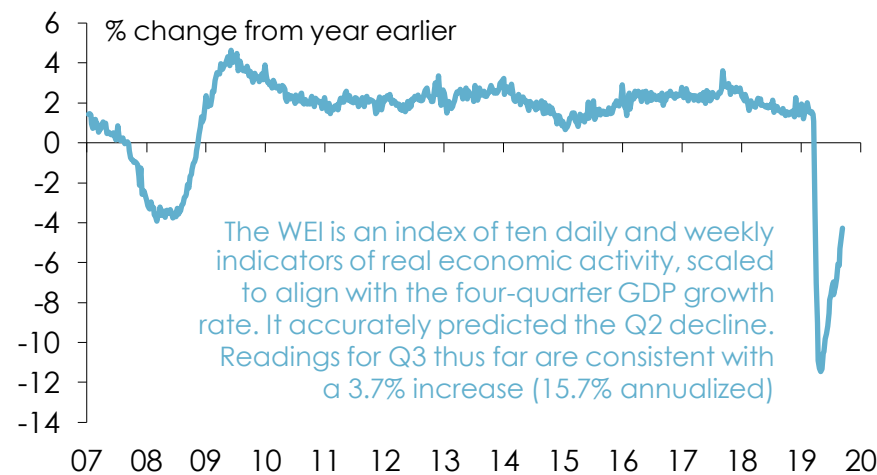
## Consumer confidence



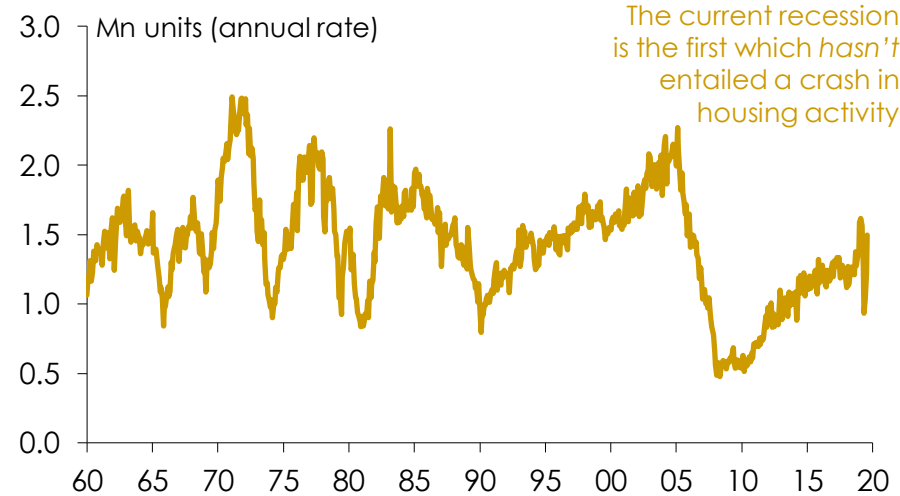
## Retail sales



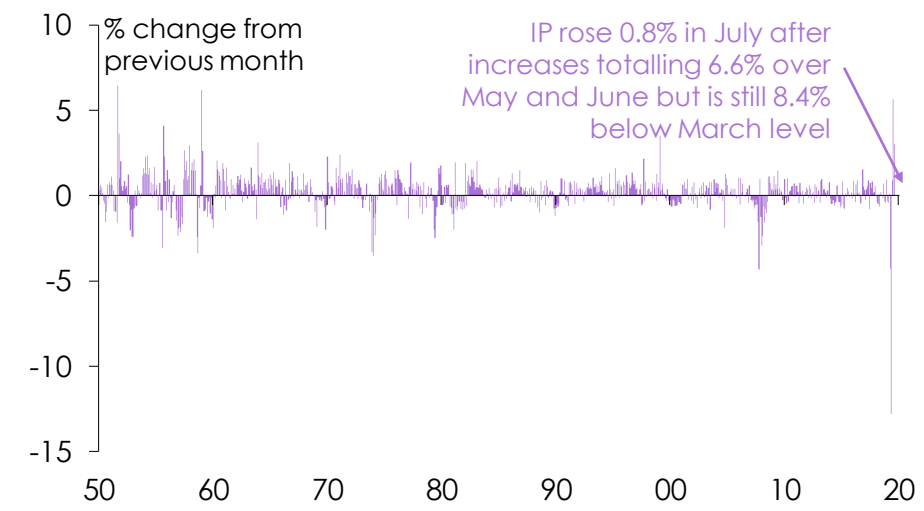
## NY Fed weekly economic index



## Housing starts

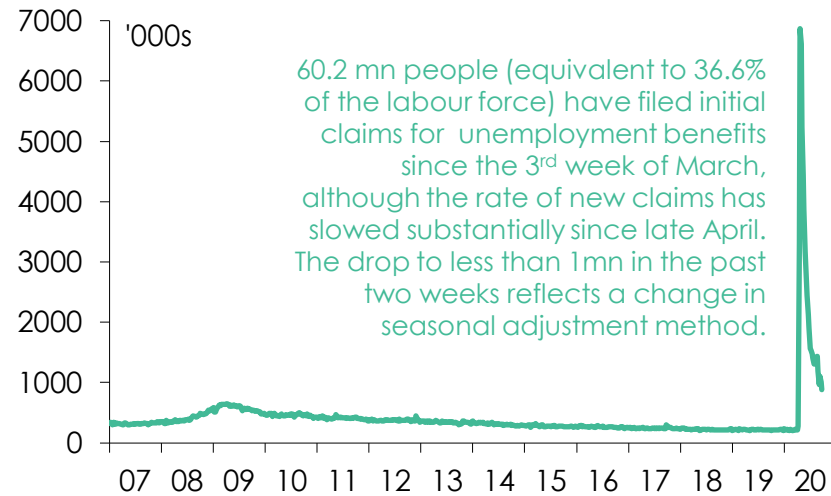


## Industrial production

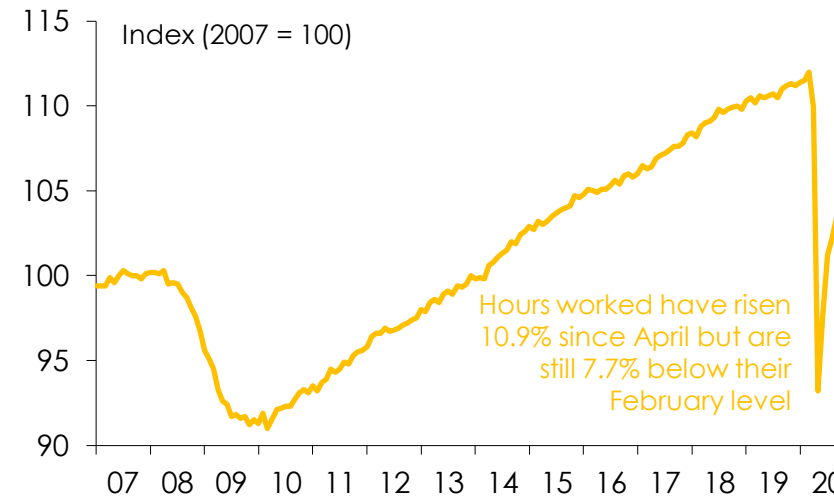


# 48% of the 22mn jobs lost in the US in March and April have been regained over the past four months while unemployment has fallen to 8.4%

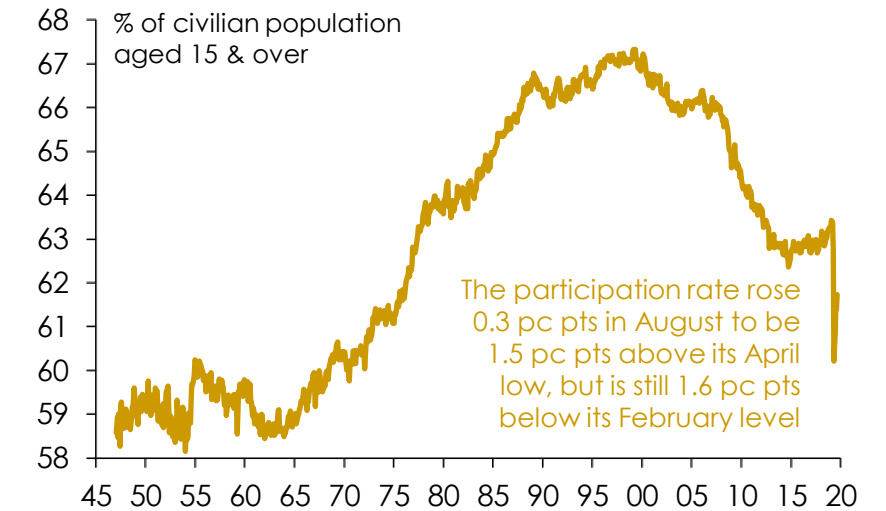
## Unemployment benefit claims



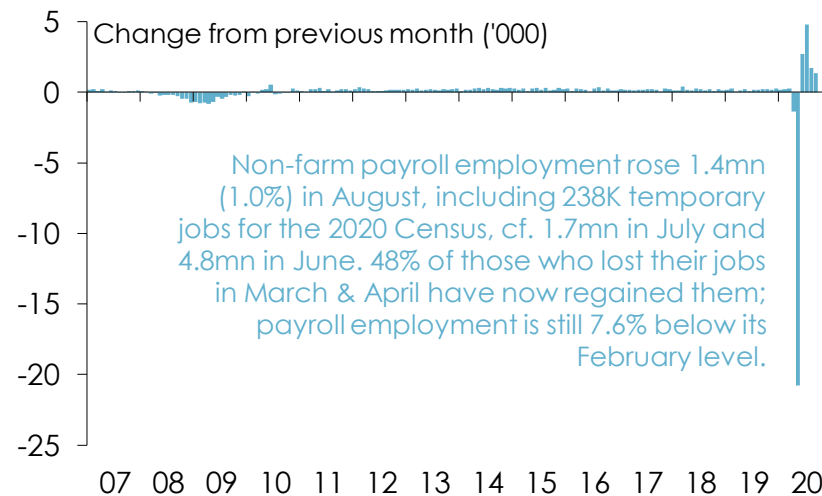
## Hours worked (private sector)



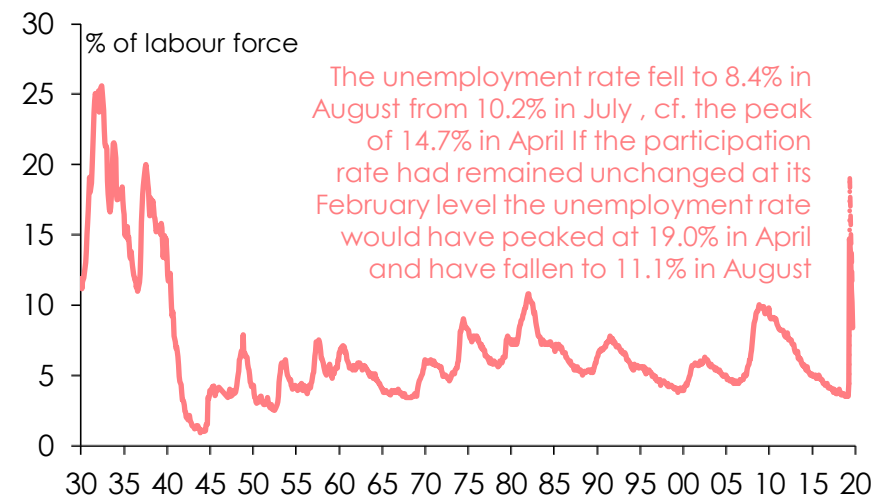
## Labour force participation rate



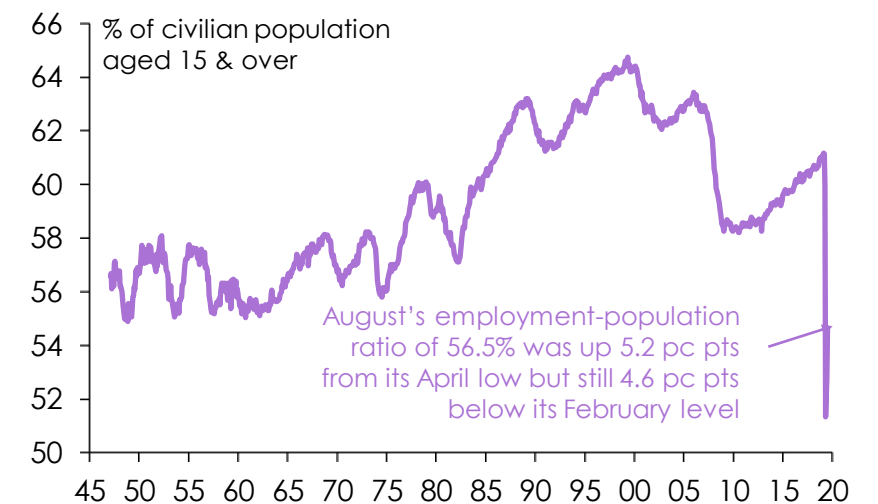
## Non-farm payroll employment



## Unemployment rate

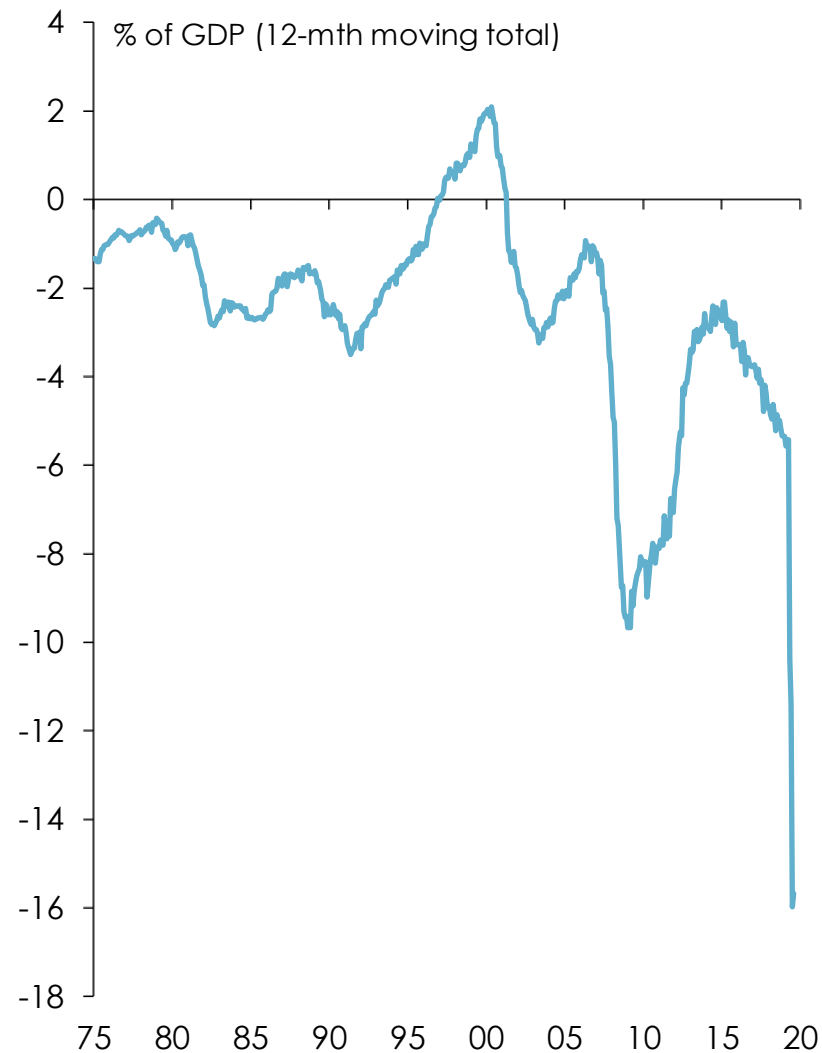


## Employment to population ratio

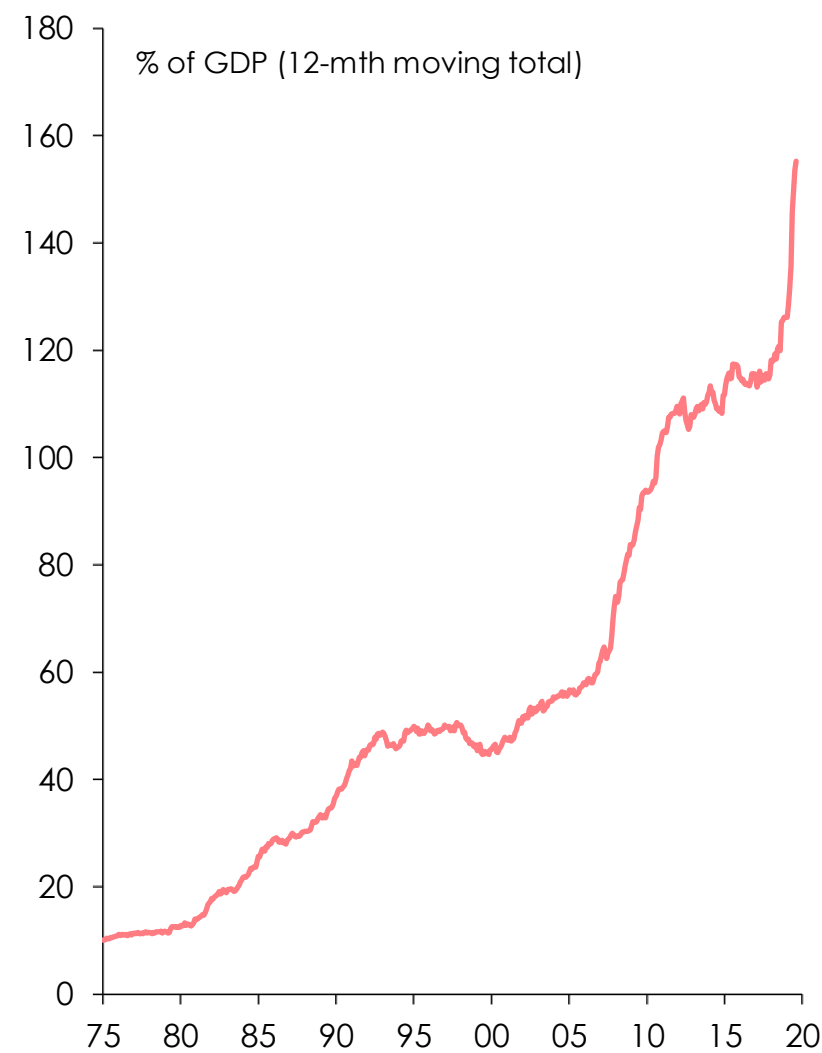


# The US budget deficit has blown out dramatically since the end of March, reaching 16% of GDP in the 12 months ended July

## US Federal budget deficit



## US gross Federal debt

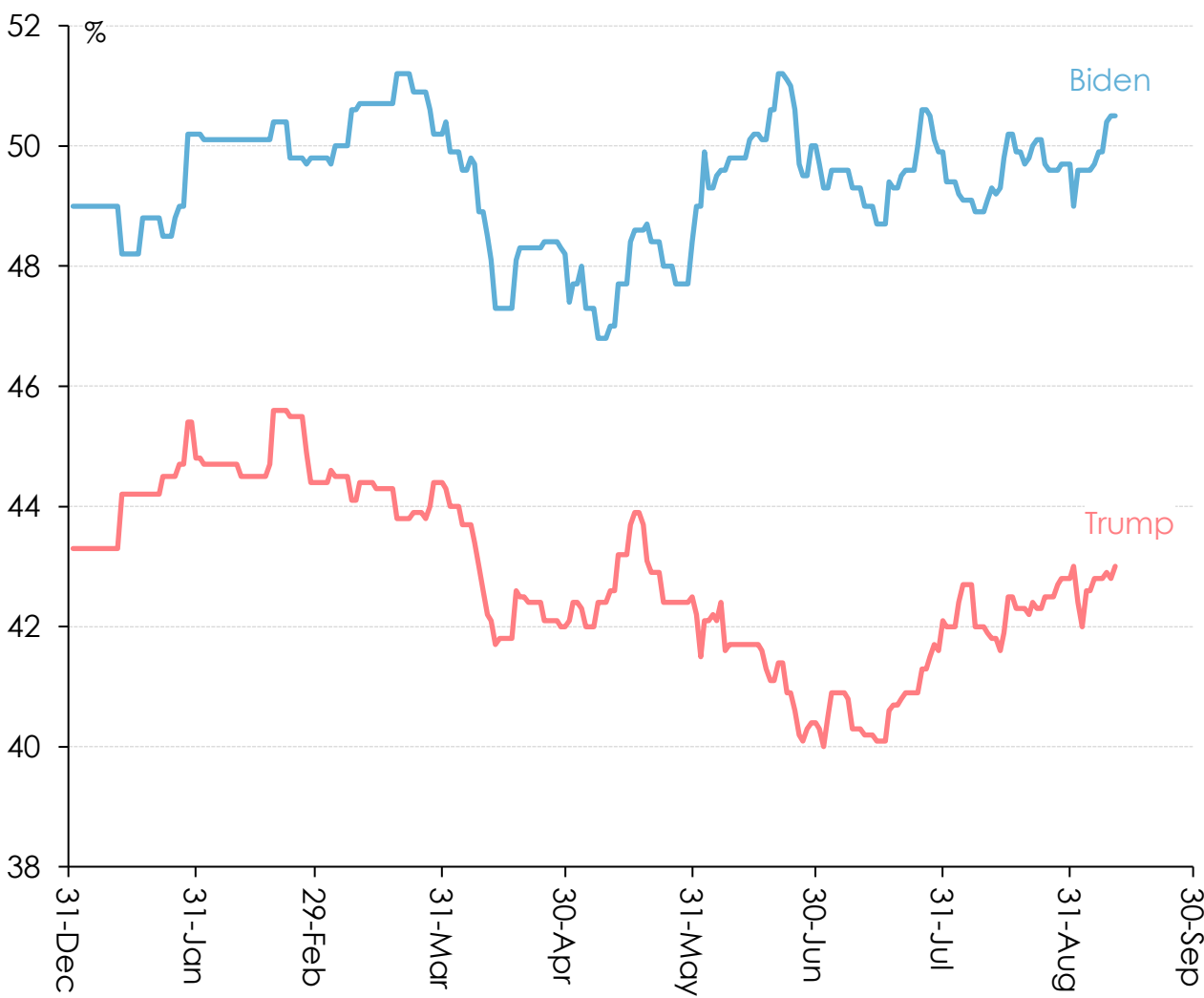


- ❑ The US budget deficit widened from US\$582bn (3.3% of GDP) in 2016 (Obama's last year in office) to US\$1 trn (5.4% of GDP) in 2019, while gross federal debt rose from US\$20.4 trn (115% of GDP) to \$24.1trn (126% of GDP)
- ❑ The budget deficit narrowed sharply in July, to US\$63bn (from \$864bn in June), reflecting the deferral from April to July of tax payments by companies and self-employed individuals
- ❑ However the 12-month moving total deficit remained close to US\$3 trn (16.0% of GDP), cf. a peak of 9.7% of GDP during the GFC (and the largest since 20.8% of GDP in FY 1945)
- ❑ Gross federal debt increased by US\$300 bn to US\$28.9 trn (155% of GDP)
- ❑ This month the non-partisan Congressional Budget Office forecast that the deficit would blow out to US\$3.3trn (16% of GDP) in FY 2020 (the largest since 1945) and remain above US\$1trn pa until at least 2030, with gross debt reaching \$38trn by 2030

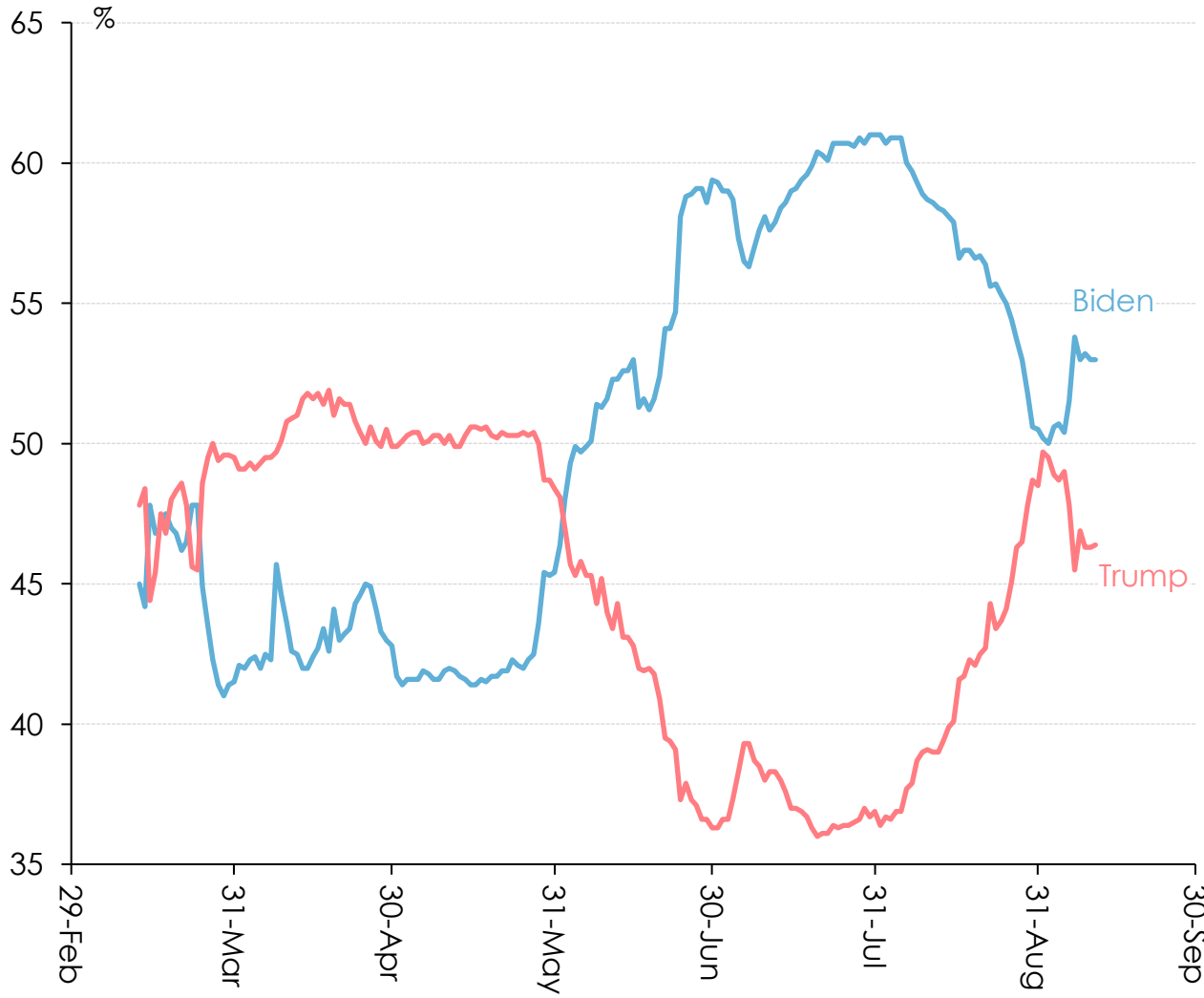
Note: The measure of US gross federal debt is at market value. Sources: US Treasury Department; Federal Reserve Bank of Dallas; US Bureau of Economic Analysis; US Congressional Budget Office; Corinna. August budget data will be released on 10<sup>th</sup> September.

# Biden's lead over Trump widened in both opinion polls and betting odds this week, probably helped by revelations in Bob Woodward's book ('Rage')

Winner of November US Presidential election  
– average of all opinion polls



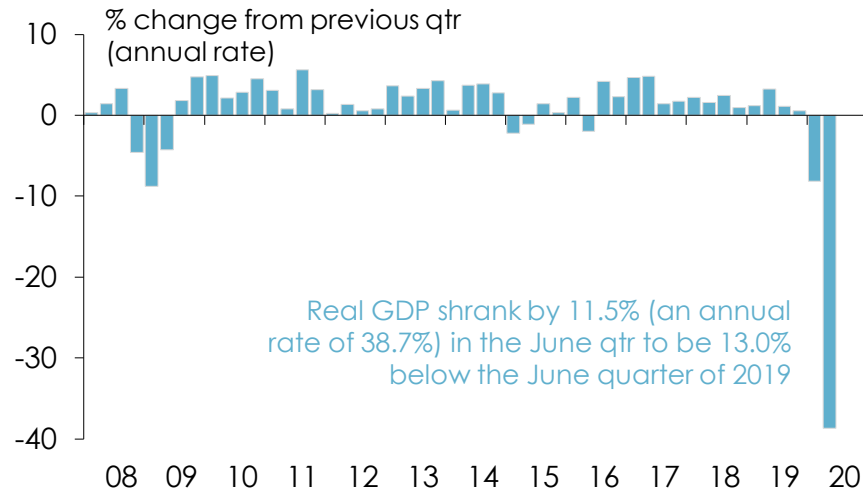
Winner of November US Presidential election  
– betting odds



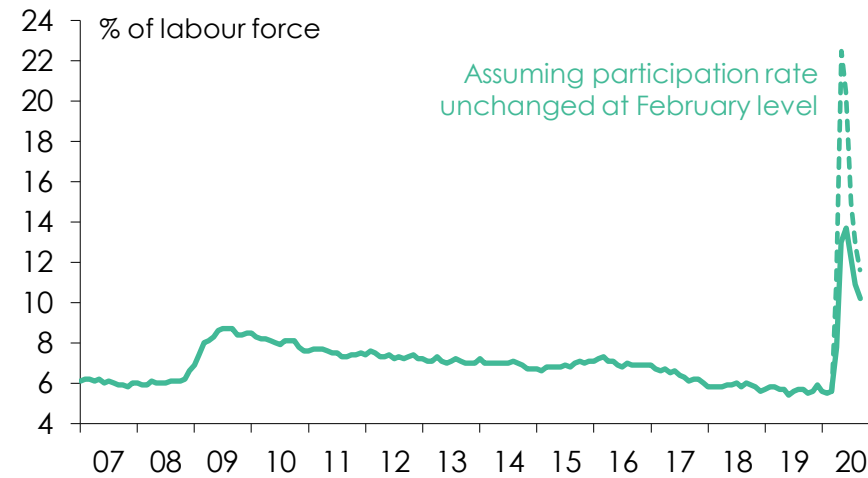
Note: The opinion poll average is based on 9 different polls; the betting odds average is based on 6 different markets. Latest opinion poll and betting odds data are for 11<sup>th</sup> September. Source: [RealClearPolitics](#).

# Canada has had a more severe recession than the US – or Australia (although Canadian house prices are holding up remarkably well)

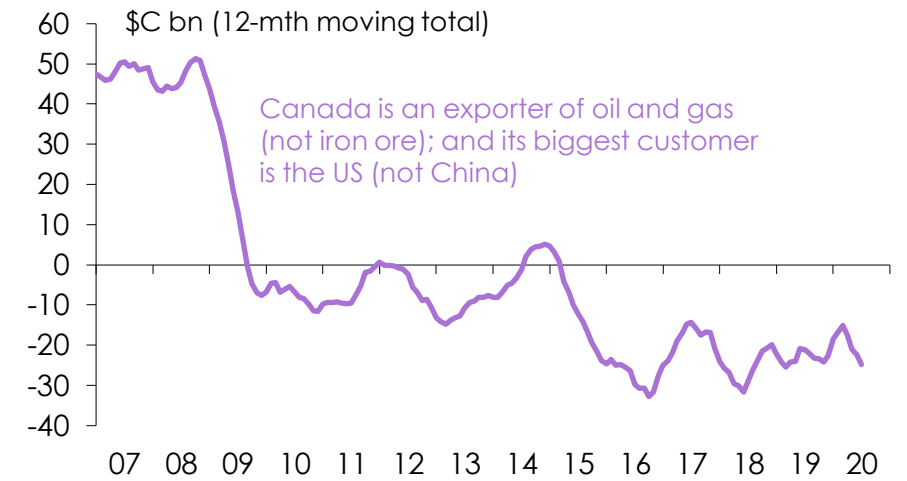
## Real GDP



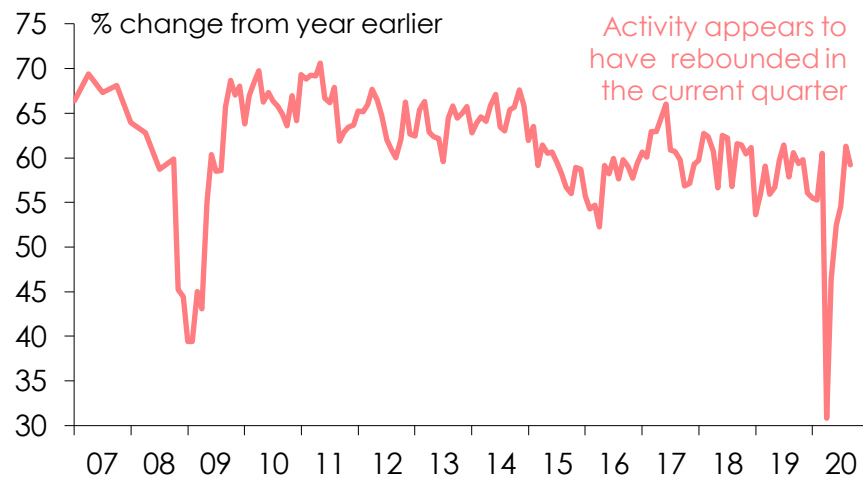
## Unemployment rate



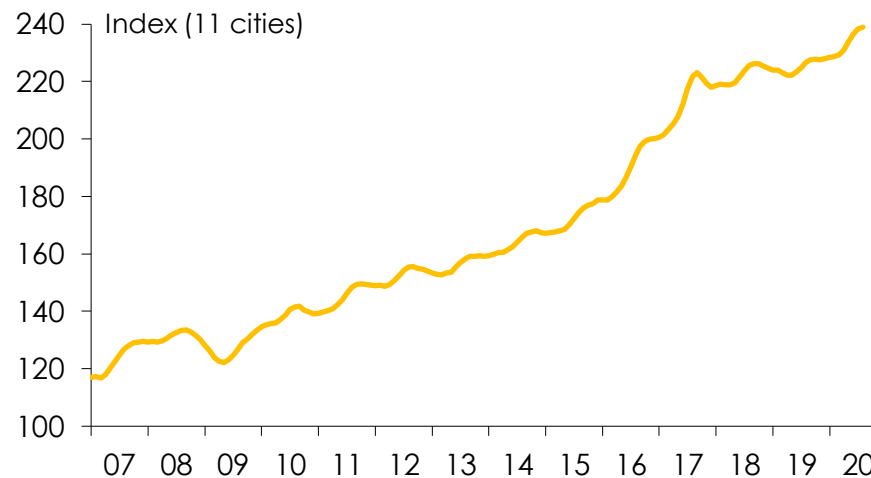
## Merchandise trade balance



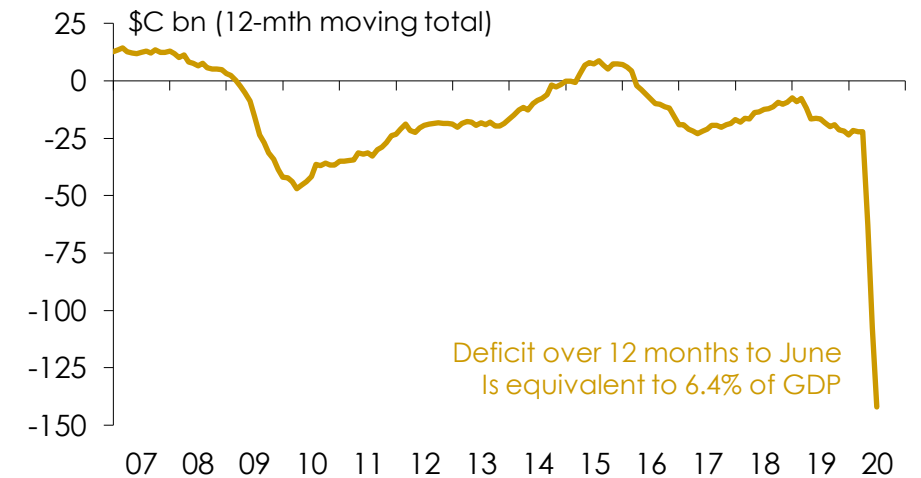
## CFIB 'business barometer'



## House prices

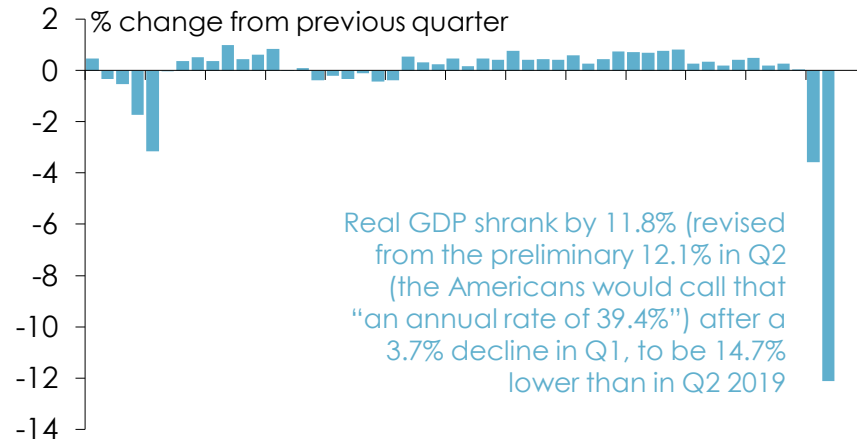


## Federal budget balance

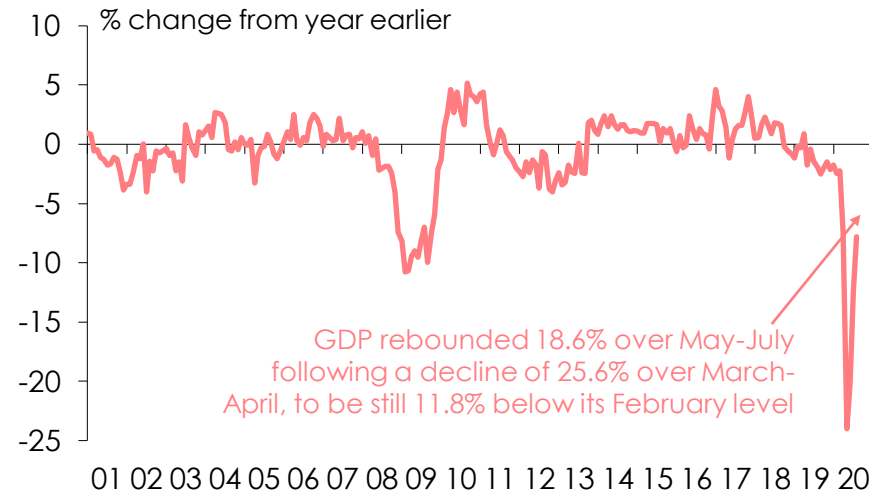


# Europe has experienced a larger contraction in real GDP than the US – although unemployment hasn't risen nearly as much

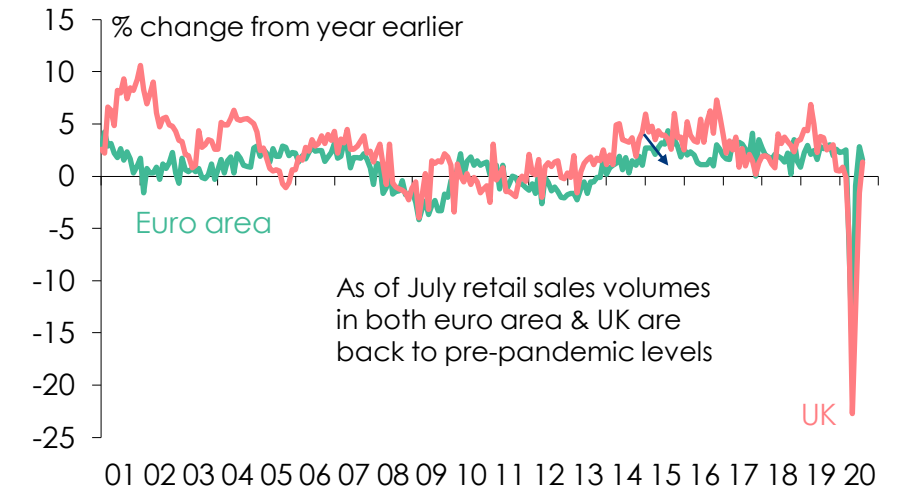
## Euro area real GDP



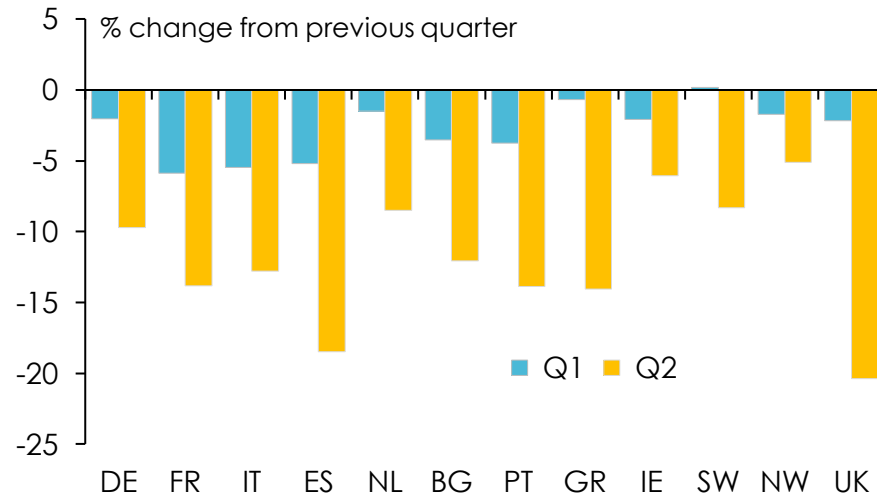
## UK monthly GDP



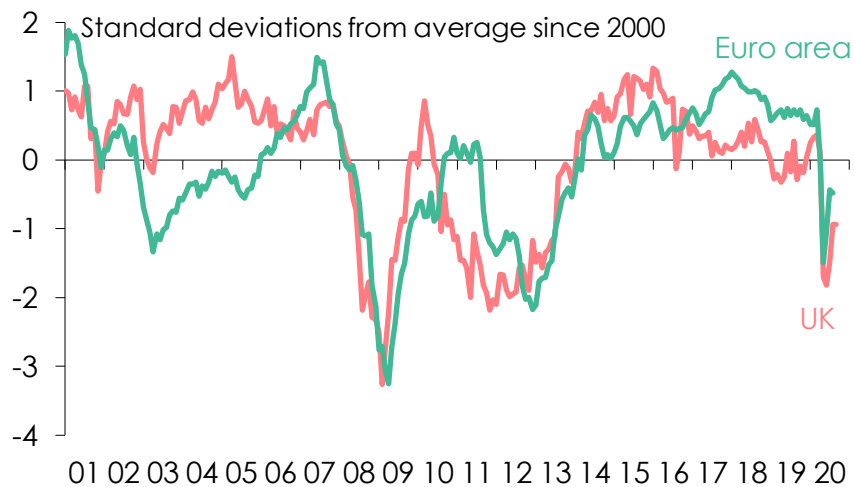
## Retail sales volume



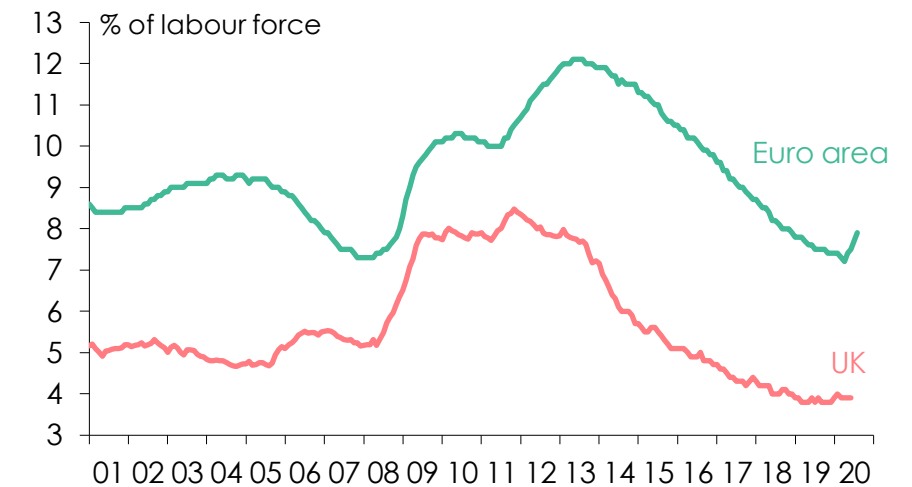
## Quarterly GDP by country



## Consumer confidence



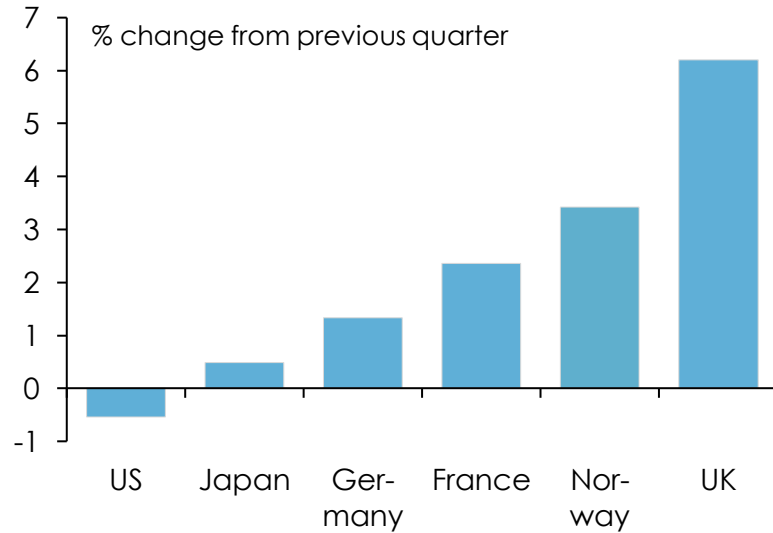
## Unemployment



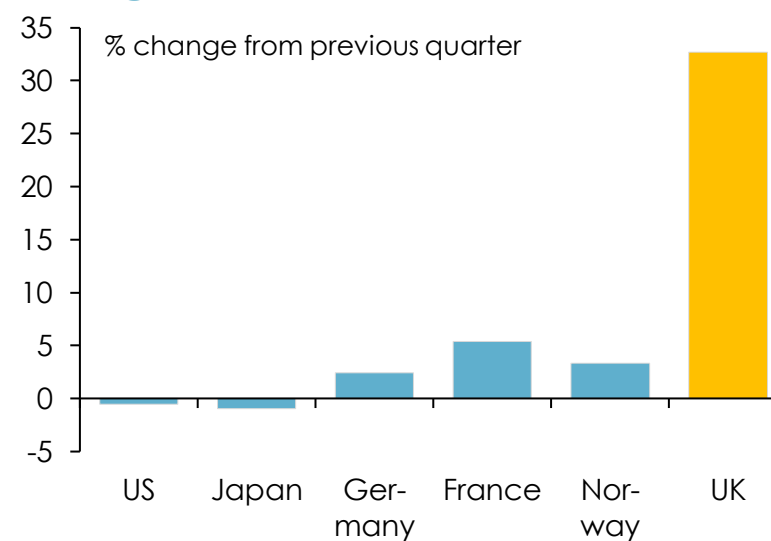
Sources: Eurostat; UK Office for National Statistics; Confederation of British Industry. The UK unemployment rate is published as a 3-month moving average

# There's something fishy about the deflators used in compiling the UK's Q2 national accounts

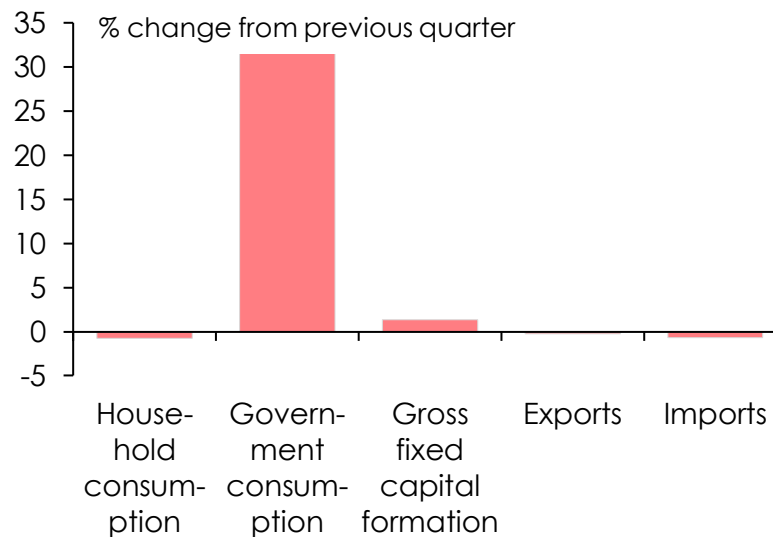
## Q2 GDP deflators



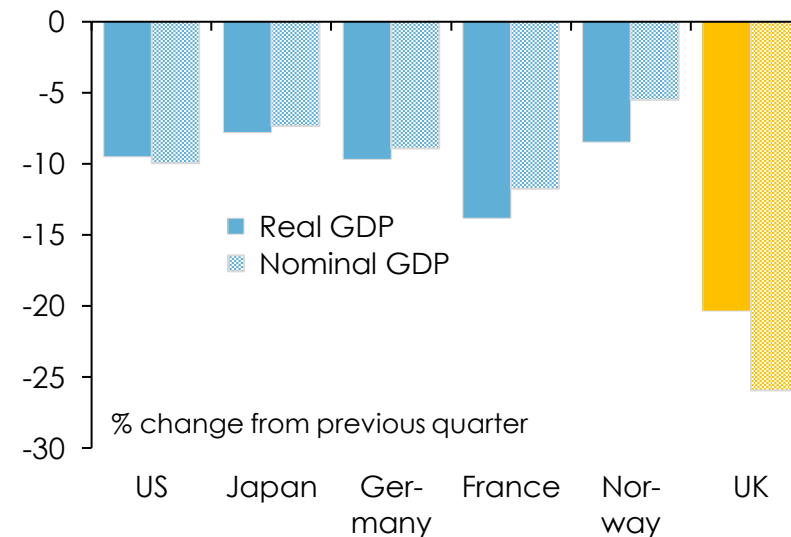
## Q2 gov't consumption deflators



## UK Q2 expenditure deflators



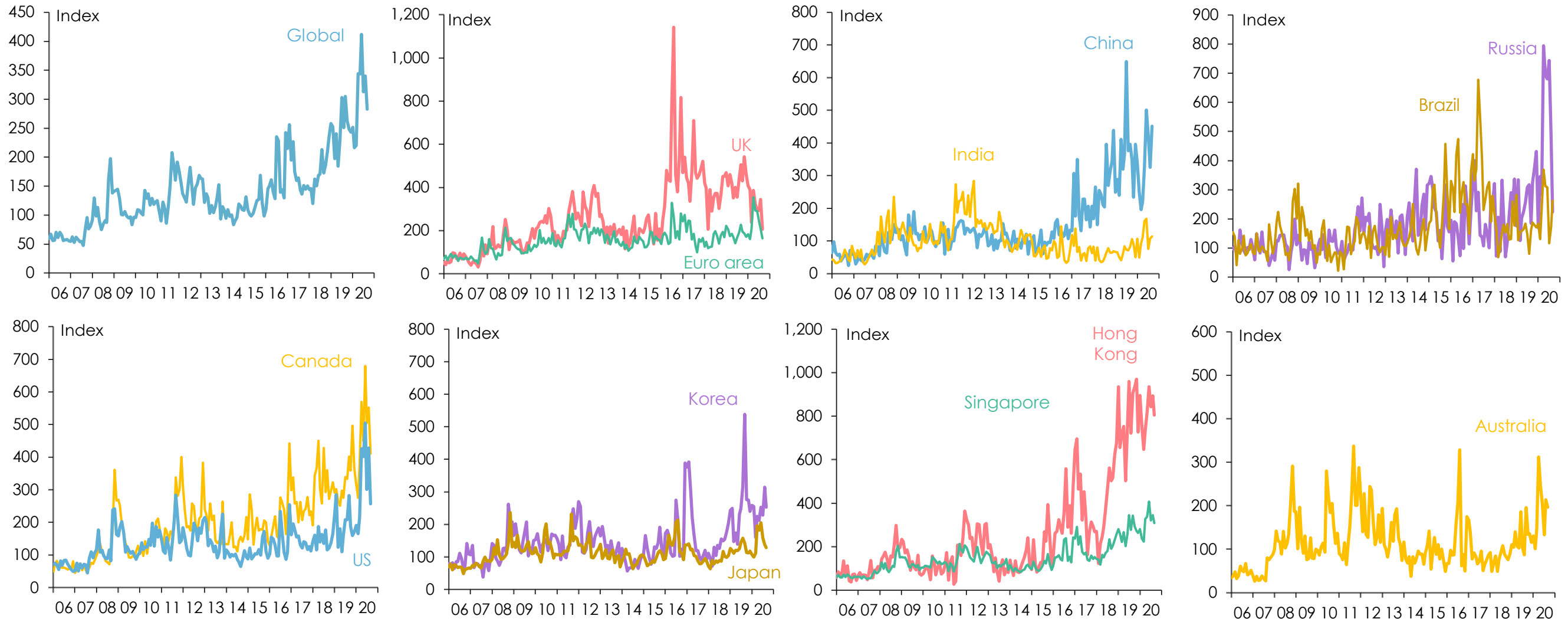
## Q2 real and nominal GDP



- ❑ According to the UK's Office for National Statistics, the UK's real GDP fell by 20.4% in Q2, but nominal GDP fell by 25.9% - implying that prices (as measured by the implicit price deflator of GDP) rose by 6.2% in Q2
- ❑ This is totally inconsistent with all other measures of UK inflation in Q2 – for example the CPI was flat, producer output prices fell 0.3% and producer input prices fell 7.3%
- ❑ Closer inspection of the Q2 national accounts shows that the main contributor to the rise in the GDP deflator was a 33% increase in the deflator for government consumption
- ❑ ONS commentary on the Q2 estimates implies that this was a by-product of the way they accounted for school closures, cancellation of elective surgery, etc, due to Covid-19
- ❑ However none of the other major economies which have so far published Q2 national accounts have reported anything similar
- ❑ It could be that real GDP fell by (even) more in Q2 than estimated, or nominal GDP by less

# Uncertainty about economic policy declined everywhere but China in August, but remains elevated by historical standards in most economies

## Economic policy uncertainty indices

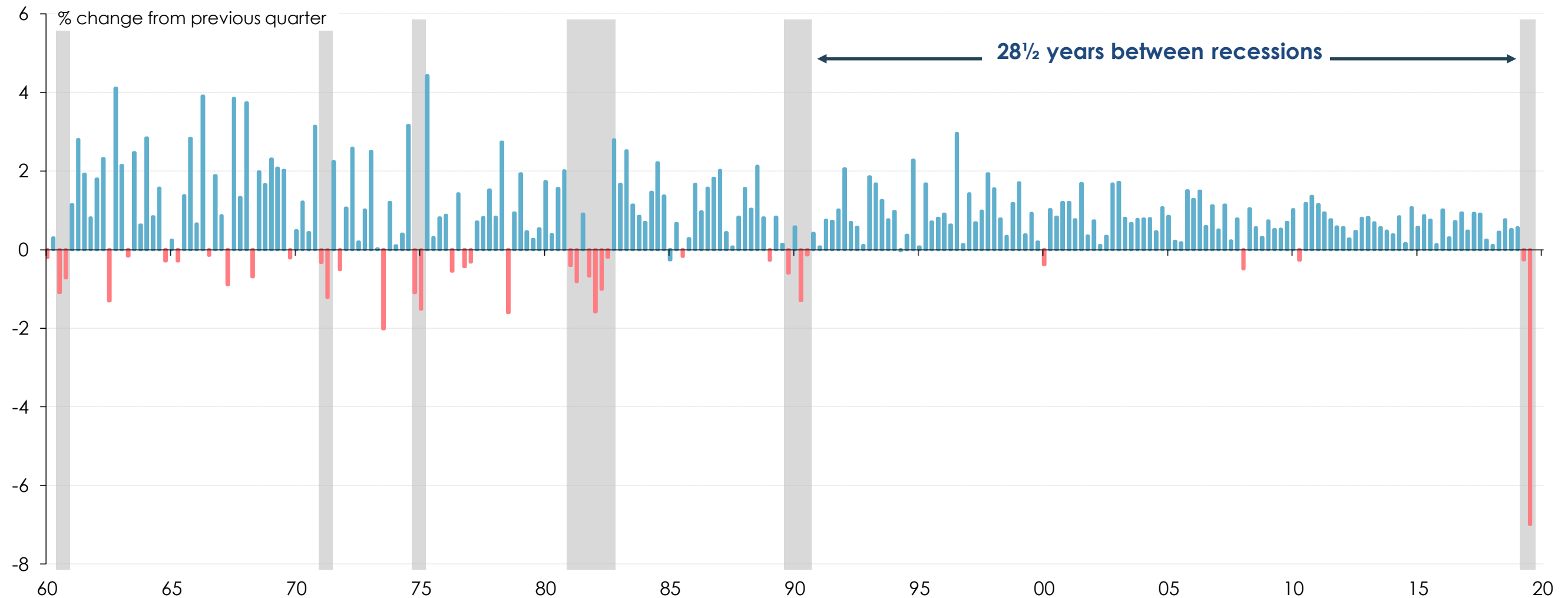


Note: The Economic Policy Uncertainty Index is derived from a count of newspaper articles containing the words “uncertain” or “uncertainty”, “economy” or “economic”, and policy-relevant terms pertaining to regulation, monetary or fiscal policy, central bank, taxation, tariffs, deficit, budget, etc. The index for the euro area is a GDP-weighted average of indices for Germany, France, Italy, Spain, the Netherlands and Ireland constructed by Corinna. Latest data are for June 2020.  
Source: [Global Policy Uncertainty](#); Scott Banker, Nick Bloom & Steven Davis, ‘Measuring Economic Policy Uncertainty’, *Quarterly Journal of Economics*, 131, no. 4 (November 2016), pp. 1593-1636.

**Australia**

# Australia's record-breaking run of almost 30 years without a recession has come to an end

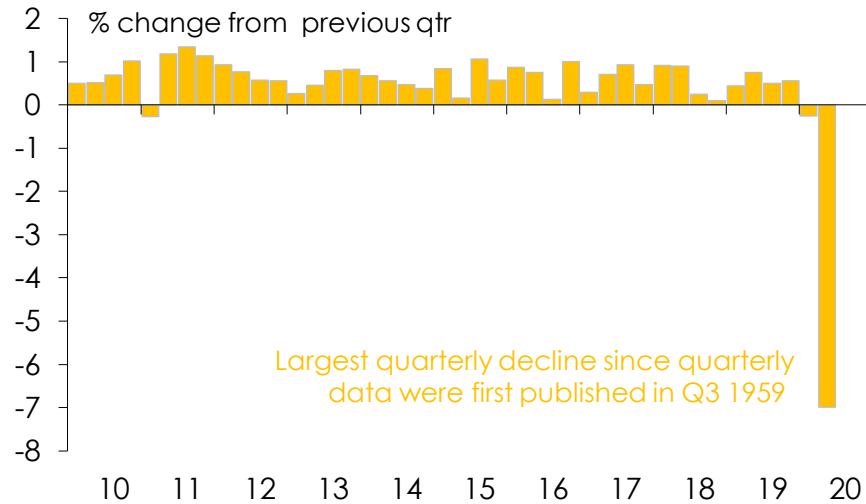
## Quarterly growth in Australian real GDP, 1960-2020



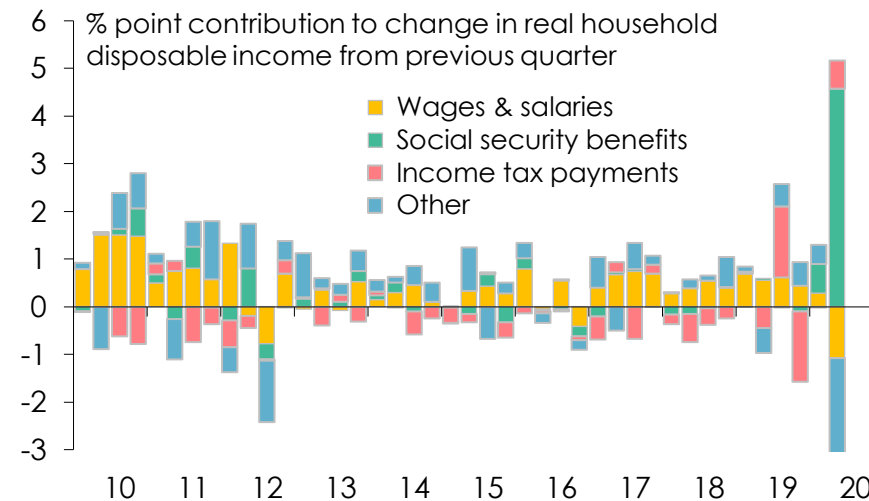
Note: Shaded areas denote recessions. Source: ABS, [Australian National Accounts: National Income, Expenditure and Product](#), June quarter 2020.

# Real GDP fell a record 7.0% in Q2 after a 0.3% decline in Q1, the first time there have been two consecutive declines since Q1 and 12 1991

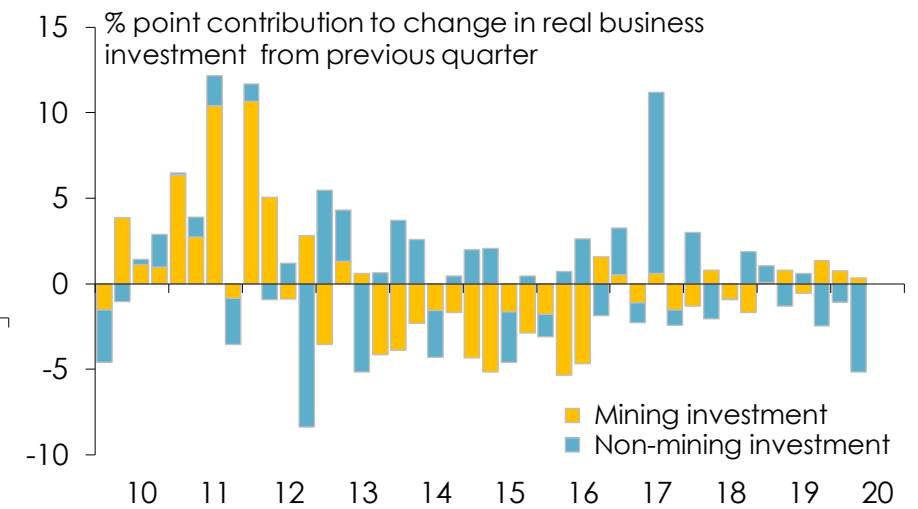
## Quarterly change in real GDP



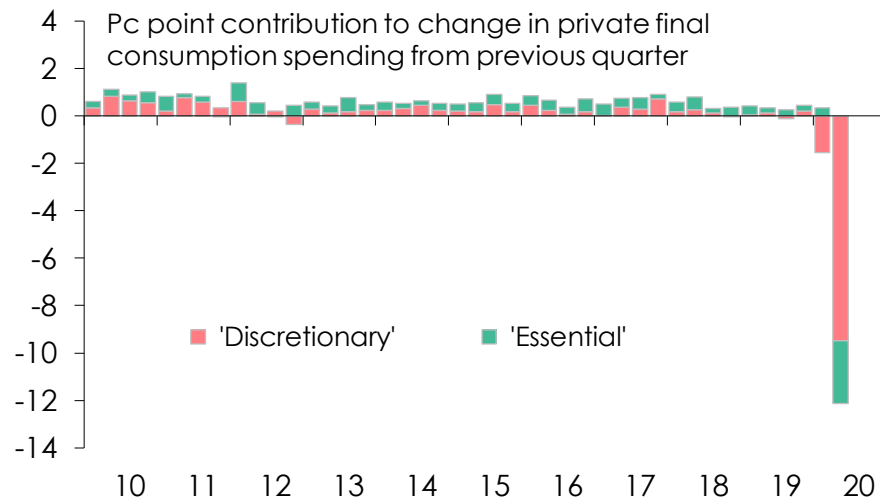
## Household disposable income



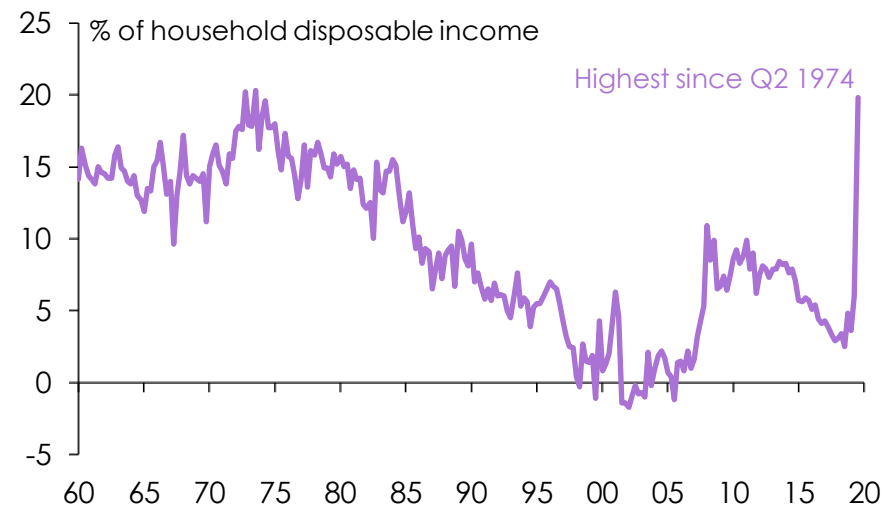
## Business investment expenditure



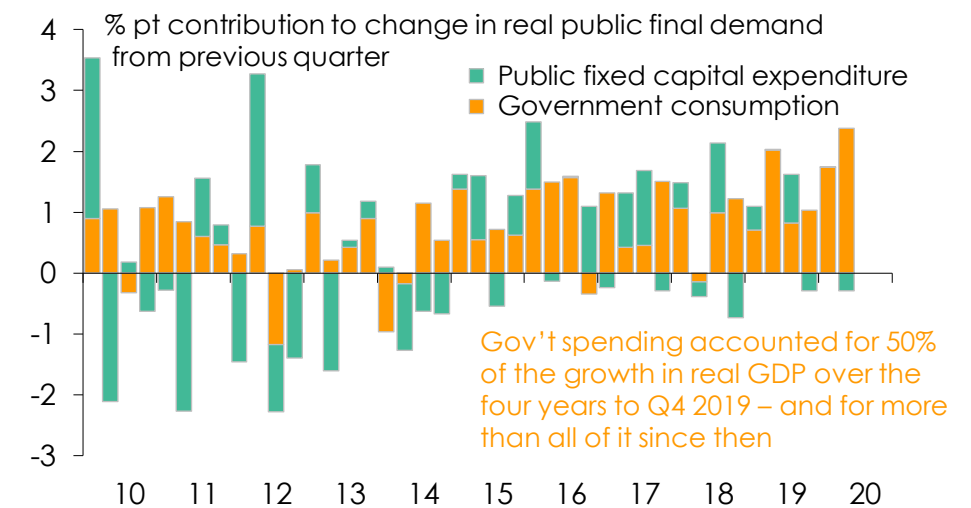
## Household consumption expenditure



## Household saving rate



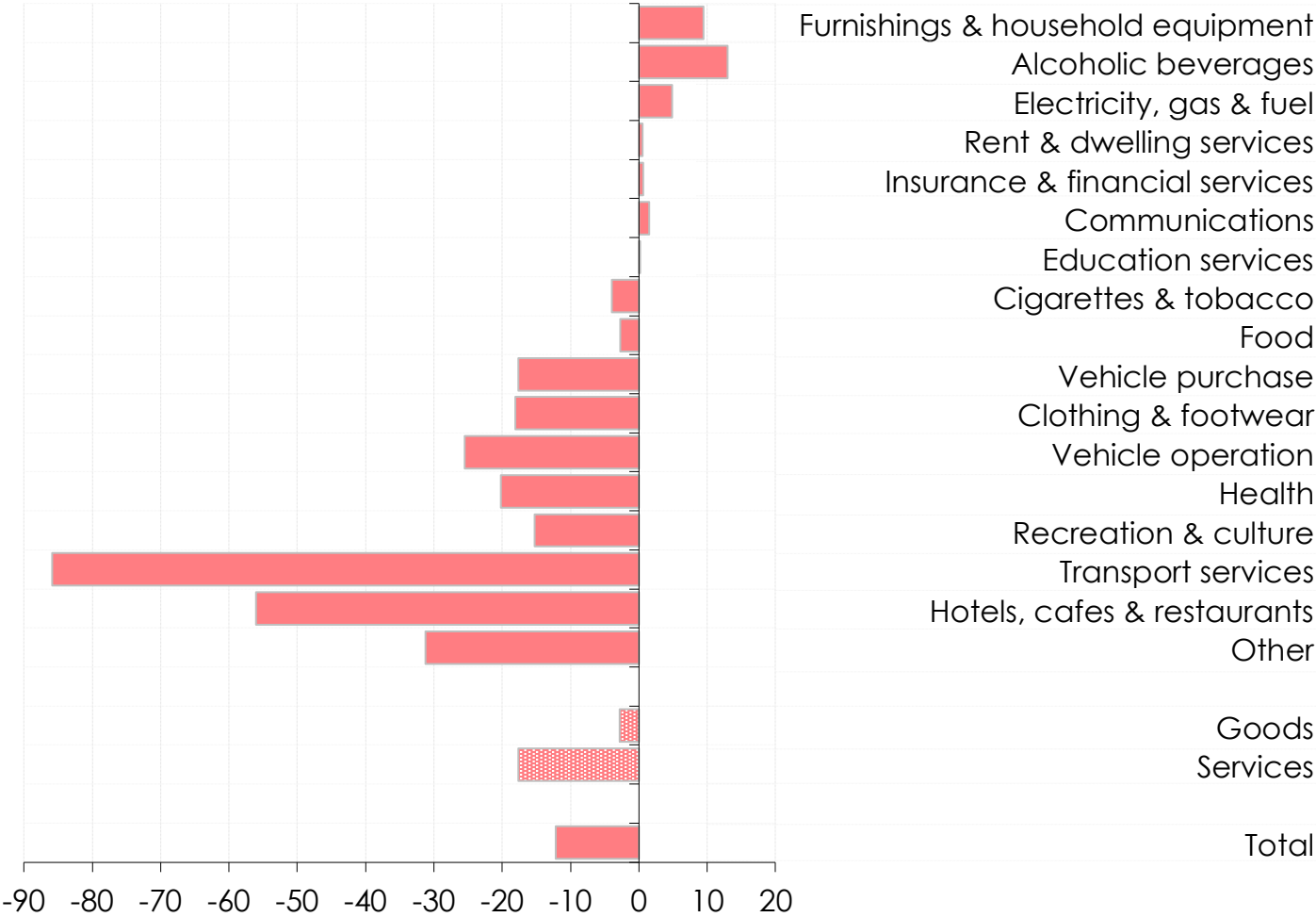
## Public expenditure



Note: 'Essential' household consumption expenditure comprises food; rent & other dwelling services; electricity, gas & other fuel; operation of vehicles; rail, bus & taxi services; communications; health; education; and insurance & other financial services. Components of household disposable income are deflated by the implicit price deflator of household final consumption expenditure. Source: [ABS](#). September quarter national accounts will be released on 2<sup>nd</sup> December.

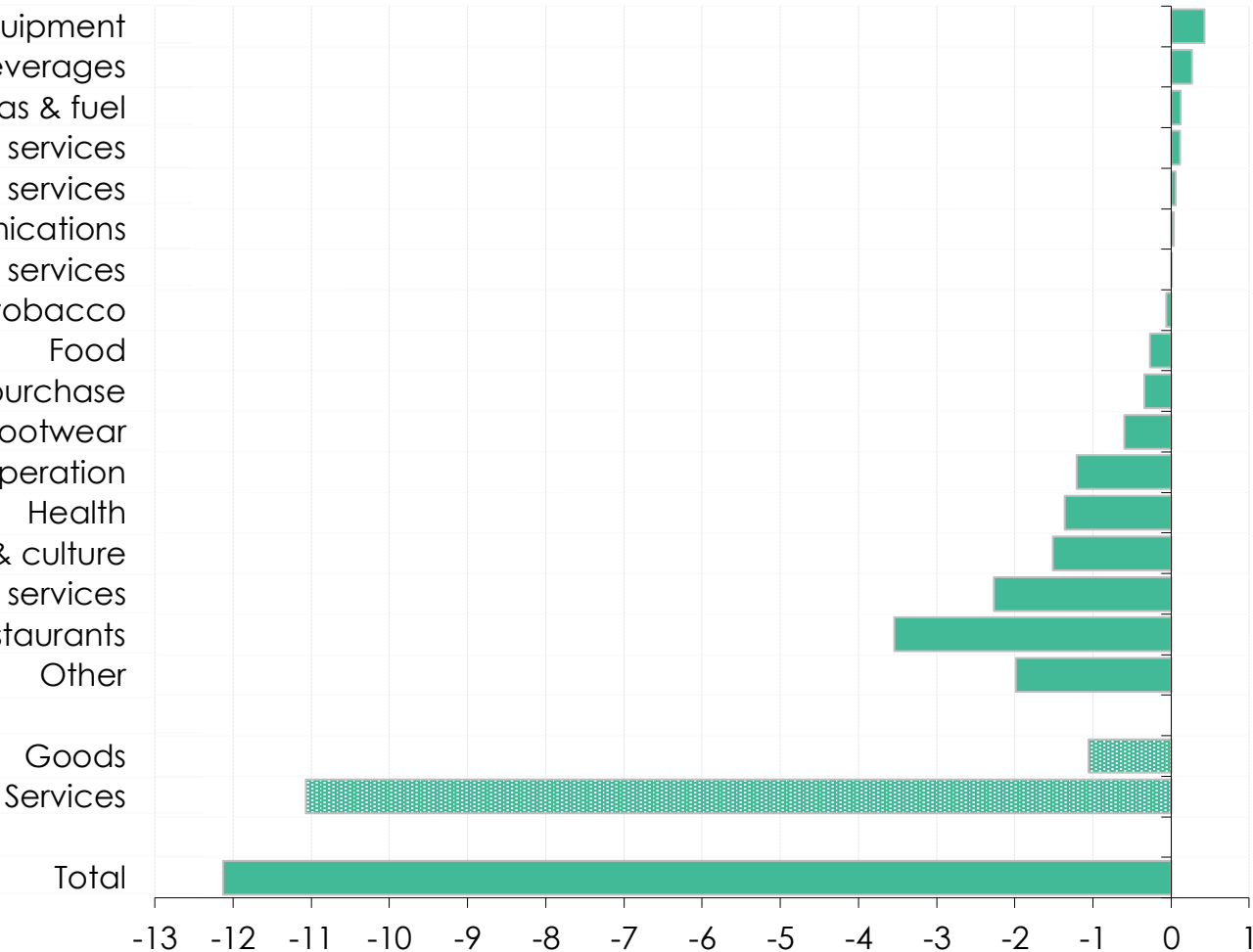
# The record 12.1% fall in consumer spending in Q2 was largely driven by sharp declines in spending on discretionary services

Change in household consumption spending, by category, June quarter



Real pc change in June quarter (from March quarter)

Contribution to change in household consumption spending, by category, June quarter

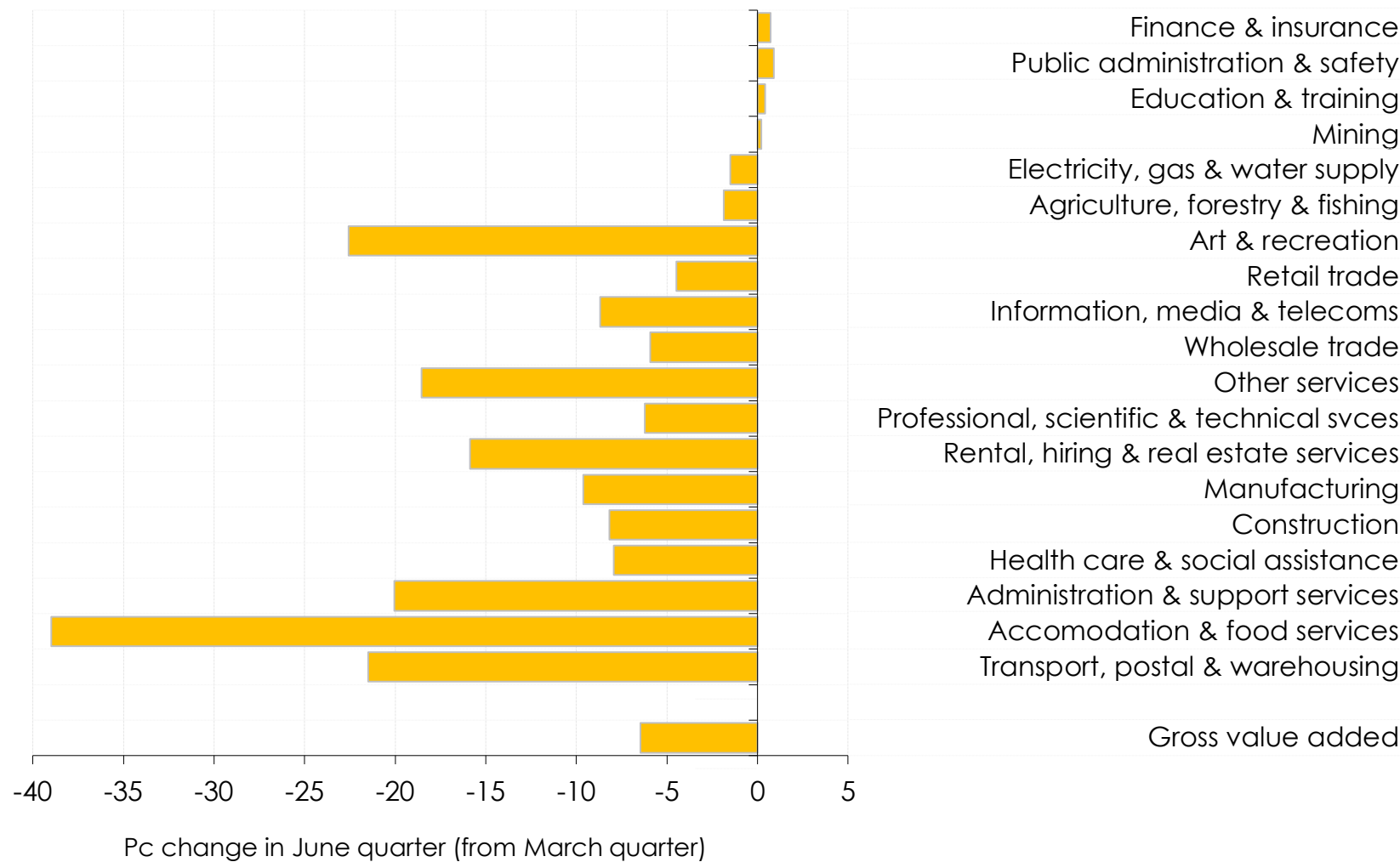


Pc point contribution to real change in household consumption expenditure in June quarter (from March quarter)

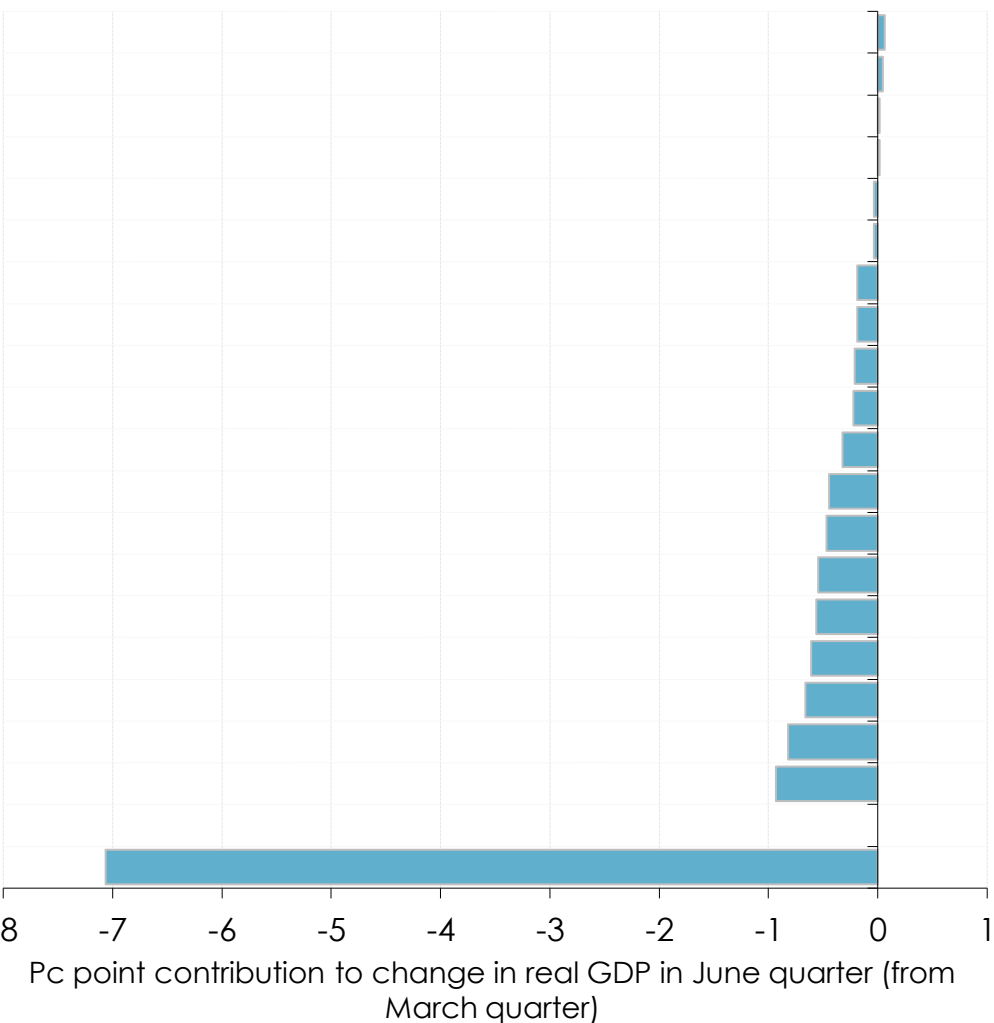
Note: 'Rent and dwelling services' includes the imputed rent which home-owners pay to (and receive from) themselves in the national accounts (so that changes in the home-ownership rate over time don't distort measured household consumption or GDP). Source: [ABS](#).

# From an industry standpoint the record decline in real GDP in Q2 was driven by falls in manufacturing, construction and private sector services

Change in real gross value added, by industry, June quarter



Contribution to change in real GDP, by industry, June quarter



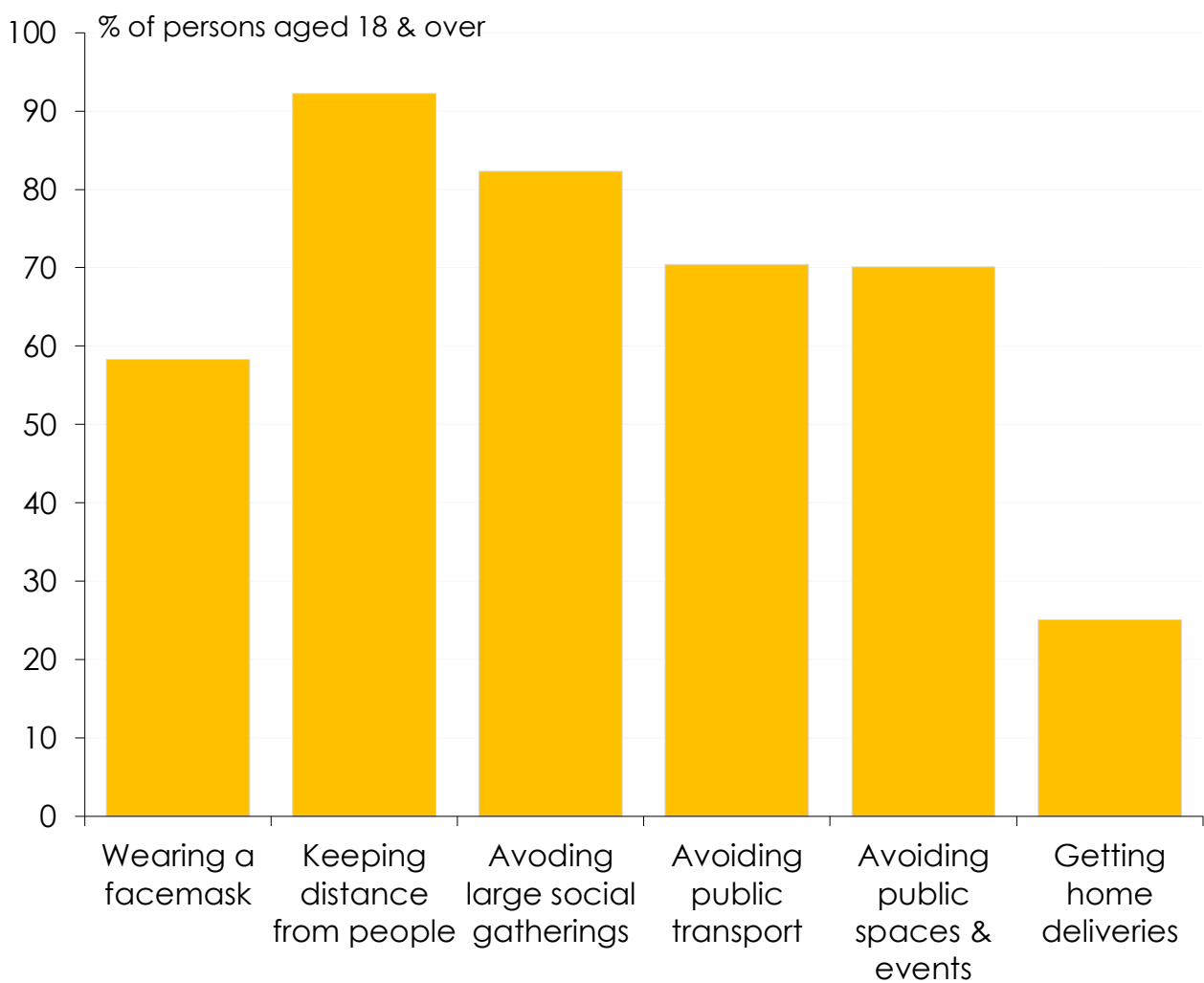
Note: Changes in, and contributions to the change in real GDP from, ownership of dwellings and net indirect taxes are not shown in the above charts. Source: [ABS](#).

# The path out of the current downturn will be more gradual than the path into it was

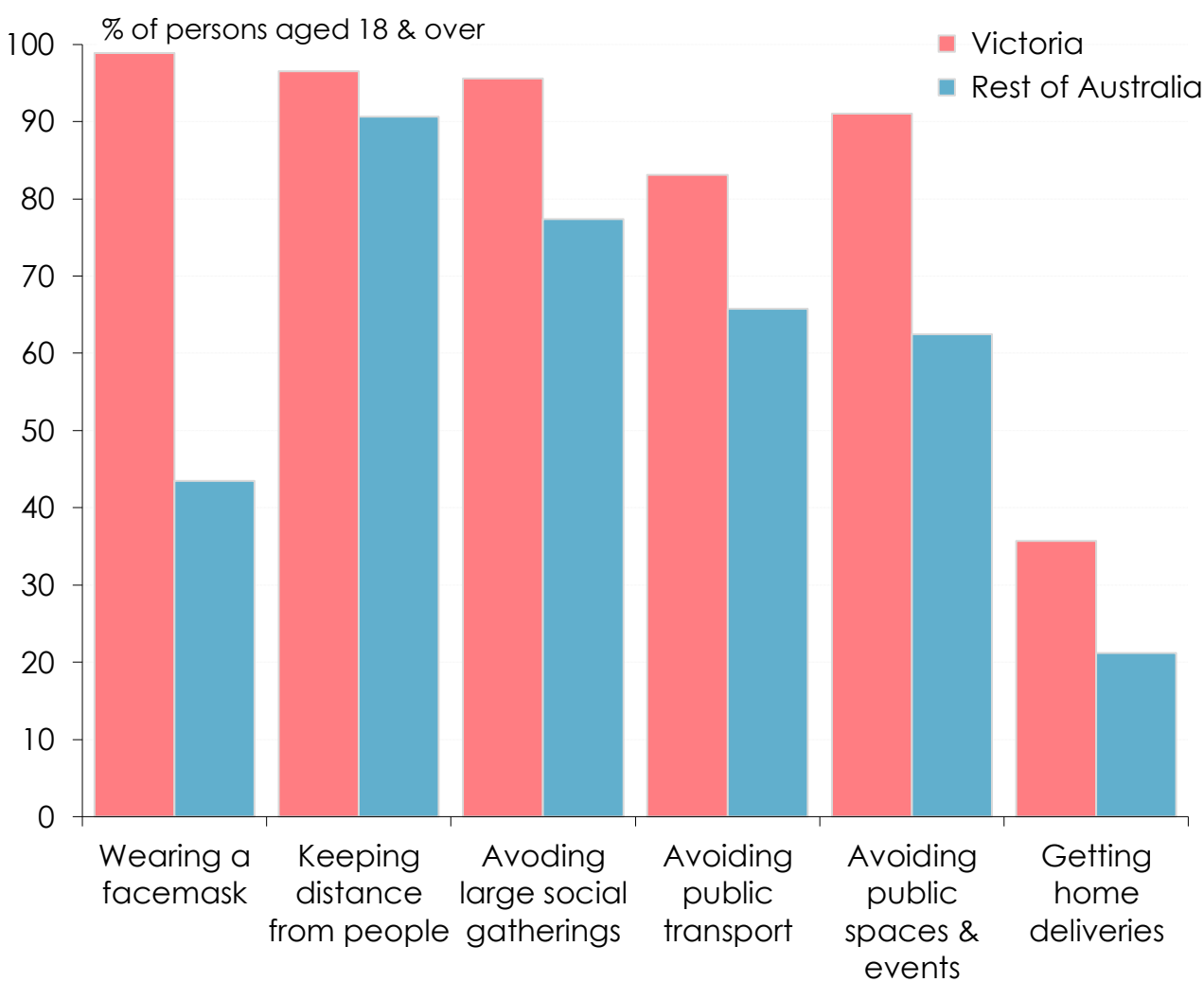
- ❑ **‘Social distancing’ requirements will be relaxed gradually rather than ‘all at once’ – and (as seen in Victoria) restrictions can be re-imposed in response to new outbreaks)**
  - new health and safety regulations will likely limit the number of employees and customers who can be ‘on premises’ (which may make it uneconomic for some businesses to re-open until restrictions are relaxed)
  - and many people may remain wary of exercising all of their newly-regained ‘freedoms’ (see next slide)
- ❑ **At least some businesses won’t have survived the shutdown period, and many of those which do will not immediately return to pre-outbreak levels of employment**
  - so employment will remain below pre-outbreak levels for some time rather than ‘snapping back’ quickly
  - and those returning to work may work reduced hours (compared with pre-outbreak) for some time
- ❑ **The recovery in household spending is likely to be gradual, rather than rapid**
  - if the recovery in employment is only gradual, so too will be the recovery in household disposable income
  - some households will be able to draw down on savings accumulated during the shutdown (see [slide 53](#)), but others will want to rebuild savings (or superannuation balances) drawn down over the past six months
  - households with mortgages who have deferred repayments will face higher or longer mortgage repayments, constraining their spending capacity to some extent
  - household spending may also be affected by ‘negative wealth effects’ from lower property prices
- ❑ **Despite the recent extensions to JobKeeper and Jobseeker, on current policy settings there will still be an effective tightening of fiscal policy at the beginning of each of the December and March quarters**
- ❑ **International borders (except with NZ) will likely remain closed until a vaccine is widely available – which is in turn likely to be at least 12 months away**
  - implying that there will be no near-term recovery in international tourism or international education
- ❑ **Businesses are likely to be very hesitant about investment spending for an extended period**

# Australians are continuing to adhere to a wide range of precautions, even where it's not mandatory (as in Victoria)

Precautions taken by Australians aged 18 and over, mid-August 2020



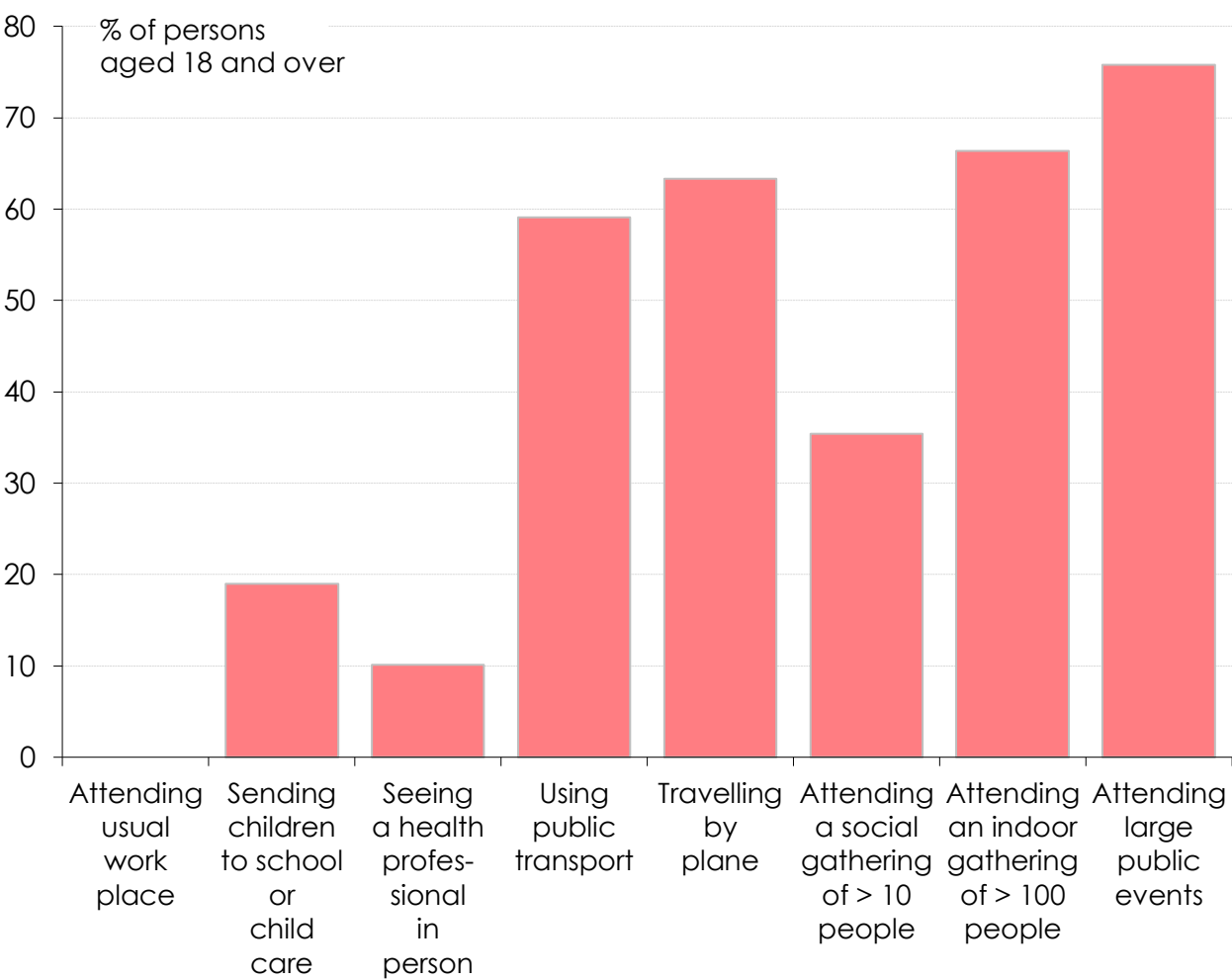
Precautions taken by people living in Victoria and elsewhere in Australia, mid-August 2020



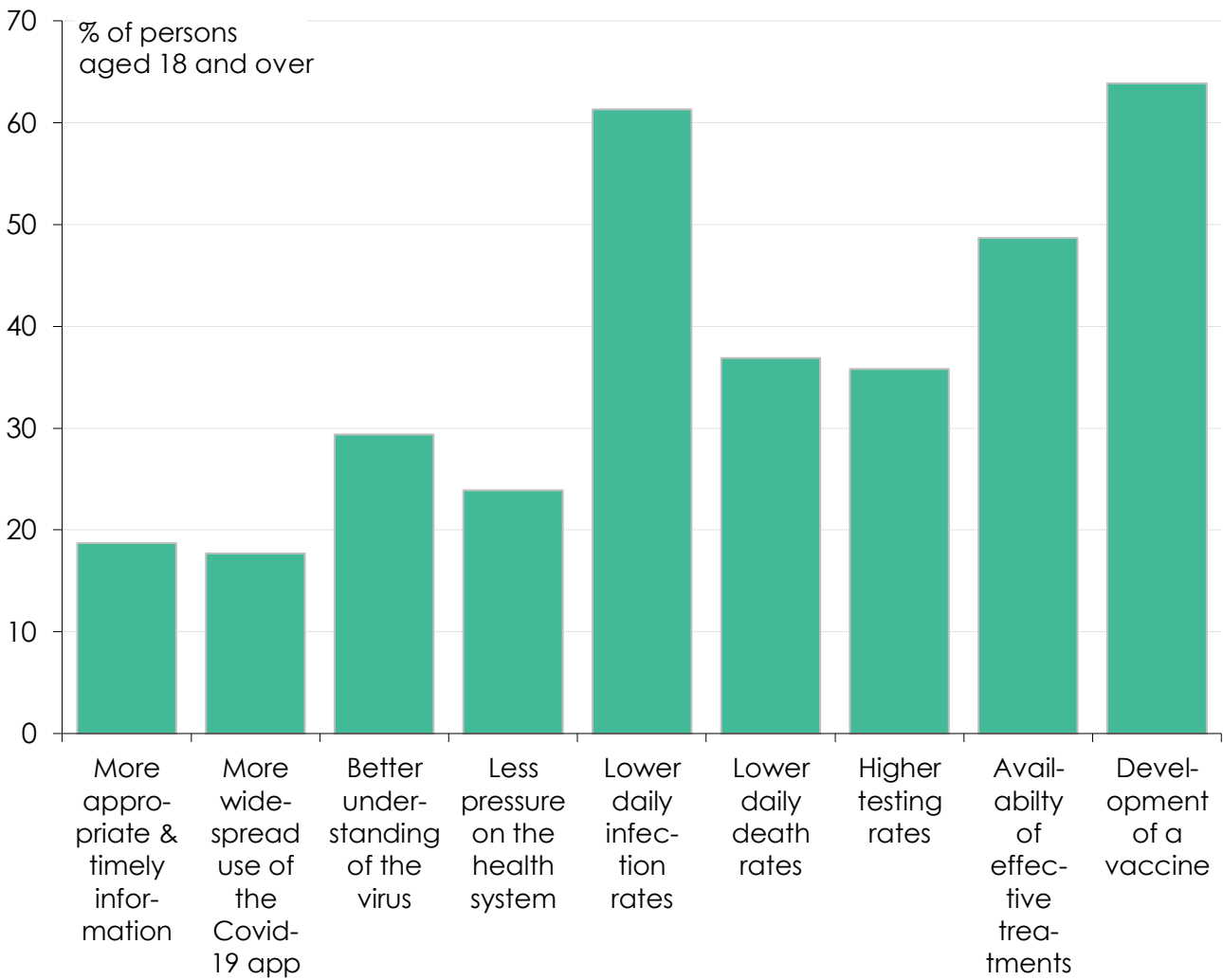
Source: ABS, [Household impacts of Covid-19](#), August 2020 (published 31<sup>st</sup> August).

# Australians seem likely to continue to be wary of travel and large gatherings, at least until a vaccine for Covid-19 is developed

Proportion of adults feeling ‘uncomfortable’ with selected activities as restrictions are eased



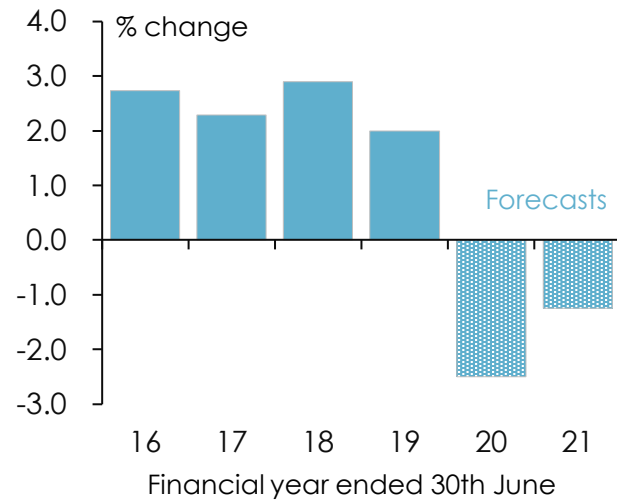
Actions that would improve people’s comfort with activities as restrictions are eased



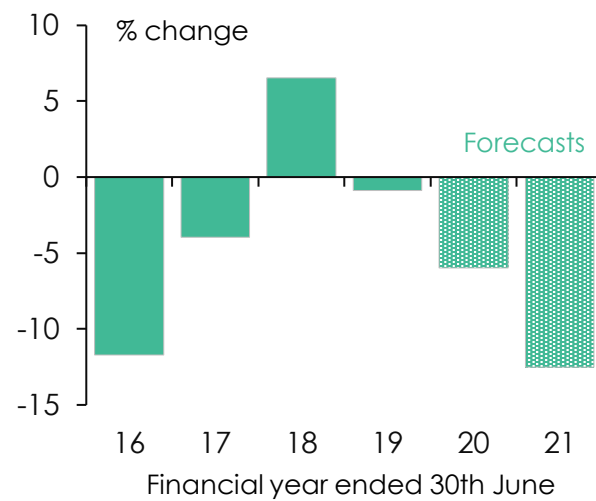
Source: ABS, [Household impacts of Covid-19](#), 26<sup>th</sup>-29<sup>th</sup> May (published 15<sup>th</sup> June).

# Treasury's most recent forecasts, published in late July, will be revised (downwards, except for unemployment) in the Budget on 6<sup>th</sup> October

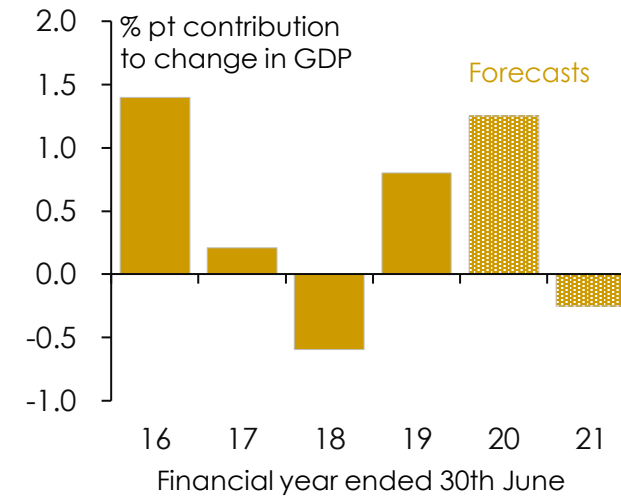
## Household consumption



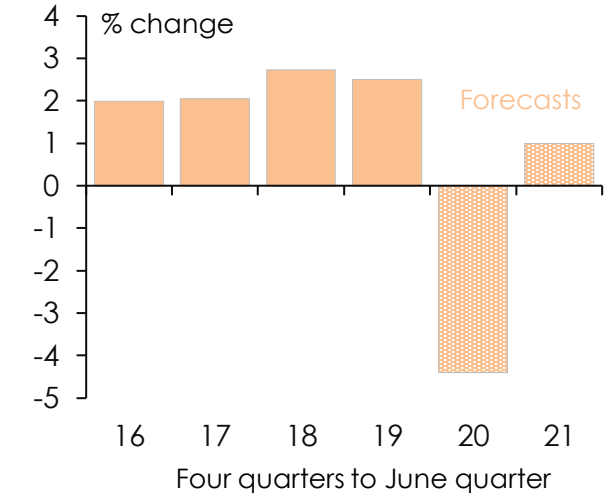
## Business investment



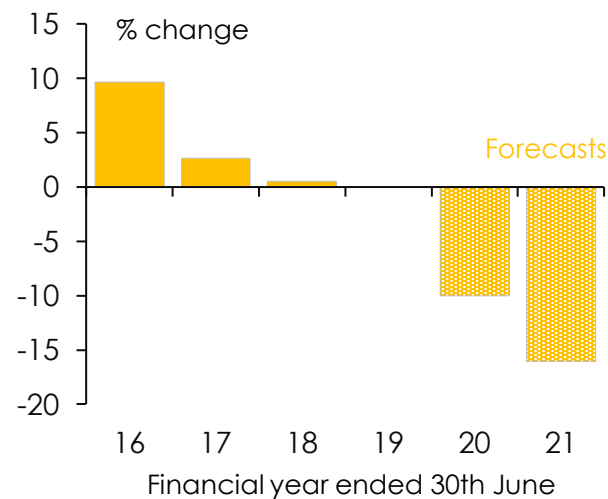
## Net exports



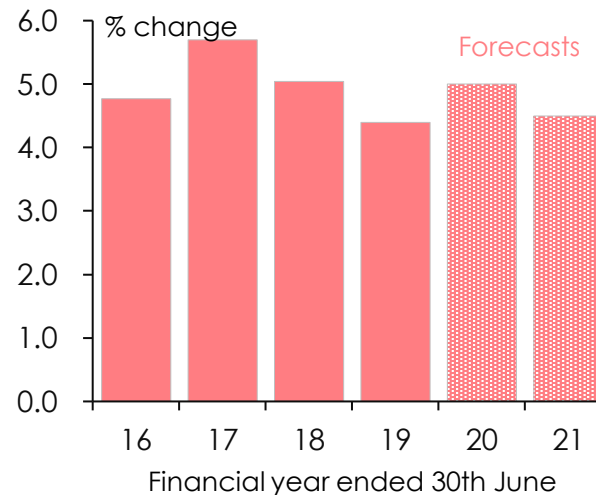
## Employment



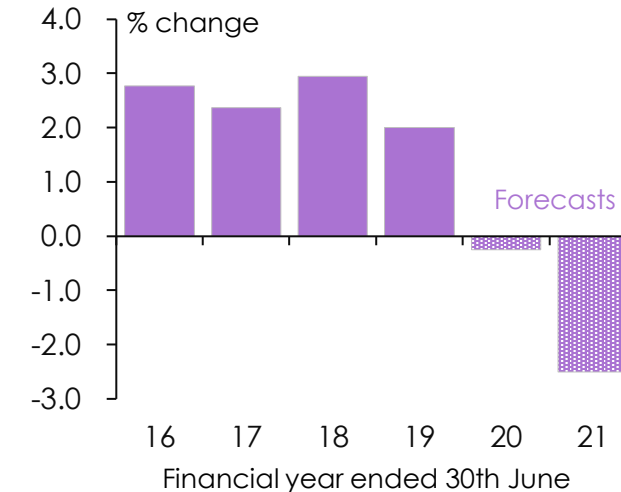
## Dwelling investment



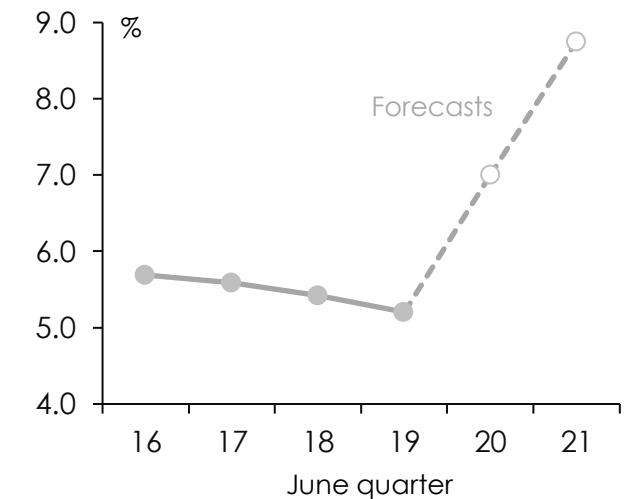
## Public spending



## GDP



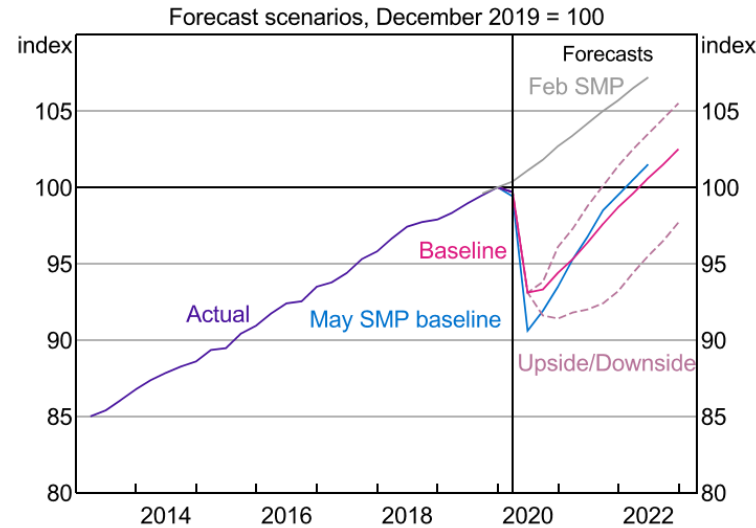
## Unemployment rate



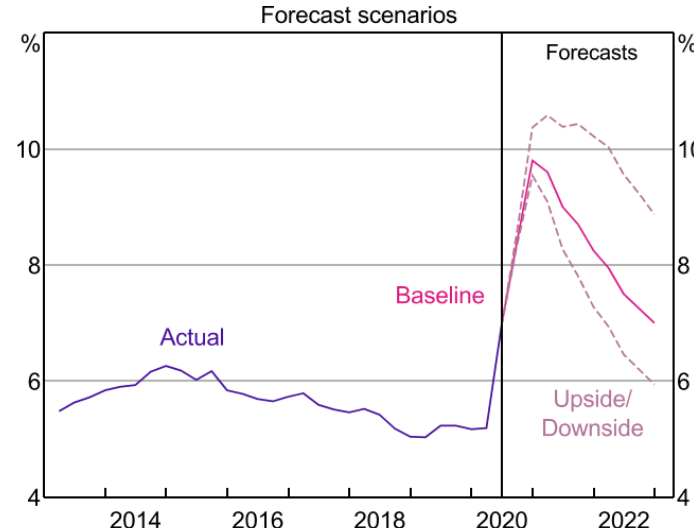
Note: Business investment and public spending exclude transactions in second-hand assets. Employment growth is June quarter on June quarter; unemployment rate is June quarter. Assumptions include current restrictions in Melbourne ending after 6 weeks, no further restrictions imposed, and other restrictions being eased in line with the '3-step process' outlined by the Government on 8<sup>th</sup> May. Net overseas migration assumed to fall from 232K in 2018-19 to 154K in 2019-20 and 31K in 2020-21; international travel bans lifted from 1<sup>st</sup> January 2021; the iron ore price falling to US\$55/t FoB by end-2020; metallurgical and thermal coal prices remaining at US\$110/t and \$54/t FoB respectively; and the A\$ remaining at around US69¢. Sources: ABS; Australian Treasury, [Economic and Fiscal Update](#), 23<sup>rd</sup> July 2020.

# In its latest quarterly Monetary Policy Statement, the RBA slightly lowered its sights on the economic recovery from the pandemic

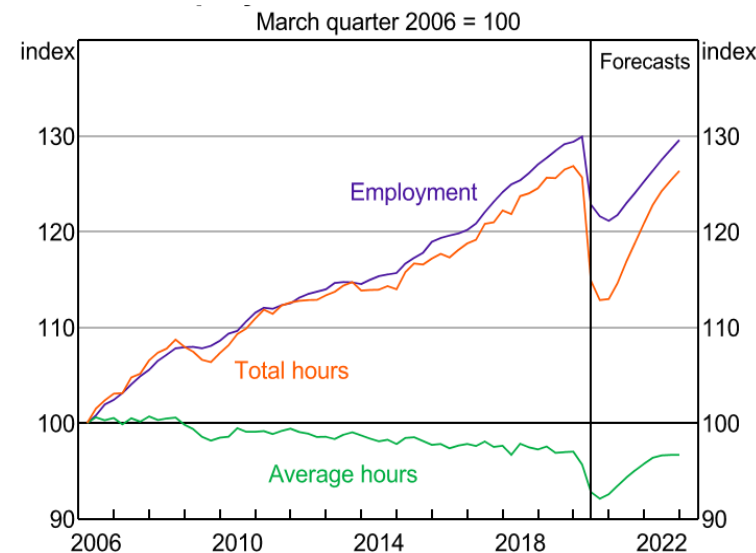
## GDP



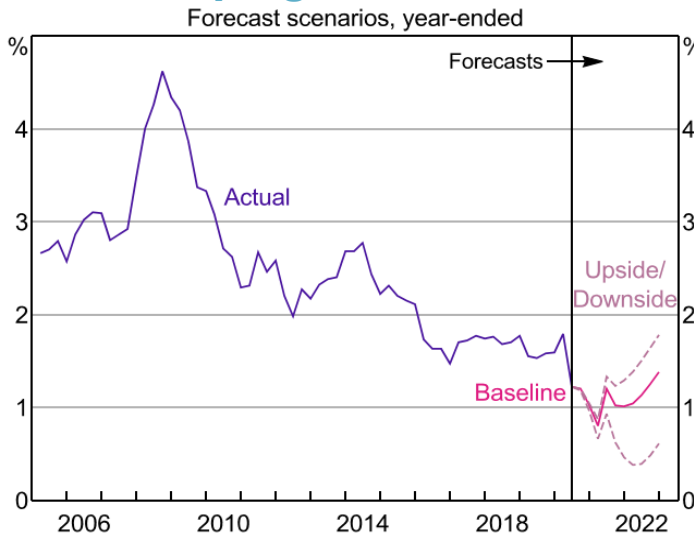
## Unemployment



## Employment & hours worked



## 'Underlying' inflation



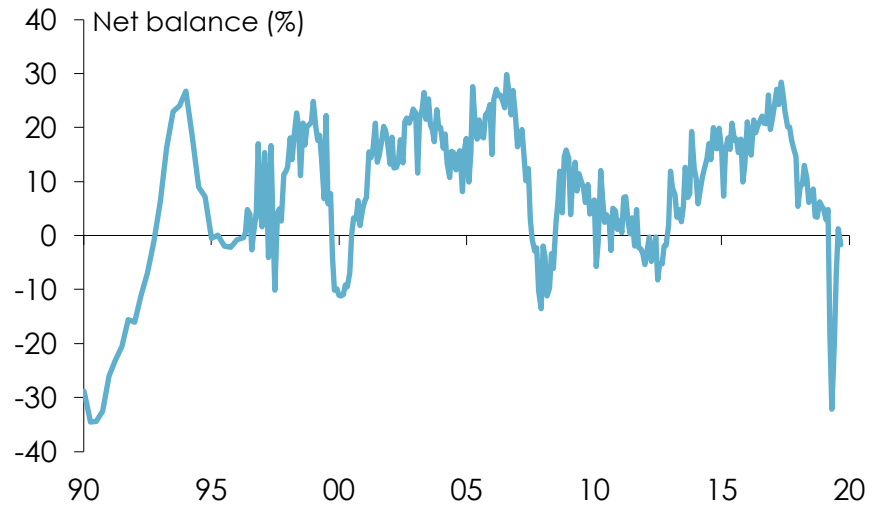
- ❑ The short-run economic effects of the initial 'lockdown' turned out to be less than the RBA had assumed in May – but it thinks the “on-going effects of weak demand are likely to be larger”, with additional headwinds stemming from the new Victorian 'lockdown'
- ❑ The RBA's latest 'baseline' scenario envisages real GDP declining by 6% over the year to Q4 (4% for 2020 as a whole) and rising by 5% (previously 6%) over the year to Q4 2021 (2% for the year as a whole), with 'official' unemployment peaking at 10% in Q4 (rather than Q2 as previously) and declining slowly to 8½% by Q4 2021 (previously 7½%) and to 7% by Q4 2022
- ❑ In an 'upside scenario' where the virus is contained more quickly and domestic restrictions lifted sooner, the unemployment rate would decline more quickly during 2021 and 2022, reaching 6% by Q4 2022
- ❑ But in a 'downside' scenario entailing periodic regional outbreaks of the virus and 'rolling lockdowns', with a widespread resurgence of infections globally, economic recovery would be delayed, unemployment would peak at ~ 11% and still be around 9% by Q4 2022
- ❑ In the RBA's 'baseline' scenario underlying inflation picks up gradually from 1% over the year to Q4 2020, to 1½% by Q4 2022 – but still remains below the target band, even in the 'upside' scenario

Note: 'underlying' inflation is as measured by the 'trimmed mean'.

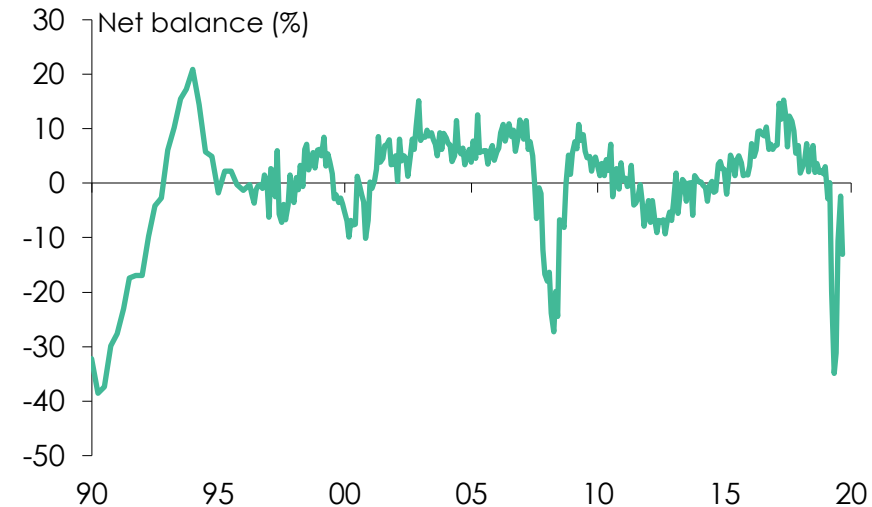
Source: Reserve Bank of Australia, [Statement on Monetary Policy](#), 7th August 2020.

# All of the components of the NAB business conditions index fell back in August after having made strong gains in July

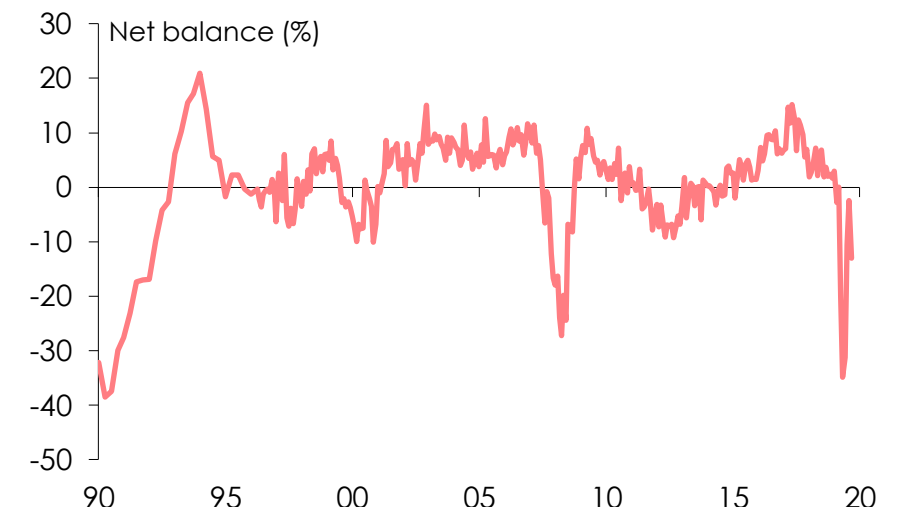
## Trading conditions



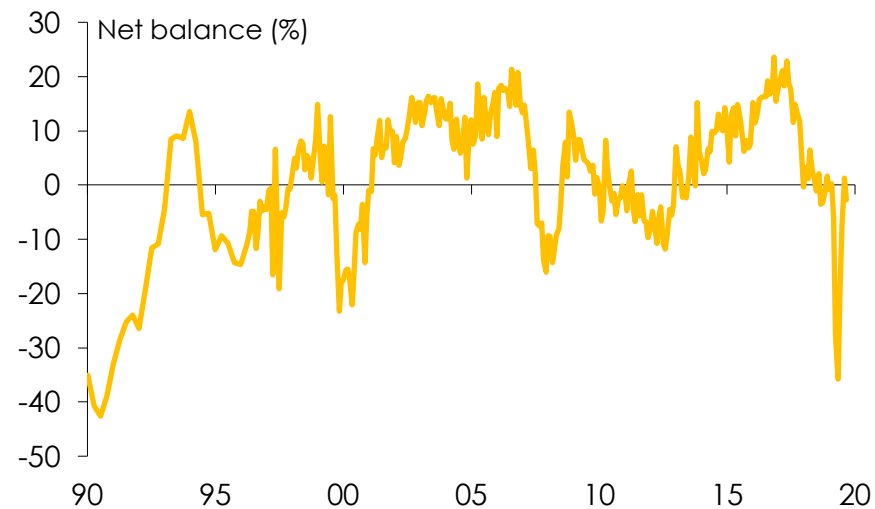
## Forward orders



## Employee hiring intentions



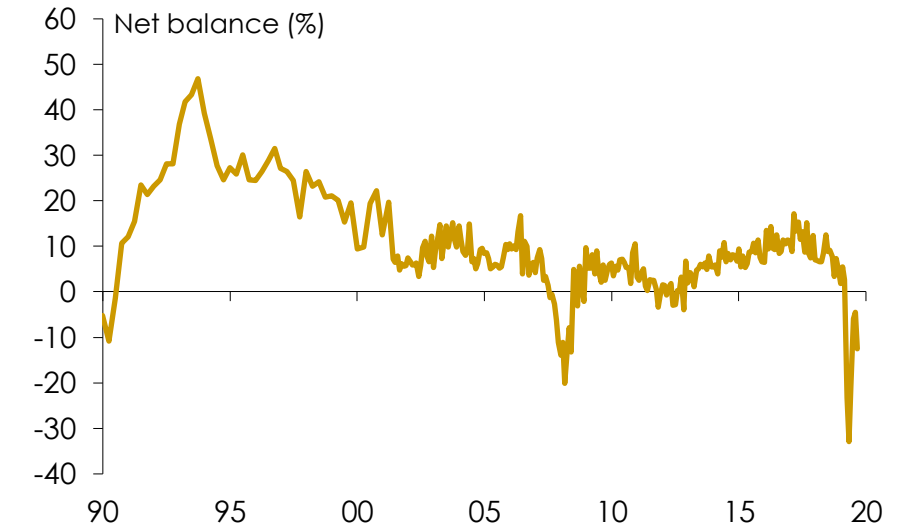
## Profitability



## Capacity utilization



## Capital expenditure intentions

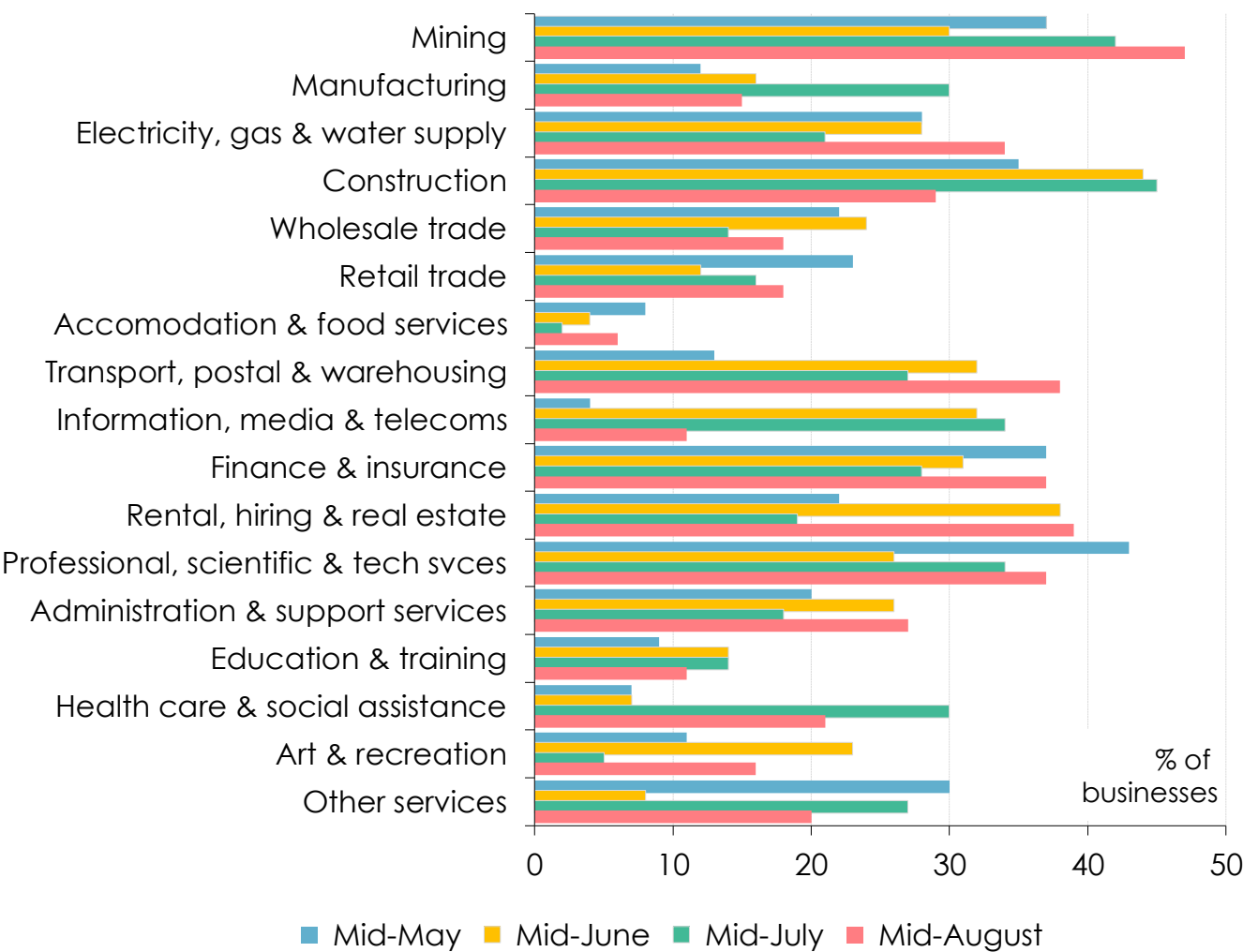


Note: Quarterly data up to March 1987 (May 2002 for capex intentions), monthly thereafter (latest data August 2020). See also chart of business confidence on [slide 77](#).

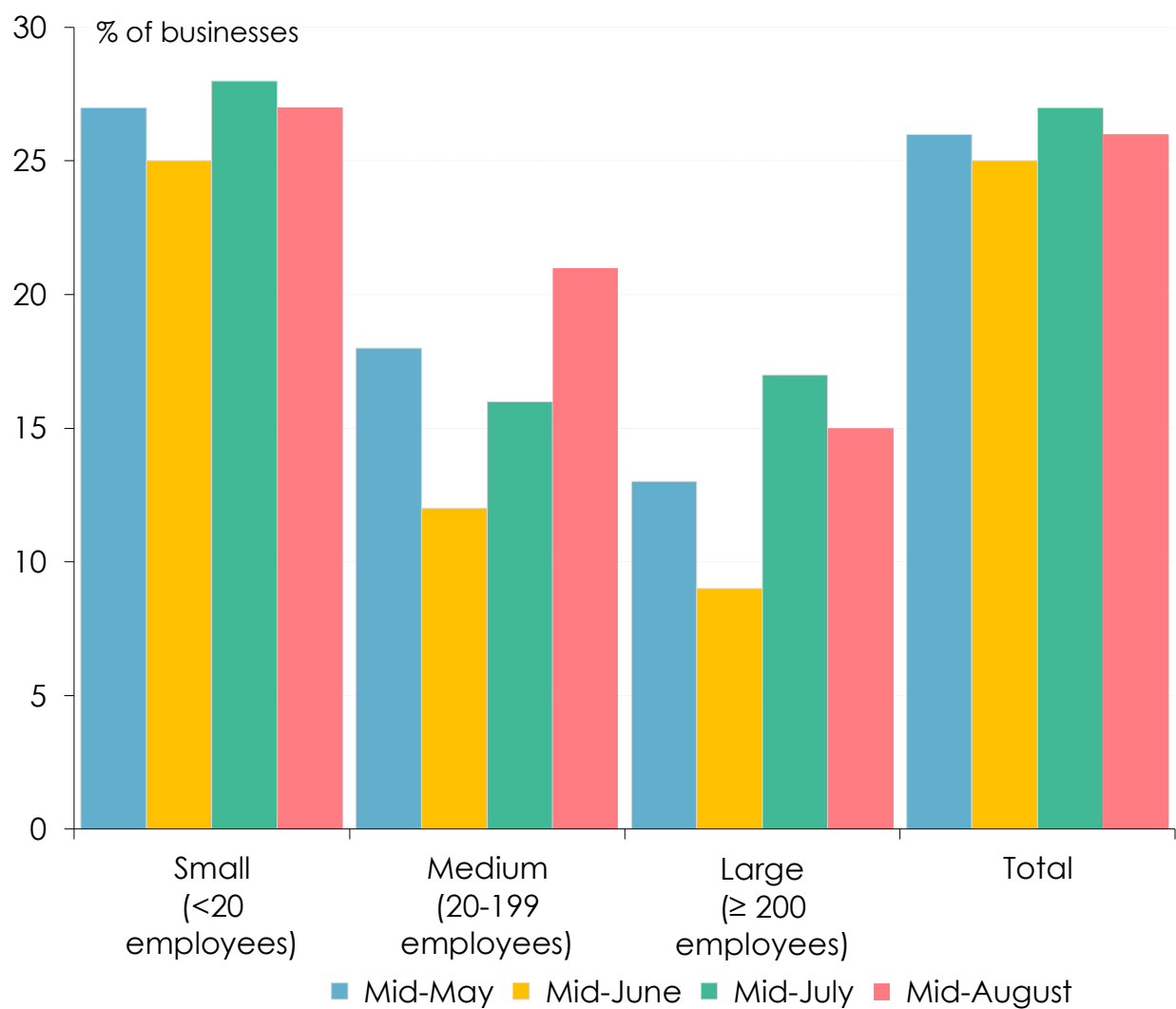
Source: National Australia Bank [Monthly Business Survey](#) August 2020; August survey results will be released on Monday 5<sup>th</sup> October (the day before the delayed federal Budget).

# Still only about one-quarter of businesses are operating 'as normal' – with fewer large business operating as 'normal' than small ones

Proportion of 'trading businesses' which are operating 'as normal' – by industry



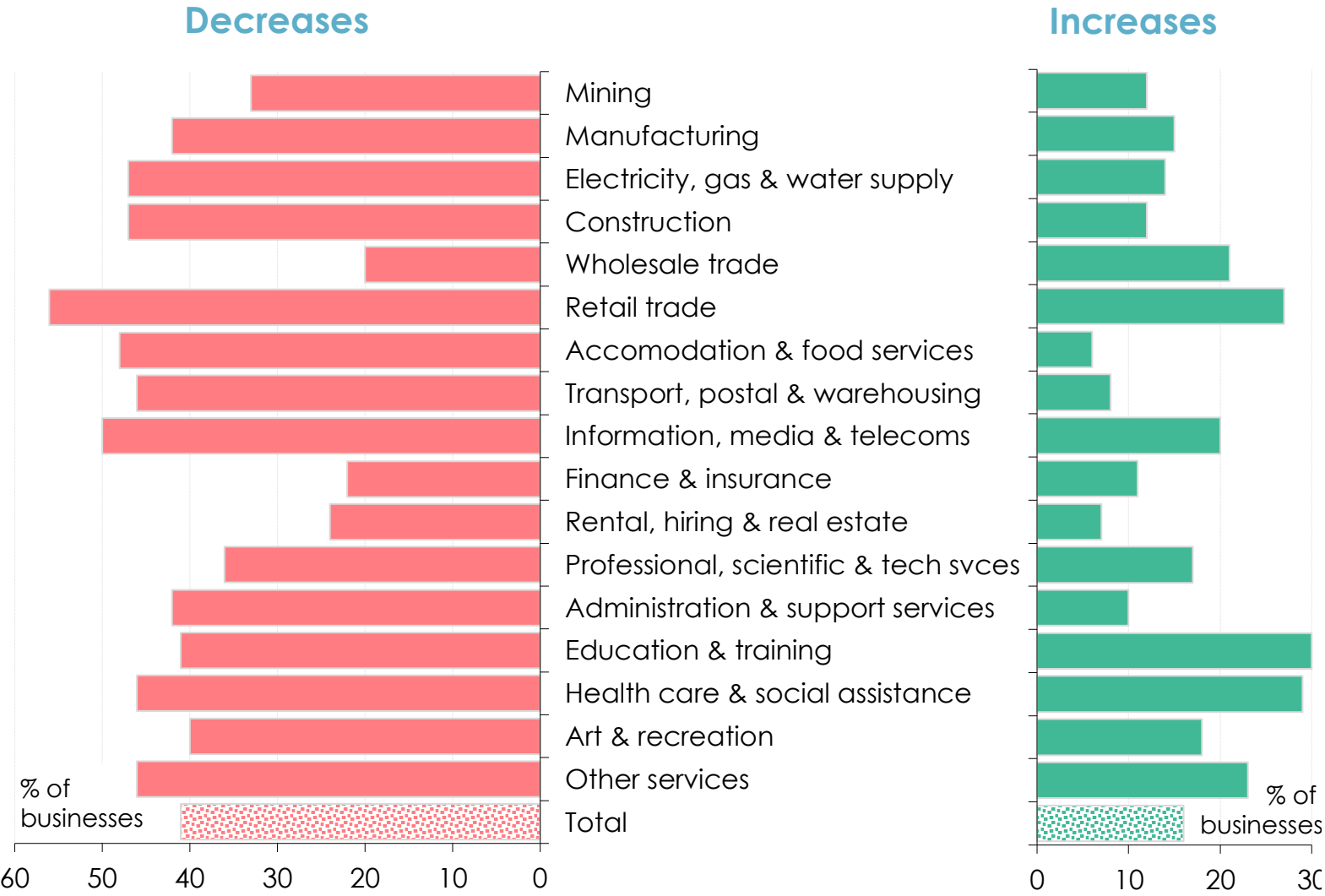
Proportion of 'trading businesses' which are operating 'as normal' – by size



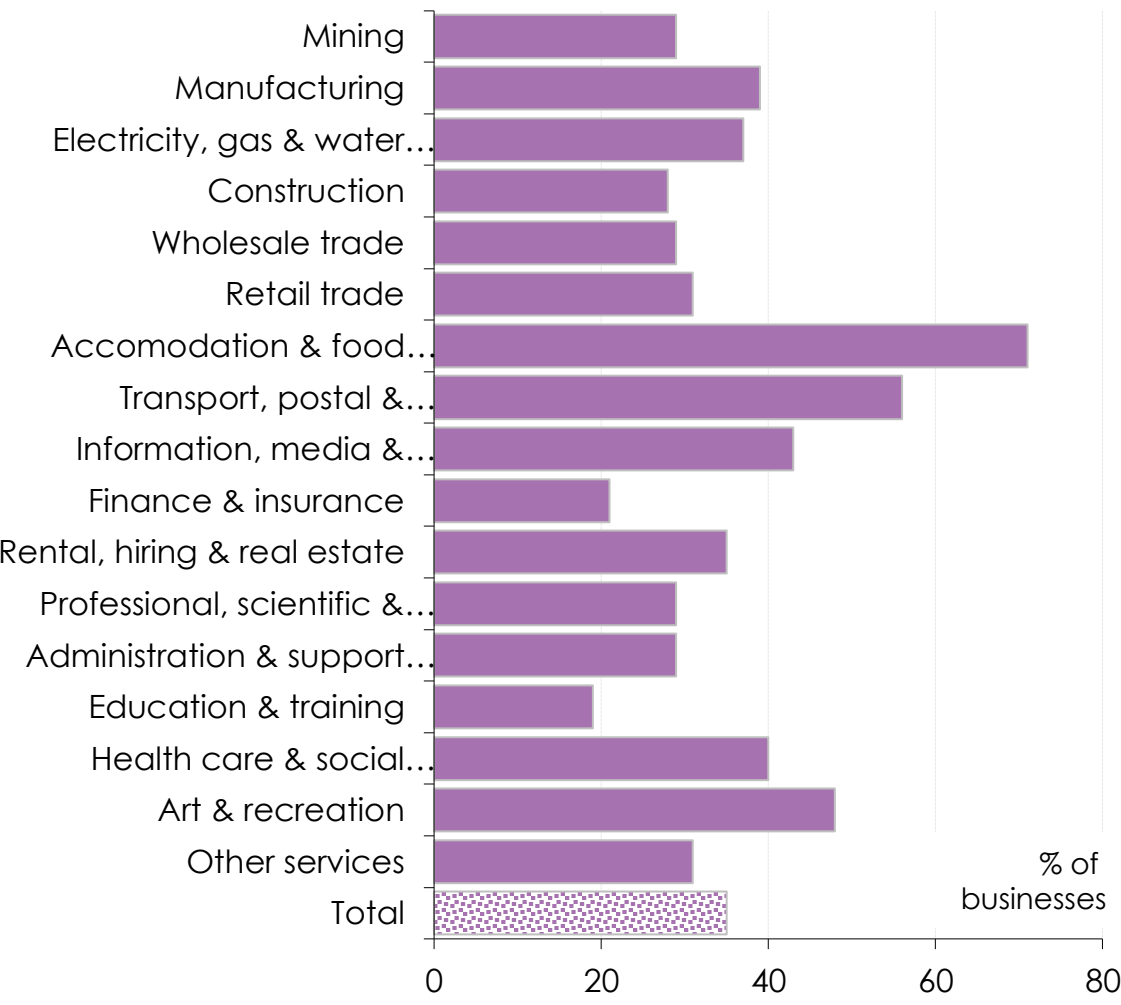
Source: ABS, [Business Impacts of Covid-19](#), May 2020 (based on survey conducted between 13<sup>th</sup> and 22<sup>nd</sup> May), June 2020 (based on survey conducted between 10<sup>th</sup> and 17<sup>th</sup> June), July (survey conducted between 15<sup>th</sup> and 23<sup>rd</sup> July) and August (survey conducted between 12<sup>th</sup> and 19<sup>th</sup> August)

# 40% of all businesses reported lower revenue in August compared with last year – and 35% say they will have trouble meeting financial commitments

Proportion of businesses reporting decreases or increases in revenue in August 2020 cf. August last year, by industry



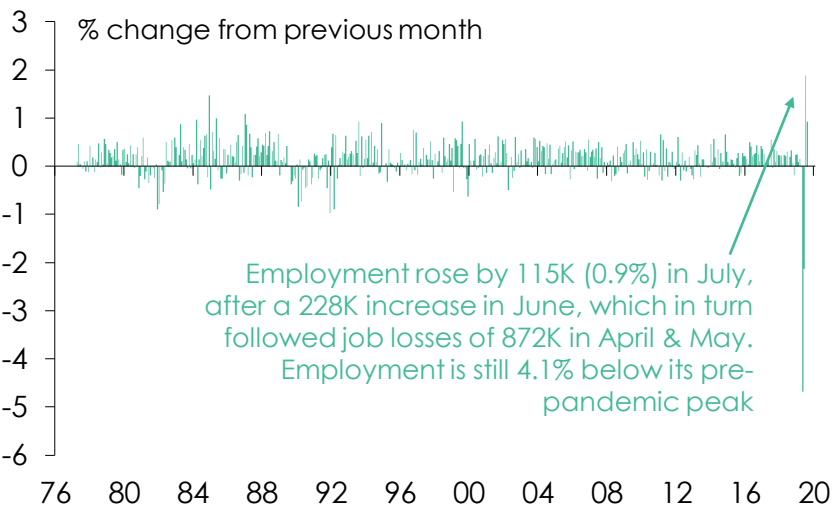
Businesses who would find it difficult, or very difficult, to meet financial commitments over the next three months, August 2020



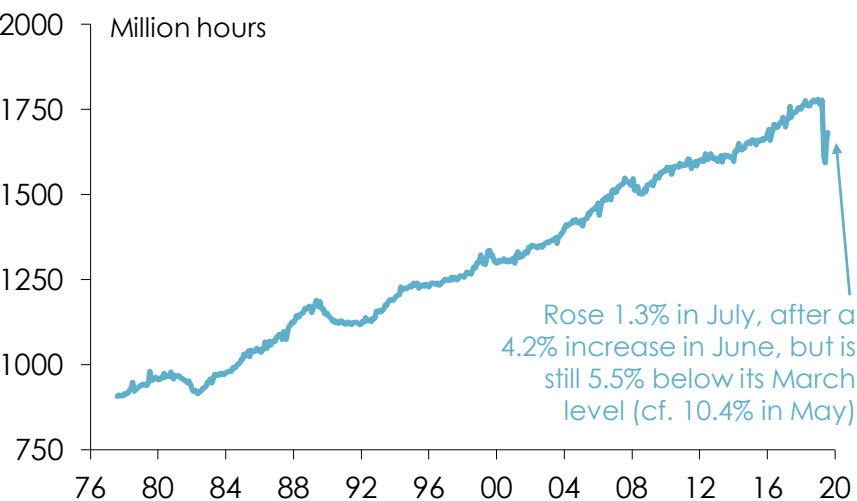
Source: ABS, [Business Impacts of Covid-19](#), August 2020 (based on survey conducted between 12<sup>th</sup> and 19<sup>th</sup> August).

# 343,100 (39%) of those who lost their jobs in March-April are now back at work, while another 86,000 started looking for work

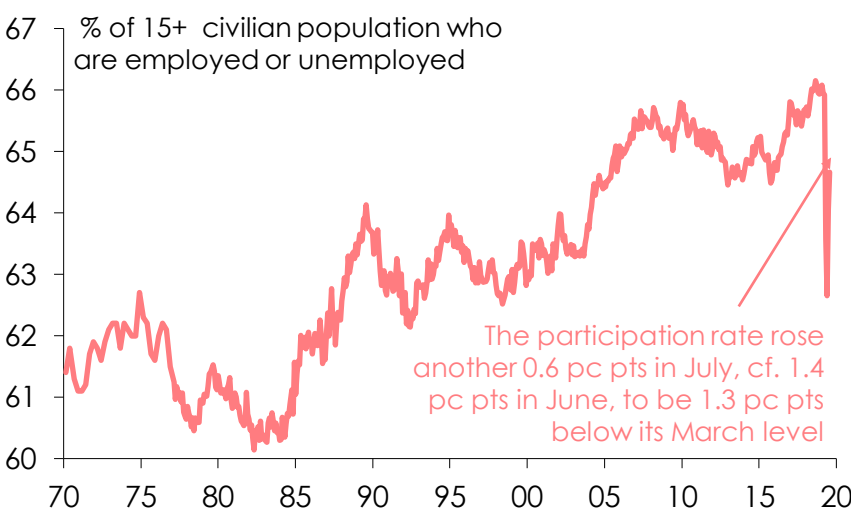
## Employment



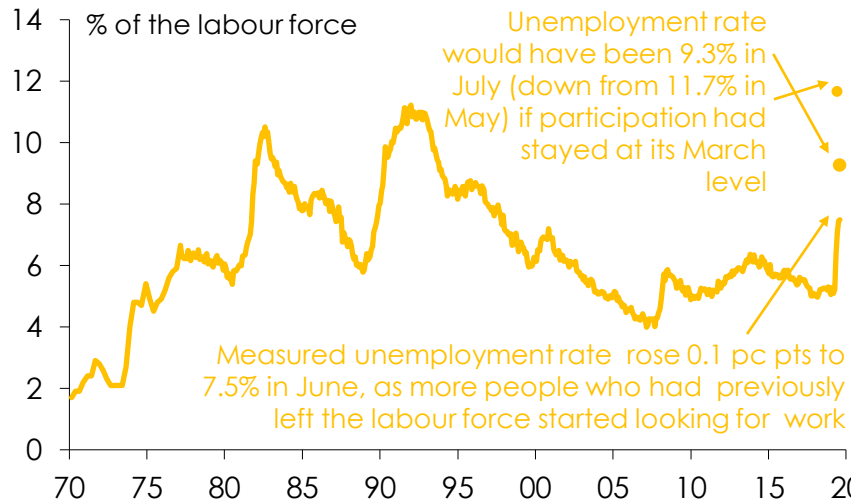
## Total hours worked



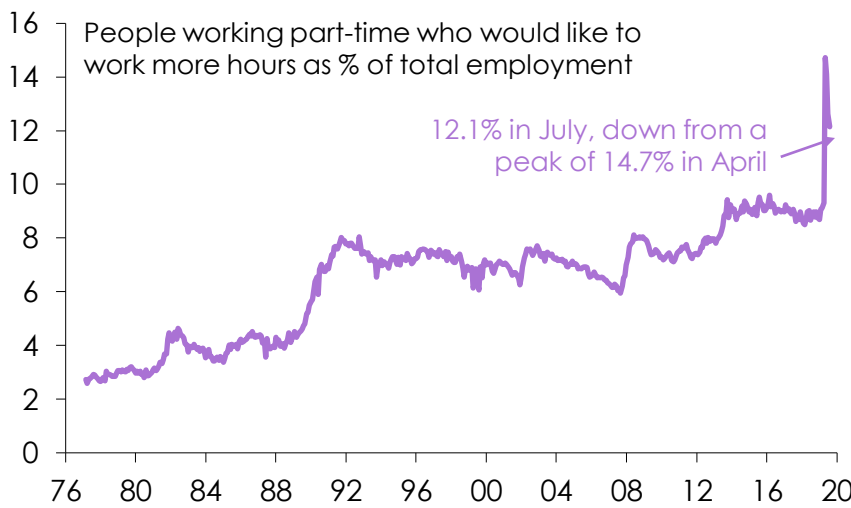
## Labour force participation rate



## Unemployment rate



## Under-employment ratio



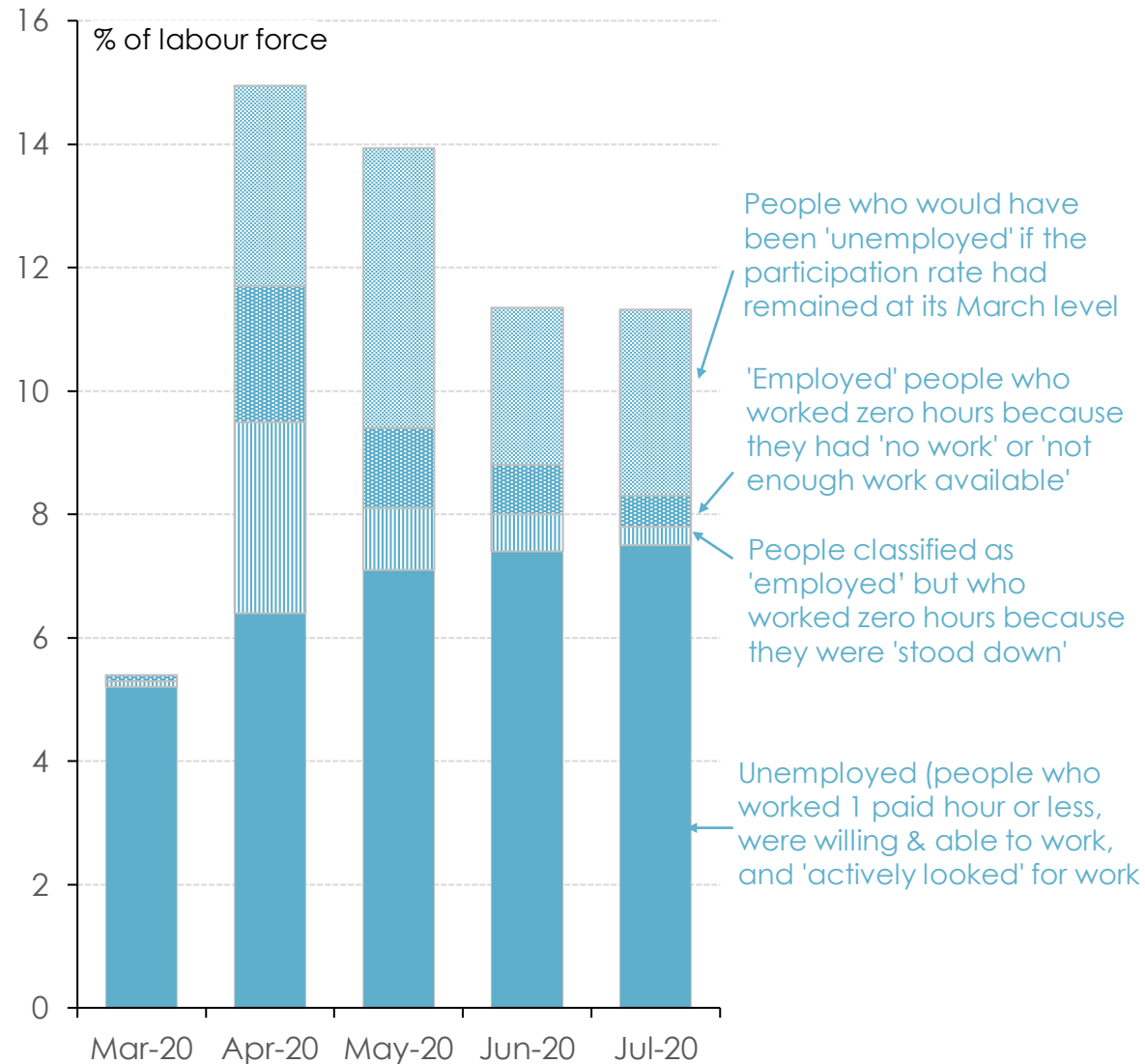
## 'Under-utilization' rate



Note: The ABS classifies people on JobKeeper who worked zero hours in the survey week as 'employed'. Had it not done so, the unemployment rate in May would have been 9.5% (down from 11.7% in April). The 'under-employment ratio' is the percentage of employed persons who are working fewer hours than they are willing and able to work. The 'under-utilization rate' is the proportion of the labour force who are unemployed or underemployed. Source: ABS, [Labour Force, Australia](#). August data will be released on 17<sup>th</sup> September.

# The July unemployment rate would have been 11.3% if people working zero hours and those who dropped out of the labour force were counted

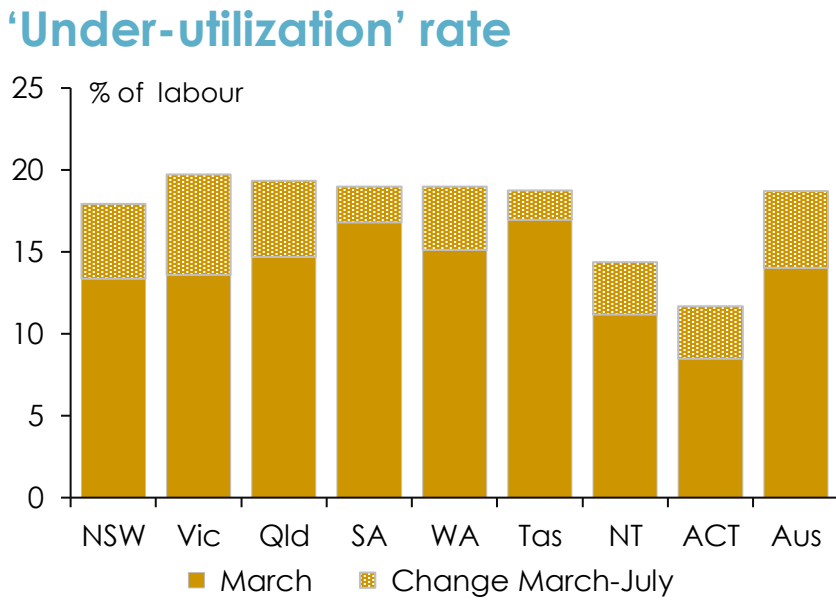
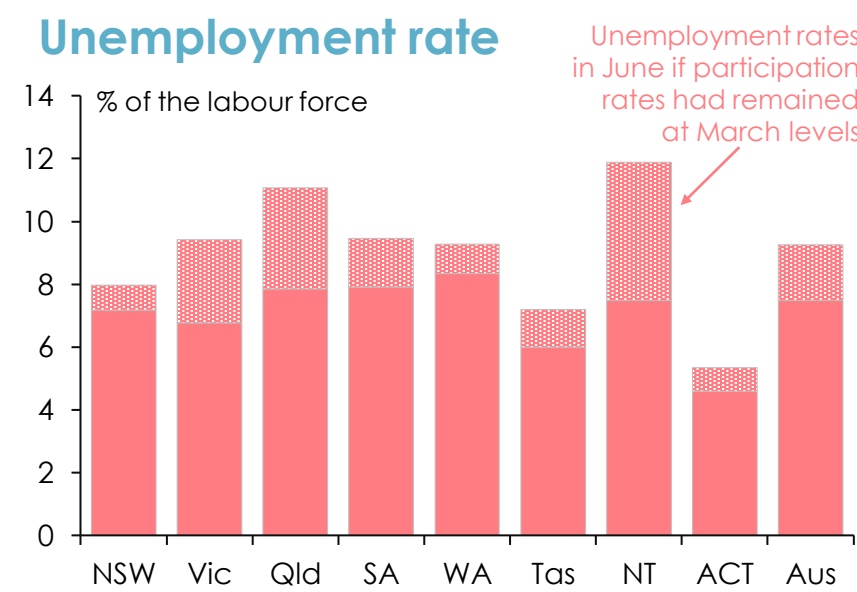
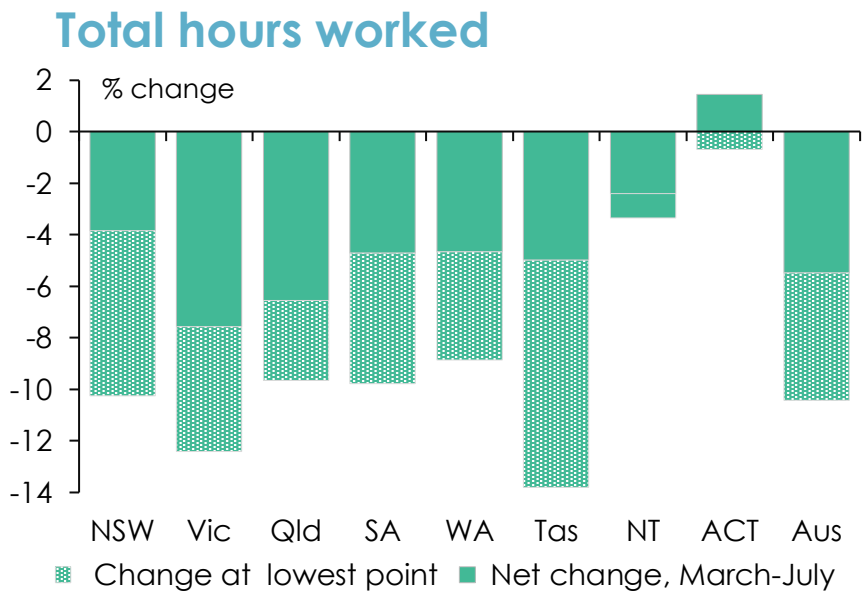
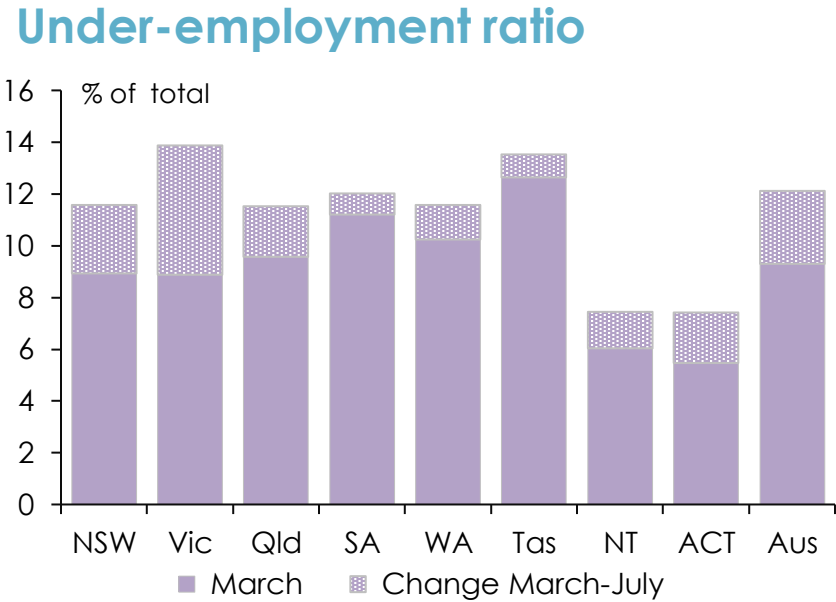
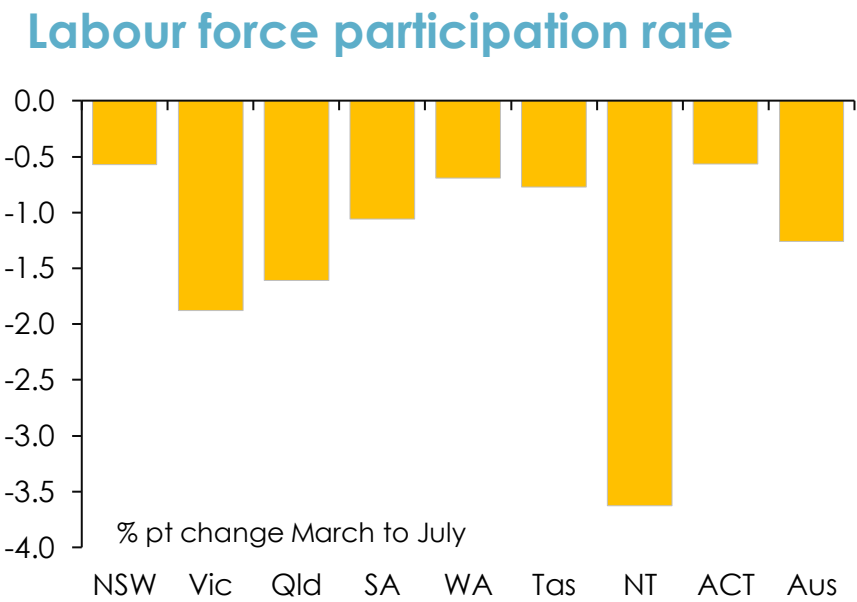
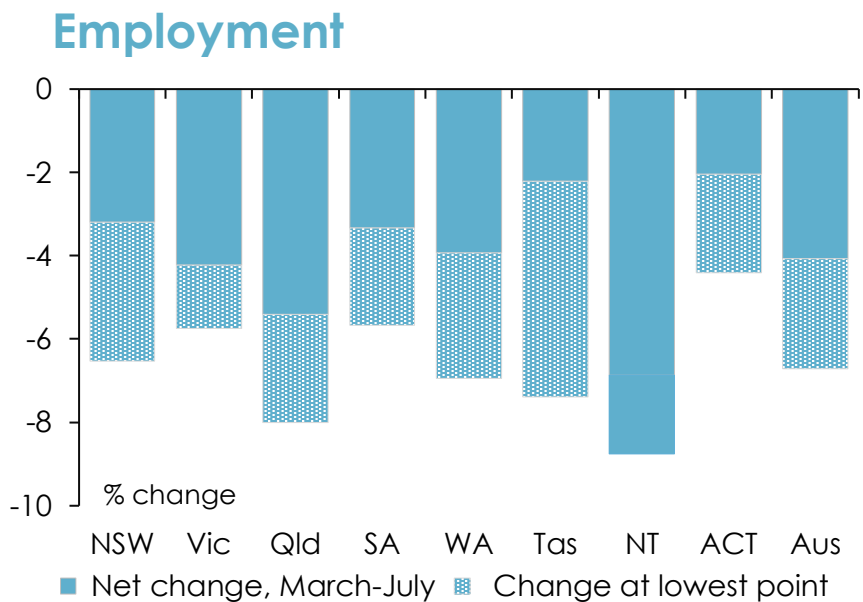
## Alternative measures of unemployment



Source: ABS, [Labour Force, Australia](#); Corinna.

- ❑ The Government's JobKeeper program pays eligible employers a subsidy of \$1500 per fortnight for each eligible employee kept on the payroll between 30 March and 27 September (the level of payments will step down in October and January)
- ❑ Eligible employers are those with
  - annual turnover of <\$1bn whose turnover has fallen by >30%
  - annual turnover of >\$1bn (other than major banks) whose turnover has fallen by >\$1bn
  - Registered charities whose turnover has fallen by >15%
- ❑ Eligible employees are Australian citizens who are (or were at 1 March) permanent full- or part-time employees, or casuals who had at least 12 months 'regular employment'
- ❑ For labour force survey purposes the ABS classifies people being paid through JobKeeper as 'employed' – even if they have been stood down, or worked no hours during the survey week
  - in the US and Canada, such people are classified as unemployed
- ❑ If these people, and those who've dropped out of the labour force since March, were counted as unemployed, then the unemployment rate in July would have been 11.3% - down from 13.9% in May and 14.9% in April

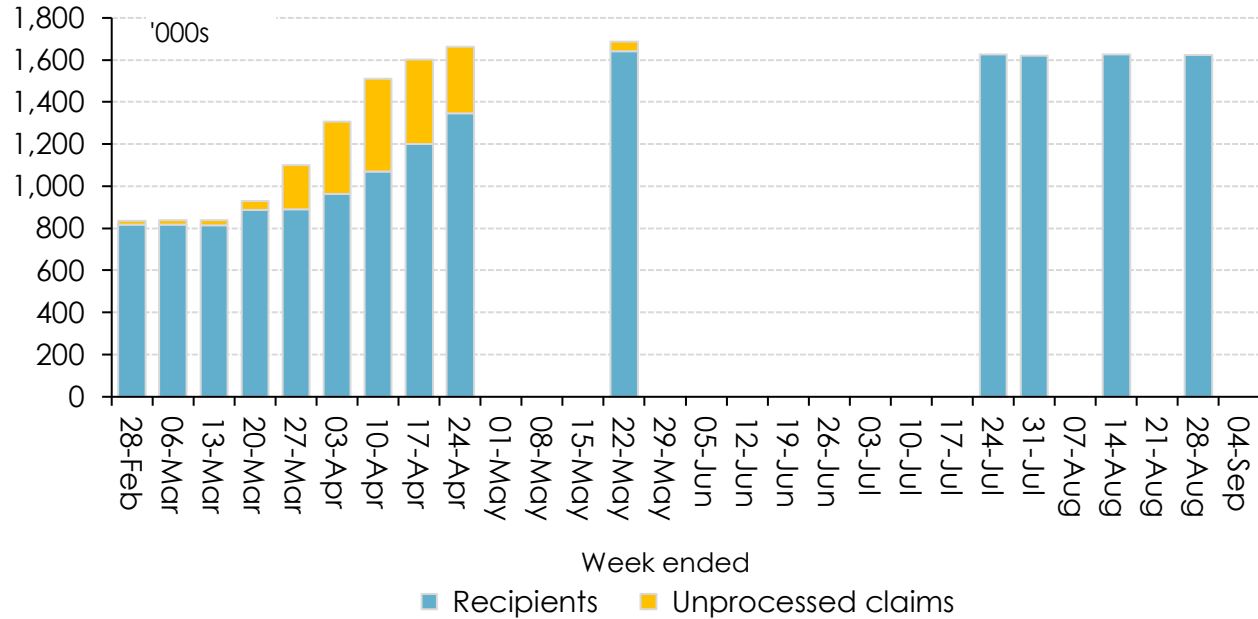
# Tasmania, NSW and WA have seen the strongest recoveries in employment over the past two months



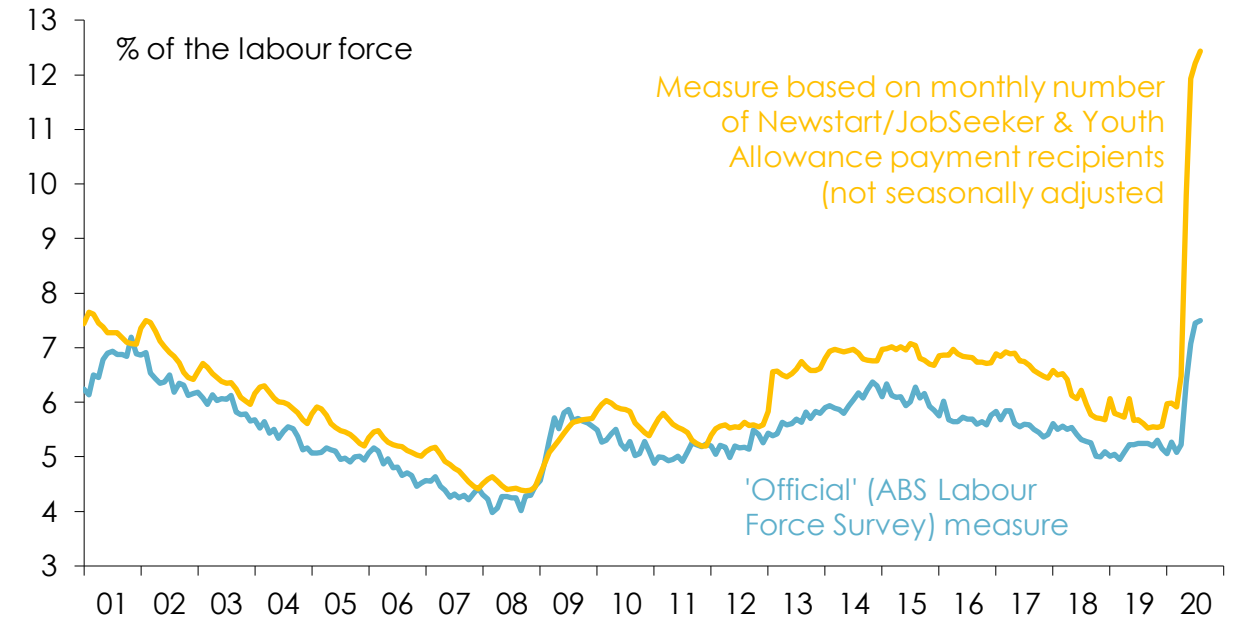
Note: The 'under-employment ratio' is the percentage of employed persons who are working fewer hours than they are willing and able to work. The 'under-utilization rate' is the proportion of the labour force who are unemployed or underemployed. Source: ABS, [Labour Force, Australia](#); August data will be released on 17<sup>th</sup> September.

# The Australian Government (unlike the US Government) seems to regard weekly data on the number of joblessness beneficiaries as a 'state secret'

Number of people receiving or seeking Newstart/ JobSeeker or Youth Allowance payments



Jobless income support beneficiaries and labour force survey unemployed as a pc of the labour force

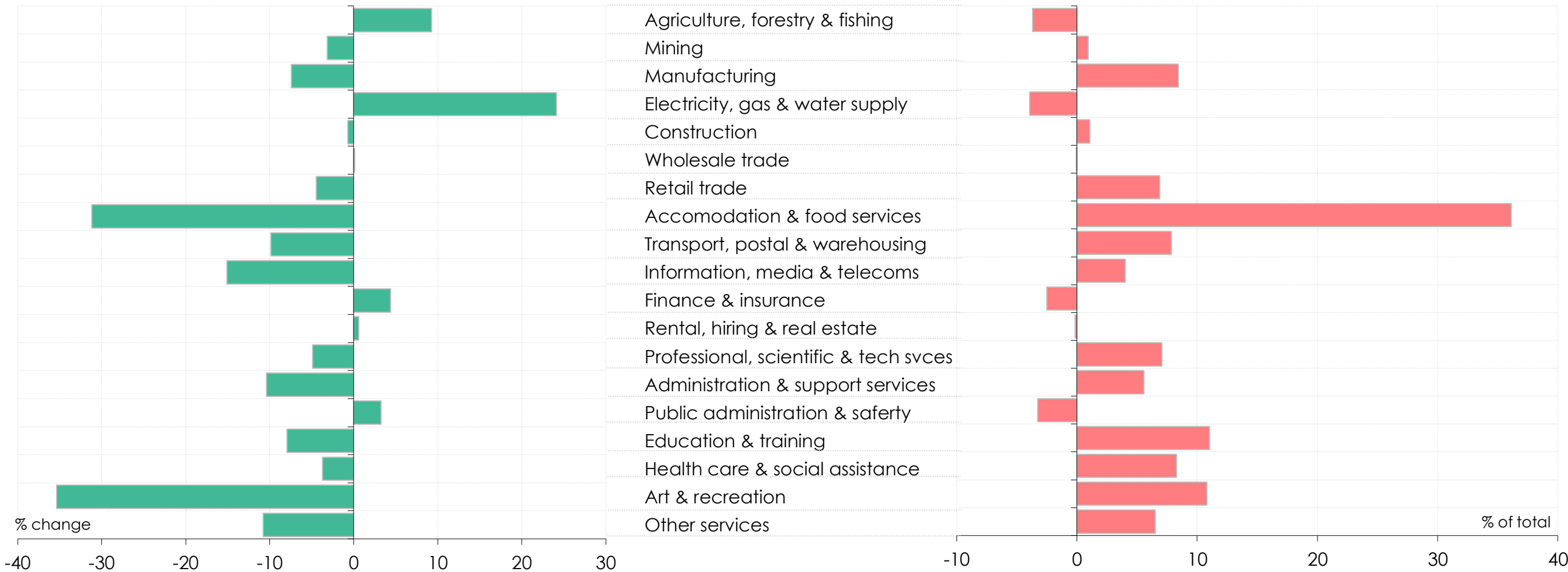


- ❑ The Department of Social Services (DSS) compiles weekly data on the number of people receiving JobSeeker and Youth Allowance (Other) payments, which are supplied to Ministers; historically, only monthly data has been made publicly available
- ❑ On two occasions earlier this year the Secretary of DSS provided weekly data to the Senate Select Committee on Covid-19, and on 29<sup>th</sup> July promised to provide fortnightly and monthly data to this Committee; however so far only three sets of data have been provided, the latest being for 28<sup>th</sup> August, and the Government is keeping the weekly data secret
- ❑ By contrast, the US Labor Department has been making the equivalent data (the 'initial claims' series) available every Thursday morning since 1968: there is no valid reason why Australia shouldn't do the same

# 58% of total job losses between February & May were in accommodation & food services, education & training, and arts & recreation

Change in employment between February and March 2020, by industry

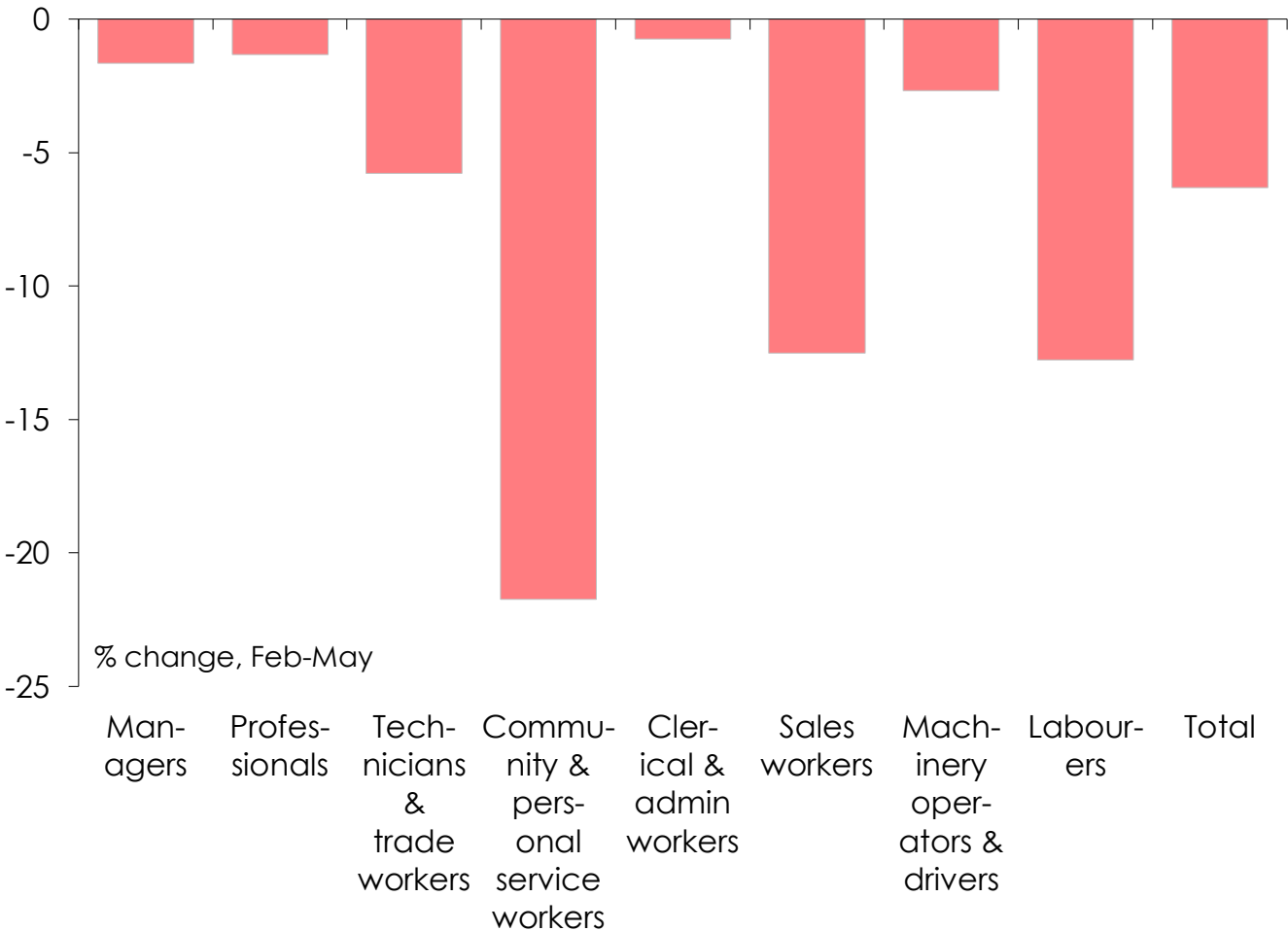
Proportion of change in total employment between February and March 2020, by industry



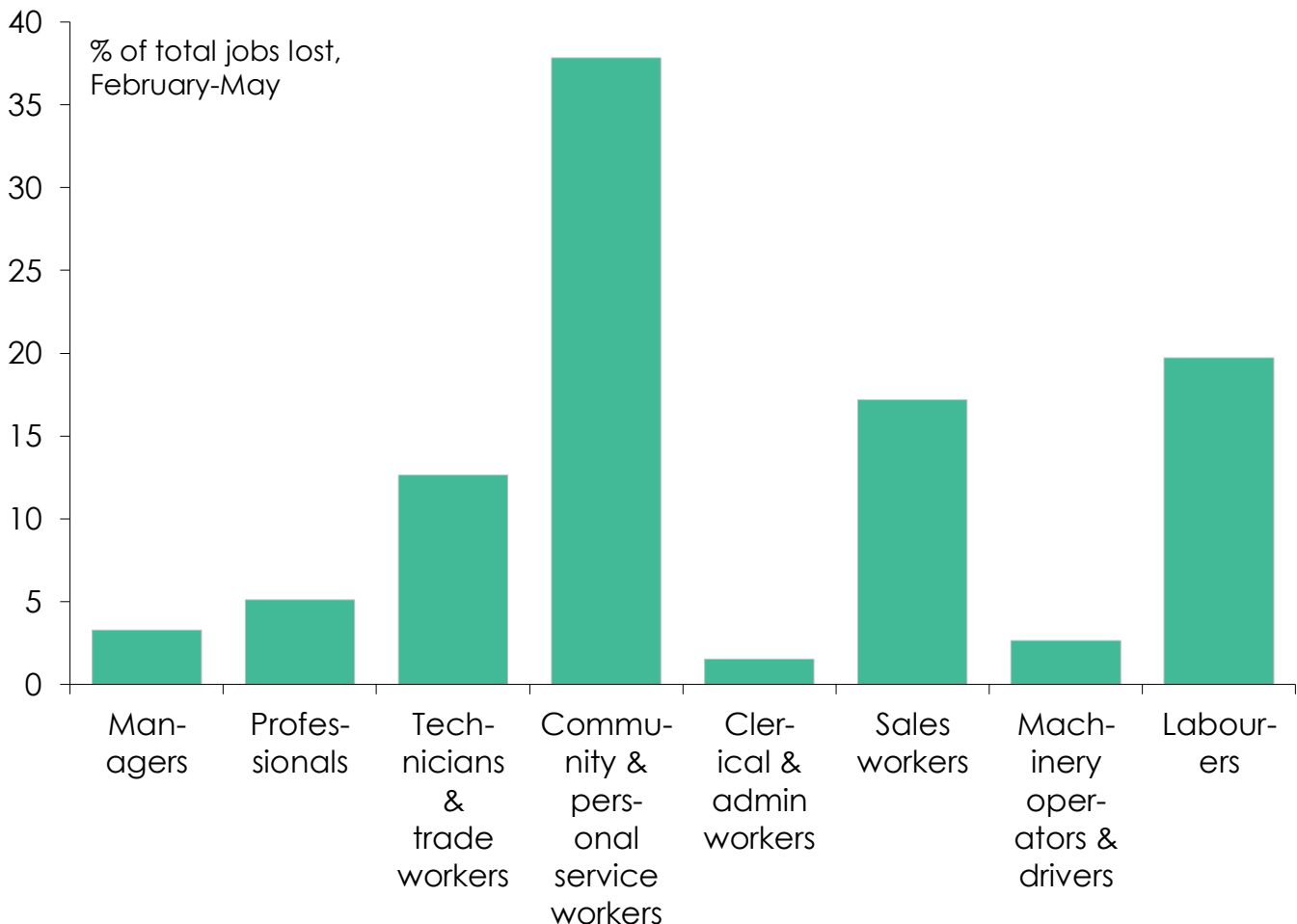
Note: The accommodation & food services, education & training, and arts & recreation services sectors accounted for 15% of total employment in February.  
Source: ABS, [Labour Force, Australia, Detailed, Quarterly](#), May 2020. August data will be released on 24<sup>th</sup> September.

# Community & personal service workers, sales workers and labourers have accounted for 75% of job losses since February

Change in employment between February and March 2020, by occupation



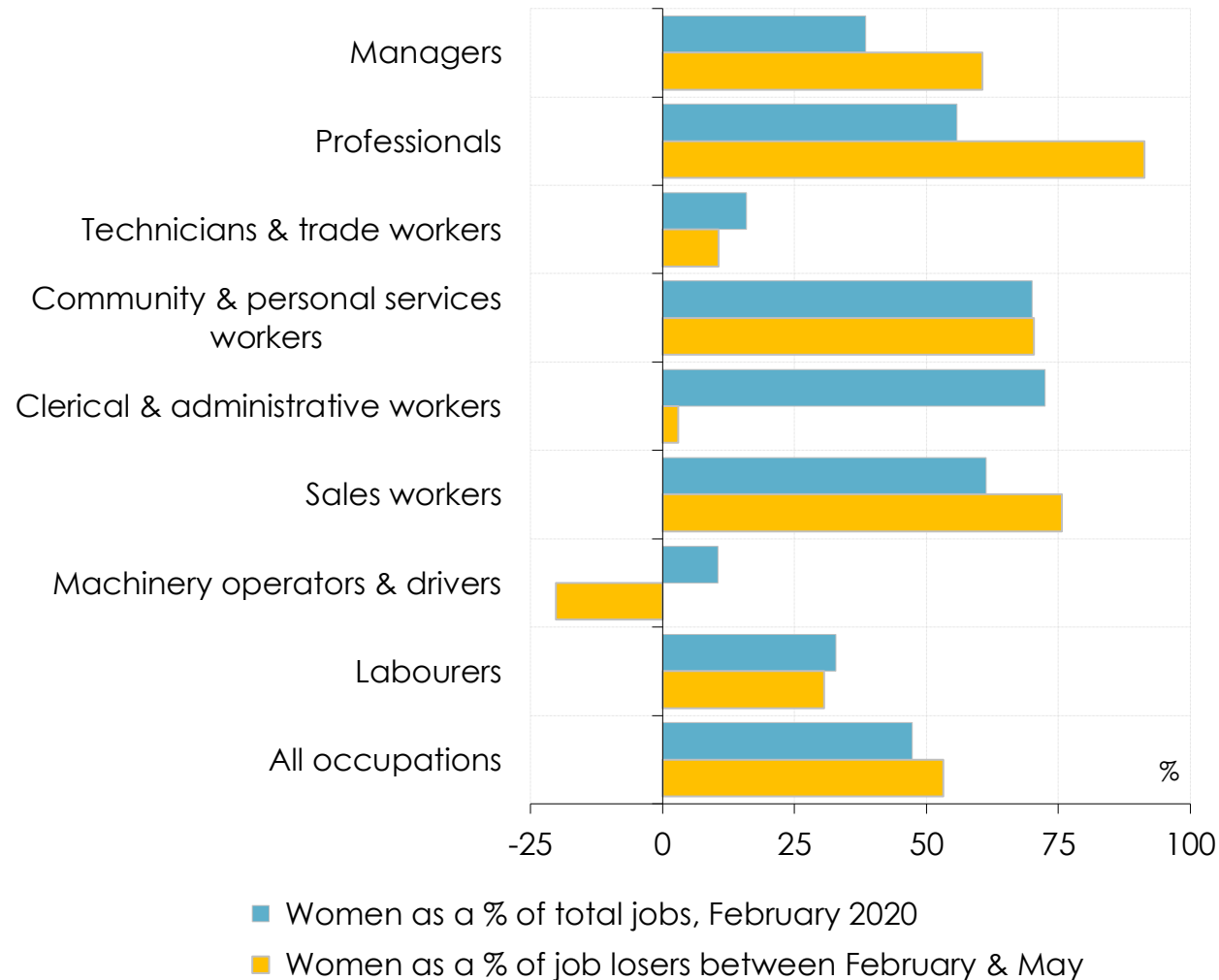
Proportion of change in total employment between February and March 2020, by occupation



Source: ABS, [Labour Force, Australia, Detailed, Quarterly](#), May 2020. August data will be released on 24<sup>th</sup> September.

# Women bore 53% of the job losses between February & May, in part because they typically work in occupations or industries which have been hardest hit

## Women's share of jobs in February, and of job losses since February, by occupation



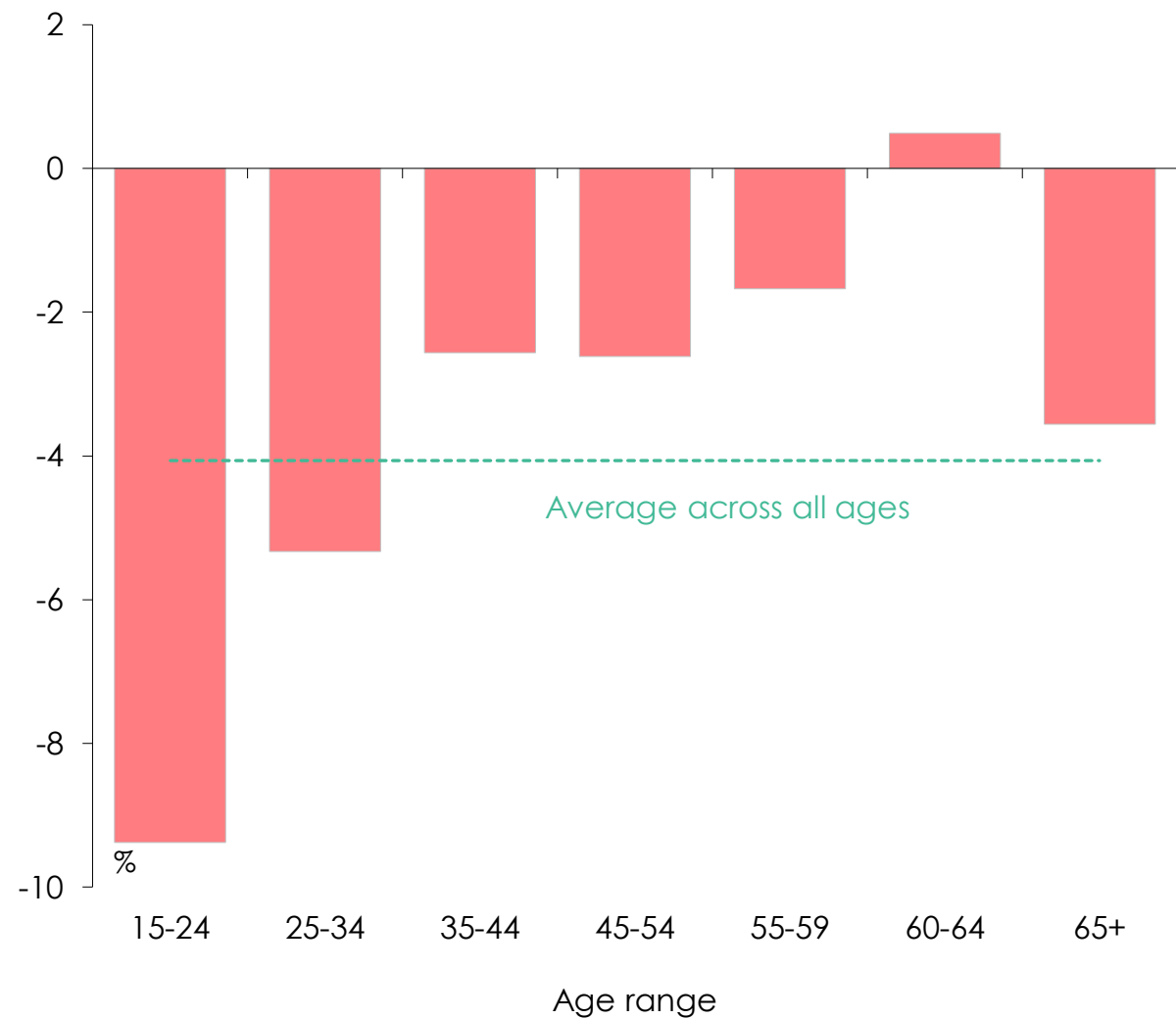
## Women's share of jobs in February, and of job losses since February, by industry



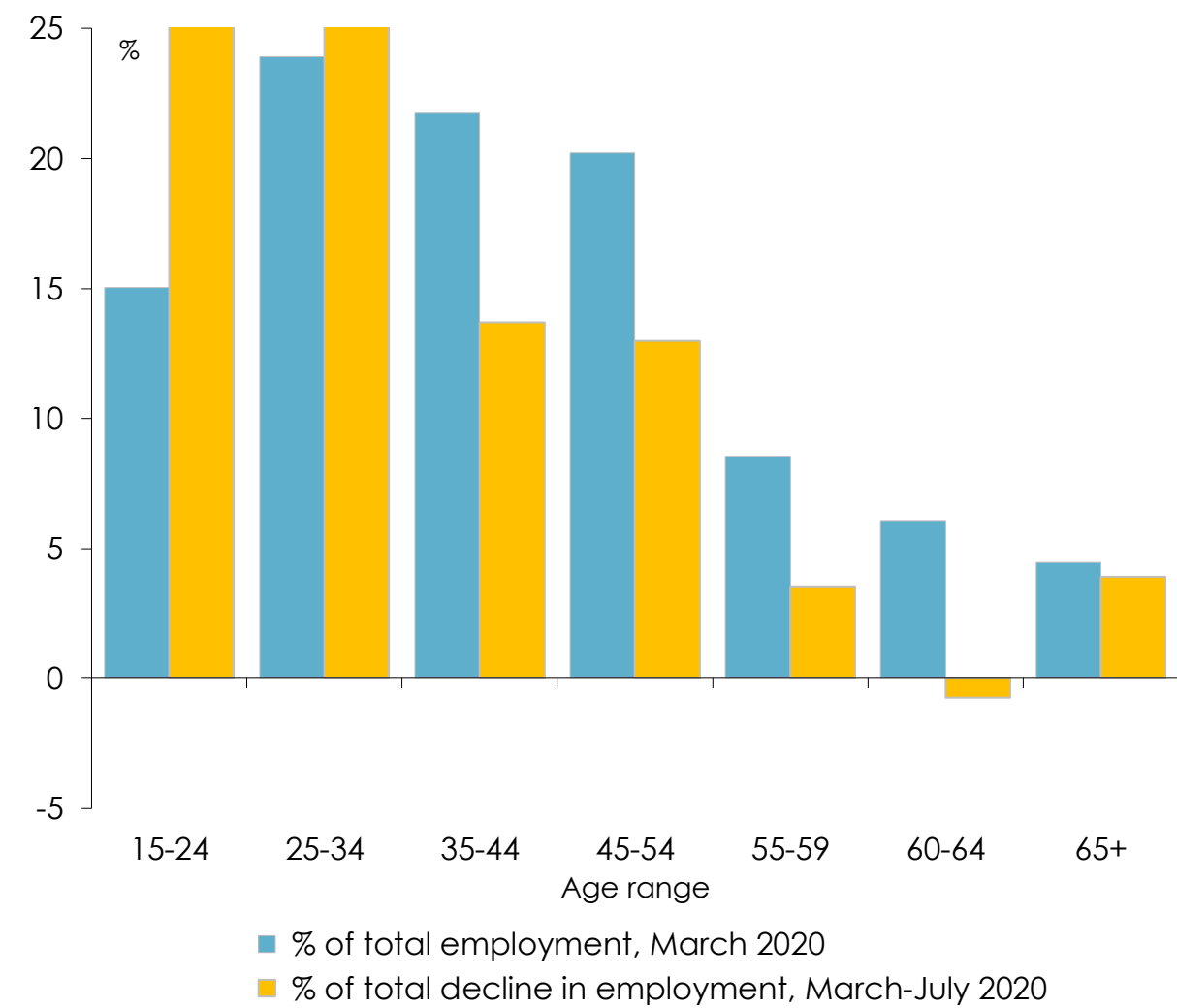
Note: Data depicted in these charts are not seasonally adjust. "nm" = "not meaningful", because employment of women in the industry thus marked either increased between February and May 2020; or fell despite total employment in that industry rising between February and May.  
Source: ABS, [Labour Force, Australia, Detailed, Quarterly](#), May 2020. August data will be released on 24th September.

# People aged 15-34 accounted for 39% of total pre-pandemic employment but have experienced 66% of the jobs lost since March

Change in employment, March-July 2020, by age range



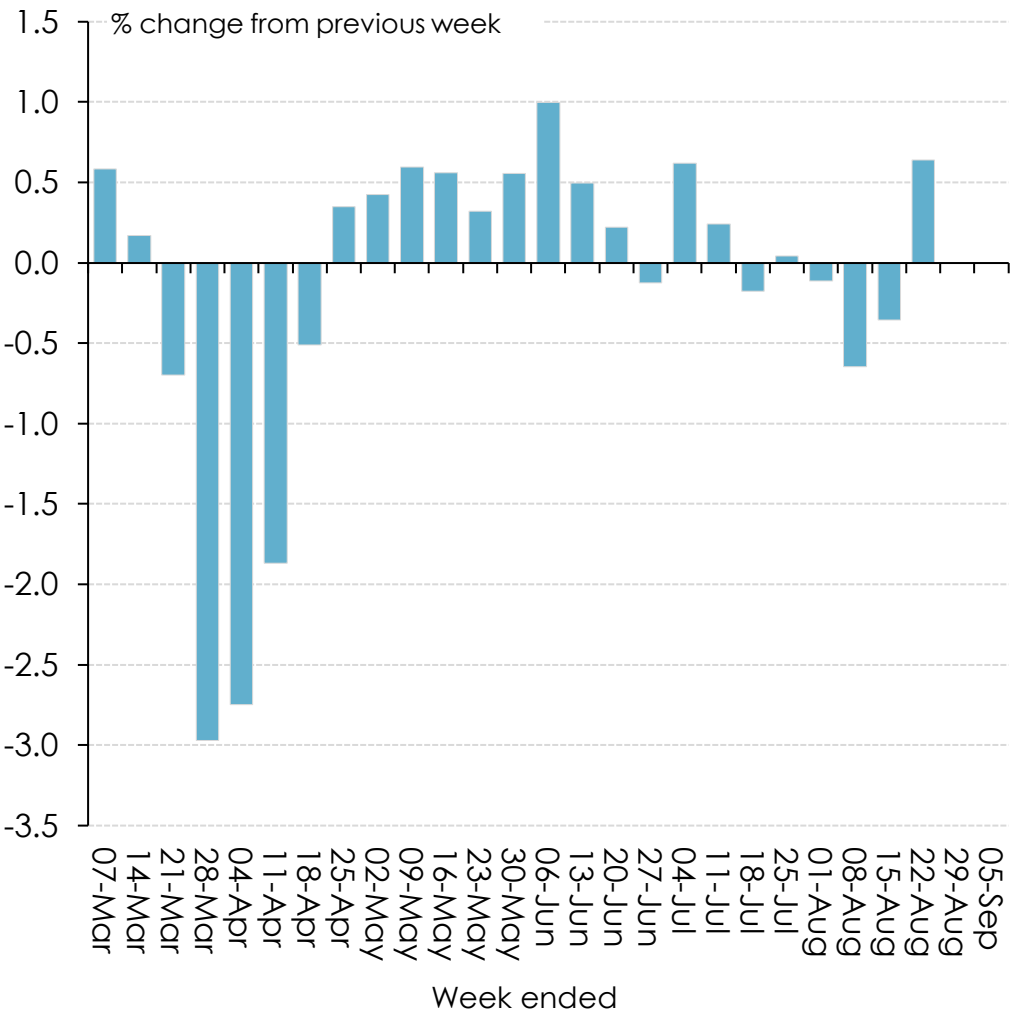
Share of total job losses between March and July 2020 and share of total employment in March, by age group



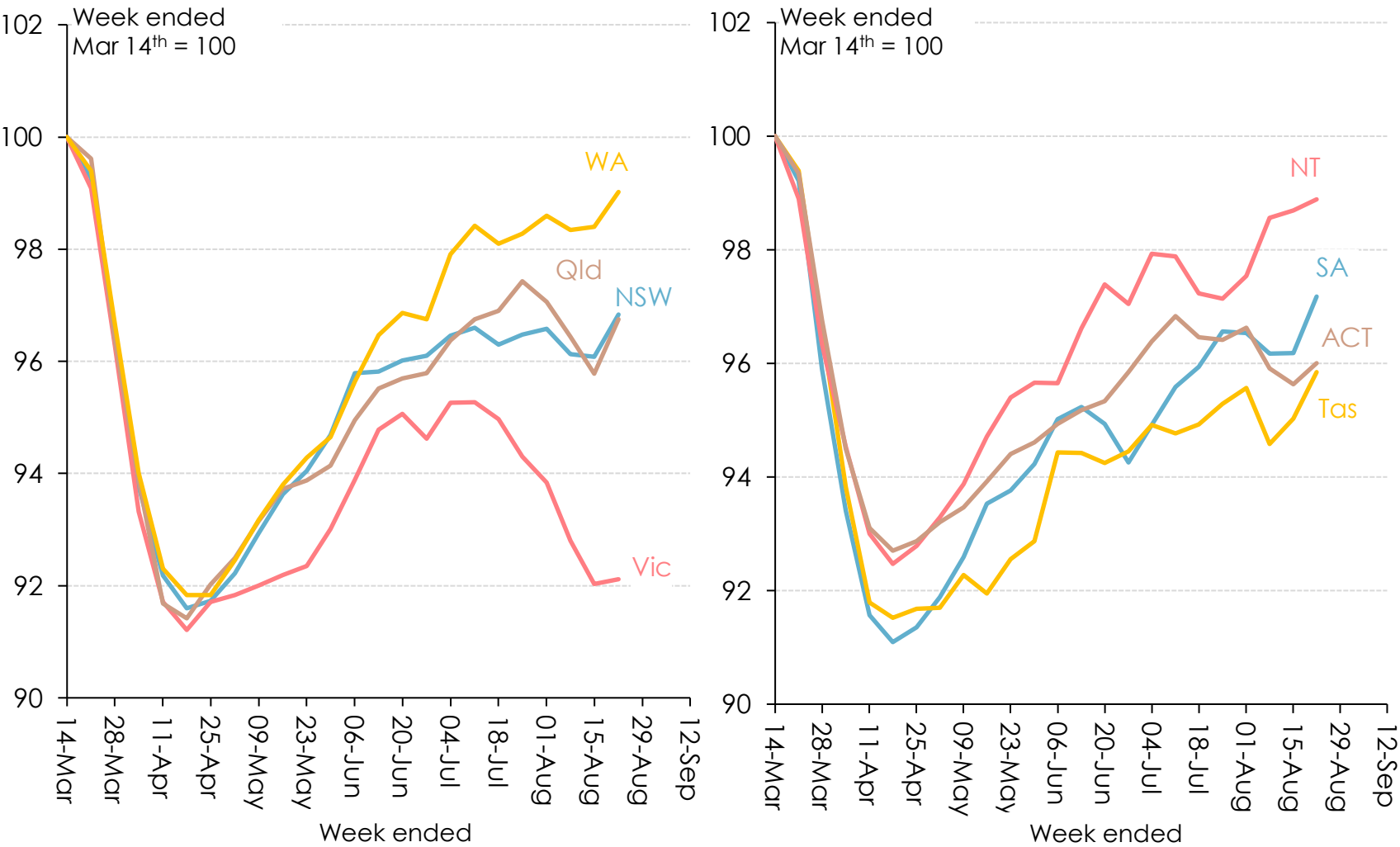
Source: ABS, [Labour Force, Australia - Detailed](#), July 2020; Corinna. August data will be released on 24th September.

# Victoria continued to be a substantial drag on employment growth through mid-August, but in other states job number picked up in late August

Weekly change in number of payroll jobs



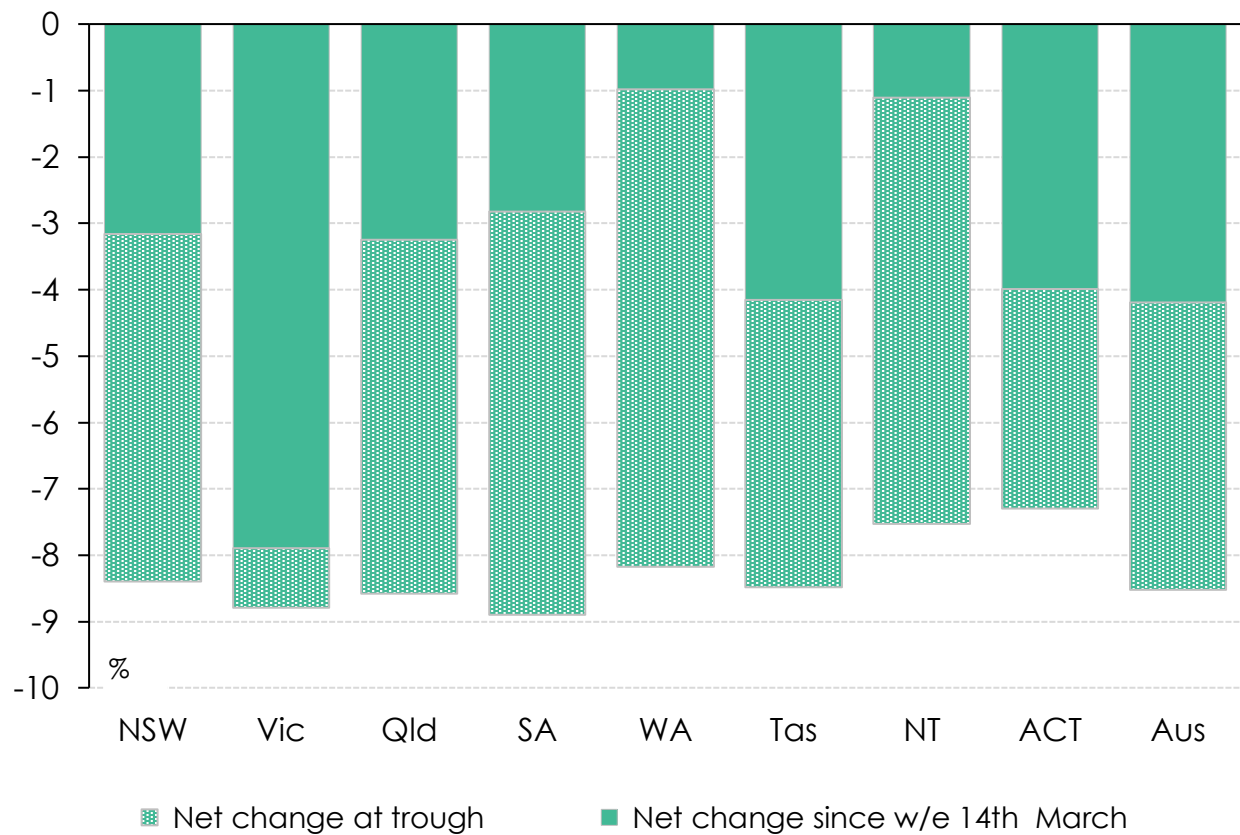
Payroll jobs by State & Territory



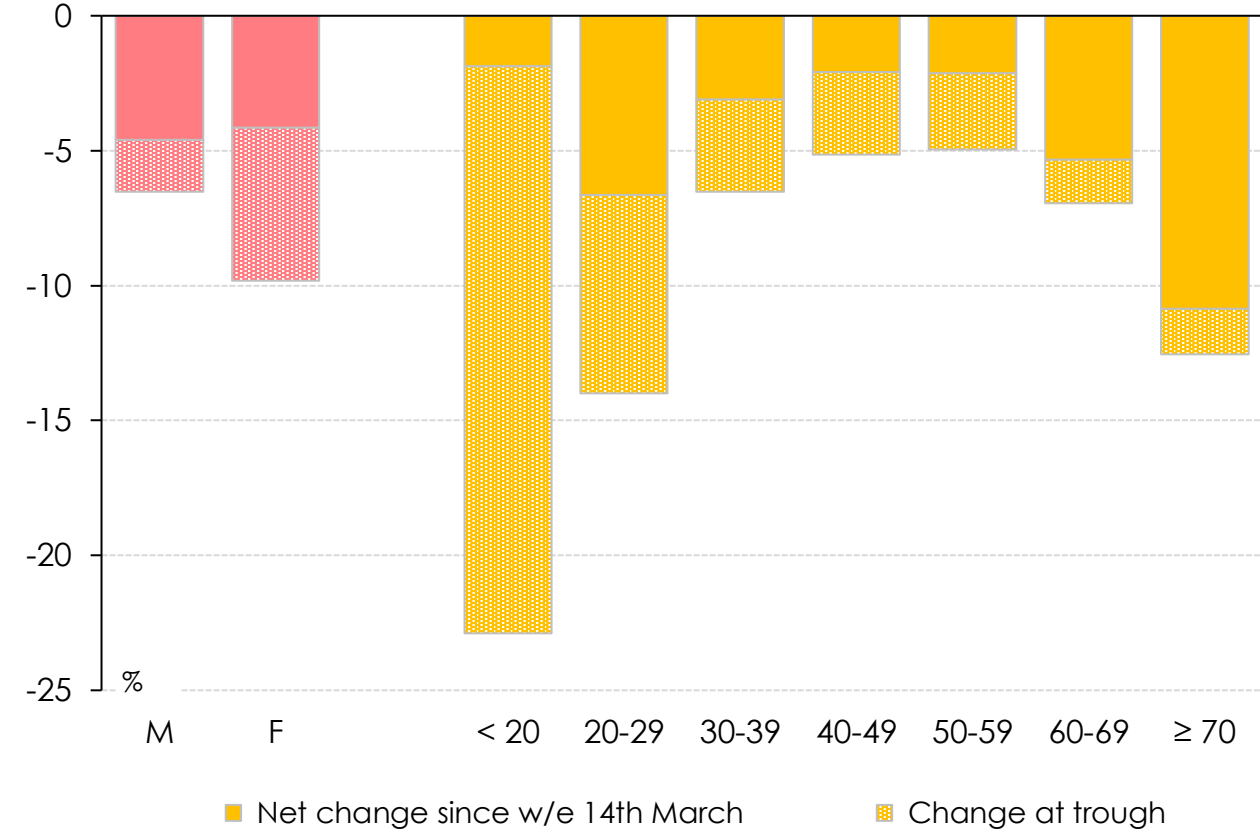
Source: ABS, [Weekly Payroll Jobs and Wages in Australia](#). Data refers to the number of payroll jobs at businesses participating in the Australian Taxation Office's Singe Touch Payroll system, which covers 99% of employers with 20 or more employees and about 71% of smaller employees. People with two or more jobs (about 6% of the total) are double-counted; employers and the self-employed are not included. Data are not seasonally adjusted (so at least some of the week-to-week variations could be due to 'normal' seasonal factors). Data for weeks up to week ended 5<sup>th</sup> September will be released on 22<sup>nd</sup> September.

# Victoria has experienced the largest net job losses, by a wide margin: but it's no longer true that women and young people have

Net change in the number of payroll jobs since the week ended 14<sup>th</sup> March, by state and territory



Net change in the number of payroll jobs since the week ended 14<sup>th</sup> March, by gender and age group



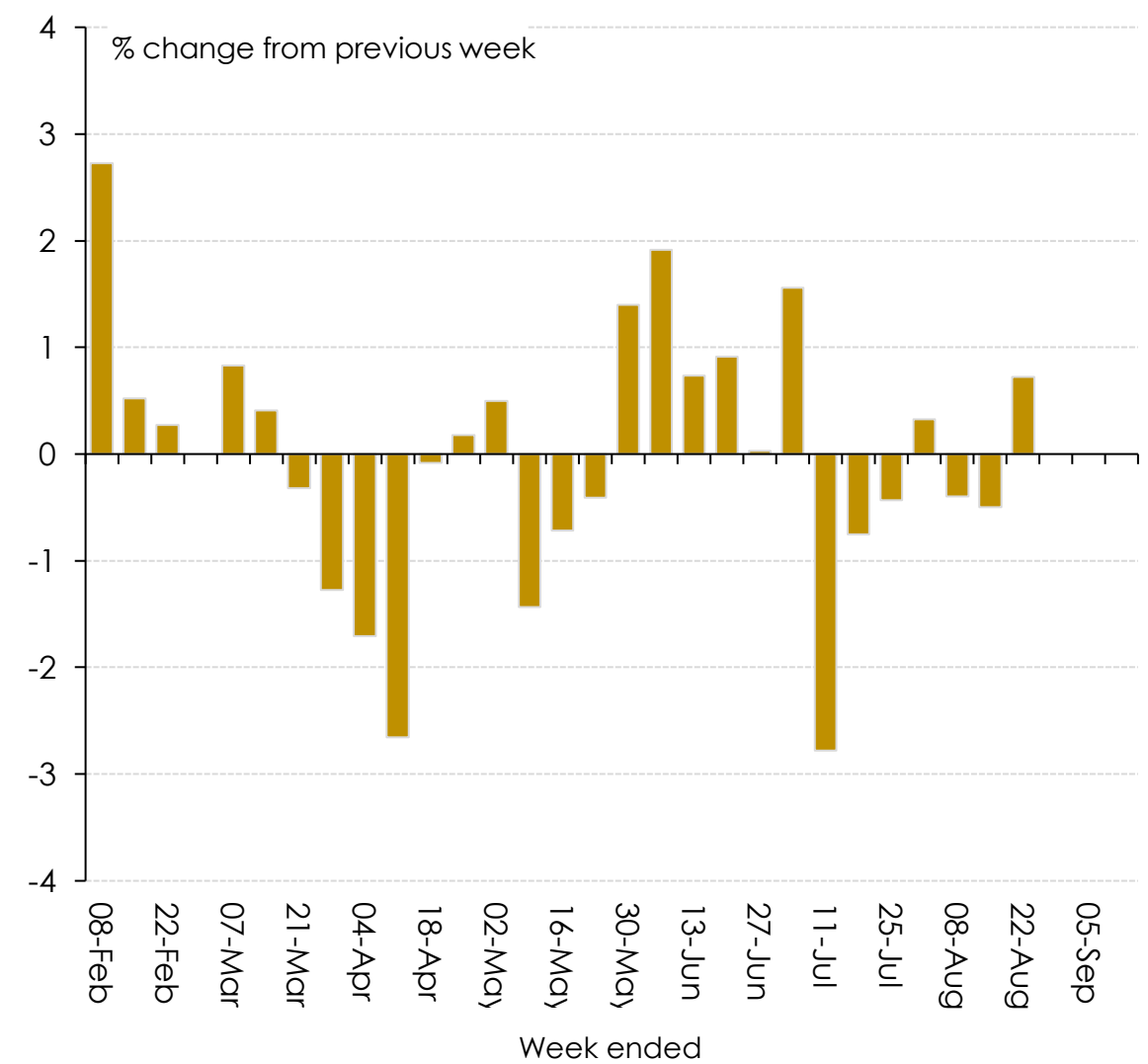
☐ **Vic payroll jobs are still down 8% on net from pre-pandemic: other states between 1% and 4¼%**

☐ **It's no longer the case that women and young people have borne the brunt of job losses**

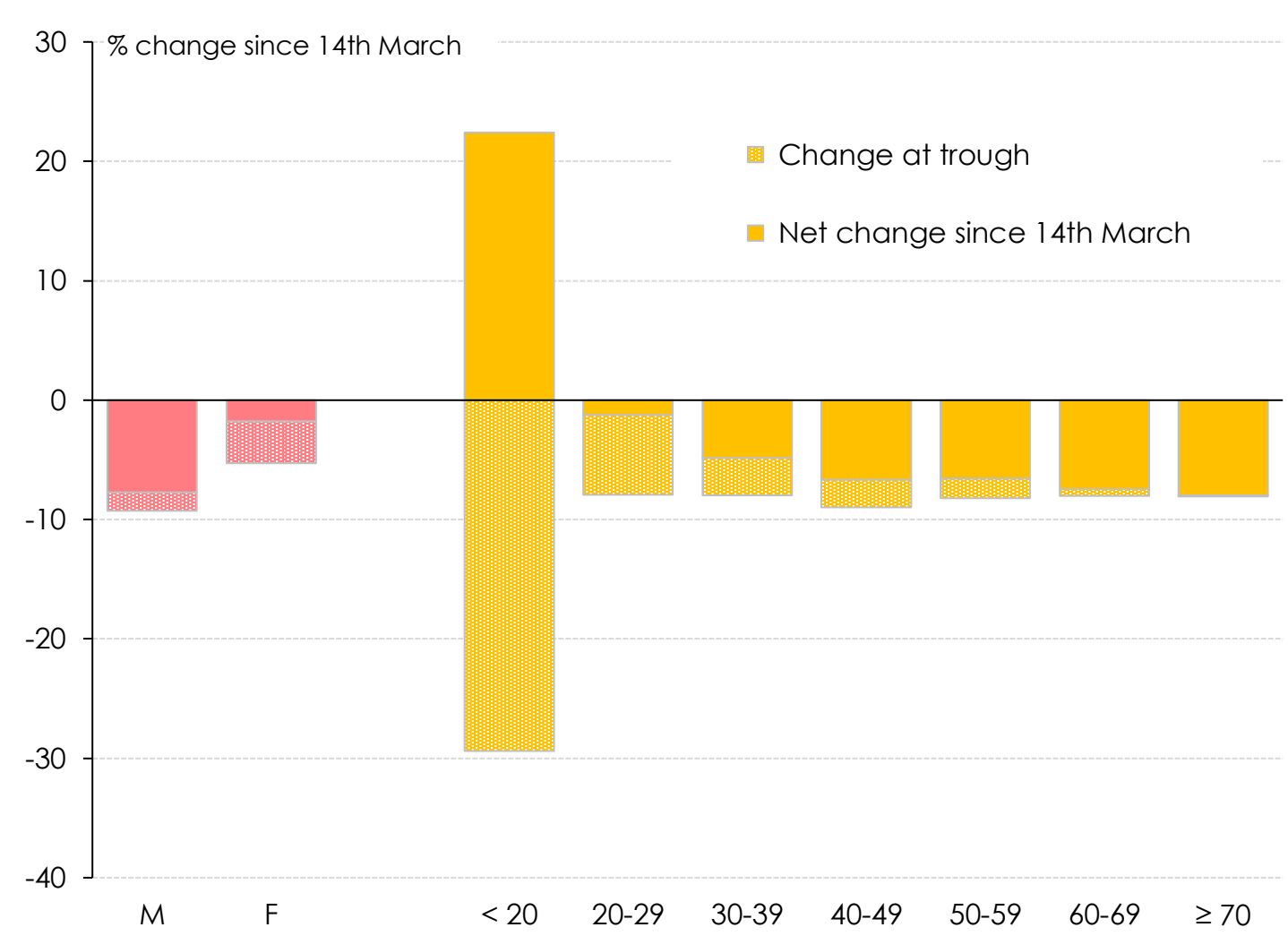
Source: ABS, [Weekly Payroll Jobs and Wages in Australia](#). Data refers to the number of payroll jobs at businesses participating in the Australian Taxation Office's Single Touch Payroll system, which covers 99% of employers with 20 or more employees and about 71% of smaller employees. People with two or more jobs (about 6% of the total) are double-counted; employers and the self-employed are not included. Data are not seasonally adjusted (so at least some of the week-to-week variations could be due to 'normal' seasonal factors). Data for weeks up to week ended 5<sup>th</sup> September will be released on 22<sup>nd</sup> September.

# Wage payments rose 0.7% in the 3<sup>rd</sup> week of August after falling in five of the previous six weeks by a total of 4½%

Weekly change in total wages paid



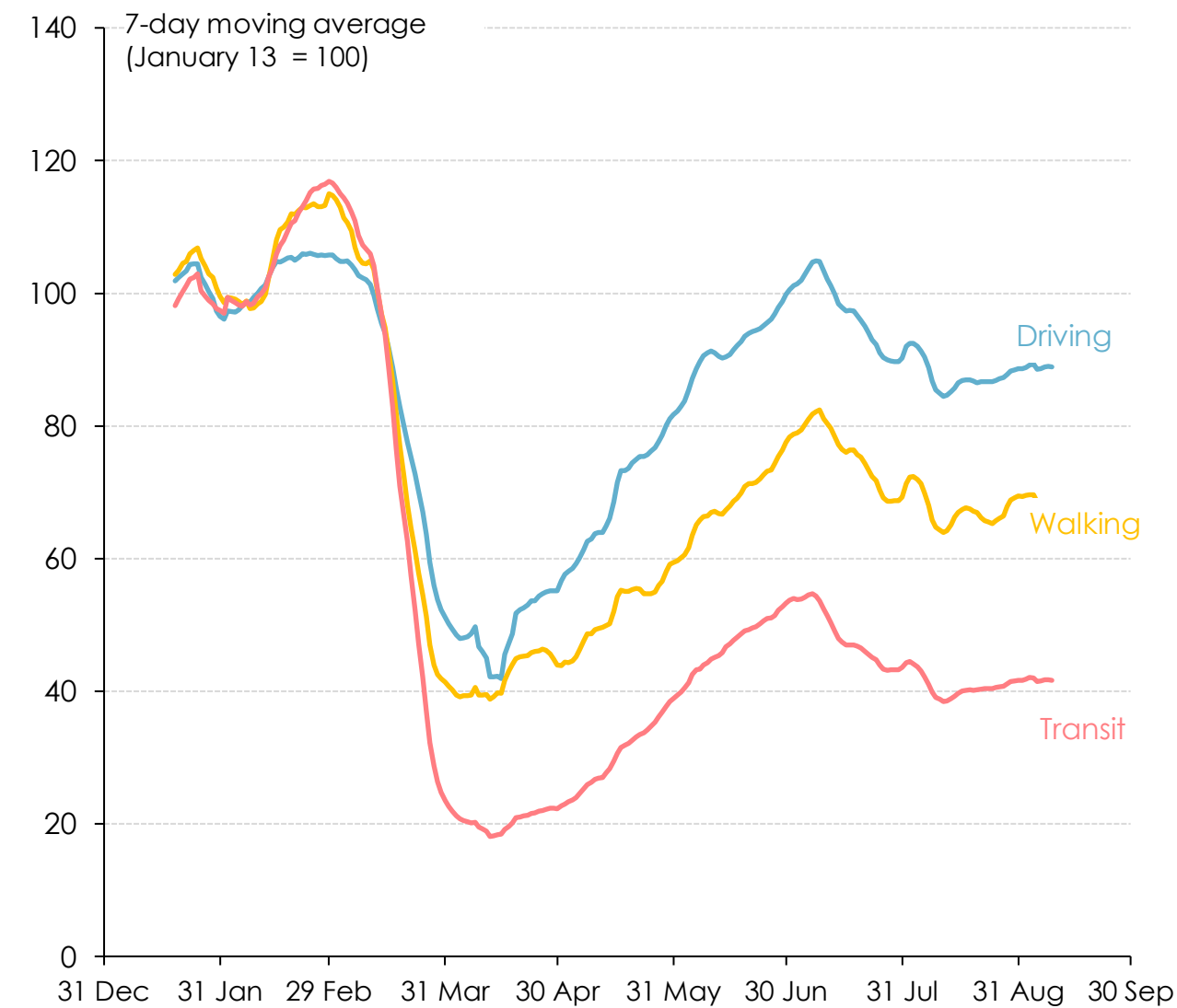
Change in total wages paid by gender and age group



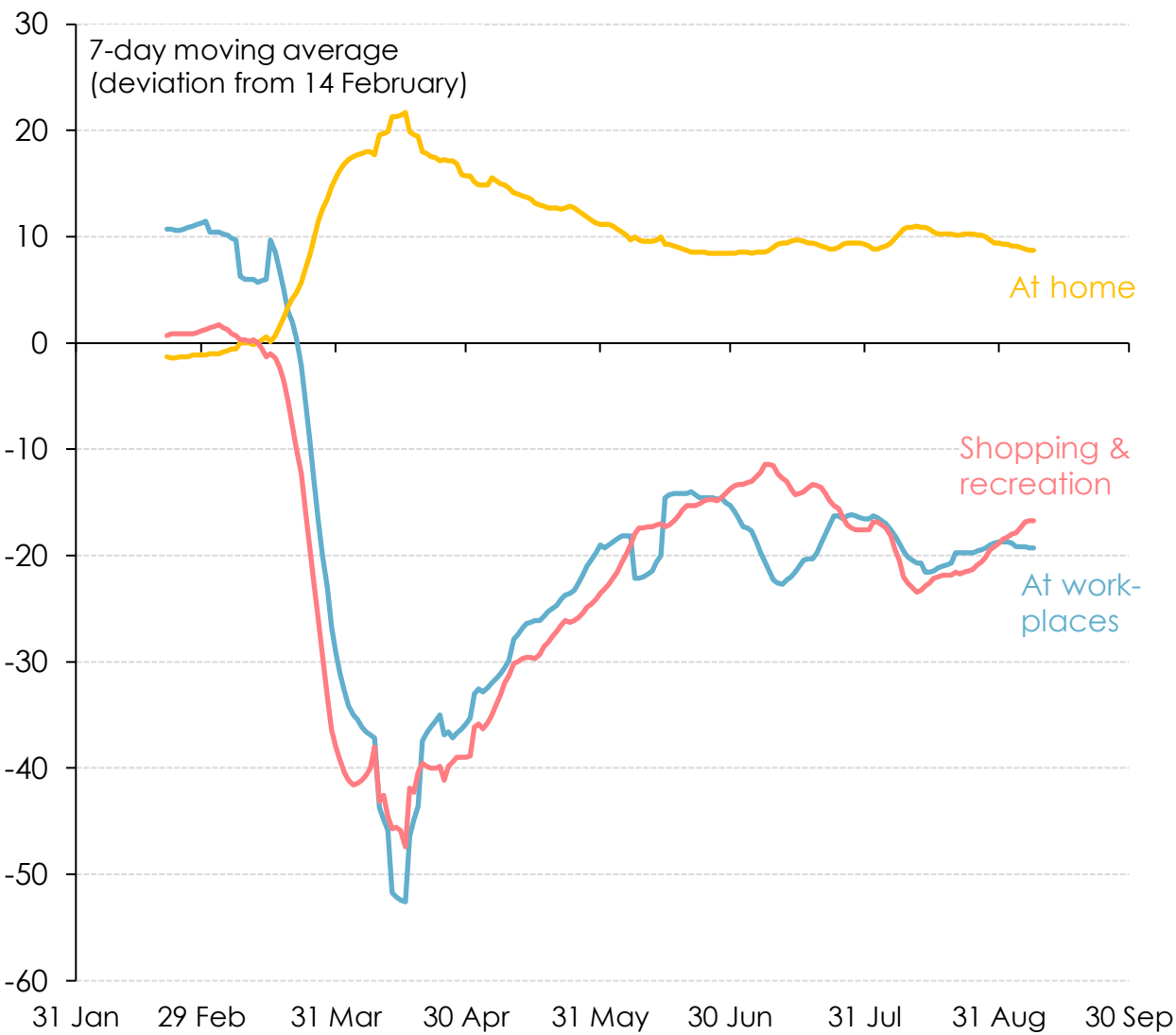
Note: The smaller fall in women's wages than men's likely reflects the fact that JobKeeper payments (at a flat rate of \$1500 per employee per fortnight) represent a higher proportion of women's (lower) average earnings than men's. Ditto for teenagers (most of whom work part-time). Source: ABS, [Weekly Payroll Jobs and Wages in Australia](#). 'Trough' refers to the week in which payroll employment for the state/territory, gender or age group was at its lowest level since mid-March. Data are not seasonally adjusted, so some of the week-to-week movements in wages could be due to 'normal' seasonal factors (for example end-of-financial year bonuses).

# There's been a slight increase in mobility over the past three weeks, after the decline due to the imposition of the stage 4 lockdown in Victoria

Time spent driving, walking and in transit



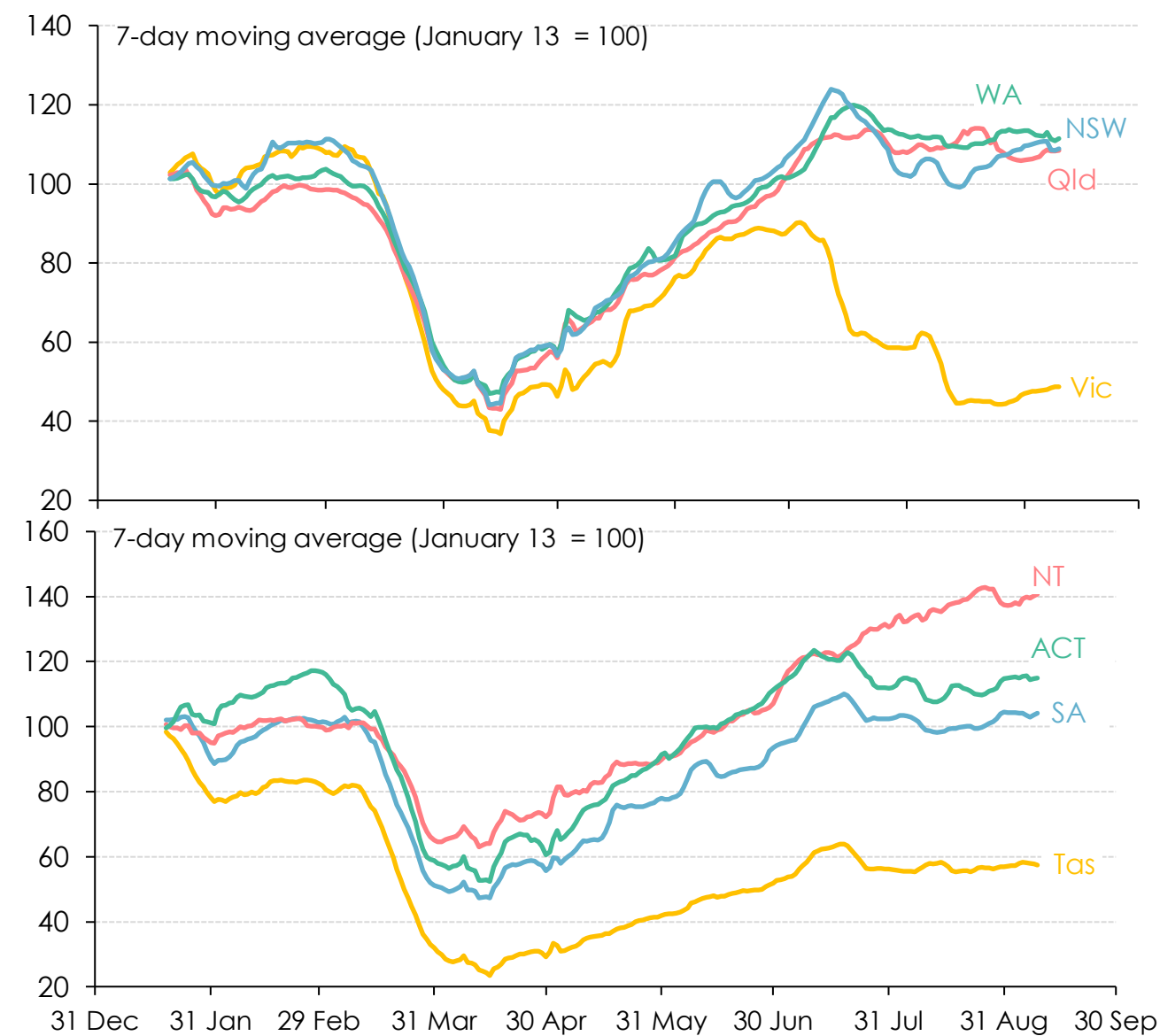
Time spent working, at home, shopping & playing



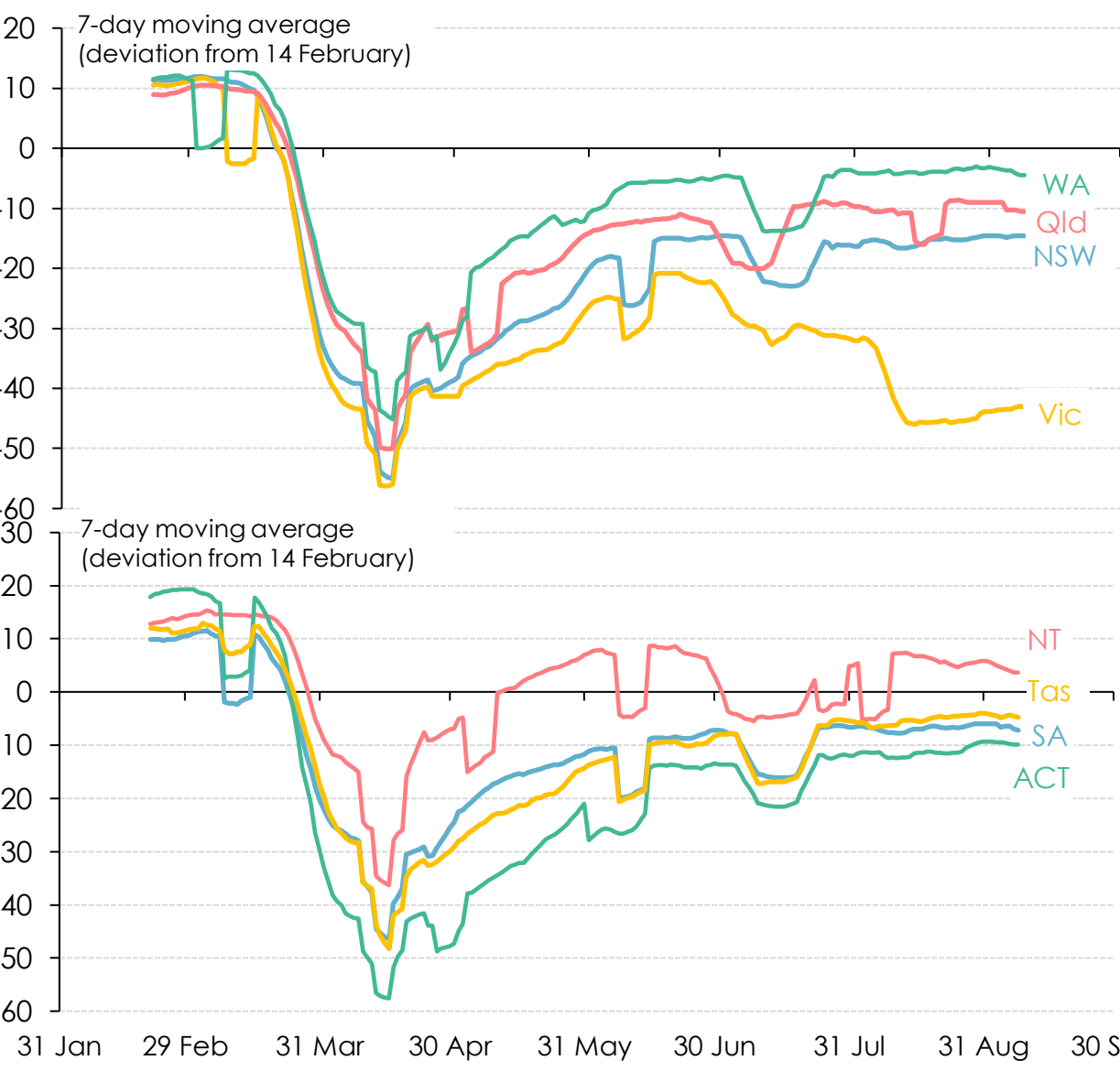
Note: 'transit' means using public transport. Note also that these data will reflect normal seasonal variations in activities as well as the effects of government restrictions and individual responses to the risks posed by the virus. Sources: [Apple Mobility Trends Reports](#) (data up to 9<sup>th</sup> September); [Google Community Mobility Reports](#) (data up to 8<sup>th</sup> September). For state-level data see [next slide](#).

# The impact of Victoria's 'stage 4' lockdown is clear from mobility measures

Time spent driving, by State and Territory



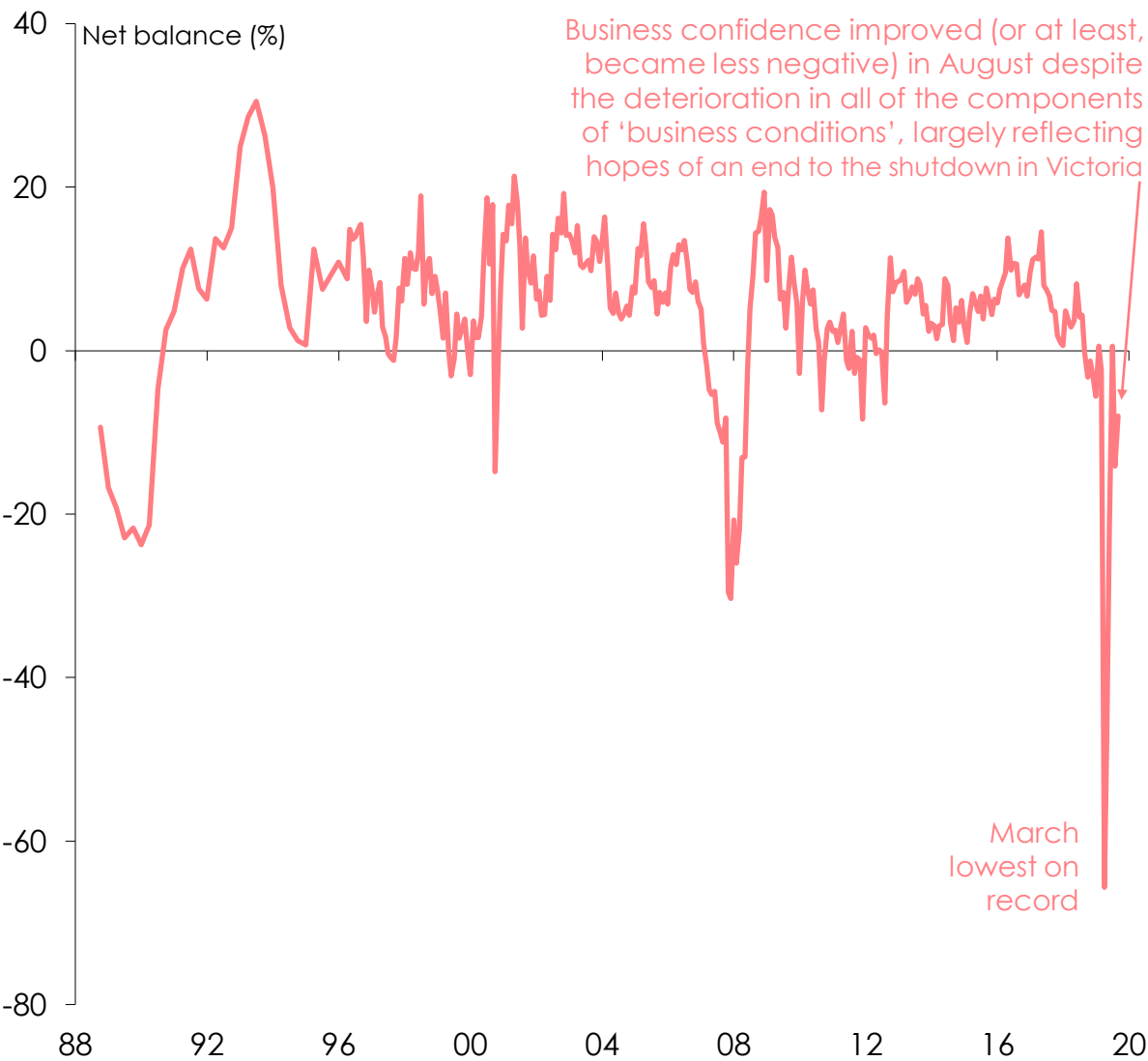
Time spent working, by State and Territory



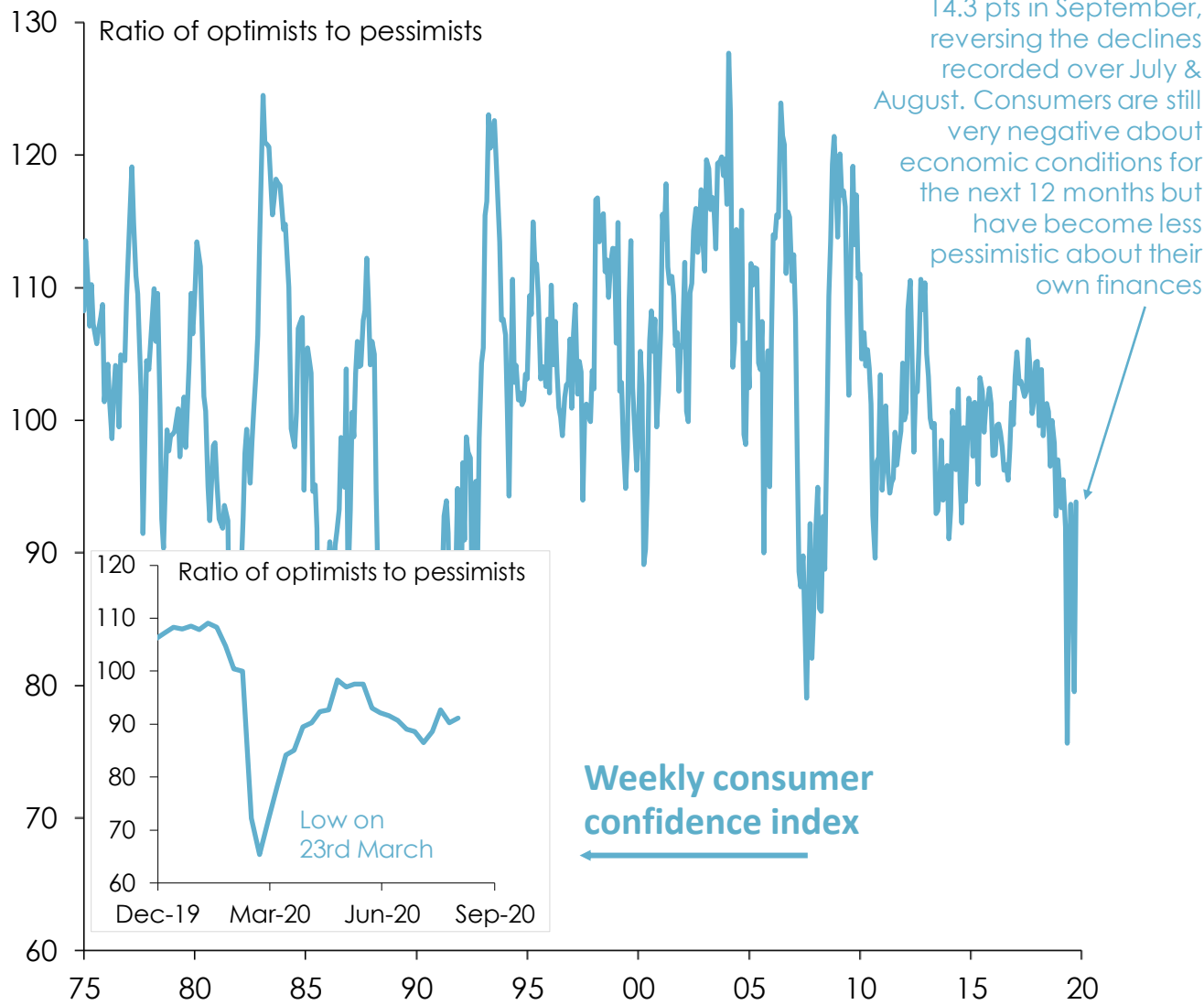
Note: these data will reflect normal seasonal variations in activities as well as the effects of government restrictions and individual responses to the risks posed by the virus. Sources: [Apple Mobility Trends Reports](#) (data up to 9<sup>th</sup> September); [Google Community Mobility Reports](#) (data up to 8<sup>th</sup> September).

# Business confidence improved a bit in August but remains weak by historical standards, consumer confidence improved in September

## Business confidence



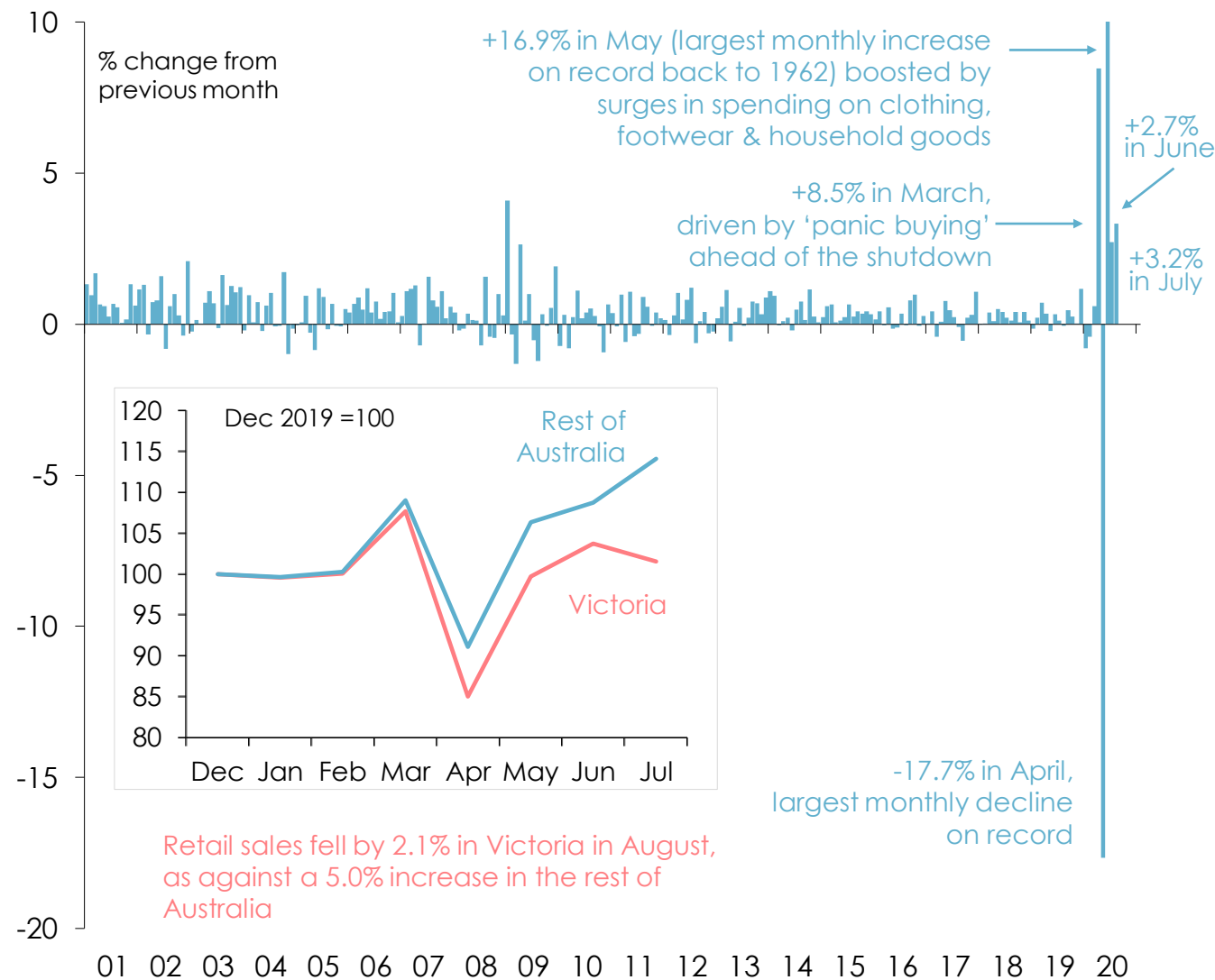
## Consumer confidence



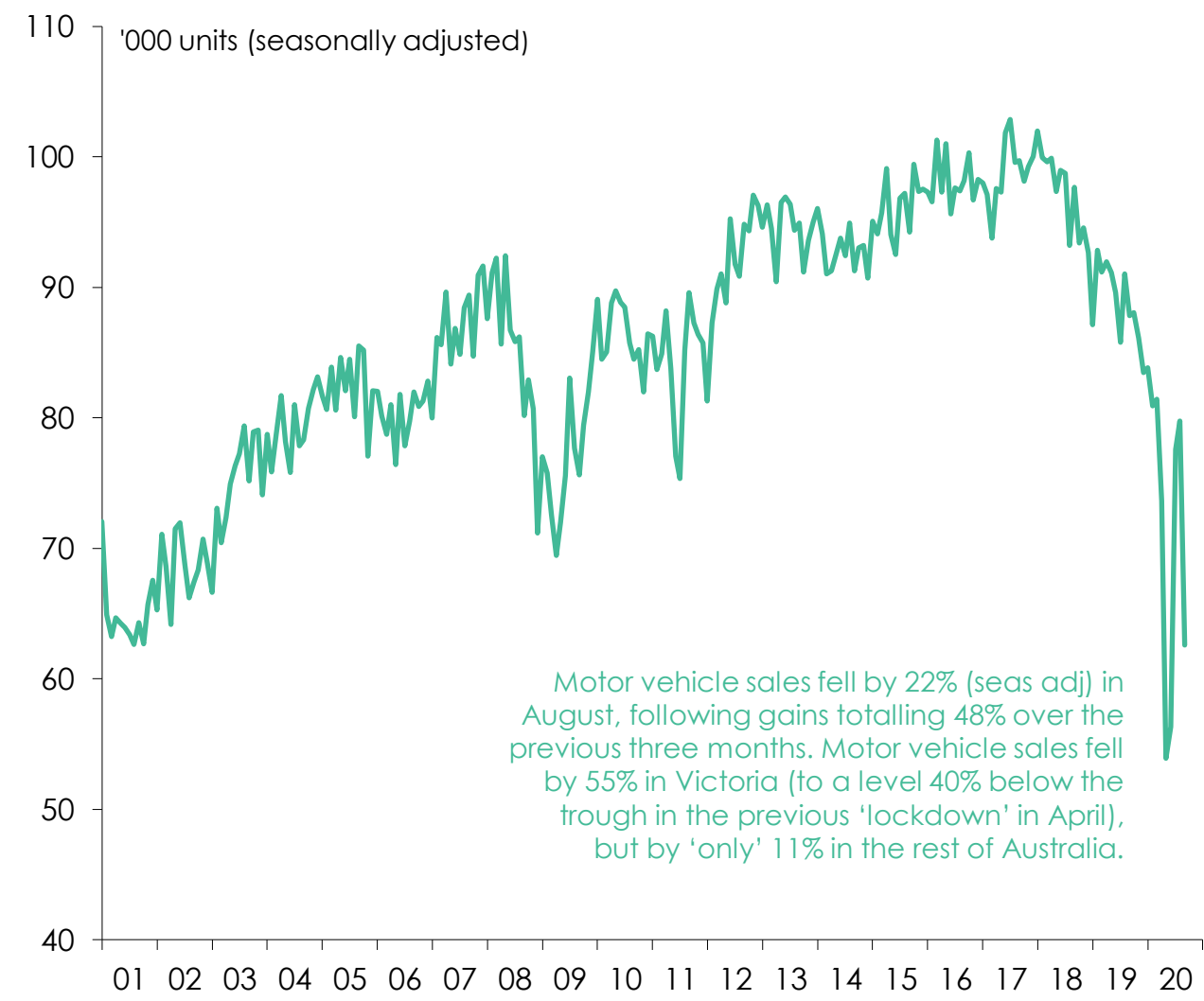
Sources: National Australia Bank; Westpac-Melbourne Institute; ANZ-Roy Morgan (weekly index). See [slide 61](#) for other components of the NAB monthly business survey from which the business confidence figure is derived. September business confidence data will be released on 5<sup>th</sup> October, and October business confidence on 7<sup>th</sup> October.

# Retail sales rose 3.2% in July (despite a 2% fall in Victoria), while motor vehicle sales fell 22% in August (dragged down by a 55% slump in Victoria)

## Retail sales



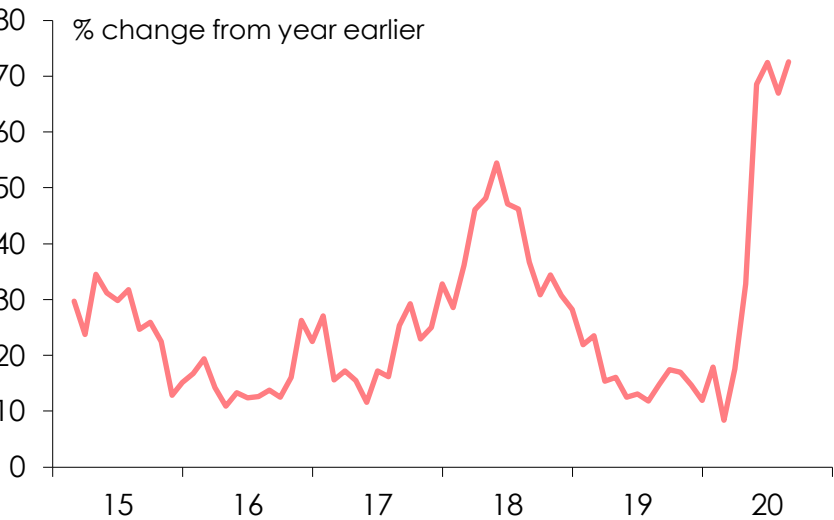
## Motor vehicle sales



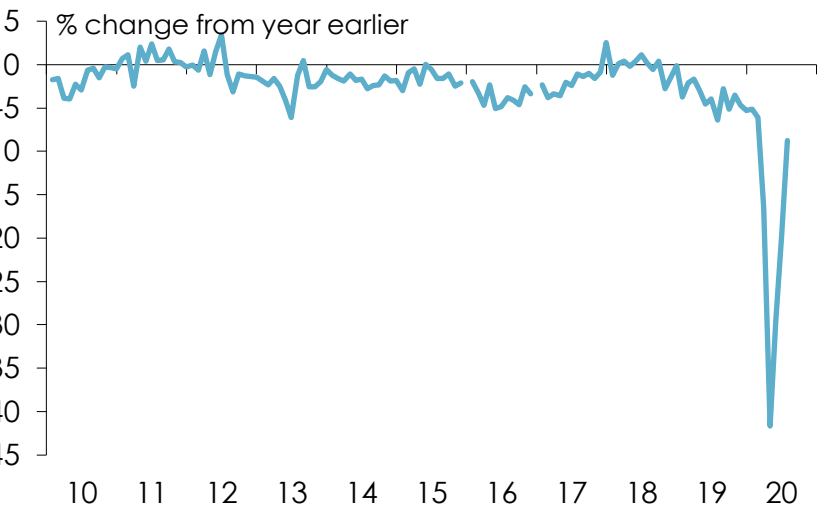
Sources: ABS, [Retail Trade, Australia](#); Federal Chamber of Automotive Industries [VFACTS](#) (seasonal adjustment of FCAI data by Corinna). Retail sales data are up to July and motor vehicle sales to August. Preliminary retail sales data for August will be released on 23<sup>rd</sup> September, and final data on 2<sup>nd</sup> October; September motor vehicle sales data will be released on or around 5<sup>th</sup> October.

# The pandemic and lockdown prompted some dramatic changes in how Australians made payments, accelerating trends already under way

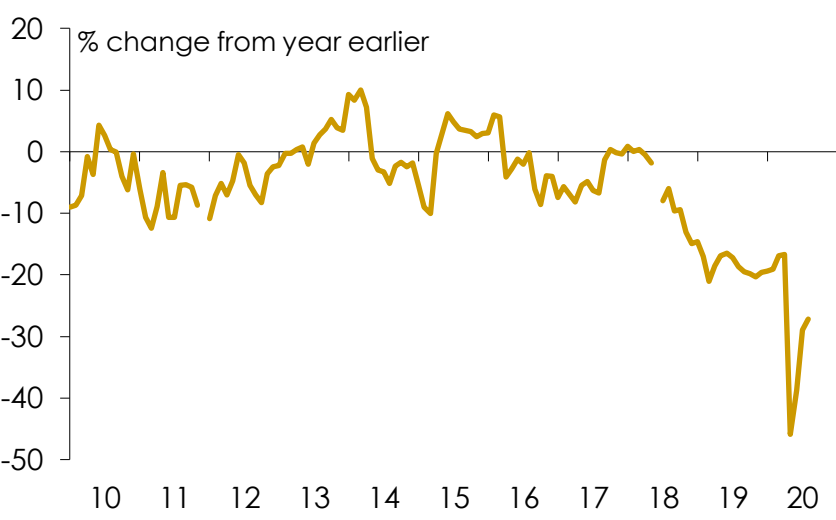
## Growth in online retail sales



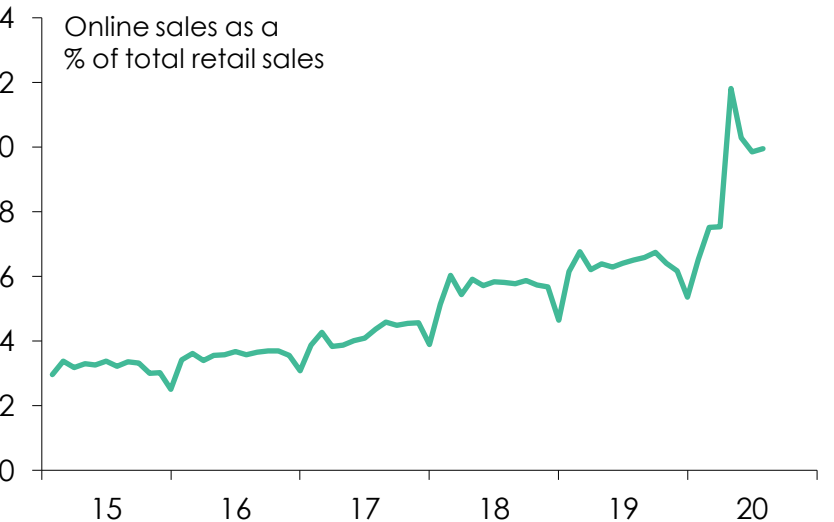
## ATM cash withdrawals



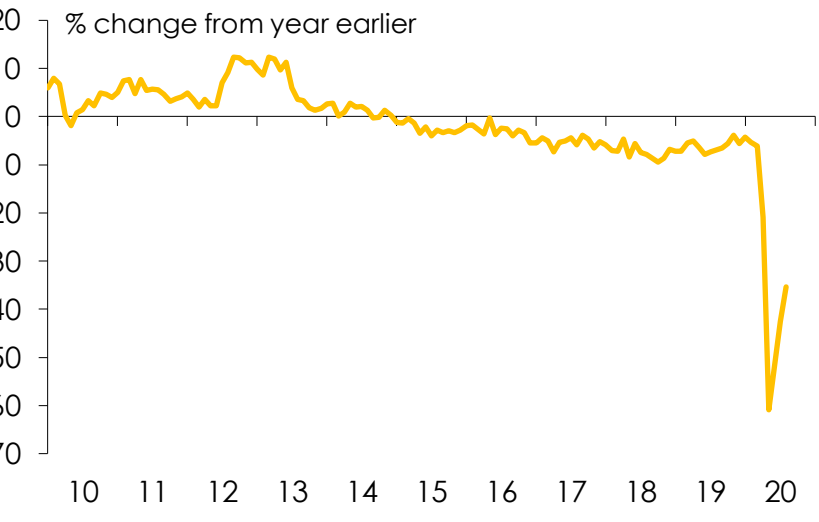
## Credit card cash advances



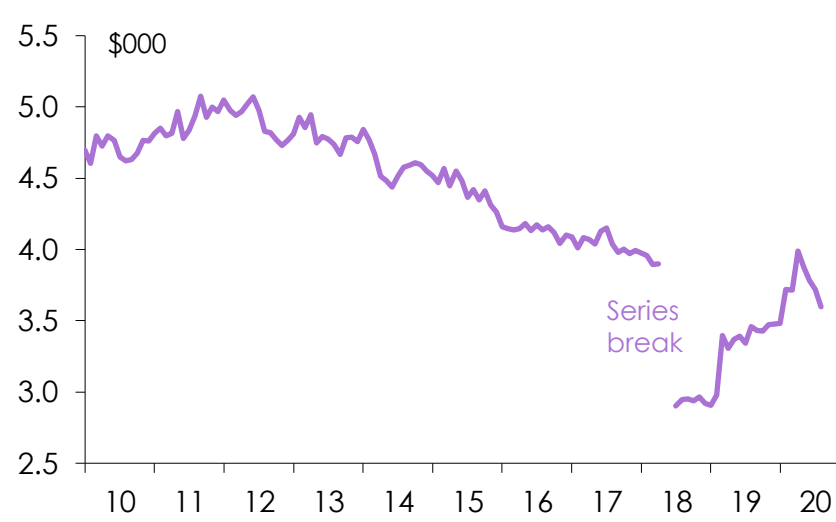
## Online retail 'market share'



## Debit card cash-outs



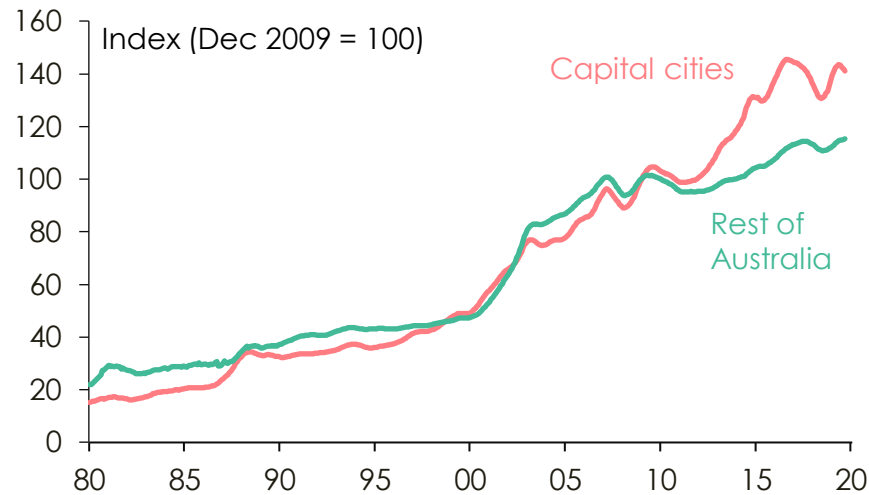
## Direct entry payments



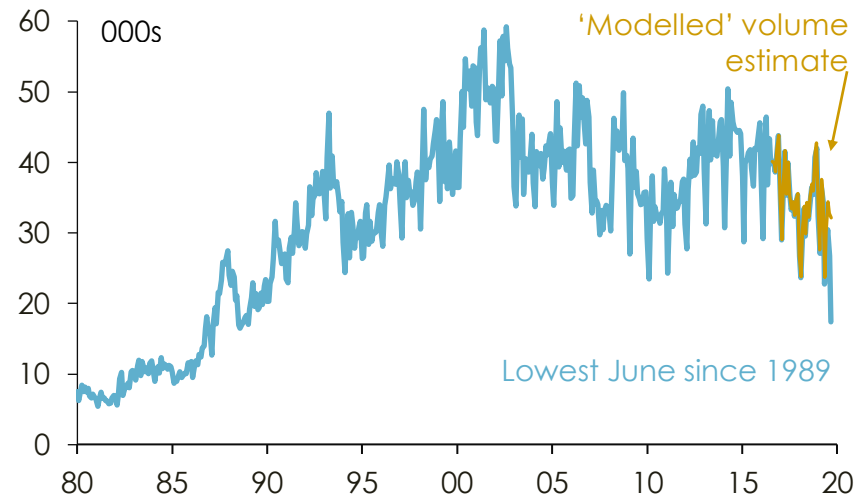
Sources: ABS, [Retail Trade, Australia](#); RBA, [Statistical Tables](#), C1, C2, C4 and C6. Latest data are for July; online retail sales data for August will be released on 2<sup>nd</sup> October, and payments system data for August on 8<sup>th</sup> October.

# Property prices fell by an average of 1.3% from April to August, on thin volumes, with bigger falls in cities than regions, and in 'top tier' properties

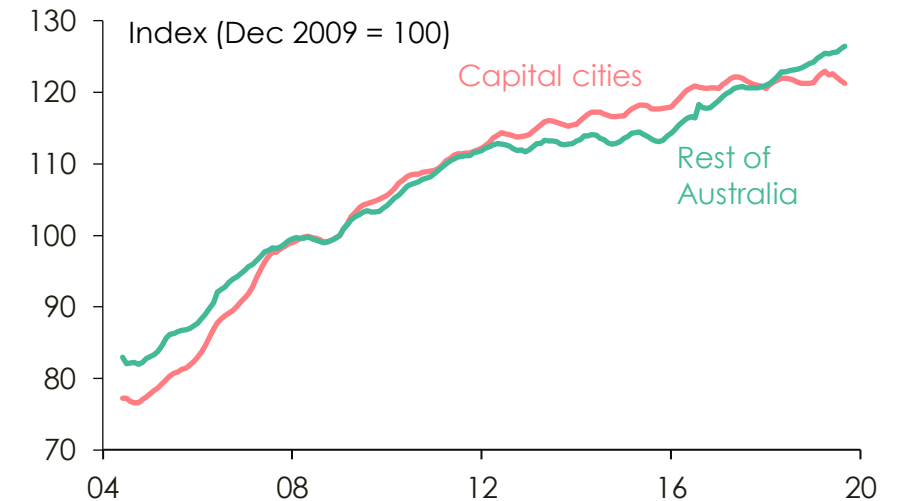
## Residential property prices



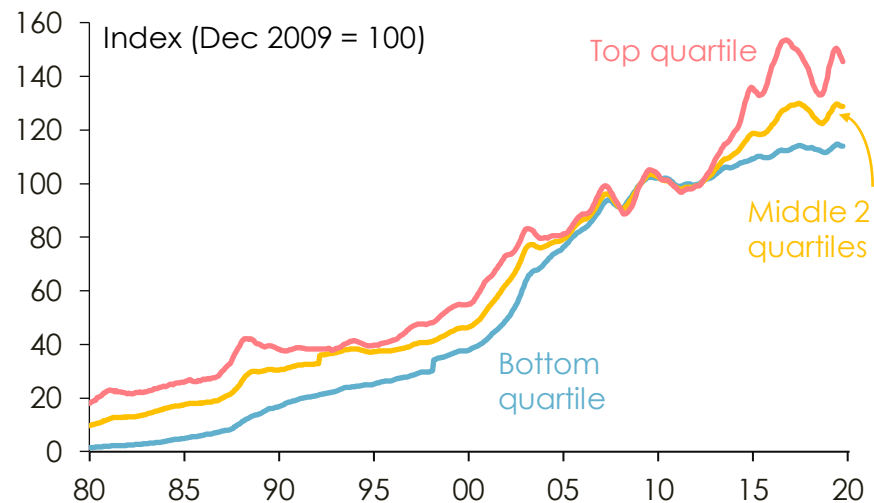
## Residential property sales volumes



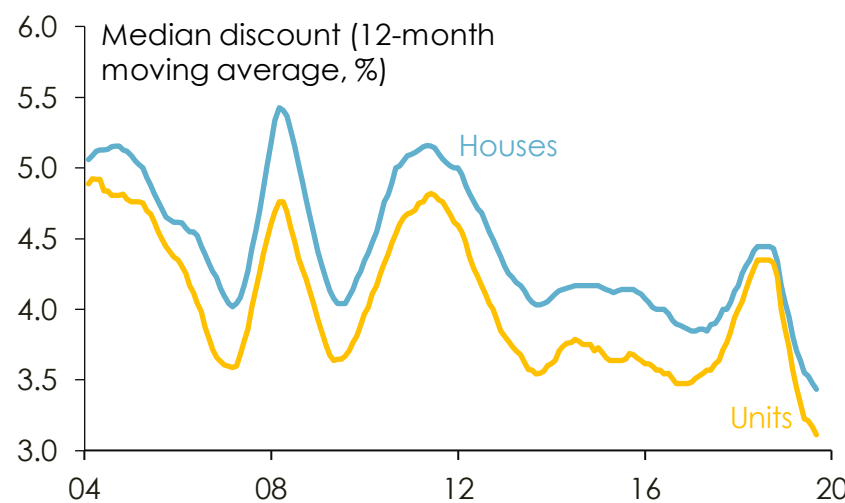
## Residential rents



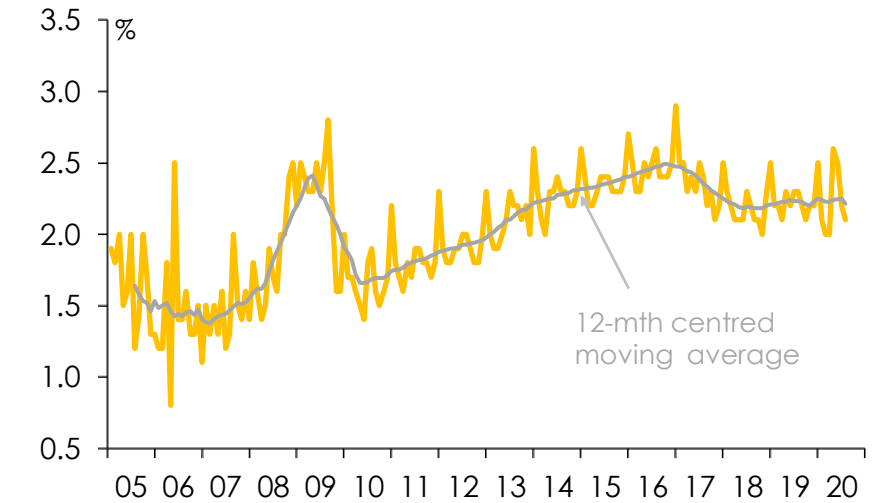
## Property prices by tier



## Vendor discounting



## Capital city rental vacancy rates

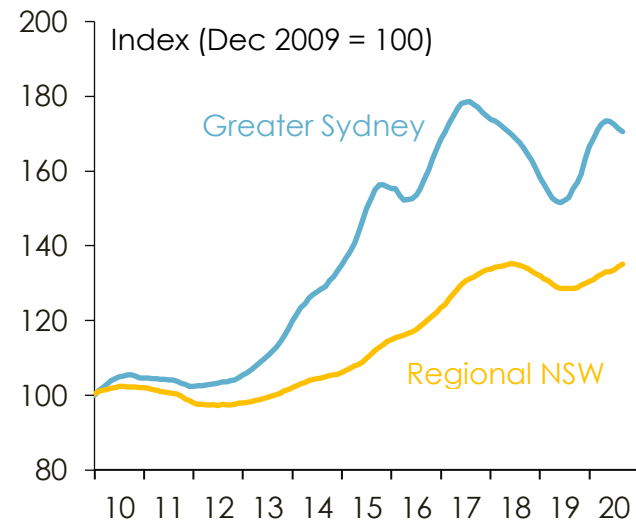


Note: The index of property prices measures the 'organic' change in underlying sales values by using a hedonic regression methodology that takes account of changes in the characteristics of properties being sold from month to month. Property price data are now seasonally adjusted. The index of residential rents uses a similar methodology to measure the 'organic' change in underlying rents. The 'modelled' sales volume estimates seek to account for delays in receiving information on transactions that have yet to settle (which can be more than six weeks after the contract date). Latest data are for August 2020; September data will be released on 1<sup>st</sup> October

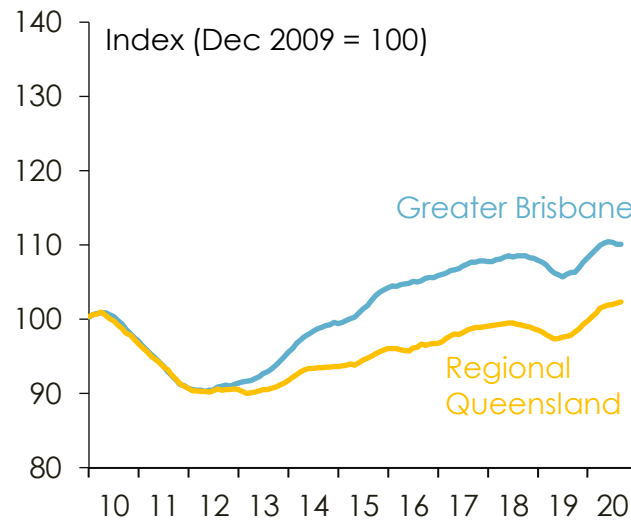
Sources: [CoreLogic](#); [SQM Research](#).

# Property prices have fallen more in regional WA, Melbourne, Sydney and Perth since March than elsewhere, and have risen in Adelaide and Hobart

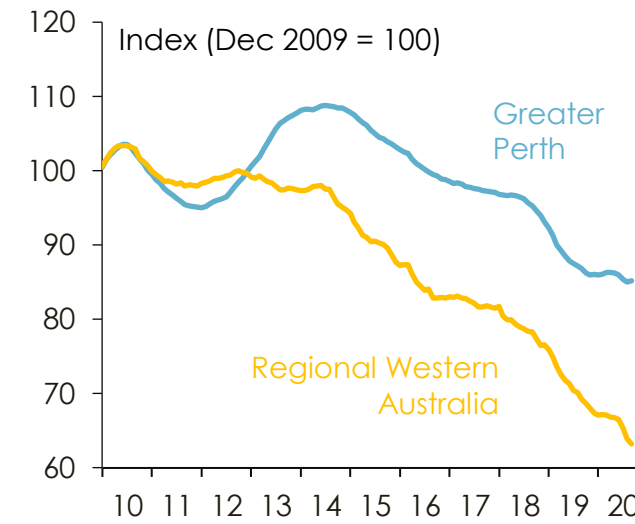
## New South Wales



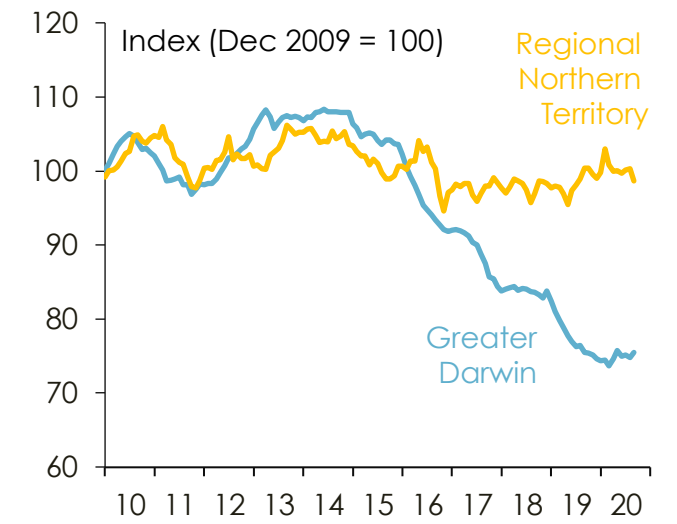
## Queensland



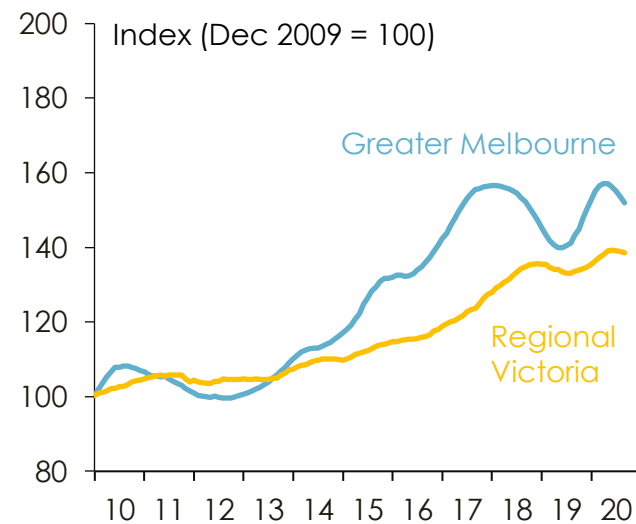
## Western Australia



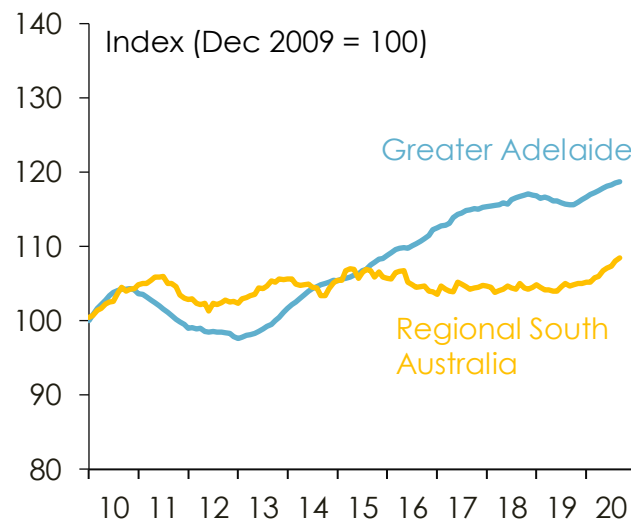
## Northern Territory



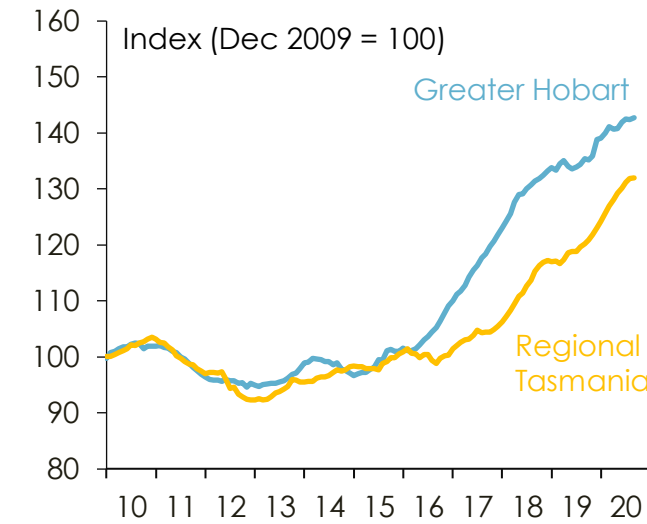
## Victoria



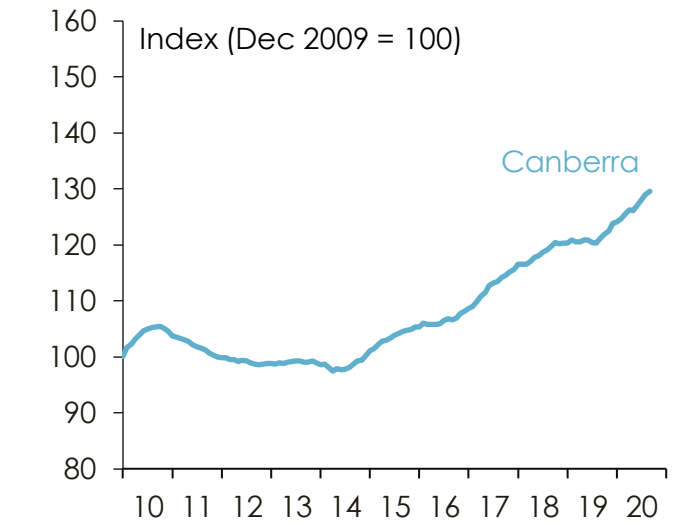
## South Australia



## Tasmania



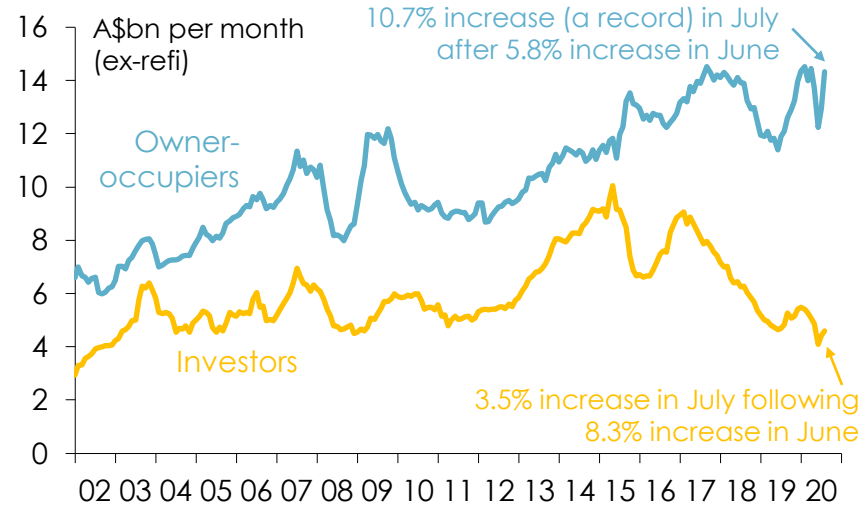
## Australian Capital Territory



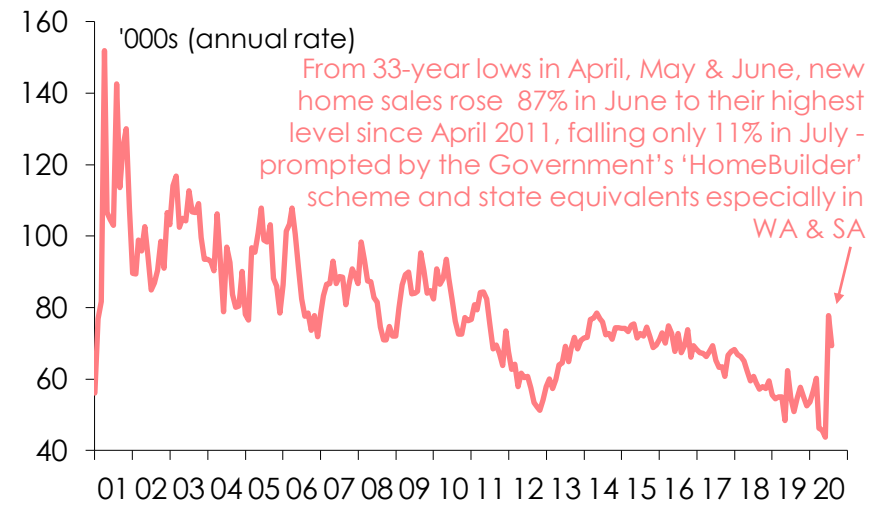
Note: The index of property prices measures the 'organic' change in underlying sales values by using a hedonic regression methodology that takes account of changes in the characteristics of properties being sold from month to month. Property price data are now seasonally adjusted. Latest data are for August 2020; September data will be released on 1<sup>st</sup> October. Source: [CoreLogic](#).

# Residential building activity will likely turn down over the next few months and longer-term will be adversely affected by sharply lower immigration

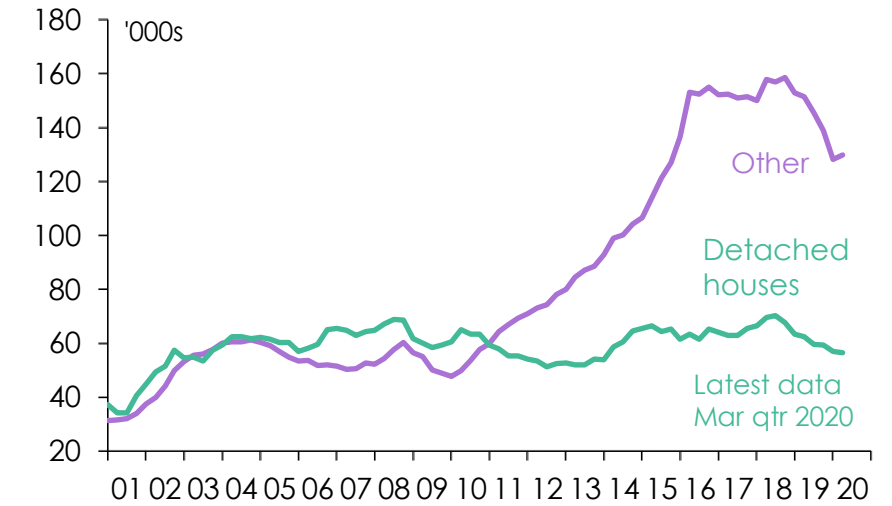
## Housing finance commitments



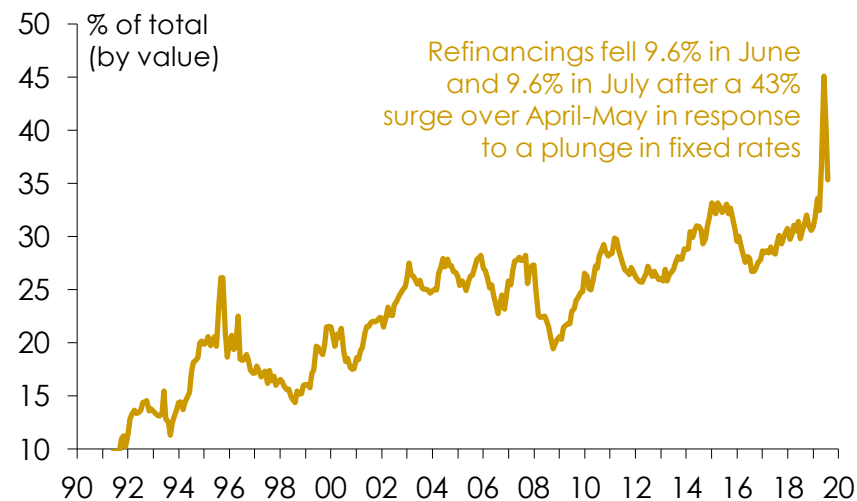
## Large builders' new home sales



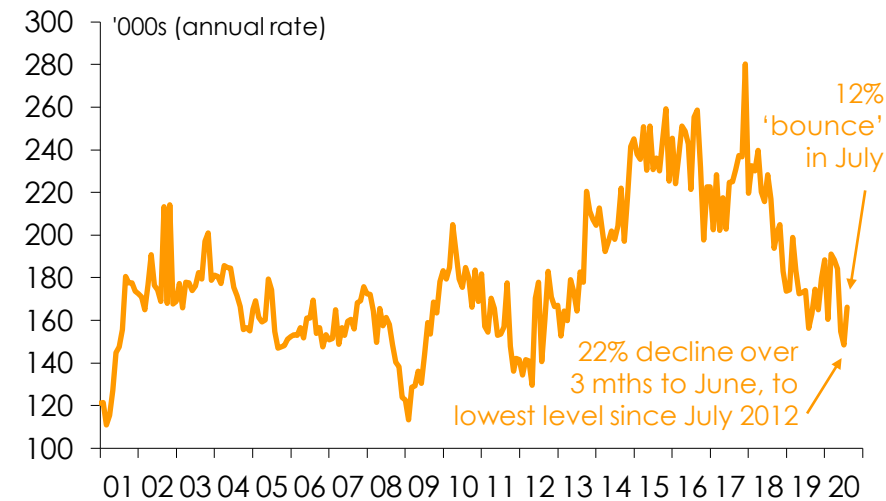
## Dwellings under construction



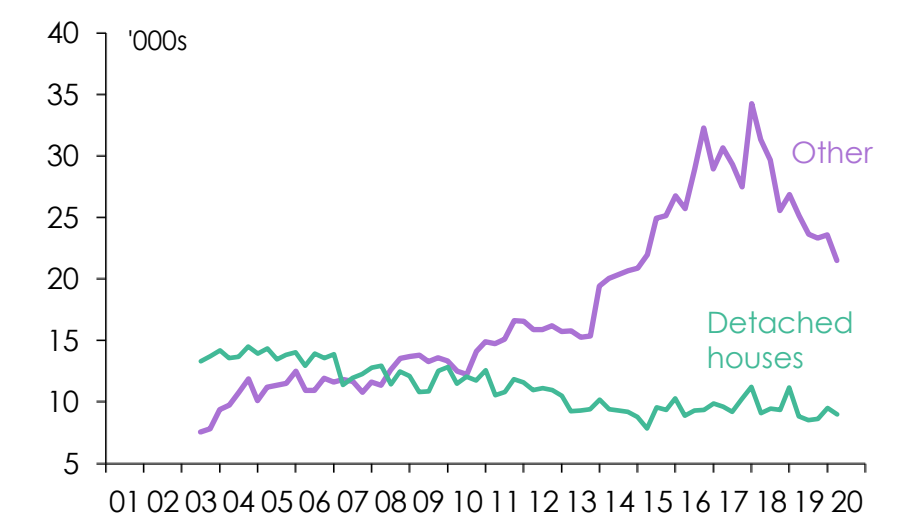
## Refinancings as pc of total



## Residential building approvals



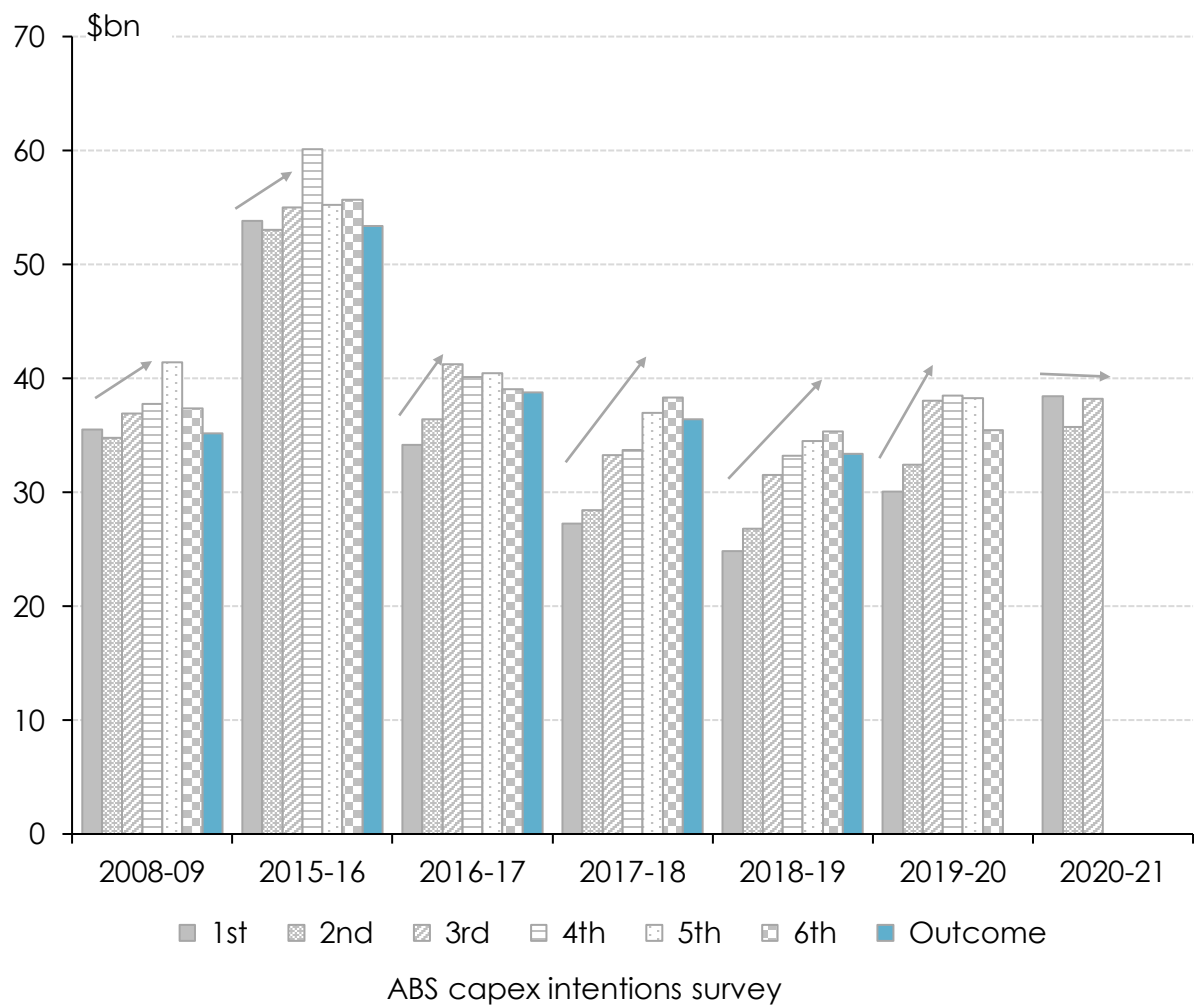
## 'Pipeline' of work yet to be done



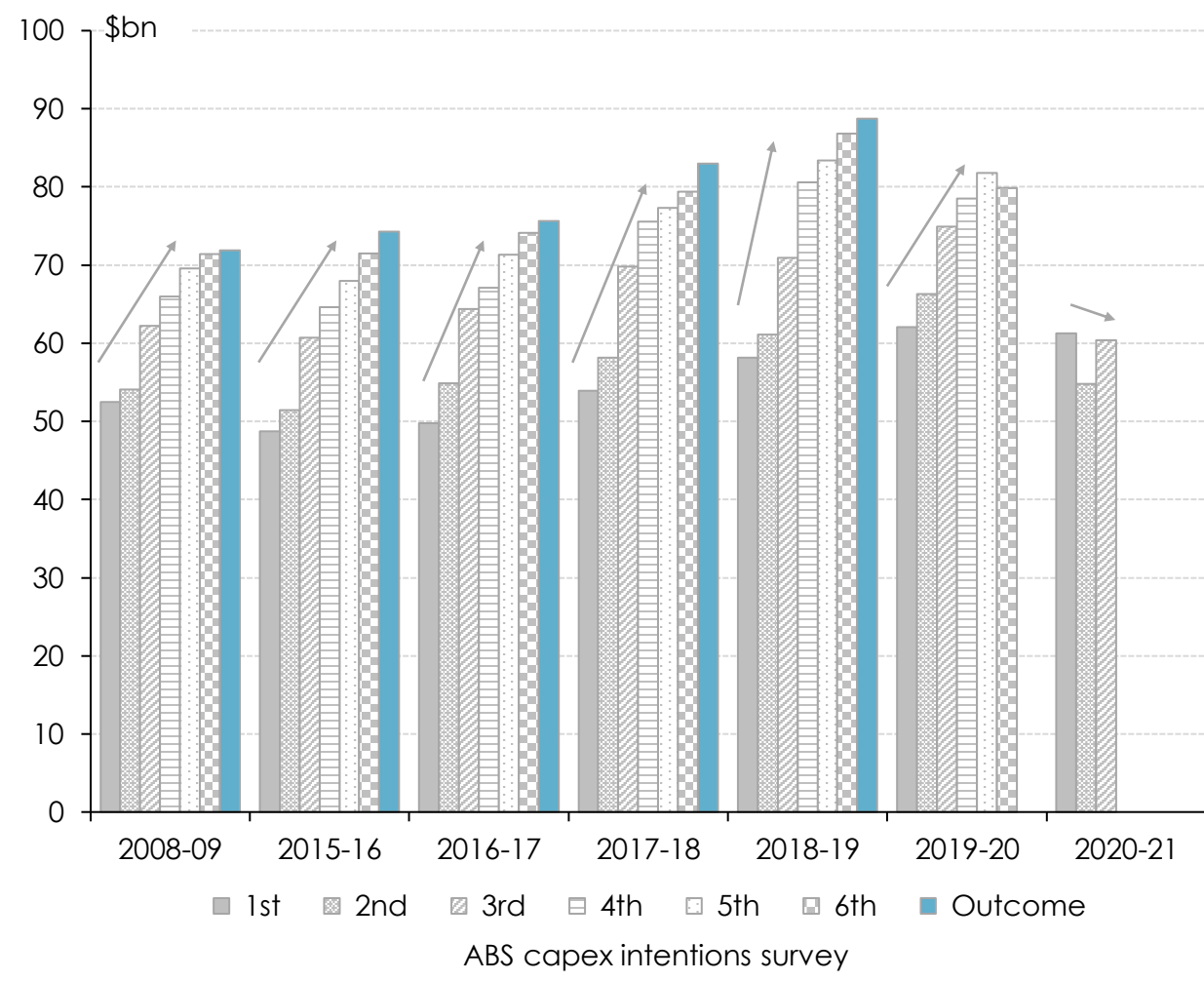
Note: 'New home sales' are of detached dwellings only and exclude small-scale builders. Sources: ABS; Housing Industry Association. August residential building approvals will be released on 30<sup>th</sup> September; August housing finance commitments on 9<sup>th</sup> October; and June quarter dwellings under construction and 'pipeline' data on 14<sup>th</sup> October.

# Business capex intentions for the current financial year are lower than they were six months ago – for the first time in at least 33 years

Capital expenditure intentions - mining



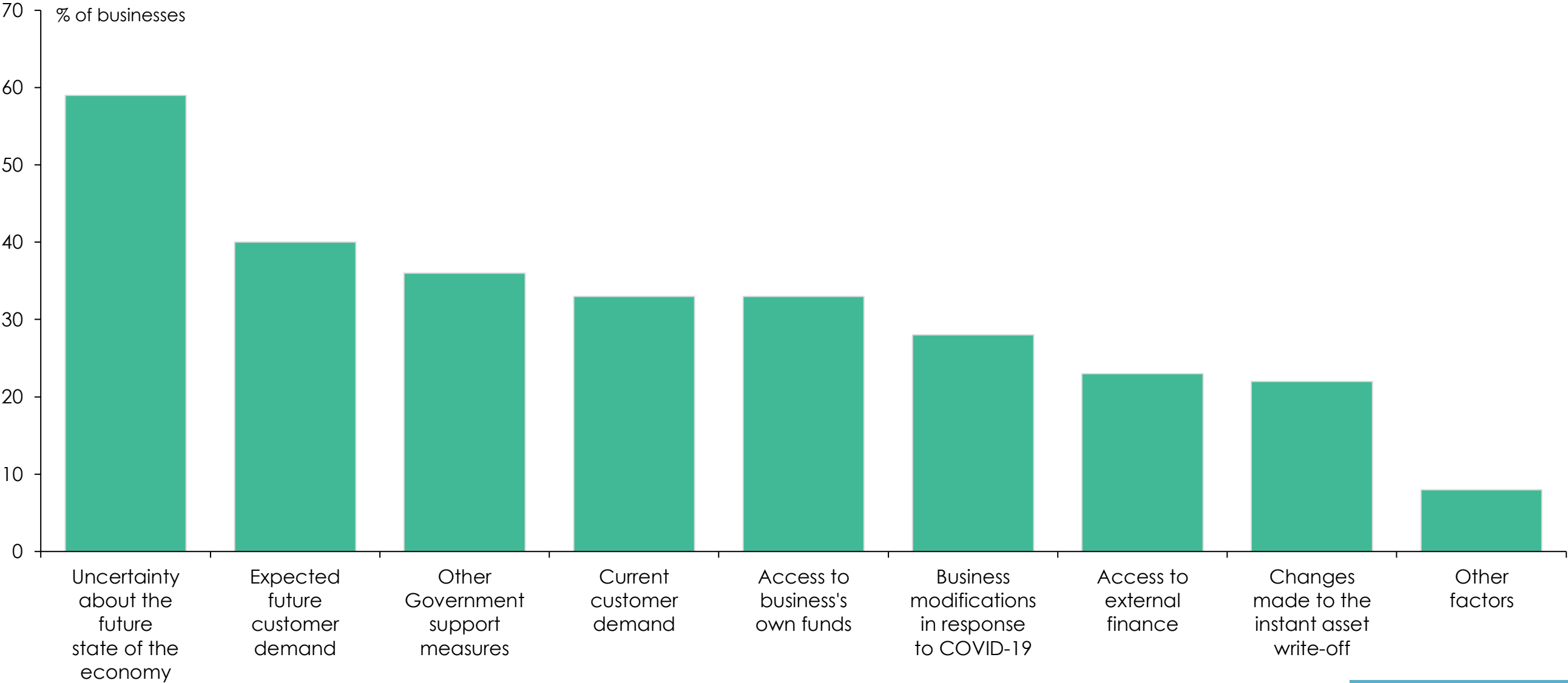
Capital expenditure intentions – non-mining



Note: The ABS conducts six surveys of business' capital expenditure intentions in respect of each financial year. The first is conducted in January & February prior to the commencement of the financial year, the second in May & June, the third in July & August of the financial year, the fourth in October & November, the fifth in January & February of the financial year, and the sixth in May & June. The outcome (actual capital expenditure in the financial year) is determined from the survey taken in July & August after the end of the financial year. The survey excludes businesses in the agriculture, forestry & fishing; and public administration and safety sectors, and also superannuation funds. The education & training, and health care & social assistance sectors have been included in the surveys since December 2019 but are not included in the above charts (to assist in comparisons). Source: ABS, [Private New Capital Expenditure and Expected Expenditure, Australia](#) (next update 26<sup>th</sup> November).

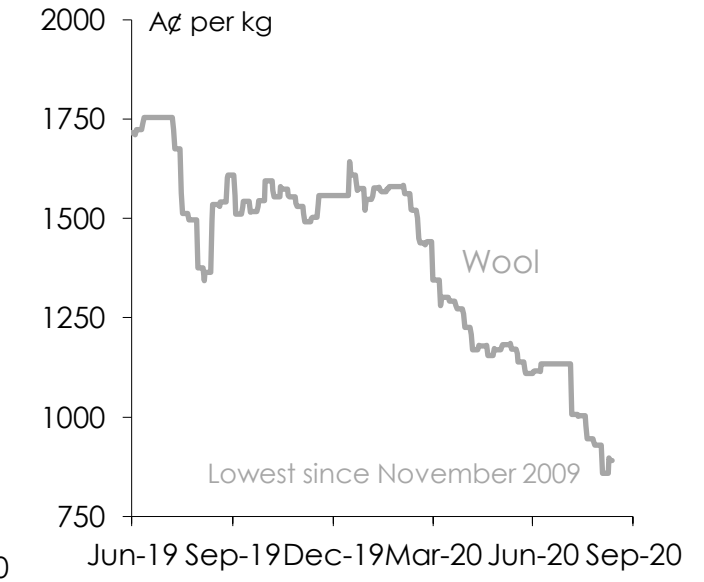
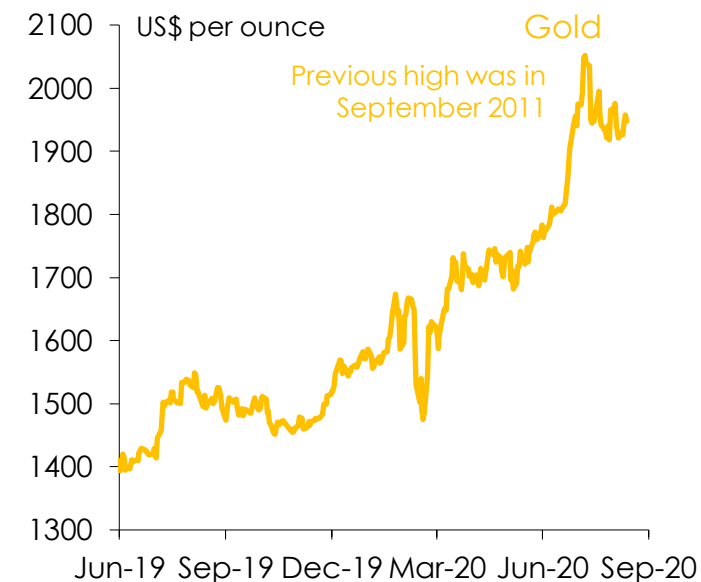
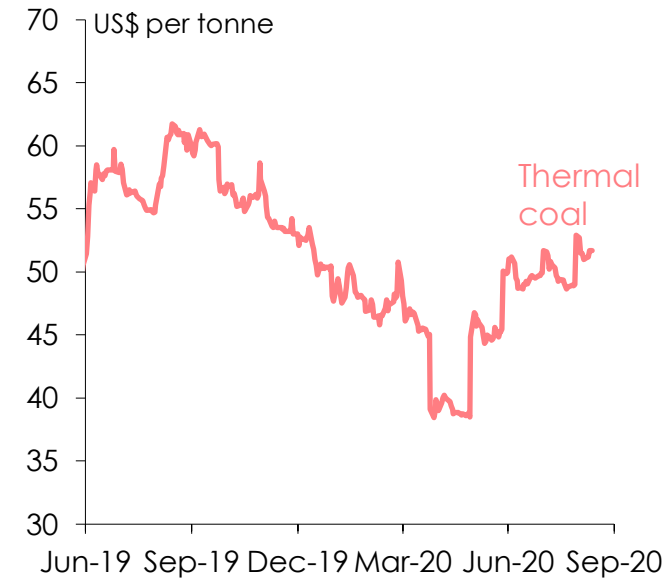
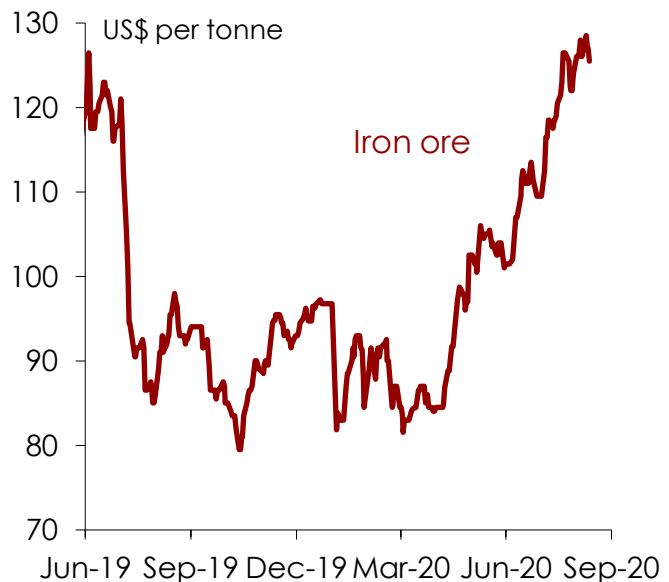
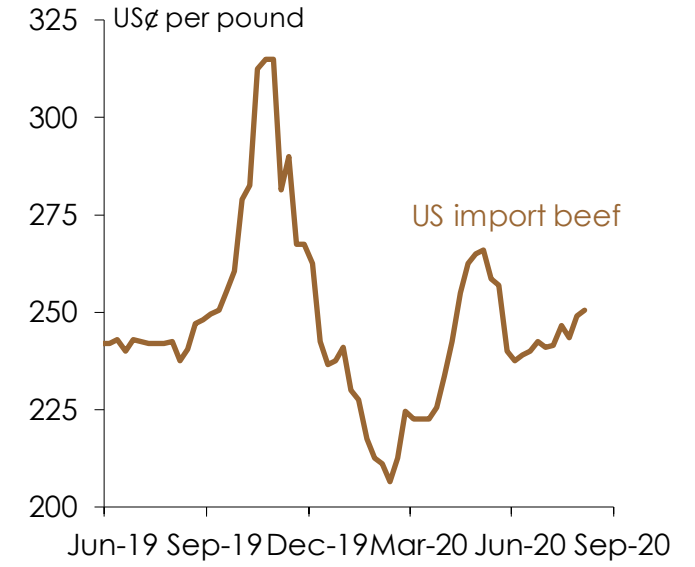
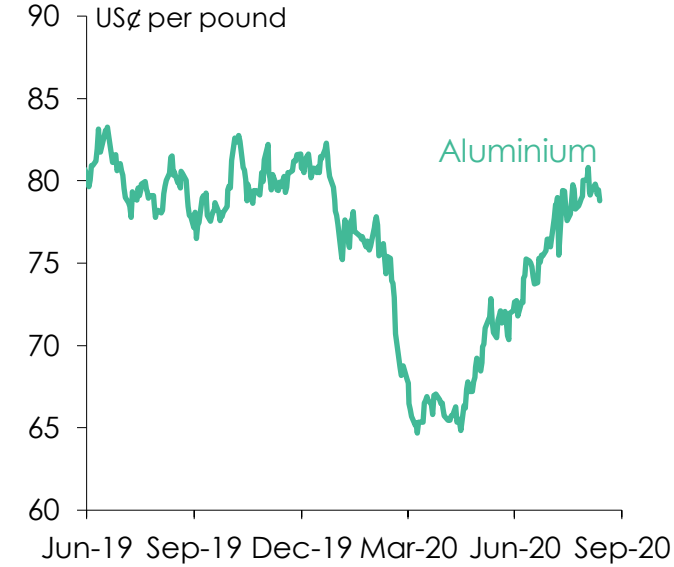
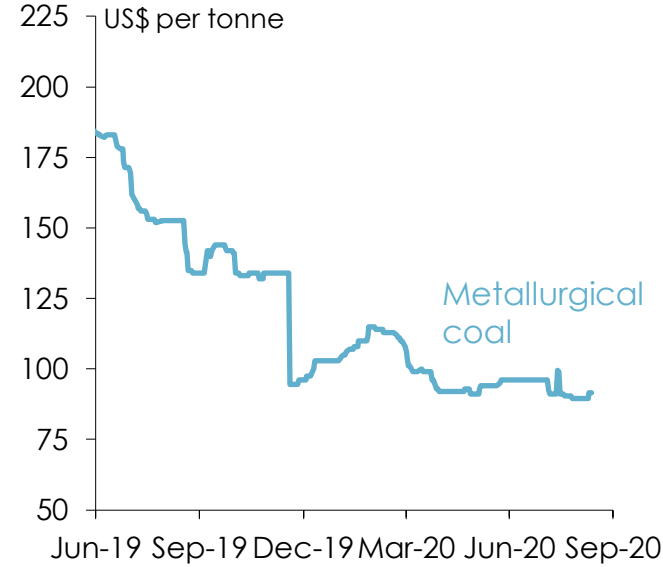
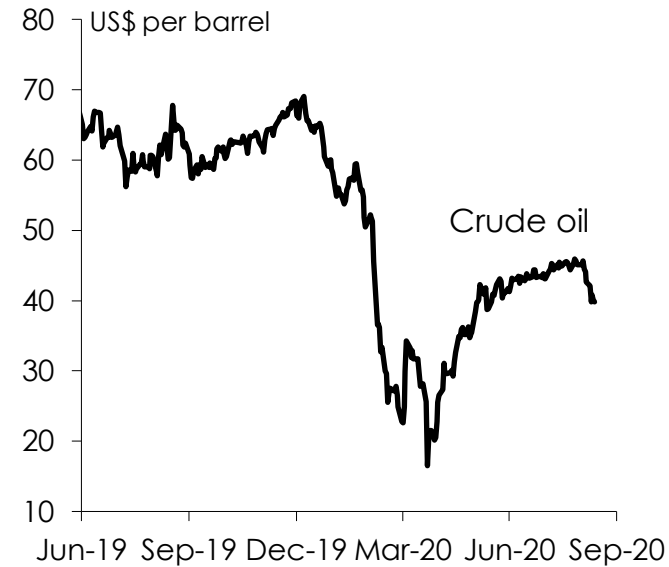
# Uncertainty about the economic outlook is the most important factor weighing on business capex decisions

Significant factors affecting business capital expenditure decisions, by industry, August 2020



Source: ABS, [Business Impacts of Covid-19](#), August 2020 (based on survey conducted between 12<sup>th</sup> and 19<sup>th</sup> August).

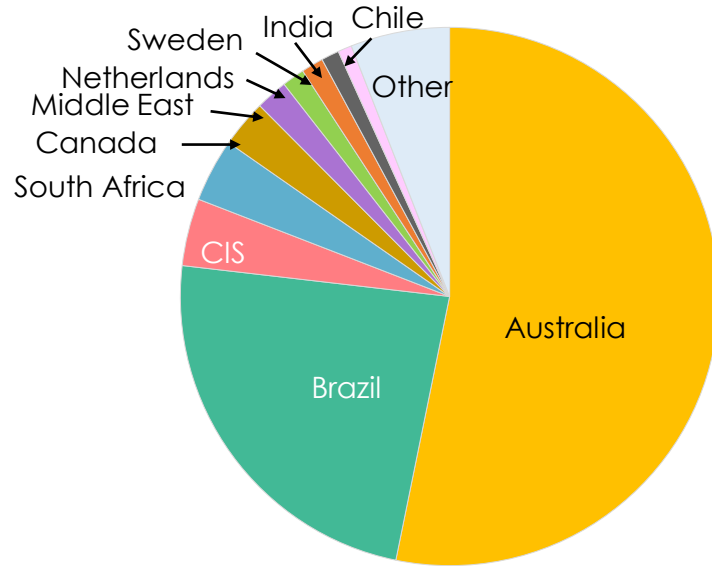
# Oil prices fell ~12% last week, and most other commodities were also a bit lower – though iron ore & gold remain high by historical standards



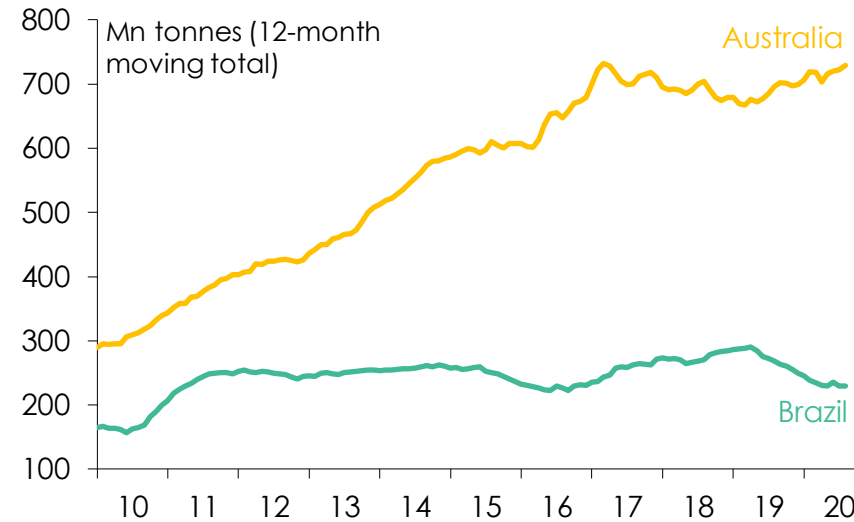
Sources: Refinitiv Datastream; Meat & Livestock Australia; Australian Wool Innovation. See [next slide](#) for more on iron ore prices. Data up to 11<sup>th</sup> September.

# The resilience of iron ore prices stems from strong Chinese demand, declining Chinese production and constraints on Brazilian exports

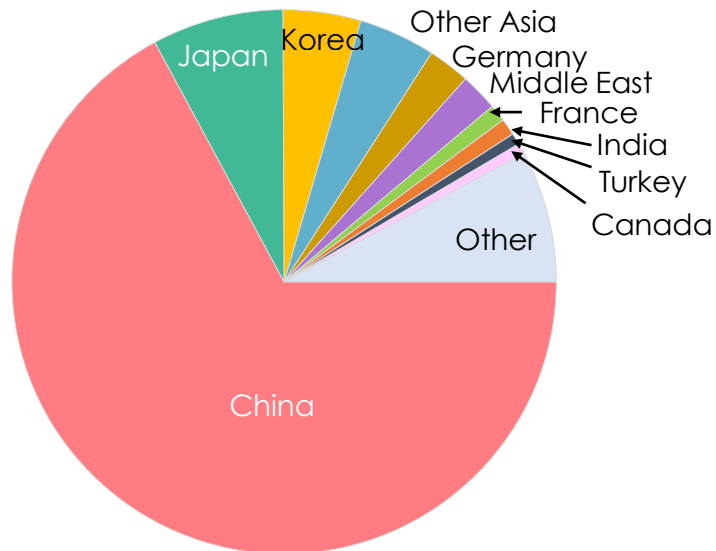
## Iron ore exports, 2018



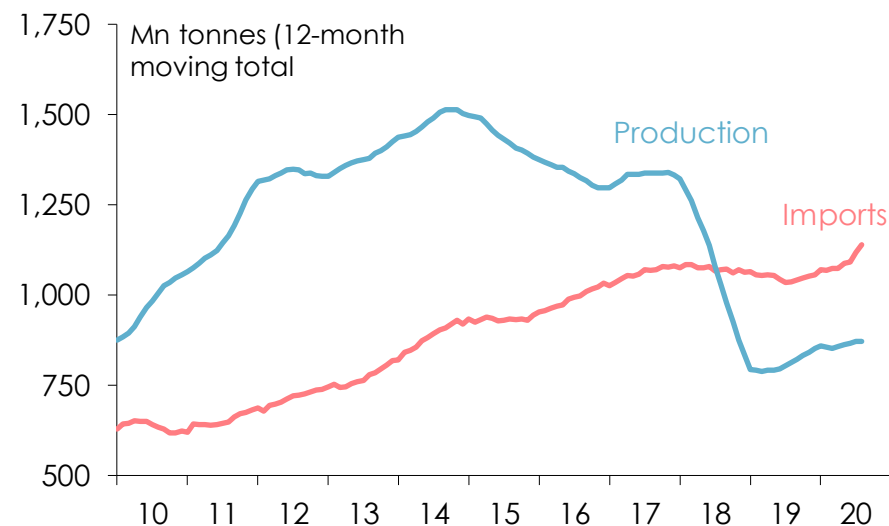
## Australia & Brazil iron ore exports



## Iron ore imports, 2018



## China iron ore production & imports

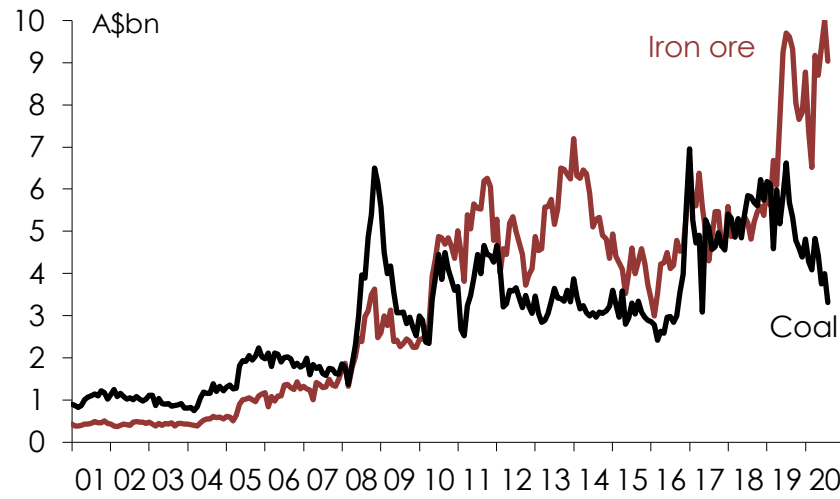


- ❑ The global seaborne iron ore trade is dominated by shipments from Australia & Brazil to China (which accounts for 53% of global steel production and 51% of steel use)
- ❑ Chinese iron ore production has fallen by more than 34% since 2017, largely because of rapidly declining quality – forcing Chinese steel mills to become more dependent on imports
- ❑ Brazilian production and exports have been curtailed by a series of tailing dam collapses over the past five years, and more recently by Covid-19 outbreaks at four large mine sites
- ❑ China is seeking to develop other sources in West Africa although there are big logistical hurdles to be overcome there
- ❑ BHP said this week that iron ore prices “can be expected to ease as Brazilian supply recovers” and that “in the second half of the 2020s, China’s demand for iron ore is expected to be lower than today as crude steel production plateaus and the scrap-to-steel ratio rises”

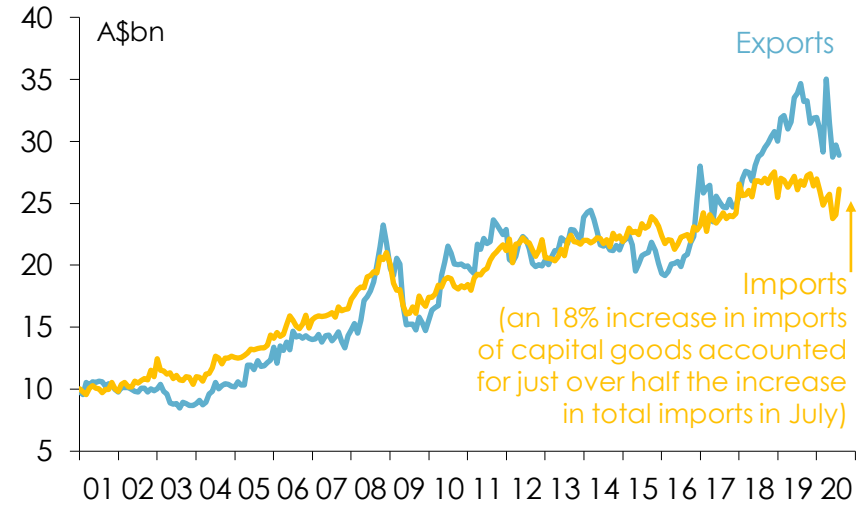
Note: Export volume data for Australia and Brazil derived by dividing export values (in US\$) from ABS and IGBE by the average US\$ price of Chinese iron ore imports.  
Sources: World Steel Association; China National Bureau of Statistics; China General Administration of Customs; Refinitiv Datastream; ABS; IGBE; BHP; Corinna.

# Australia's merchandise trade surplus fell by 52% in August to its smallest since last August 2018, with exports down 2¾% and imports up 8½%

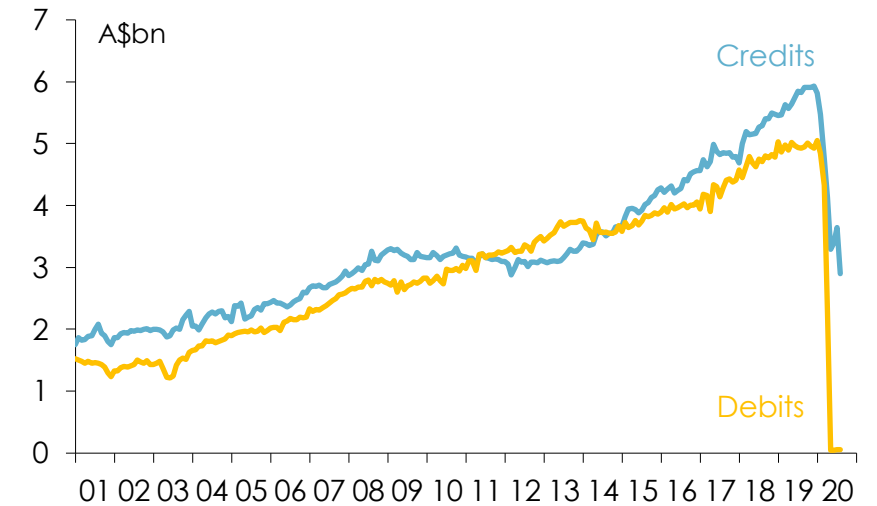
## Iron ore and coal exports



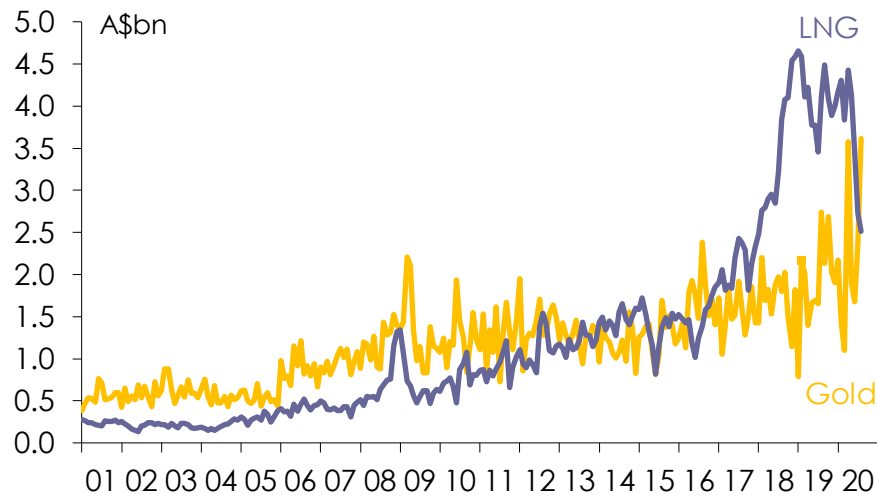
## Merchandise exports and imports



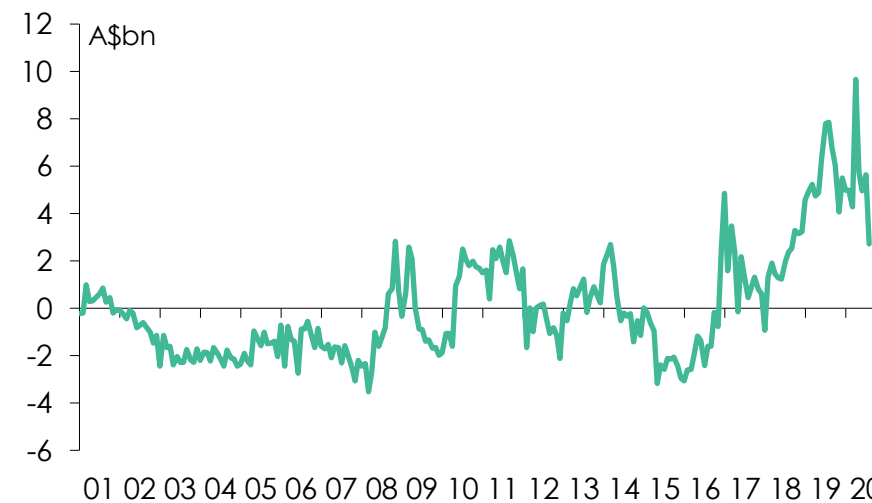
## Tourism-related services trade



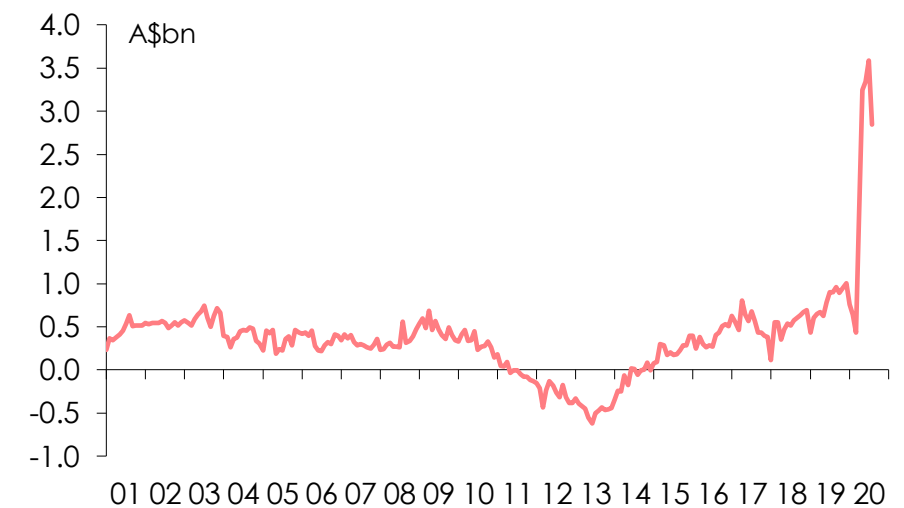
## LNG and gold exports



## Merchandise trade balance



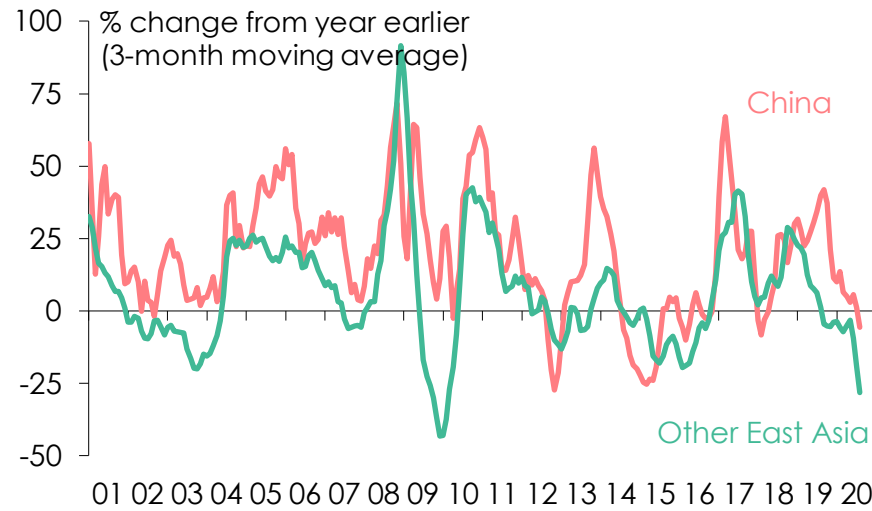
## Tourism services trade balance



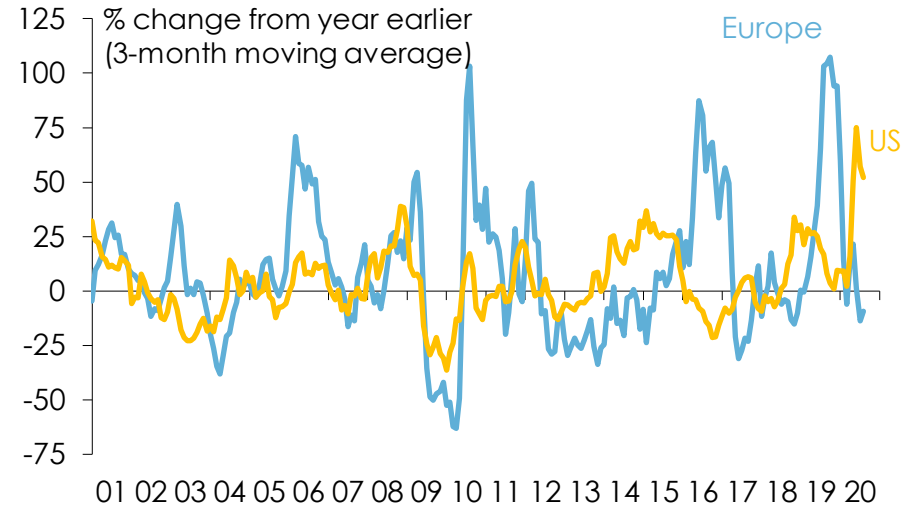
Source: ABS, [International Trade in Goods and Services, Australia](#). Latest data are for July: August data will be released on 6<sup>th</sup> October.

# Despite strong iron ore exports, Australia's exports to China are now below year-earlier levels, as are exports to other markets (apart from the US)

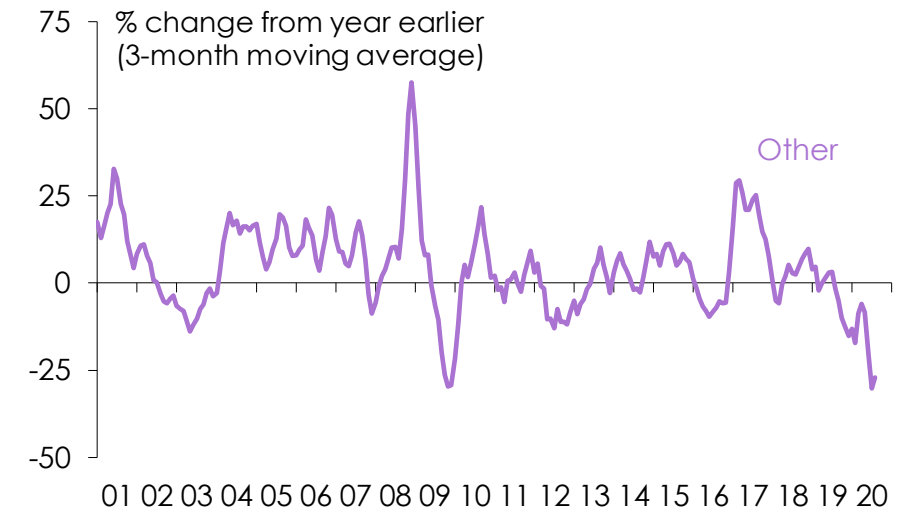
## Merchandise exports – East Asia



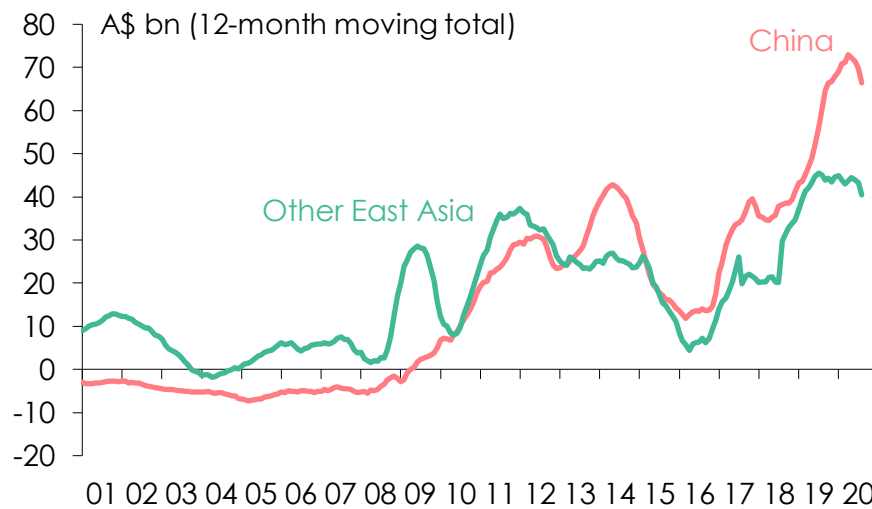
## Merchandise exports – US & Europe



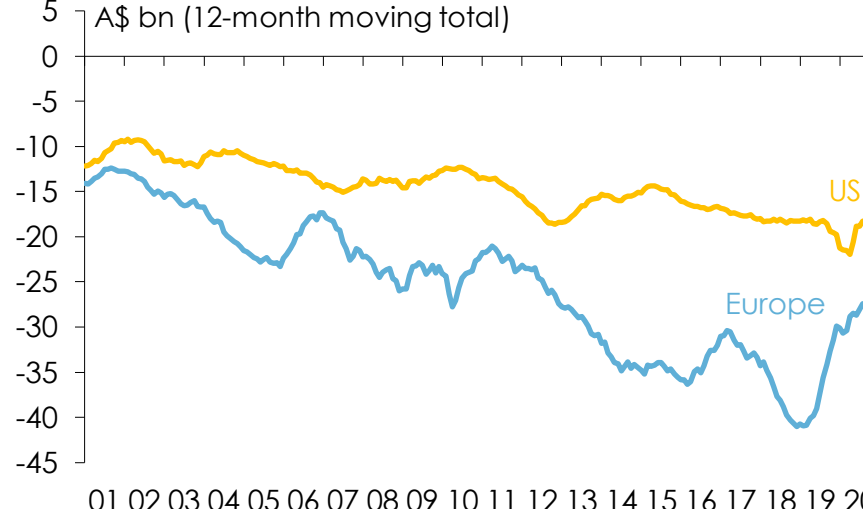
## Merchandise exports – other



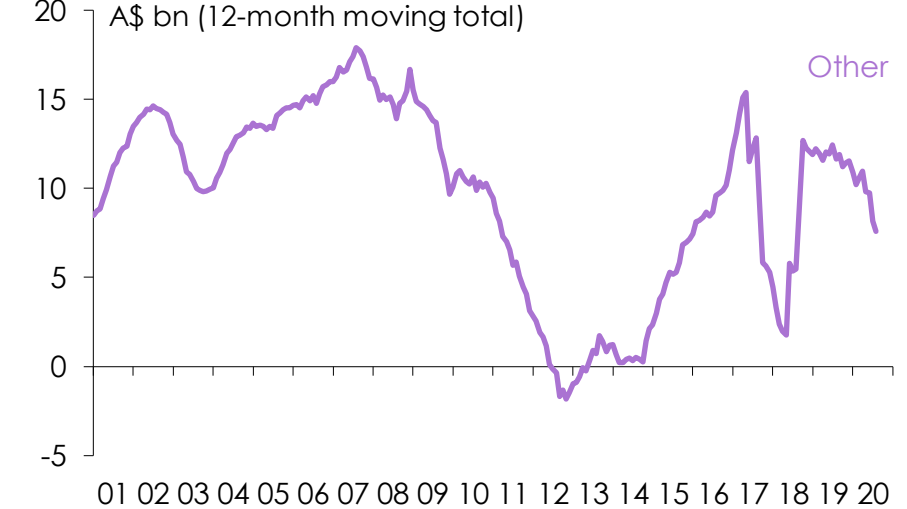
## Goods trade balance – East Asia



## Goods trade balance – US & Europe



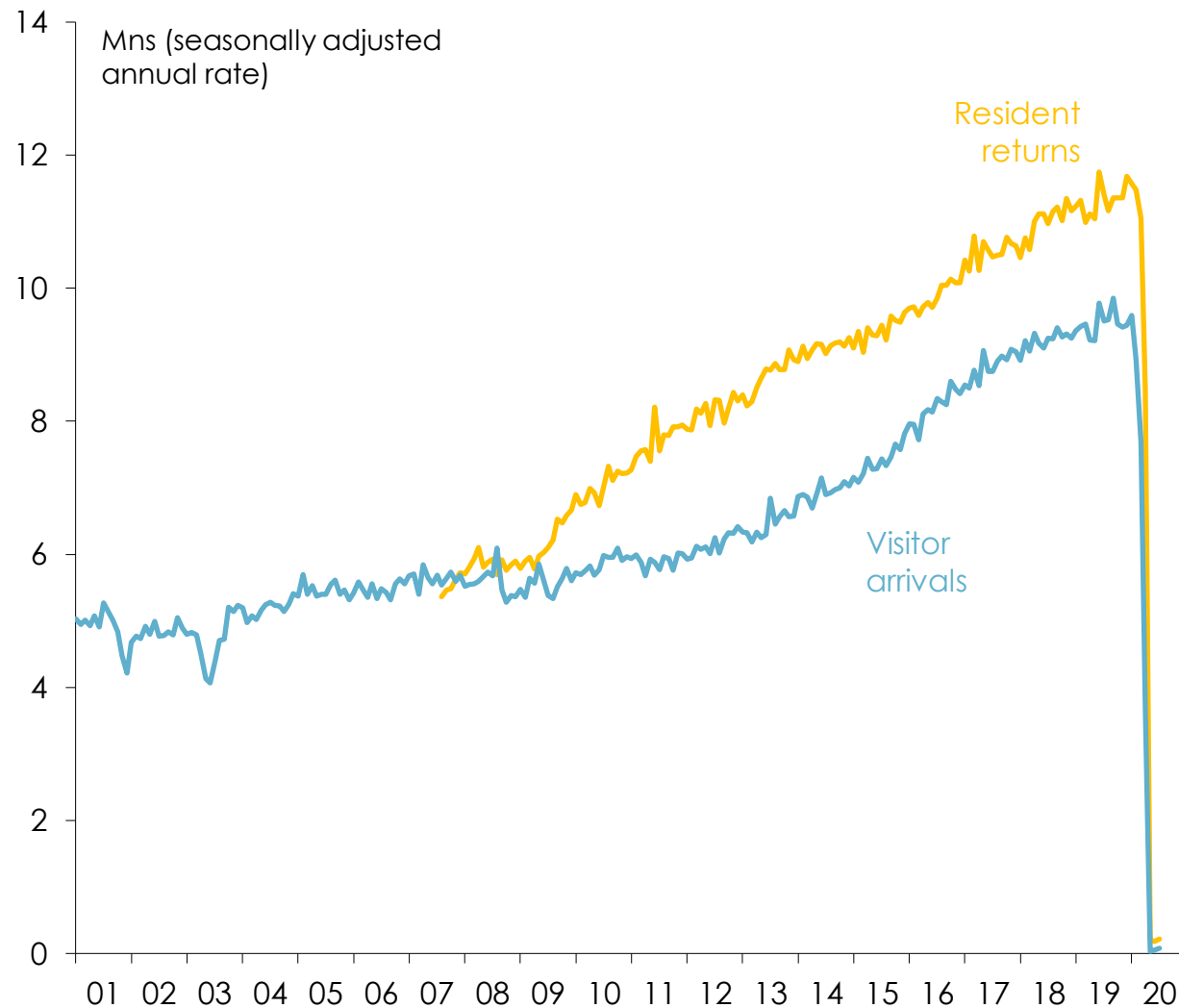
## Goods trade balance – other



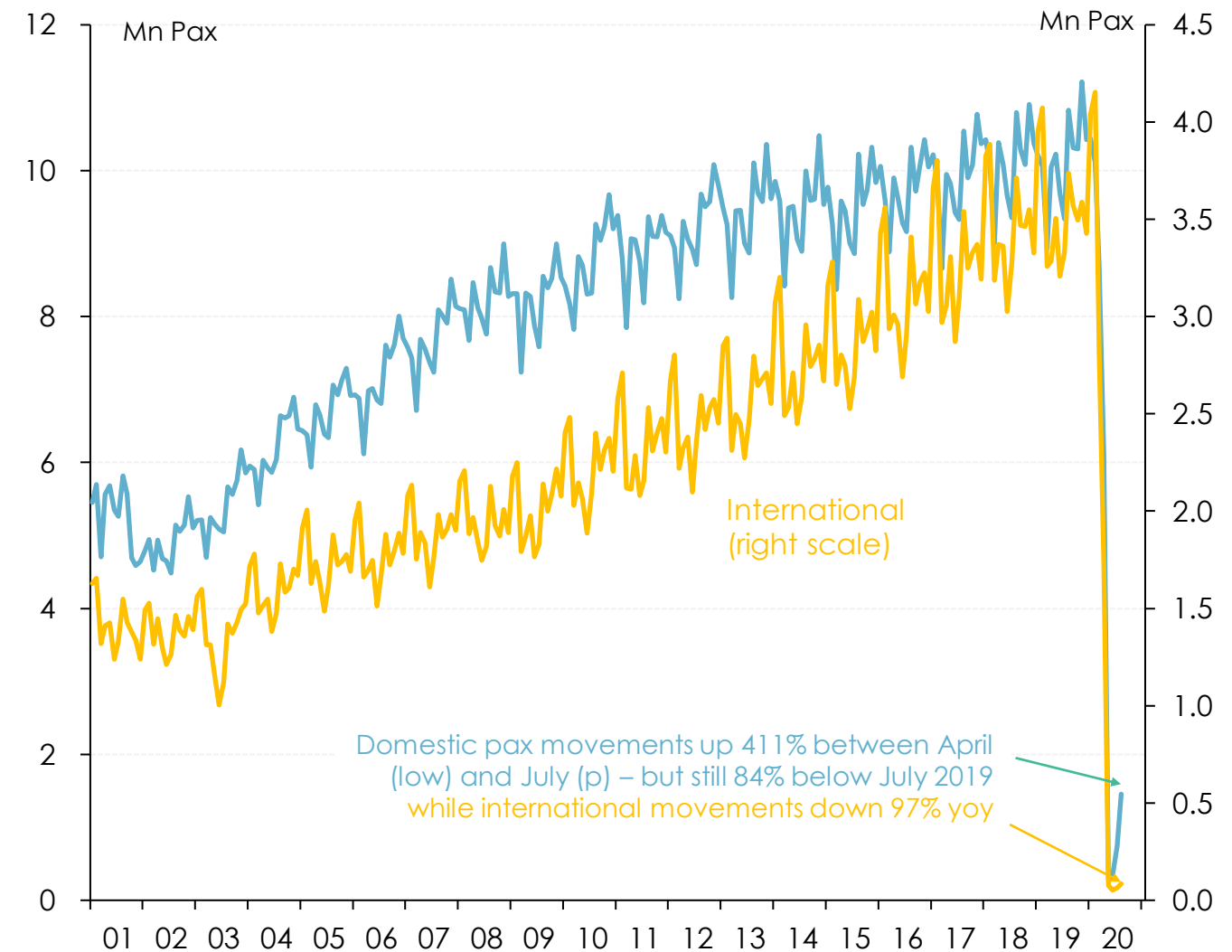
Note: 'Other East Asia' includes Japan, Korea, Taiwan, Hong Kong and ASEAN. 'Europe' includes the EU, UK and Switzerland. 'Other' includes India, New Zealand and the Pacific, Canada, Latin America, Africa, the Middle East and others not included in the foregoing. Source: ABS, [International Trade in Goods and Services, Australia](#). Latest data is for July; August data released on 6<sup>th</sup> October.

# Tourism and aviation have been severely impacted by the closure of international and most state borders

## Short-term visitor arrivals and resident returns



## Airport passenger movements

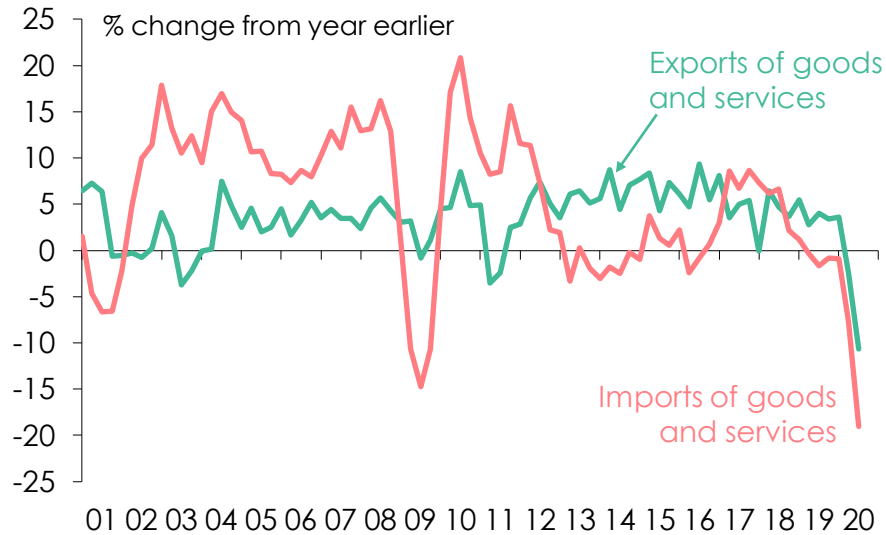


Note: The ABS has suspended publication of seasonally adjusted estimates of short-term visitor arrivals and resident returns, so published original estimates for April 2020 (and beyond) have been seasonally adjusted by Corinna using the same seasonal factors as for the corresponding month of 2019. Latest BITRE data on airport passenger movements are for June; July data have been extrapolated from data for Sydney Airport published by Sydney Airport Ltd.

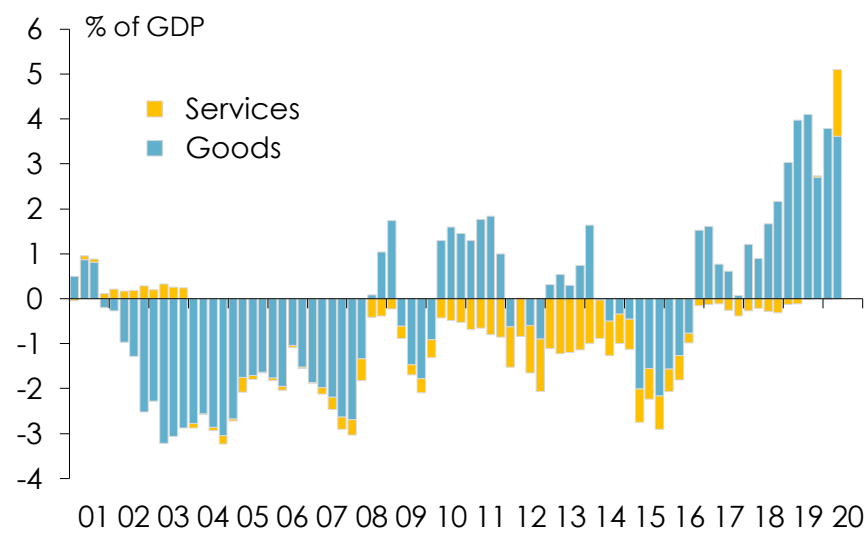
Sources: ABS; Bureau of Industry, Transport and Resources Economics (BITRE); Sydney Airport Ltd; Corinna.

# Australia recorded its largest-ever current account surplus in Q2, and is now a capital exporter, paying down debt and building up equity assets

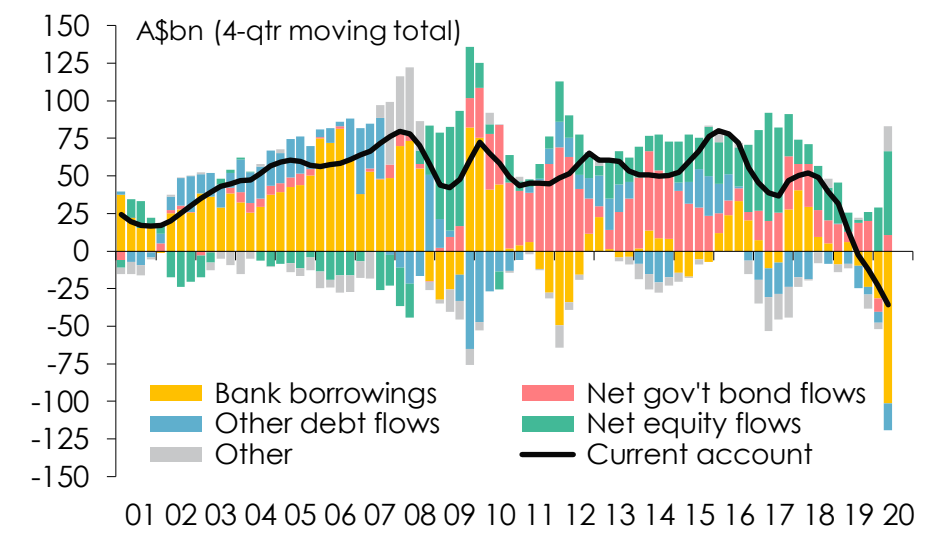
## Export and import volumes



## Goods & services trade balances



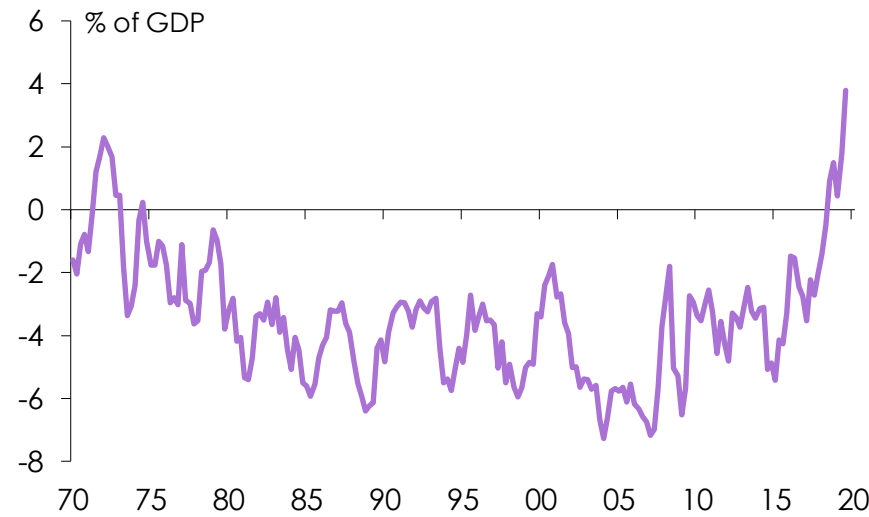
## Capital flows



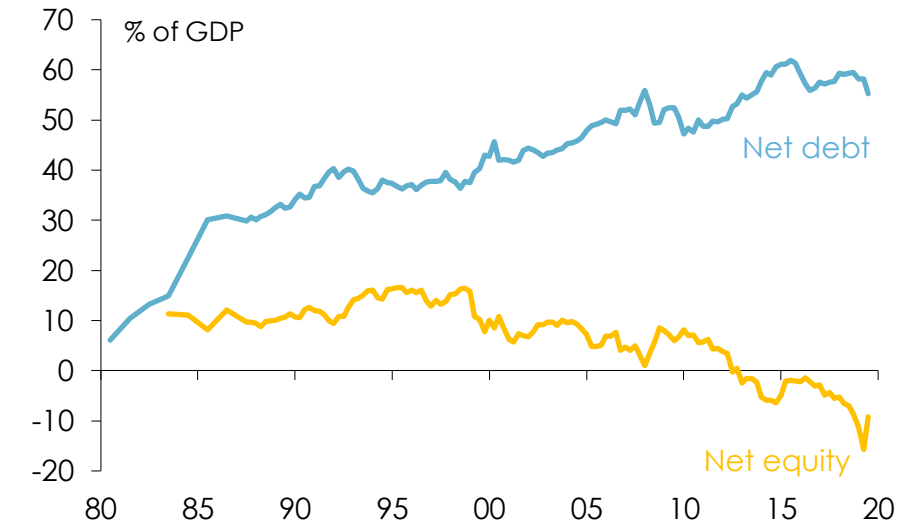
## Export and import prices



## Current account balance



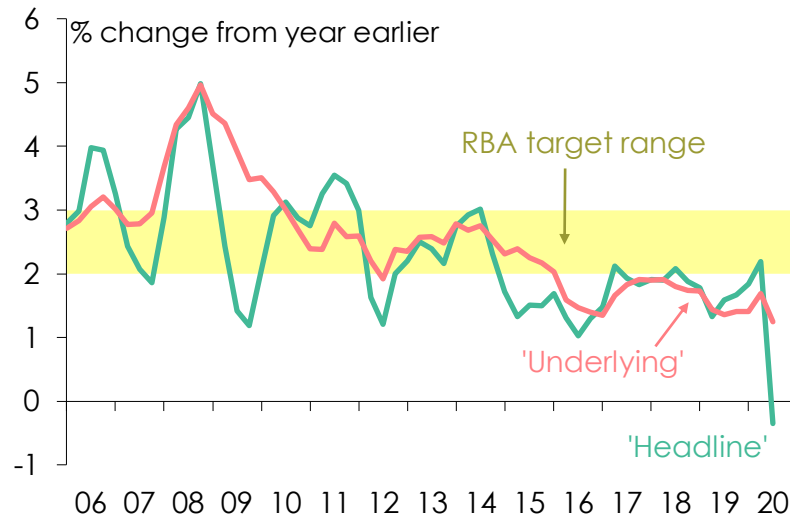
## Net international investment position



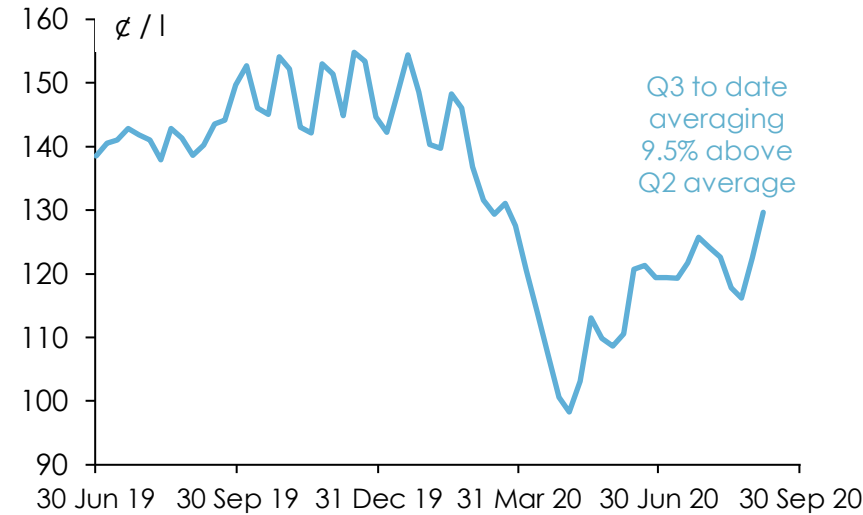
Source: ABS, [Balance of Payments and International Investment Position, Australia](#). September quarter data will be released on 1<sup>st</sup> December.

# Inflation turned negative, temporarily, in Q2 and will remain below the RBA's target until at least the second half of 2021

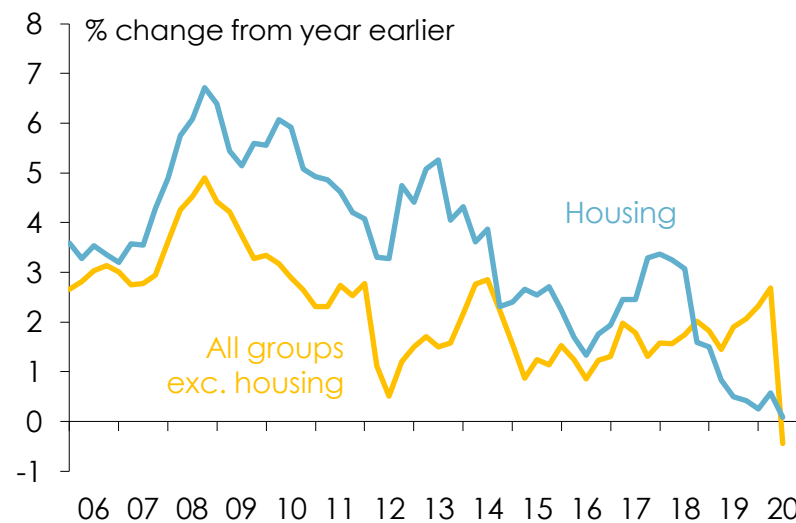
## Consumer prices



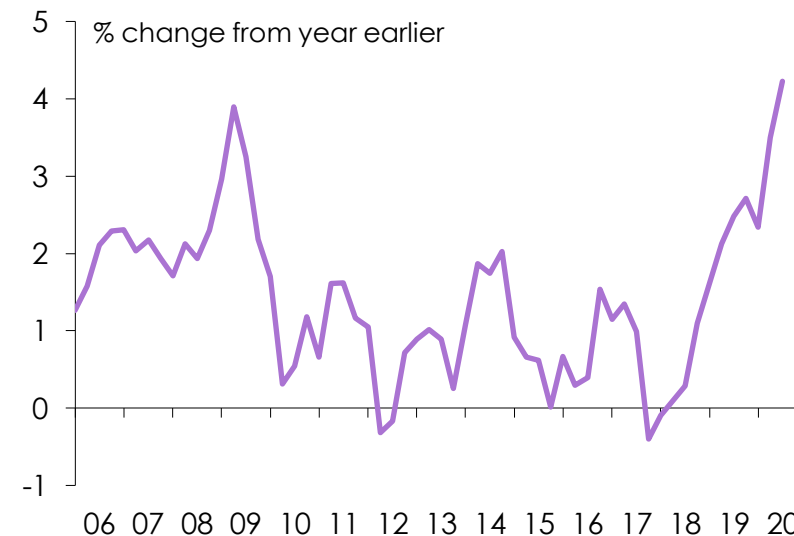
## Retail petrol prices



## Housing costs in the CPI



## Retail sales implicit price deflator



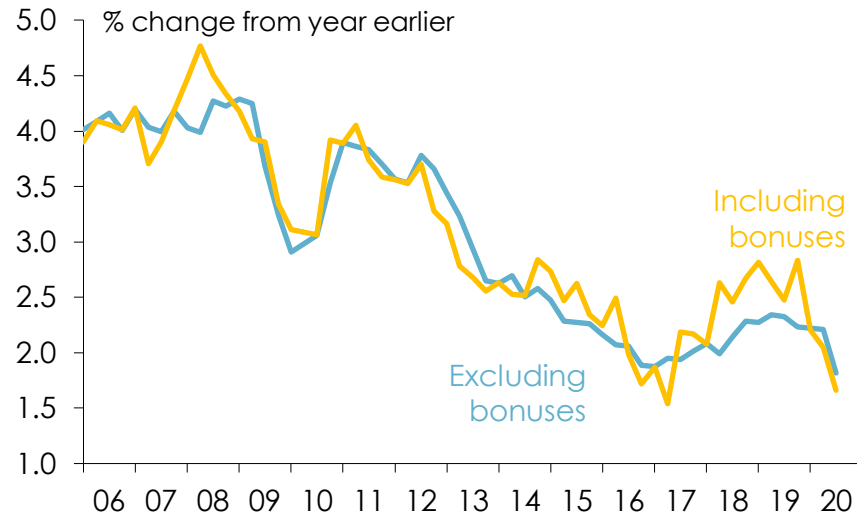
- ❑ The CPI fell (by 1.9%) in the June quarter, the largest quarterly decline since 1931 and only the 11<sup>th</sup> decline in 60 years
- ❑ The annual 'headline' inflation rate fell to -0.3%, the lowest since Q3 1997 (which was artificially induced by falling mortgage rates, which are no longer included in the CPI), or otherwise since Q3 1944
- ❑ The fall in the CPI in Q2 was largely due to the provision of free child care between 6<sup>th</sup> April and 28<sup>th</sup> June, which subtracted 1.1pc pts from the CPI; and a 19% fall in petrol prices, which subtracted 0.7 pc pts
  - both of these items will reverse in Q3
- ❑ 'Underlying' inflation was flat in Q2 and 1.3% from Q2 last year – it's now been below the RBA's target for more than four years
- ❑ In contrast to the CPI, the retail sales price deflator rose 1.2% in Q2 to be 4.2% higher than in Q2 2019 – the biggest annual increase since Q2 2001 – largely driven by a 6.7% increase in food prices

Note: 'Underlying' inflation is the average of the weighted median and trimmed mean CPIs. Wage price indices exclude bonuses.

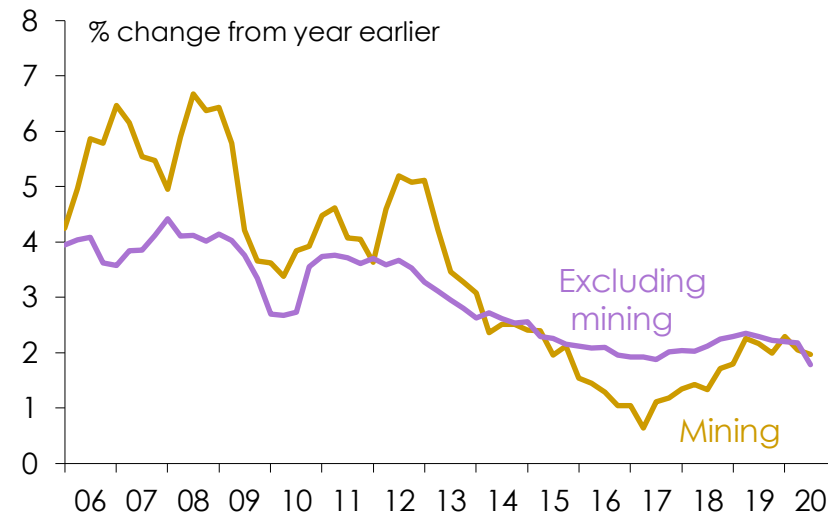
Sources: ABS, [Consumer Price Index, Australia](#); [Australian Institute of Petroleum](#). The September quarter (Q3) CPI will be released on 28<sup>th</sup> October.

# Wages growth over the year to the June quarter was the lowest for at least 23 years

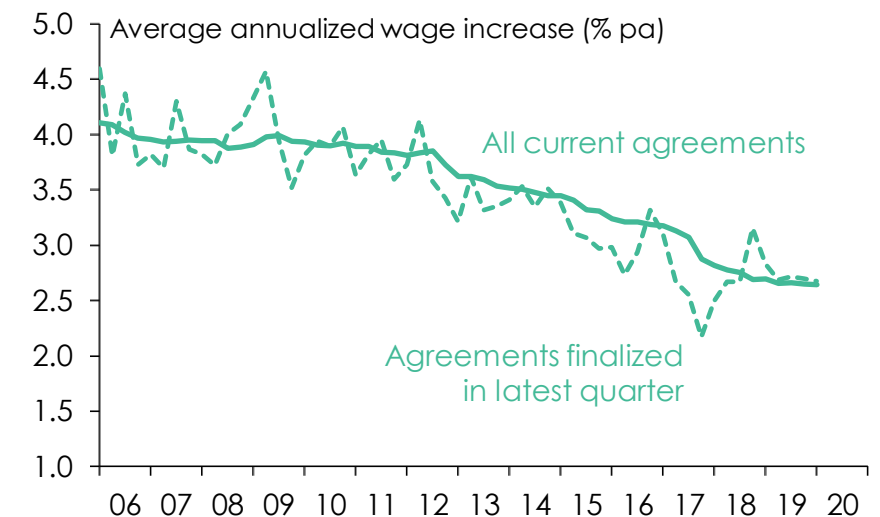
## Wage price index – all sectors



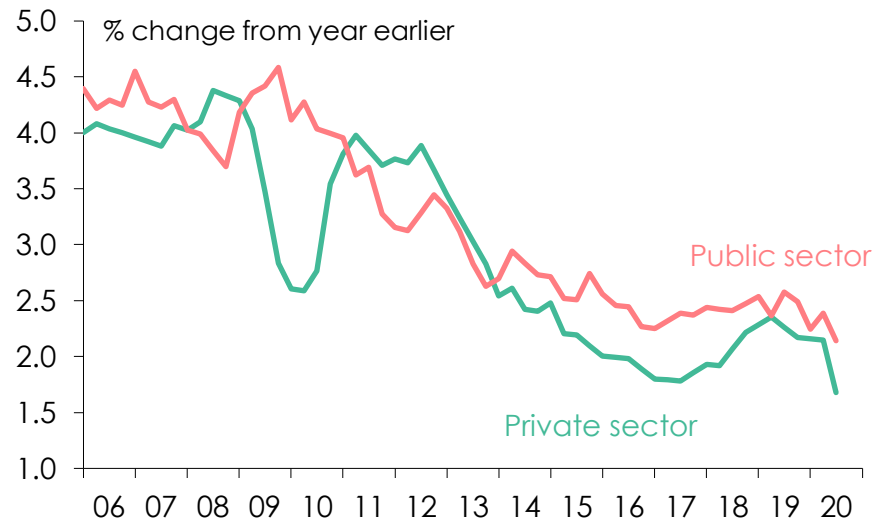
## WPI by industry



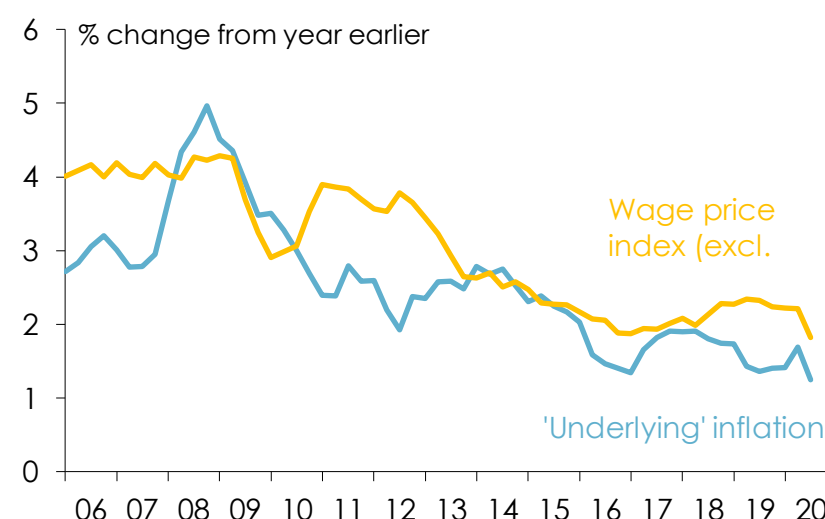
## Enterprise bargaining agreements



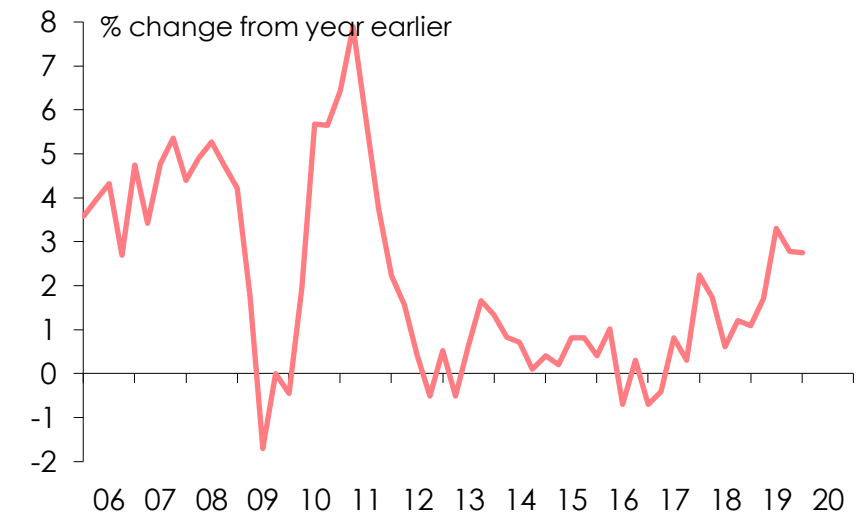
## WPI – private vs public sectors



## WPI and 'underlying' CPI inflation



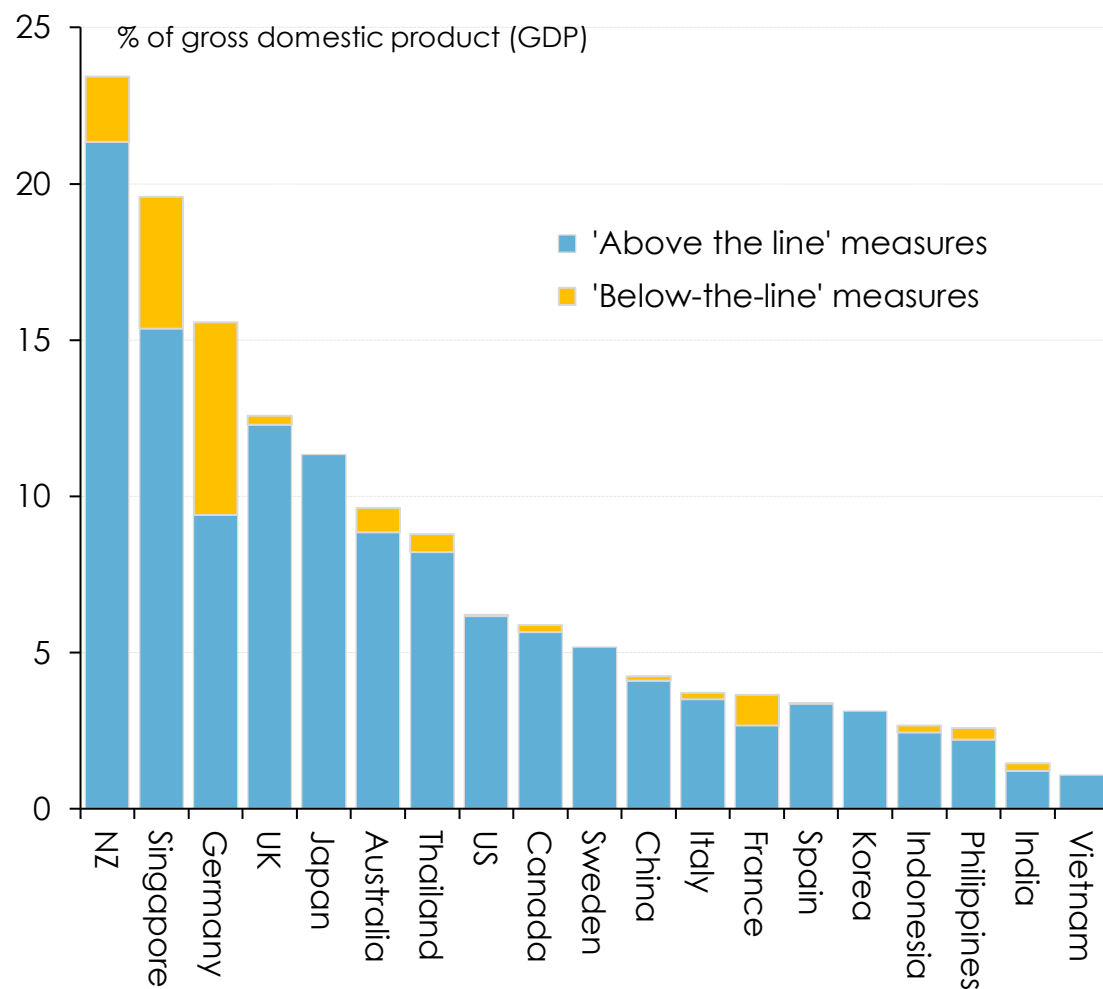
## Unit labour costs



Note: Unit labour costs is compensation of employees (including fringe benefits and social insurance contributions) per hour worked divided by (real) gross value added per hour worked (ie, labour productivity) for the non-farm sector. Source: ABS; Attorney-General's Department. September quarter WPI data will be released on 18<sup>th</sup> November.

# The Australian Government's policy measures have been large by historical and international standards

Fiscal policy responses to Covid-19 – selected 'advanced' & Asia-Pacific economies

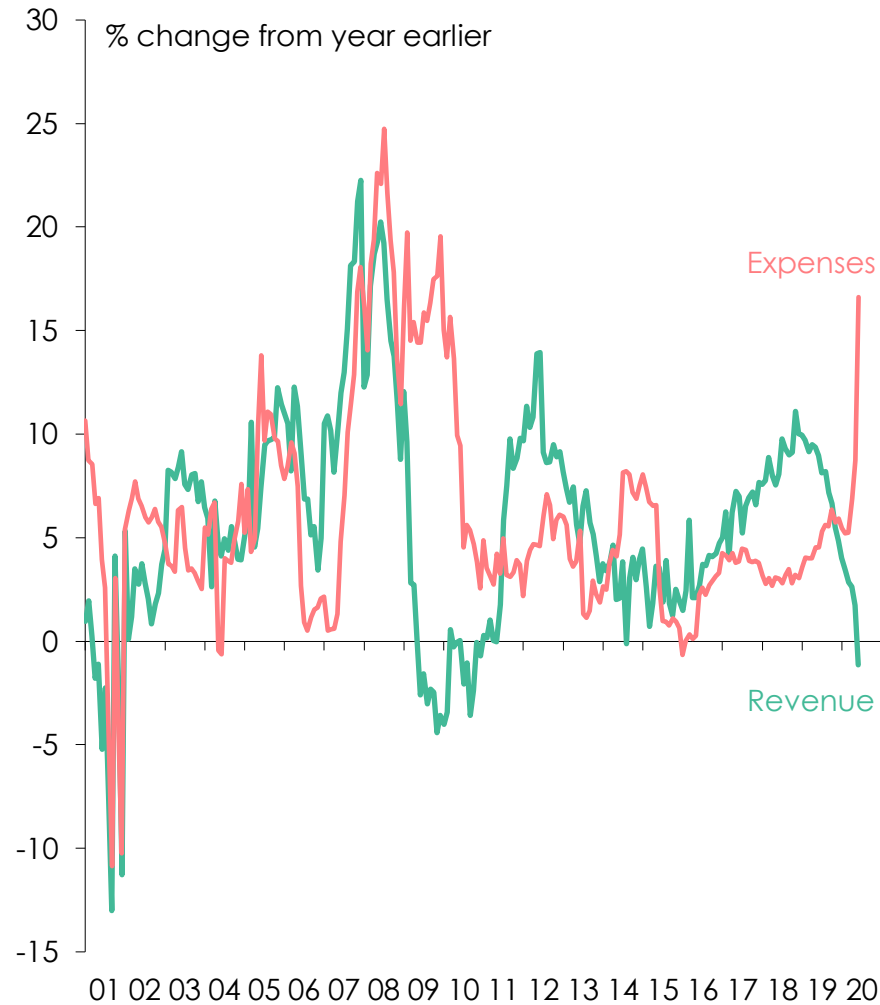


Note: 'Above the line' measures comprise additional or accelerated spending and deferred or foregone revenue. 'Below the line' measures comprise equity injections, loans, asset purchases and debt assumptions, but do not include loan guarantees or other contingent liabilities. Source: IMF, [Fiscal Monitor: Database of Country Fiscal Measures in Response to the COVID-19 Pandemic](#), 24<sup>th</sup> June 2020.

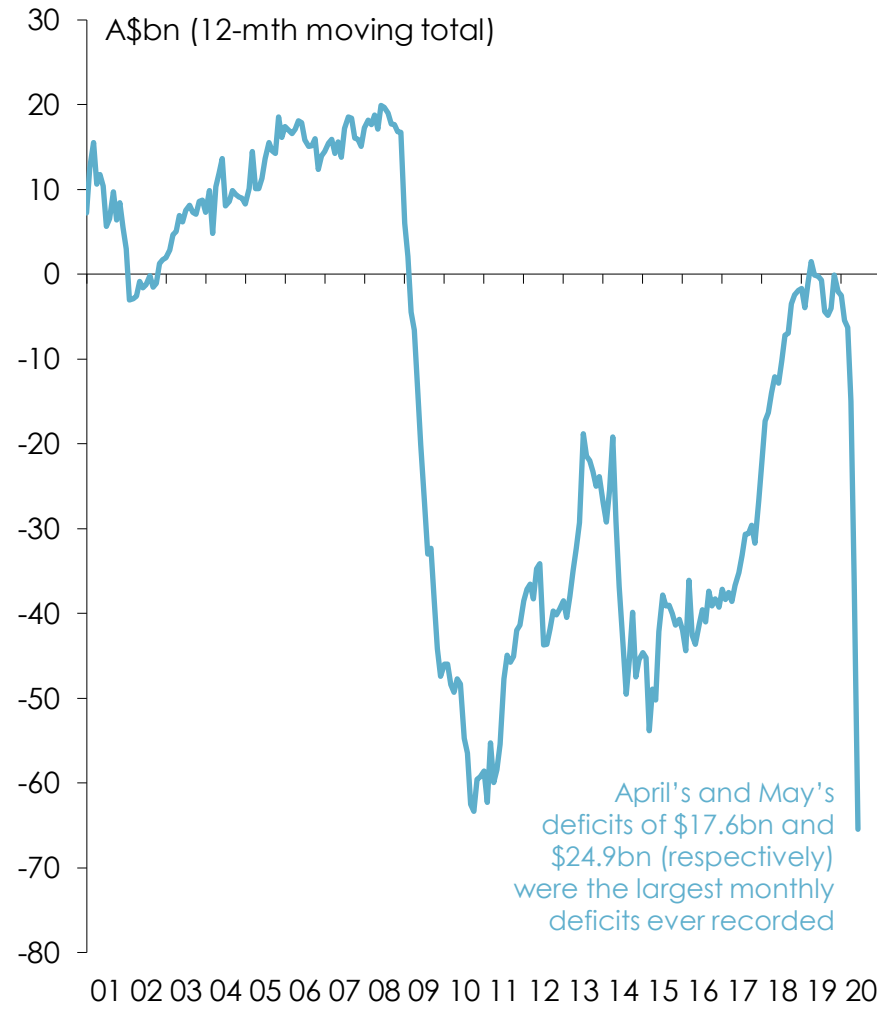
- ❑ Policy measures announced thus far by the Australian Government total \$192bn over FYs 2019-20 and 2020-21 or about 9% of one year's GDP – which is large by international standards (and double what was done during the GFC)
  - including an additional \$15bn for Jobkeeper announced this week in response to the 'lockdown' in Victoria
- ❑ Principal objectives of policy measures have been to –
  - maximize the 'survival prospects' of businesses affected by shutdowns or ongoing restrictions
  - minimize the impact of the shutdown on employment
  - provide additional income support to those who lose their jobs
  - strengthen the capacity of the health care system to cope with increased demand
- ❑ Policy measures have been designed to be 'simple' to administer, and to make greatest use of existing systems rather than having to create new mechanisms
  - which resulted in some anomalies initially (eg with the level of Jobkeeper payments to part-time workers) though most of these have now been corrected
- ❑ Policy measures also designed to be readily 'switched off' once the need for them has passed

# The Australian Government's 'bottom line' has begun to deteriorate sharply, and ...

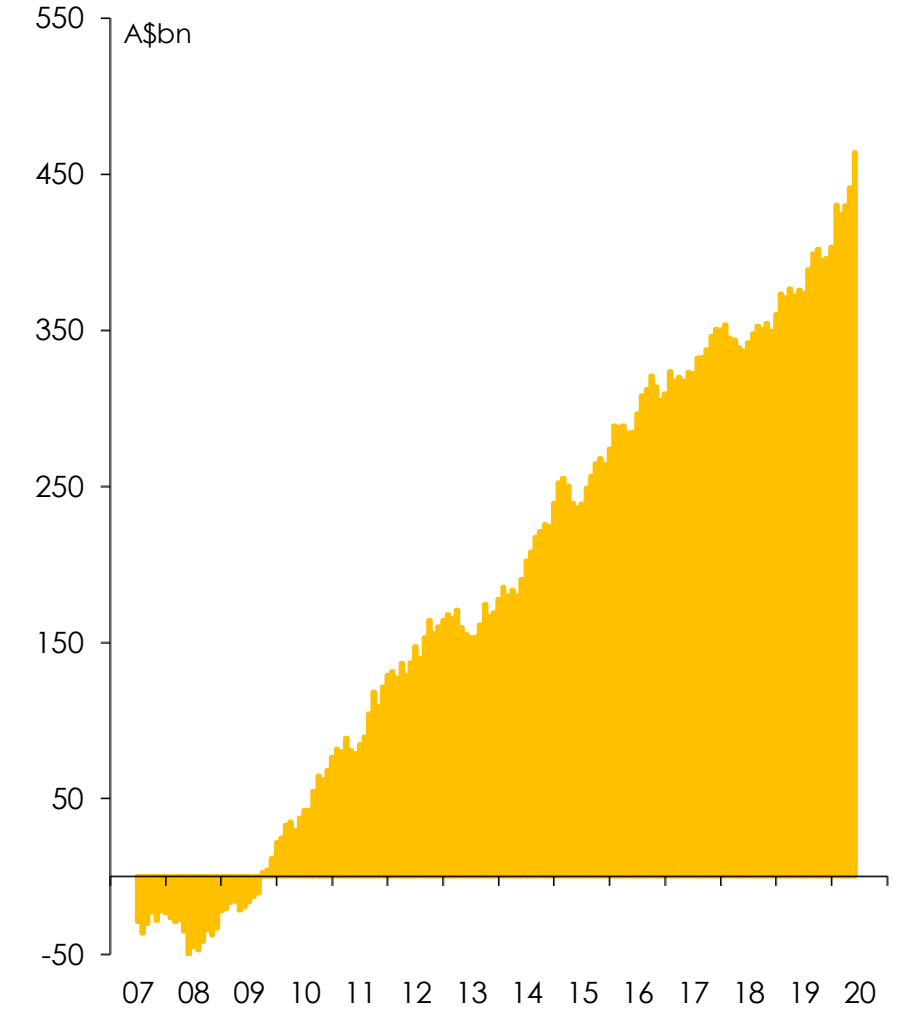
## Australian Government revenue and expenses



## Australian Government 'underlying' cash balance



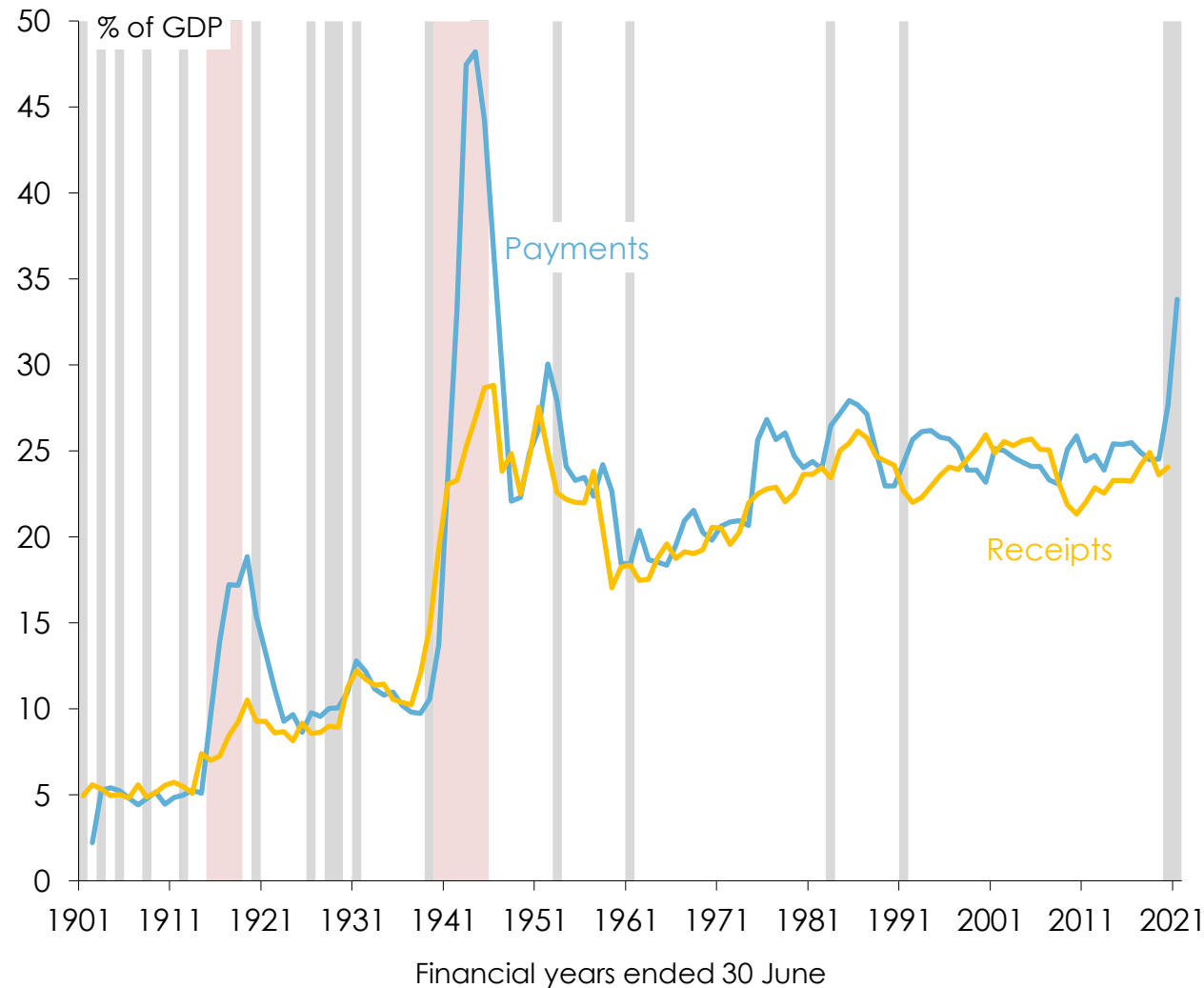
## Australian Government net debt



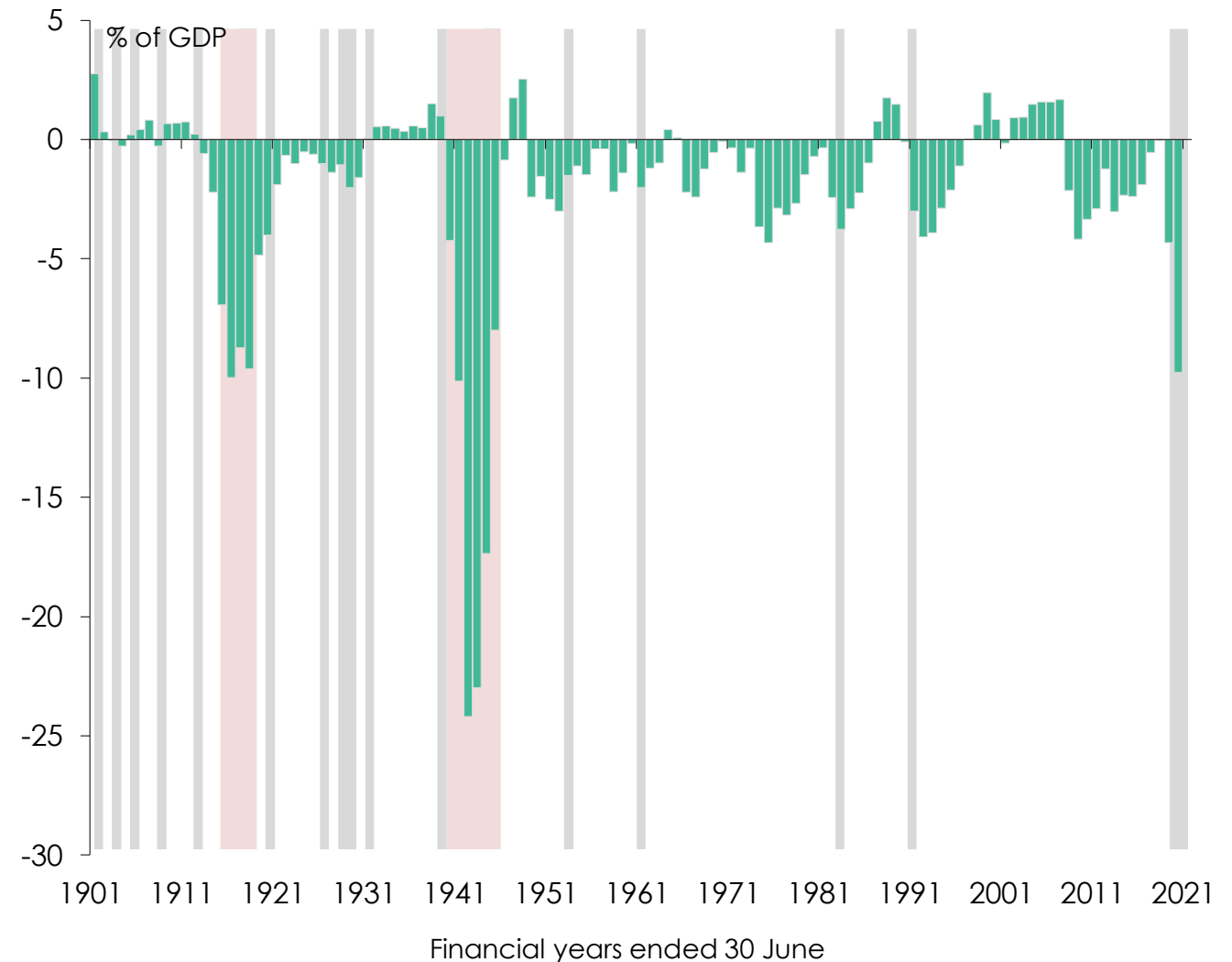
Note: Revenue and expenses are accrual accounting items. The 'underlying' cash balance is (cash) receipts minus payments, excluding transactions in financial assets for policy purposes and net earnings of the Future Fund. Net debt is total interest-bearing liabilities (government securities, deposits, loans and other borrowing) minus cash and deposits, advances paid, and (interest-bearing) loans, placements and investments. Source: [Department of Finance](#).

... blew out to \$86bn in 2019-20, and is forecast to widen to \$185bn (9.7% of GDP) in 2020-21, the largest deficit as a pc of GDP since WW II

Australian Government receipts and payments



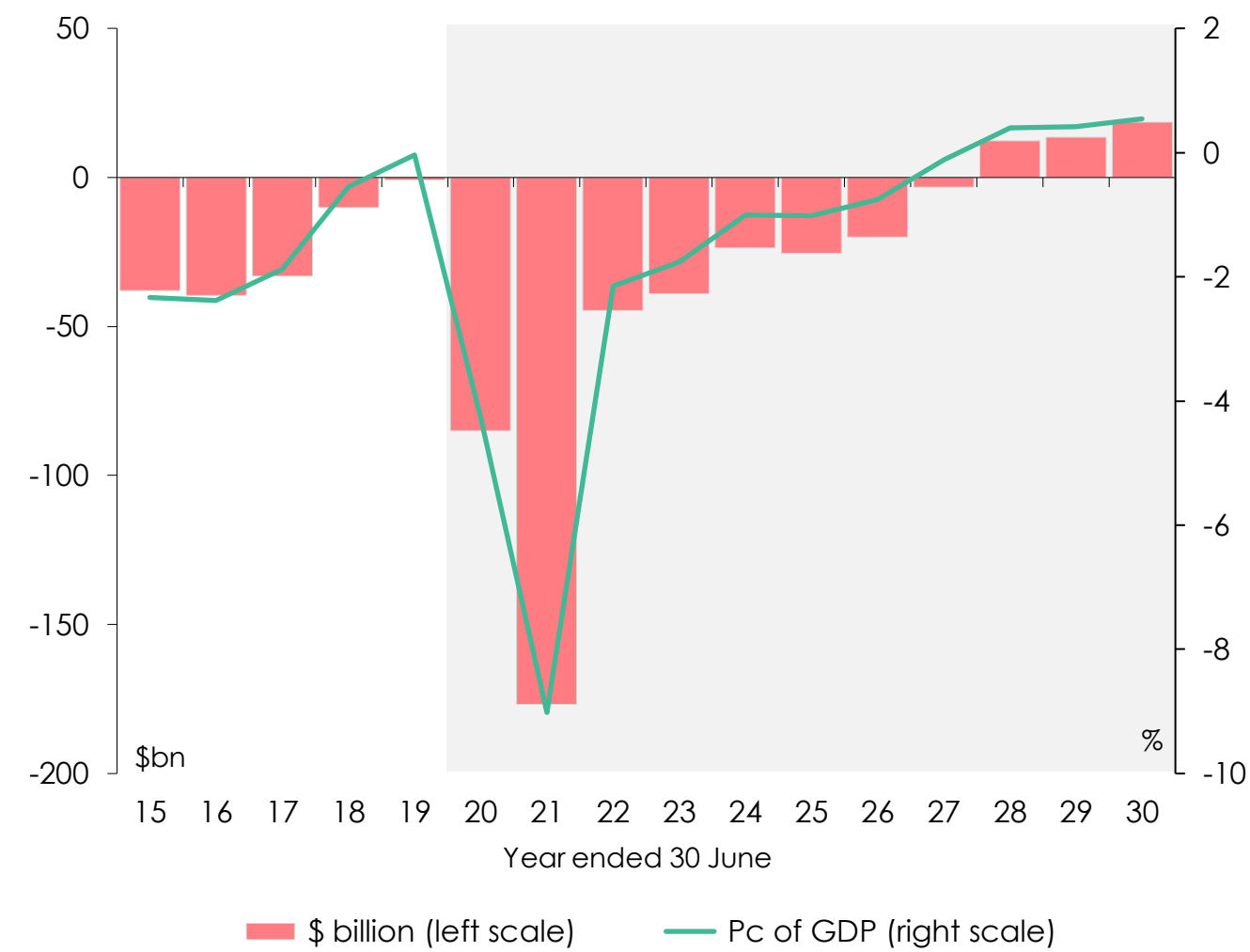
Australian Government budget deficit or surplus



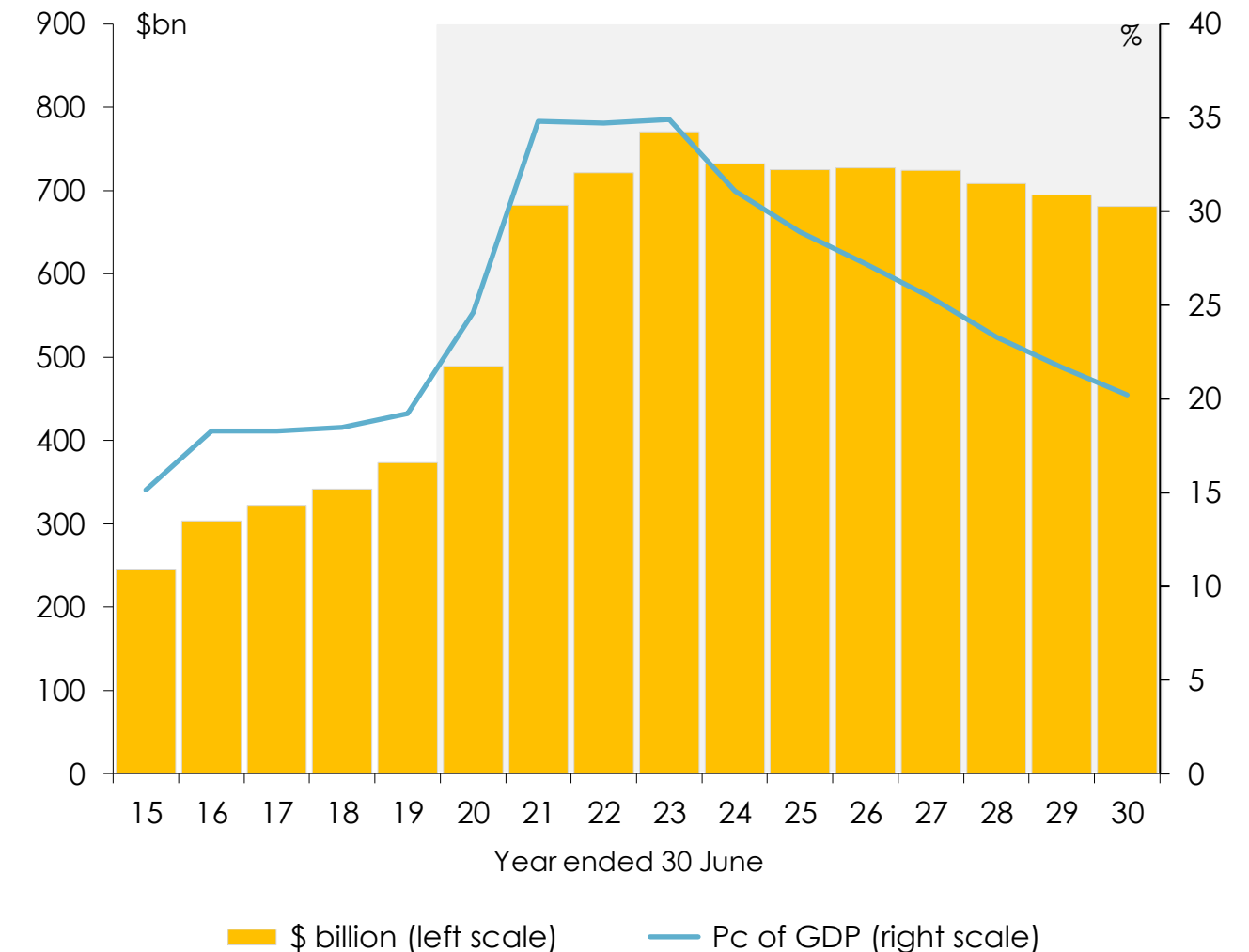
Note: Payments and the budget surplus or deficit are 'underlying' (that is, exclude 'net investments in financial assets for policy purposes') after 1989-90, when state governments became responsible for issuing their own debt, and 'headline' before that. Areas shaded in grey are fiscal years in which real GDP contracted; areas shaded in pink are World Wars I and II. Sources: Global Financial Data; Australian Government, 2019-20 [Mid-Year Economic and Fiscal Outlook](#) (December 2019) and [Economic and Fiscal Update](#) (July 2020).

# Based on PBO projections, the budget looks set to remain in deficit until 2027-28, with net debt peaking at \$771bn (35% of GDP) in 2023

‘Underlying’ cash balance projections to 2029-30



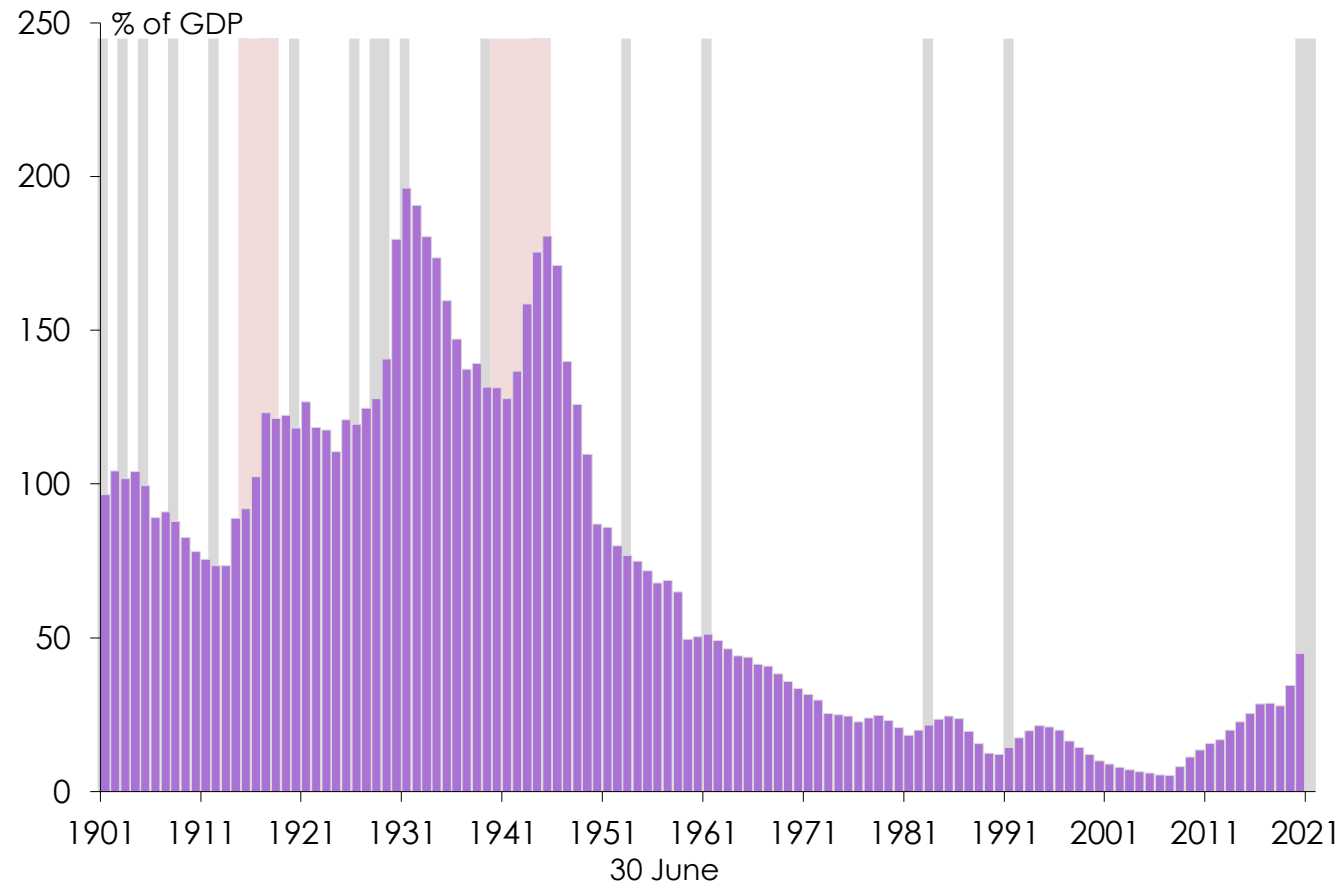
Net debt projections to 2029-30



Note: Shaded area denote estimates (for 2019-20) or projections. Estimates and projections expressed in dollars have been inferred by Corinna from the PBO’s baseline projections expressed as a pc of GDP, PBO projections of real GDP (starting with RBA SoMP forecasts) and Corinna estimates of the GDP deflator. PBO projections only allow for the impact of Covid-19 and measures taken in response to it (including, in particular, the impact of border closures on forecasts for immigration and hence population growth), and not for any other developments which may affect long-term economic or fiscal projections (in either direction).  
Sources: Parliamentary Budget Office (PBO), *Updated medium-term fiscal scenarios: impact of COVID-19 pandemic and response*, Canberra, 21<sup>st</sup> August; Corinna.

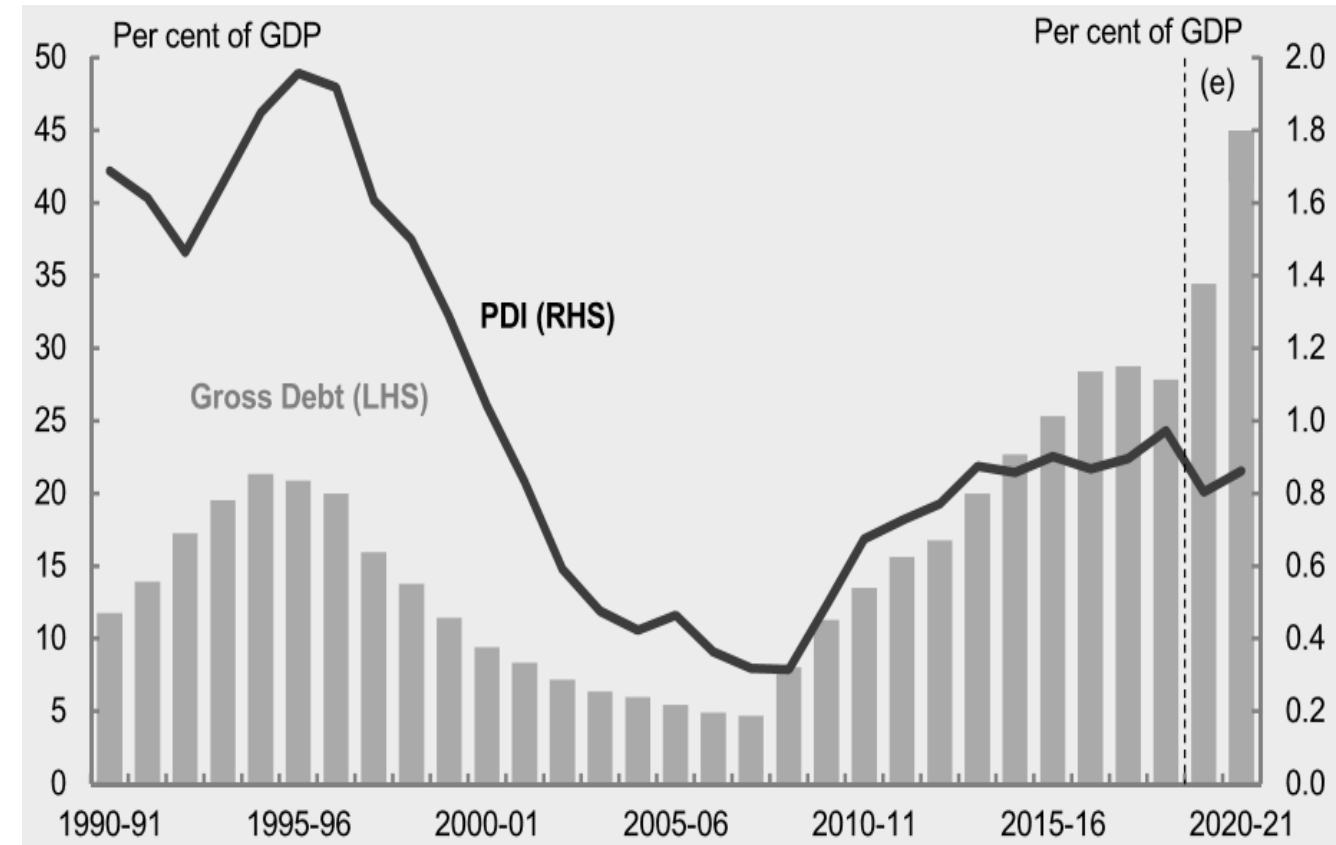
# However there's no need for undue alarm at the level of debt which will be incurred by the Australian Government

## Australian Government gross public debt



- ❑ Australian governments have coped with much higher levels of gross debt (as a pc of GDP) in the past than are in prospect over the next decade

## Gross public debt and public debt interest payments

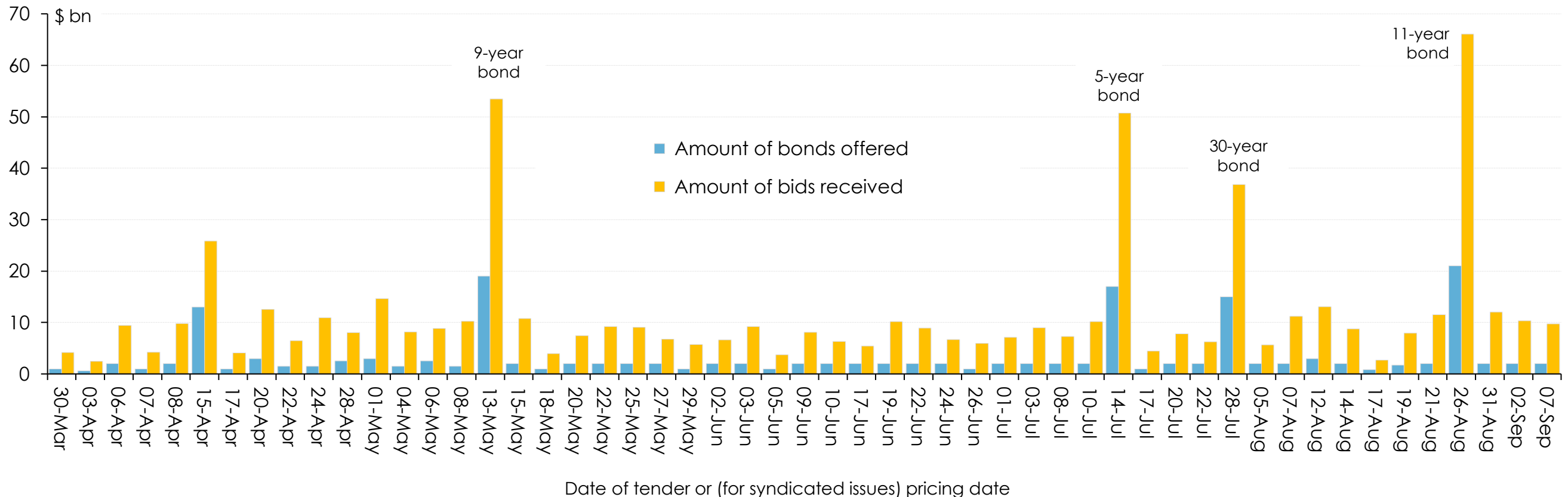


- ❑ Thanks to much lower interest rates, the Government will actually be spending less on interest payments, as a pc of GDP, in 2020-21 than in any of 2013-14 through 2018-19

Note: Areas shaded in grey are fiscal years in which real GDP contracted; areas shaded in pink are World Wars I and II. Sources: Global Financial Data; Australian Government, 2019-20 [Mid-Year Economic and Fiscal Outlook](#) (December 2019) and [Economic and Fiscal Update](#) (July 2020).

# The Australian Government continues to have absolutely no difficulty financing its significantly higher deficits

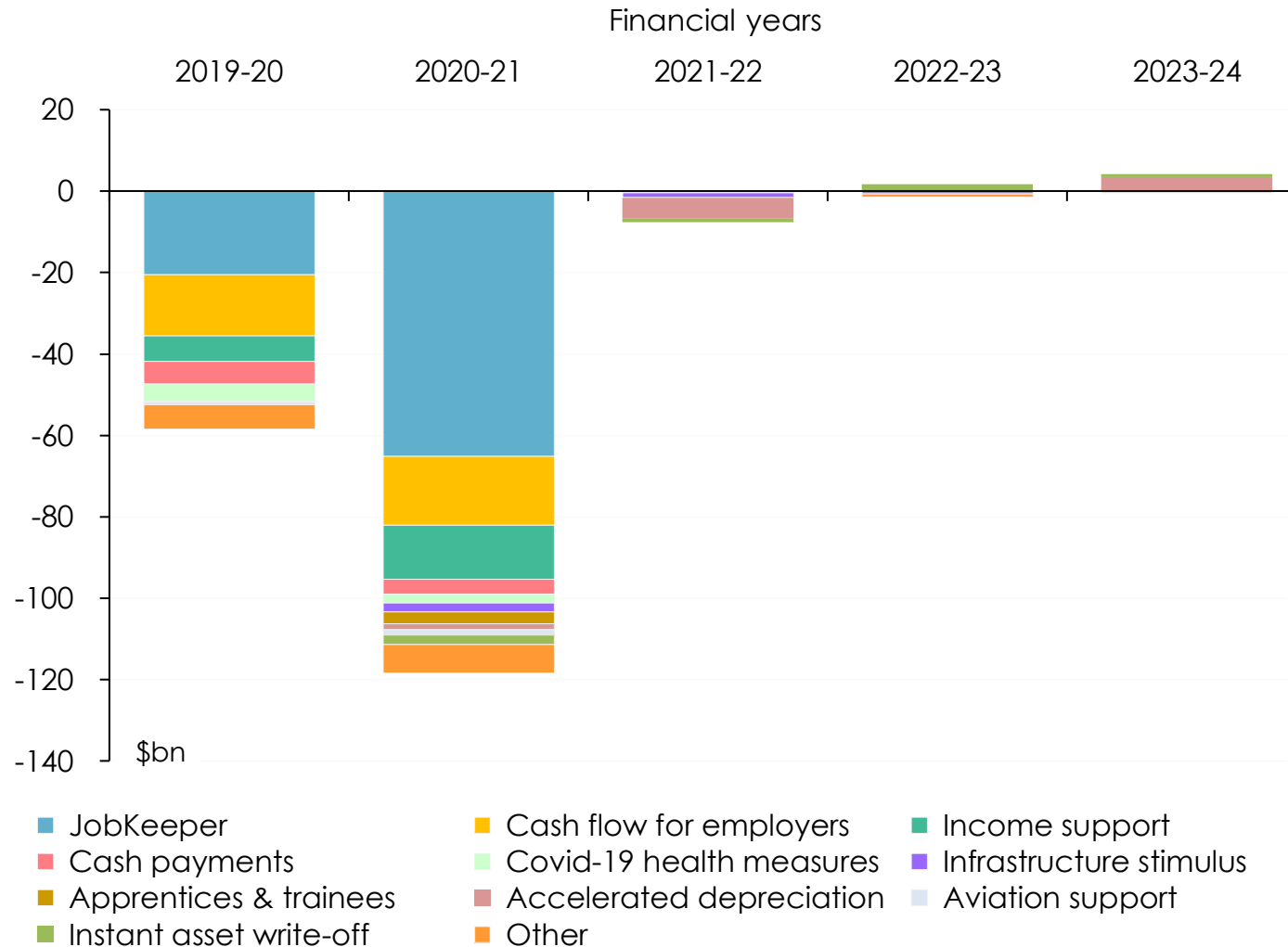
## Australian government bond issuance since March 2020



- ❑ Since 30<sup>th</sup> March, the Australian Office of Financial Management (which conducts the Government's borrowing programs) has issued \$172.1bn of Treasury bonds - based on the volume of bids received it could have borrowed \$616bn with yields at most 3 basis points above the highest yields actually accepted
- ❑ This past week, AOFM had only one auction, of \$2bn of 9-year bonds – for which it received \$9.7bn of offers (almost five times as much as sought)

# The Government has provided a massive fiscal stimulus during the June and September quarters, but this is set to wind back in Q4 and beyond

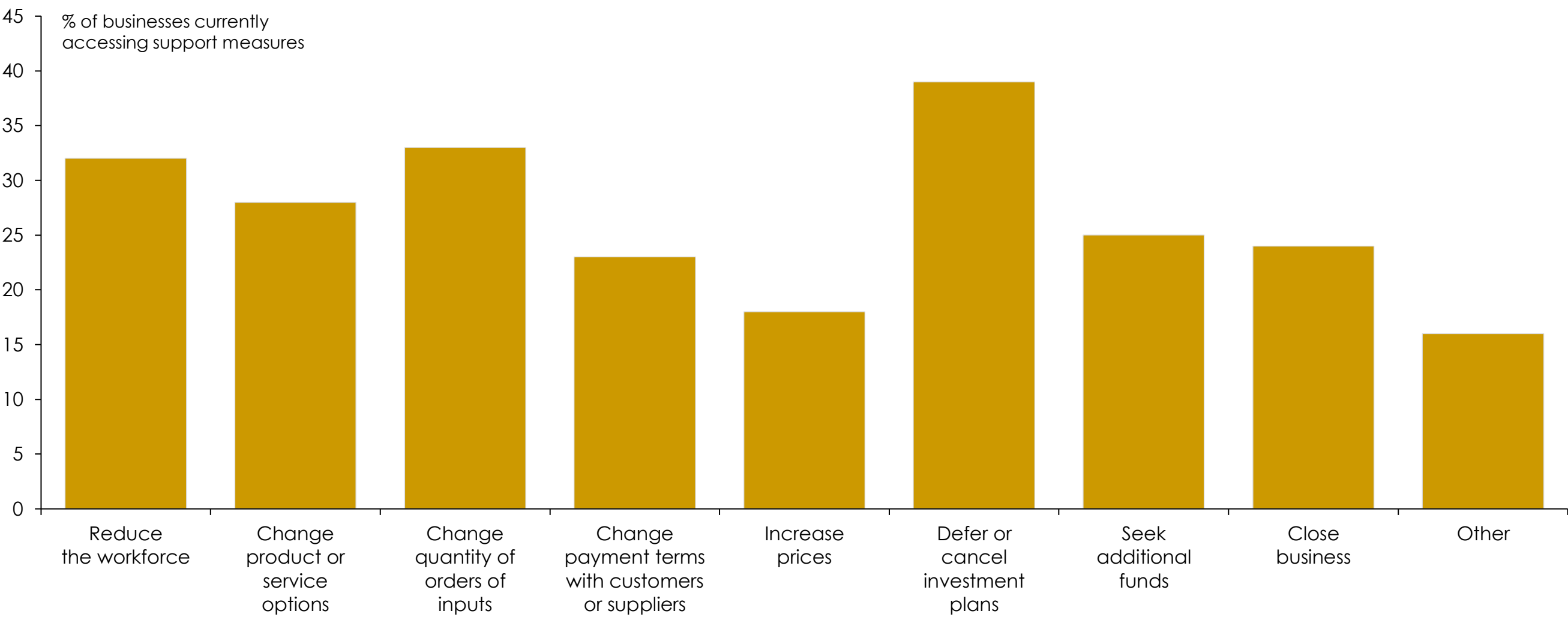
## Impact of 'policy decisions' taken since last December on the Australian Government's 'underlying' cash balance



- ❑ 'Policy decisions' taken since last December's Mid-Year Economic & Fiscal Outlook (MYEFO) represent a discretionary fiscal stimulus equivalent to 2.9% of GDP in 2019-20 and 6.3% of GDP in 2020-21
- ❑ Treasury estimates that this fiscal support boosted by real GDP (relative to what it would have been otherwise) by  $\frac{3}{4}\%$  in 2019-20, and will boost it by around  $4\frac{1}{4}\%$  in 2020-21
  - and that this support prevented the loss of around 700,000 jobs, lowering the peak unemployment rate by around 5 pc points
- ❑ July's decisions to extend 'JobKeeper', and the elevated level of 'JobSeeker' payments (albeit at lower levels) beyond end-September until the end of March have lowered the 'fiscal cliff' that was looming at the end of September
  - nonetheless, as things currently stand there will still be a significant tightening of fiscal policy at the end of this and the next two quarters
- ❑ The Government will need to (and probably will) provide more fiscal stimulus in the (delayed) Budget to be presented on 6<sup>th</sup> October (see [slide 101](#))

# Withdrawal of government supports for business may have significant consequences for employment – unless the economy is much improved

Actions that businesses currently accessing support measures expect to take when support measures are no longer available, July 2020



Source: ABS [Business Impacts of Covid-19](#), July 2020 (based on survey conducted between 15<sup>th</sup> and 23<sup>rd</sup> July).

# The Treasurer has foreshadowed ‘bringing forward’ personal income tax cuts scheduled for 2022 and 2024 as a form of fiscal stimulus

## Legislated personal income tax cuts

Rates from 2017-18 to 2023-24	New thresholds from 2018-19 to 2021-22	New thresholds from 2022-23 to 2023-24
Nil	Up to \$18,200 pa	Up to \$18,200 pa
19 %	\$18,201 - \$37,000	\$18,201 - \$45,000
32.5 %	\$37,001 - \$90,000	\$45,001 - \$120,000
37 %	\$90,001 - \$180,000	\$120,001 - \$180,000
45 %	Above \$180,000	Above \$180,000
Low & middle income tax offset	Up to \$1,080	-
Low income tax offset	Up to \$445	Up to \$700

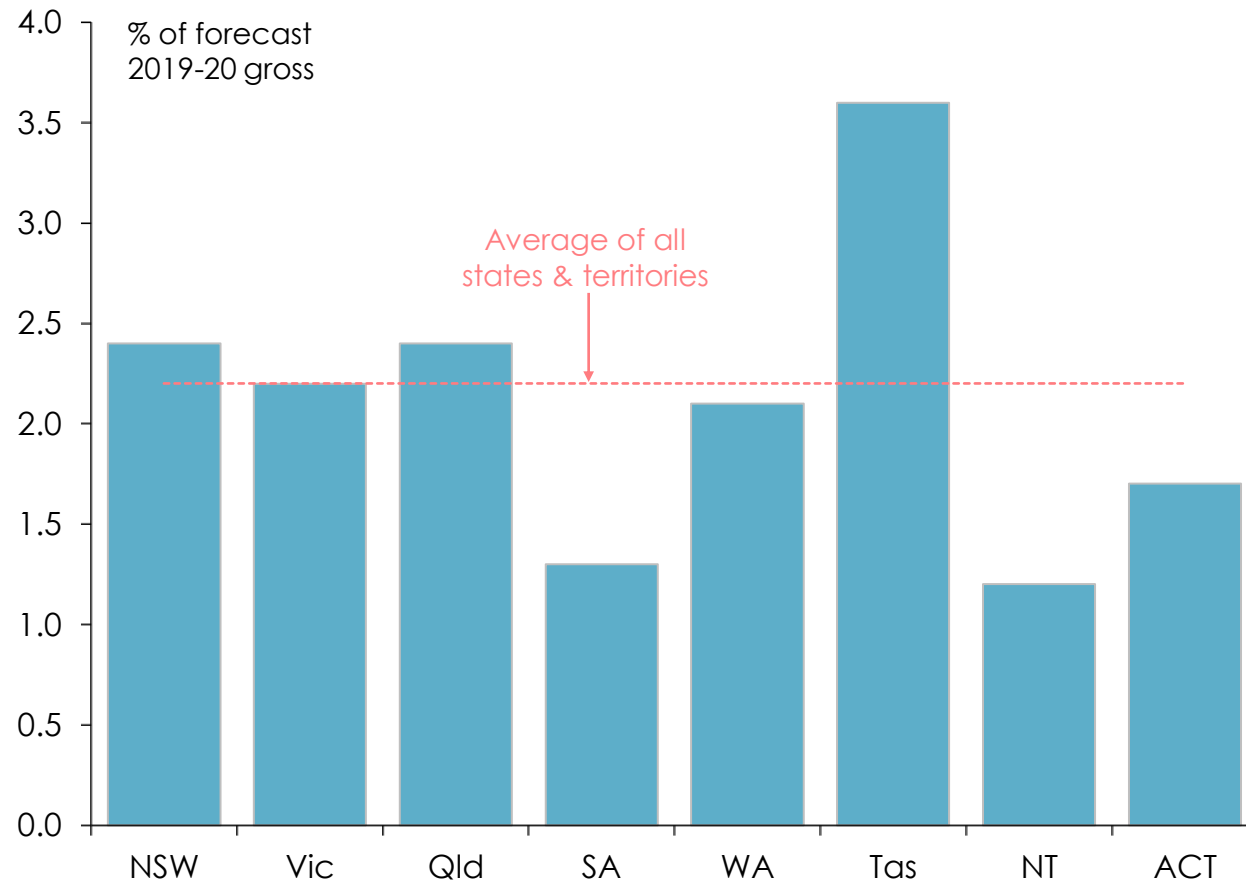
Rates from 2024-25	New thresholds from 2024-25
Nil	Up to \$18,200 pa
19 %	\$18,201 – \$45,000 pa
30 %	\$45,001 – \$200,000 pa
45 %	Above \$200,000 pa
Low income tax offset	Up to \$700

- ❑ Treasurer Josh Frydenberg has again foreshadowed bringing forward the personal income tax cuts currently legislated to come into effect on 1<sup>st</sup> July 2022, as a way to ‘boost aggregate demand, boost consumption [and] put more money in people’s pockets’
  - this could be a central feature of the (delayed) Budget which he will present on 6<sup>th</sup> October
- ❑ The tax cuts were estimated to ‘cost’ \$4½bn (in revenue foregone) in FY2022-23 and (together with the further cuts legislated to take effect from the beginning of FY2023-2024) \$143bn over the ten years to 2029-30
- ❑ Bringing forward these tax cuts would likely provide some lift to demand and activity – but, inevitably, at least some of the boost in after-tax incomes would be saved and/or used to pay down debt
  - as happened with the enhanced tax refunds paid out in the Sep quarter of last year, and (even more starkly) with the government payments made to social security beneficiaries and (via JobKeeper) employees – [slide 53](#)
- ❑ Alternatively, spending the same amount on (for example) cash payments to households whose income is too low to benefit from tax cuts, infrastructure spending, or social housing would provide more ‘stimulus bang’ for each ‘buck’
  - an even better option could be to provide time-limited, tradeable vouchers valid for spending in designated areas (eg tourism, child care etc)

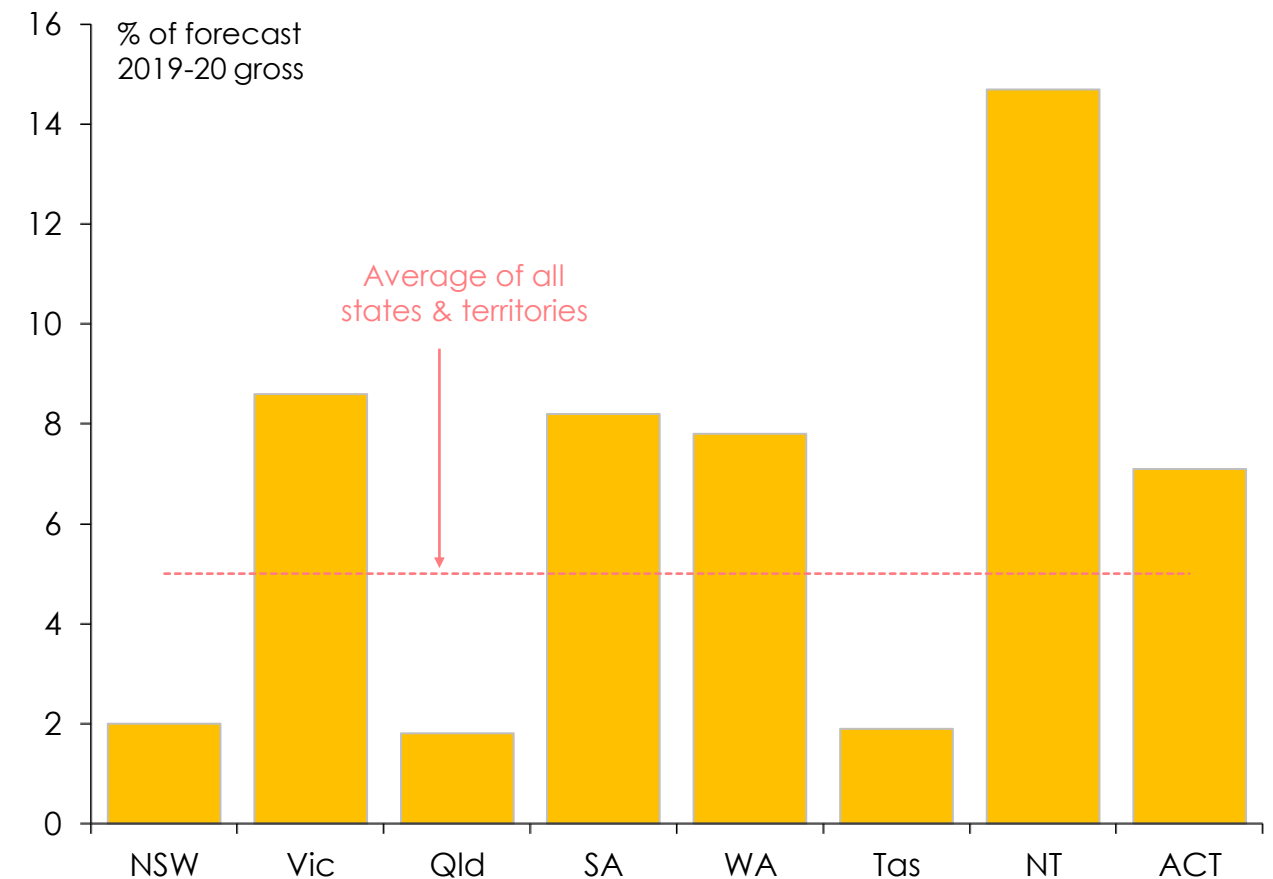
Source: Australian Government, 2019-20, [Budget Paper No. 1, Budget Strategy and Outlook](#), April 2019.

# There's been considerable difference in the size of state and territory governments' fiscal responses to Covid-19

State & territory Covid-19 support and response measures as a pc of gross state product



State & territory general government net debt as at 30 June 2020

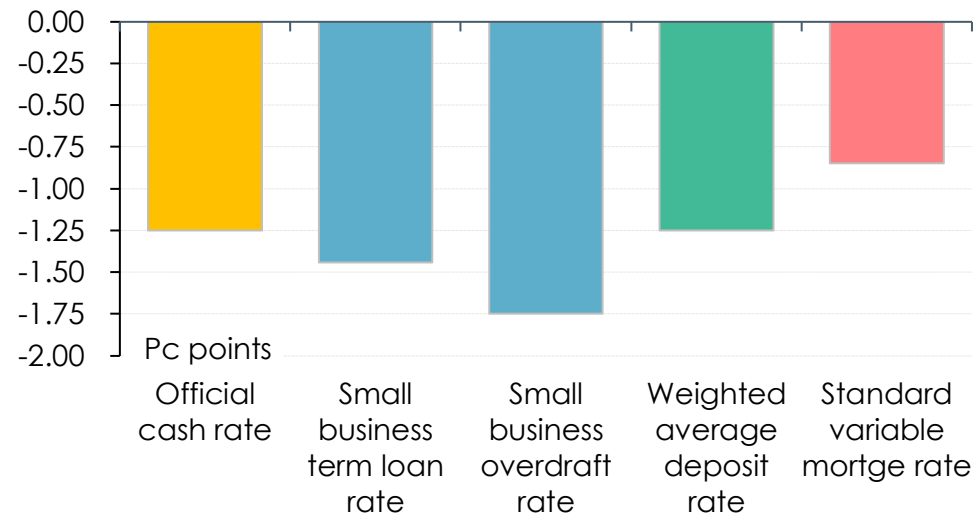


- ❑ This month RBA Governor Phillip Lowe advised state and territory governments to spend an additional \$40bn (2% of GDP) on infrastructure investment – an amount which S&P Global Ratings said state and territory balance sheets had “plenty of room to accommodate”

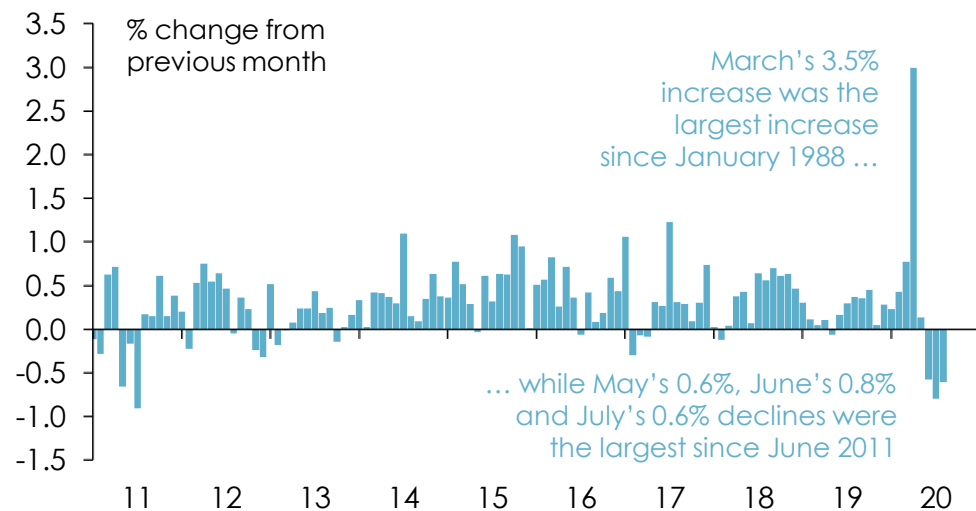
Sources: Commonwealth Treasury, 6<sup>th</sup> August 2020; Australian Financial Review, 14<sup>th</sup> August 2020; The Australian, 22<sup>nd</sup> August 2020.

# For now at least, banks are 'part of the solution', not 'part of the problem'

## Changes in interest rates since June 2019



## Business credit outstanding

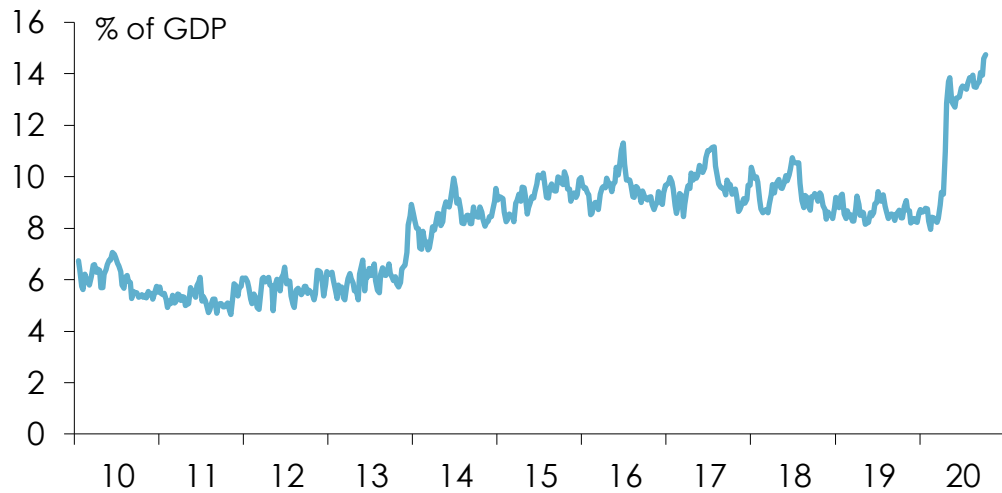


Source: Reserve Bank of Australia.

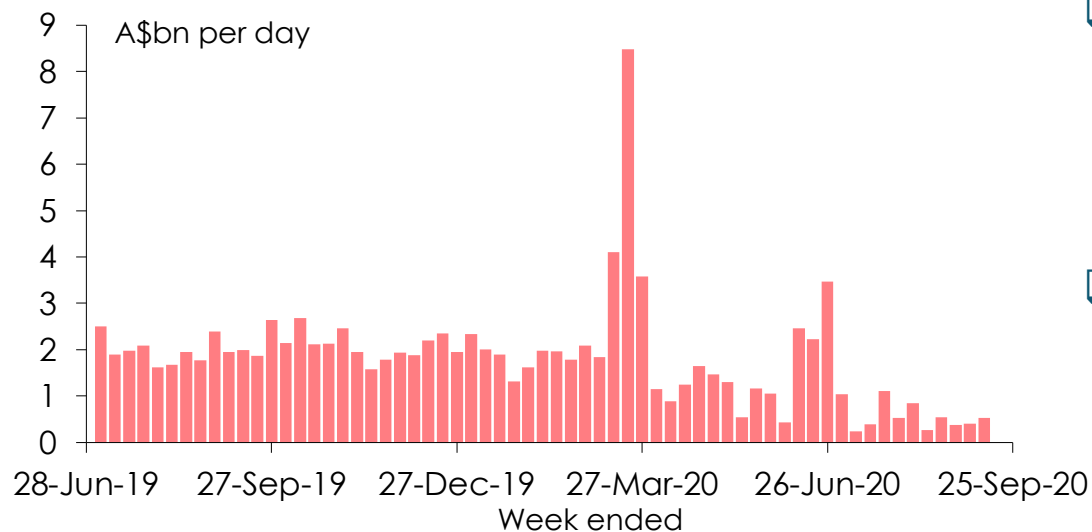
- ❑ Banks have cut interest rates on small business loans by more than the official cash rate since June last year (when the RBA started cutting rates again)
- ❑ Banks have extended 'repayment holidays' to business and home mortgage borrowers who request it (about 12% of mortgages and 20% of SME loans)
  - although it is important to note that under these arrangements interest payments are deferred and capitalized, not foregone
- ❑ These 'repayment holidays' are due to expire at end-September, but banks have announced that they would be extended for up to four months for those customers who were still experiencing difficulties but have good prospects of eventually repaying
- ❑ At end-2019, the Australian banking system had a Common Equity Tier 1 capital ratio of 11.3% of risk-weighted assets - well above the 10.5% required for major banks since 2017
  - APRA will allow banks CET1 ratios to drop below the 2017 requirements during the Covid-19 period provided they remain above other minimum prudential capital requirements
- ❑ Press reports this week suggested that the RBA & APRA will phase out the 'Committed Liquidity Facility' for banks introduced as part of Basel III (at a time when the stock of Australian bonds was very low) – this will likely see the banks hold more bonds over time, though not necessarily by \$226bn (the amount of CLF)

# With official interest rates as low as they can go, the RBA has implemented a range of 'quantitative' monetary policy measures

## Reserve Bank assets as a pc of GDP



## Reserve Bank daily repo transactions

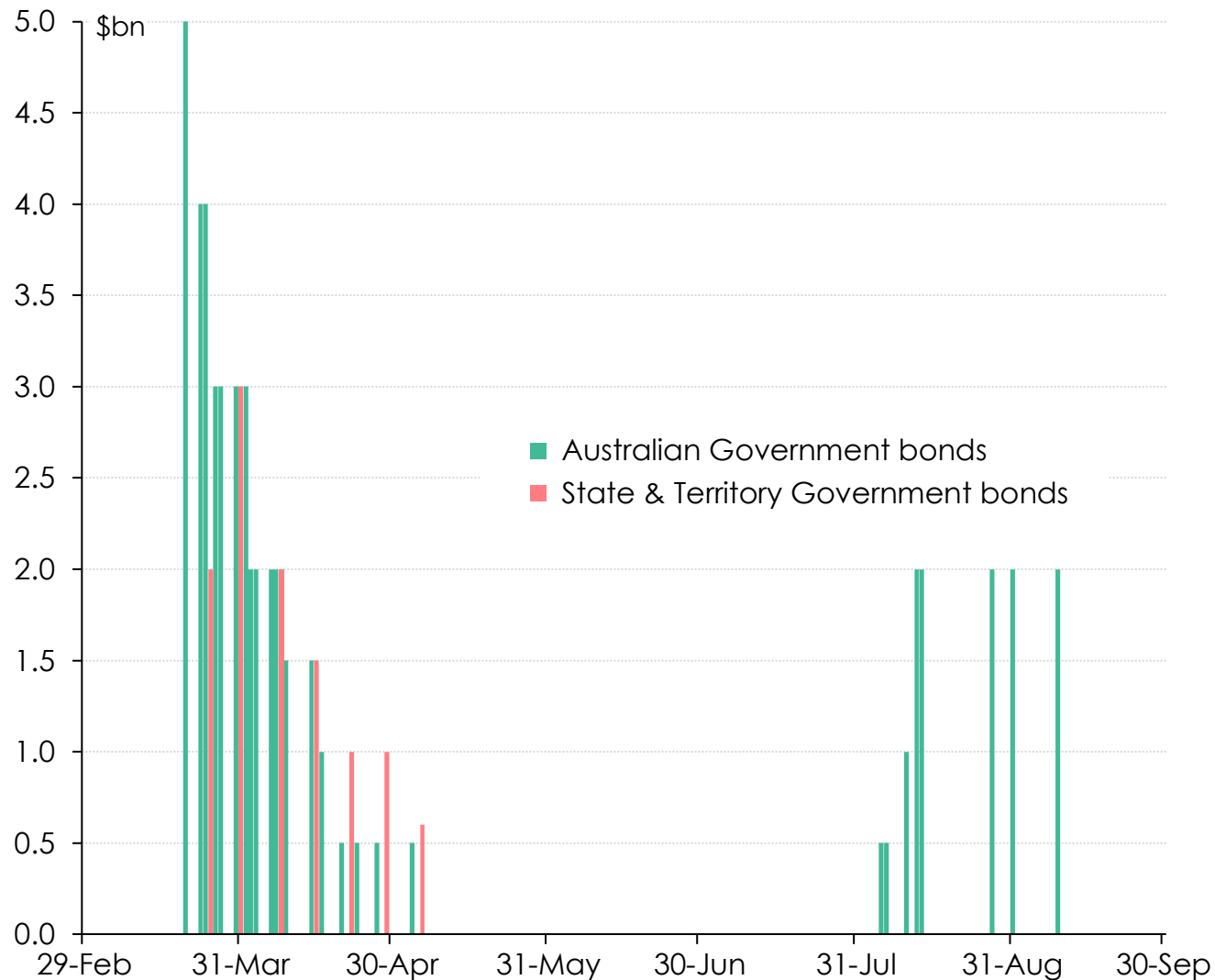


- ❑ The RBA has kept its cash rate target at 0.25% since March, but has allowed the actual rate to drift down to 0.13%
  - the RBA has committed to keeping the target at this level 'until progress is made towards full employment' and 'it is confident inflation will be sustainably within the 2-3% target band' – which the RBA Governor last month said was likely to be at least three years away (see [slide 107](#))
- ❑ The RBA restated its commitment to keeping 3-year yields at 0.25%
  - The RBA bought another \$2bn of bonds this week, taking total purchases under its BoJ-style QE to \$62.1bn, of which \$12bn has been since it resumed purchases in the first week of August after a 3-month hiatus (see [next slide](#))
  - RBA assets are now equivalent to 14.8 % of GDP (cf. BoC 23¾%, US Fed 36%, BoE 44¾%, ECB 62%, BoJ 135% - see [slide 26](#)) and RBNZ 18½%
- ❑ RBA provided additional liquidity through 'open market operations' to prevent disruption of credit markets in March
  - RBA repo transactions averaged \$830mn a day since the beginning of April (except for the last two three weeks of the 2019-20 financial year), down from peak of almost \$8½ bn a day in 3rd week of March
- ❑ The RBA has provided \$58bn of three-year funding at 0.25% pa to banks and other lenders for on-lending to business, especially SMEs, through its Term Funding Facility
  - of which \$5.8bn was provided in the week ended Wednesday
  - as of this week up to \$151.7bn was notionally available through the TFF
  - at last month's Board meeting the RBA extended the period for which the TFF will be available from 30<sup>th</sup> September to 30<sup>th</sup> June next year

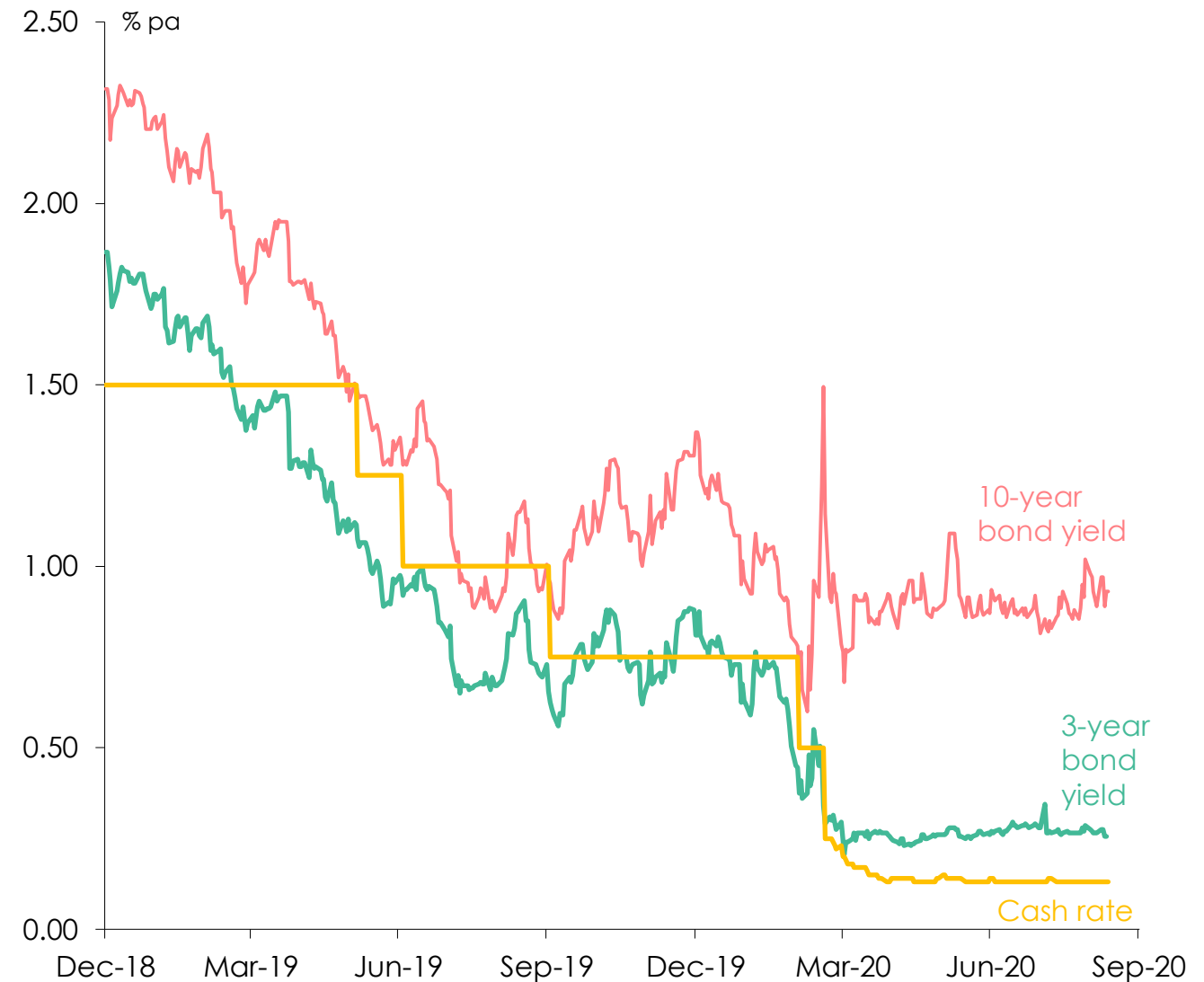
Source: Reserve Bank of Australia, [Statistical Tables](#) A1 and A3.

# The RBA bought another \$2bn of bonds in the secondary market this week as part of its 'yield curve control' targeting the 3-year yield at 0.25%

## RBA open market bond purchases



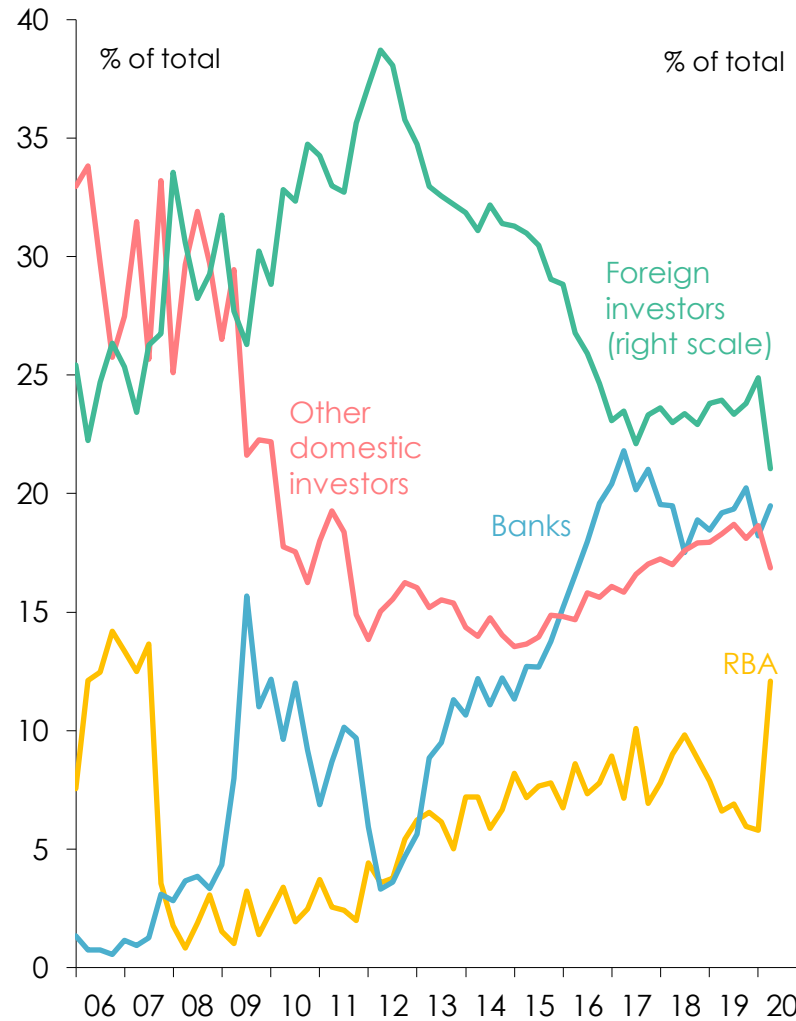
## Interest rates



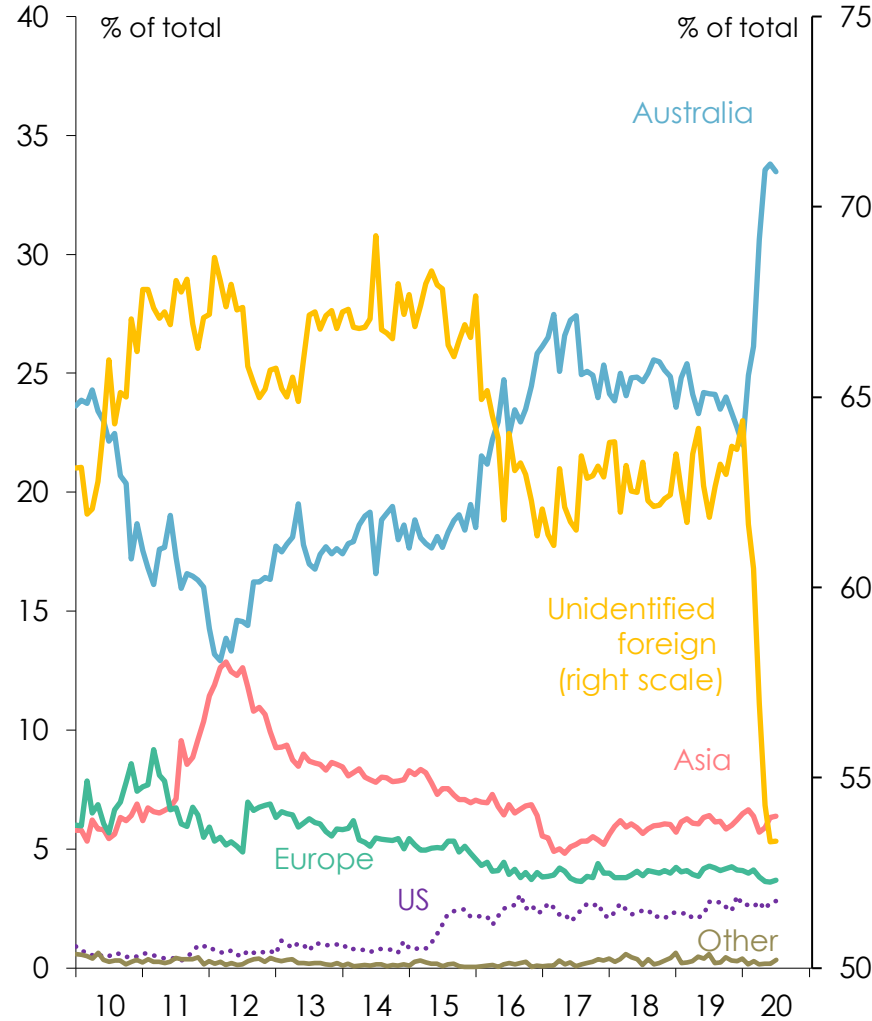
Source: Reserve Bank of Australia, [Statistical Tables](#) A3 and F2. Data up to 11<sup>th</sup> September.

# The RBA in effect more than absorbed the increase in Commonwealth and State debt, and sales by foreign investors, during the March quarter

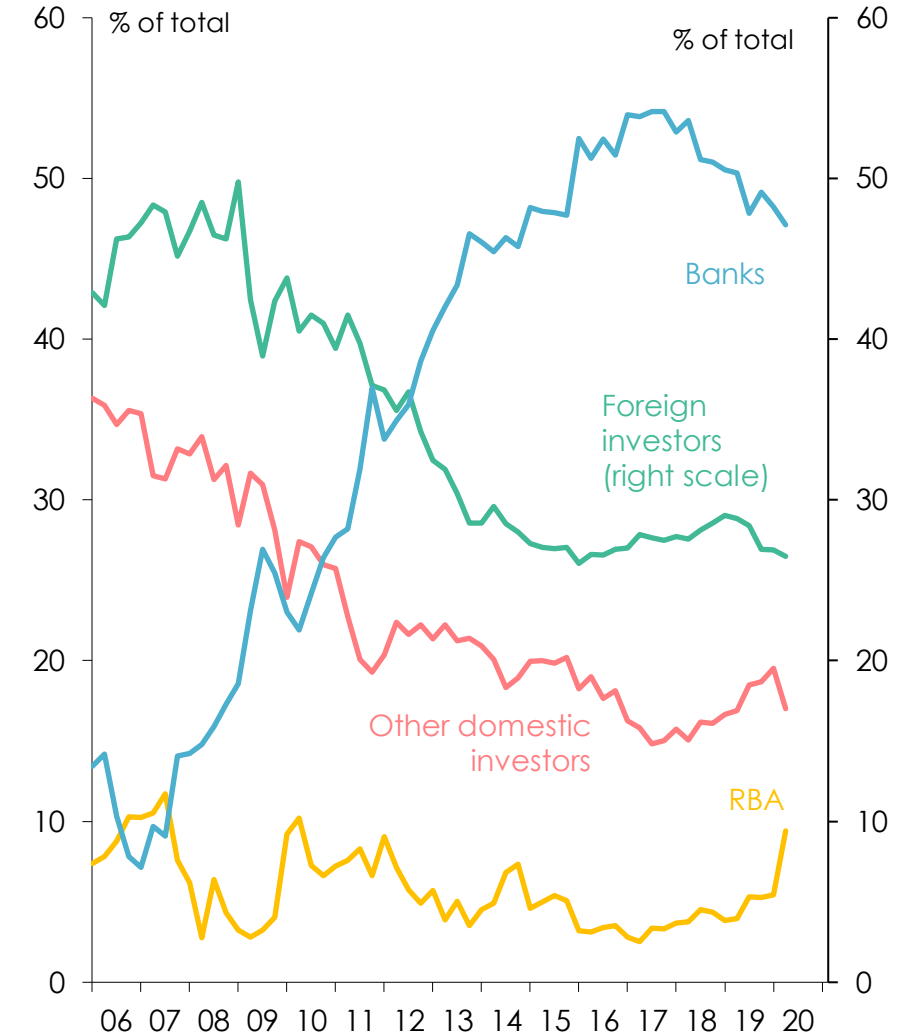
## Holder of Australian Government bonds



## Nationality of Australian Government bond holders



## Holder of State and Territory Government bonds



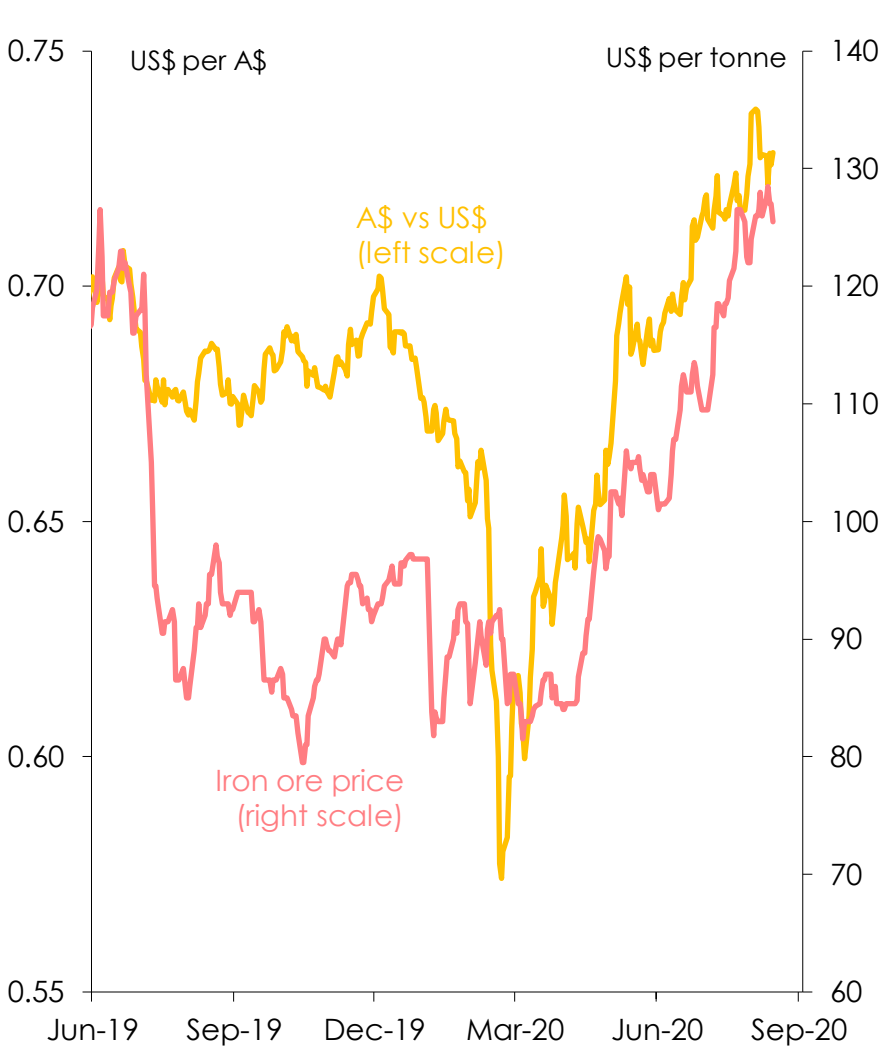
Sources: ABS (Finance & Wealth Accounts); Australian Office of Financial Management. June quarter data will be released on 24<sup>th</sup> September.

# The RBA has no appetite for negative interest rates, ‘modern monetary theory’ or FX market intervention

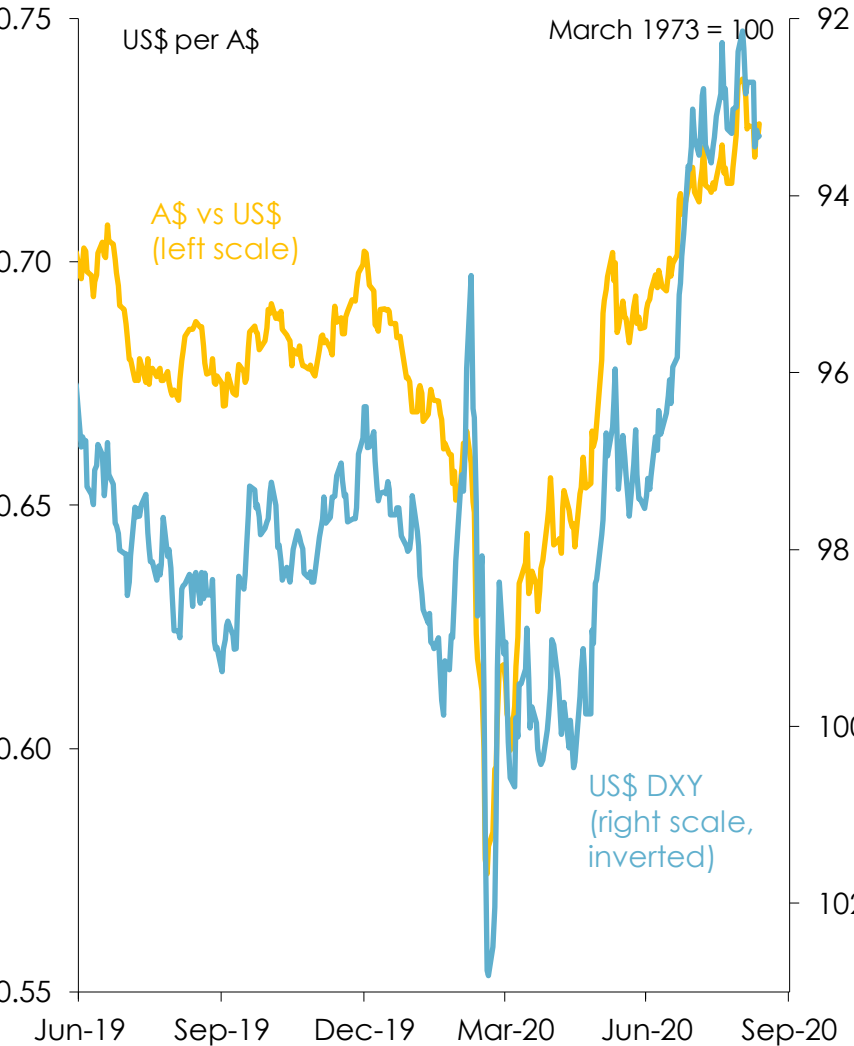
- ❑ Speaking to the Parliamentary Economics Committee on 14<sup>th</sup> August RBA Governor Lowe again characterized negative interest rates as “extraordinary unlikely”, monetary financing of budget deficits (aka ‘modern monetary theory’) as “not on the agenda in Australia”, and FX market intervention to drive the A\$ down as something the RBA is “not prepared to [do] ... unless the currency is misaligned, and I don’t think it is”
- ❑ The Governor indicated that, on the basis of its current outlook (see [slide 60](#)) it is likely to be at least three years before the RBA’s stipulated conditions for raising the cash rate will be met
- ❑ The Governor defended the RBA’s adoption of a BoJ-style approach to QE – targeting the 3-year yield at 0.25% pa as opposed to a fixed program of bond purchases – saying this was “a more direct way of achieving ... low funding costs” and that it “reinforces the [RBA’s] forward guidance regarding the cash rate”
  - however the Governor didn’t rule out “a separate bond buying program”, or “tweaks” to the RBA’s Term Funding Facility, if doing so were likely to “get traction” in a future environment where “people ... want to invest and expand”
- ❑ The Governor re-iterated that the “expected increase in public debt” resulting from the blow-out in budget deficits is “entirely manageable and ... affordable”
  - and moreover that borrowing “today to help people, keep them in jobs and boost public investment at a time when private investment is very weak” was “the right thing to do”
- ❑ The RBA’s approach to the use of monetary policy in current circumstance is increasingly different from that of the RBNZ, whose Governor last month again flagged the possibility of negative interest rates, coupled with a ‘Funding for Lending Program’ to enable banks to lend to their customers at negative rates, and direct FX market intervention to push the NZ\$ lower (see [slide 122](#))
  - The RBNZ this month also announced an expansion (in size) and extension (in time) of its ECB-style bond-buying program (which is already three times as large, as a pc of GDP, as the RBA’s)

# Diminished risk appetite (following the decline in US stocks) and lower iron ore prices kept the A\$ below US73¢ this week

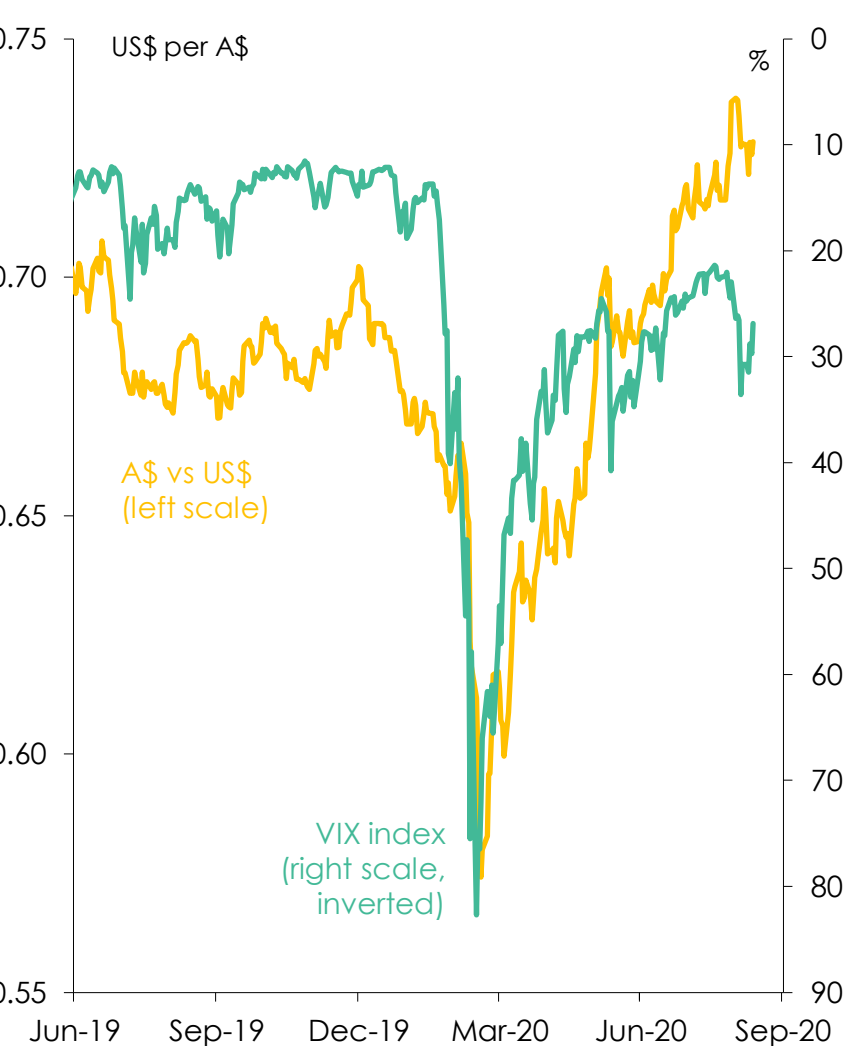
A\$-US\$ and spot iron ore prices



A\$-US\$ and US\$ trade-weighted index



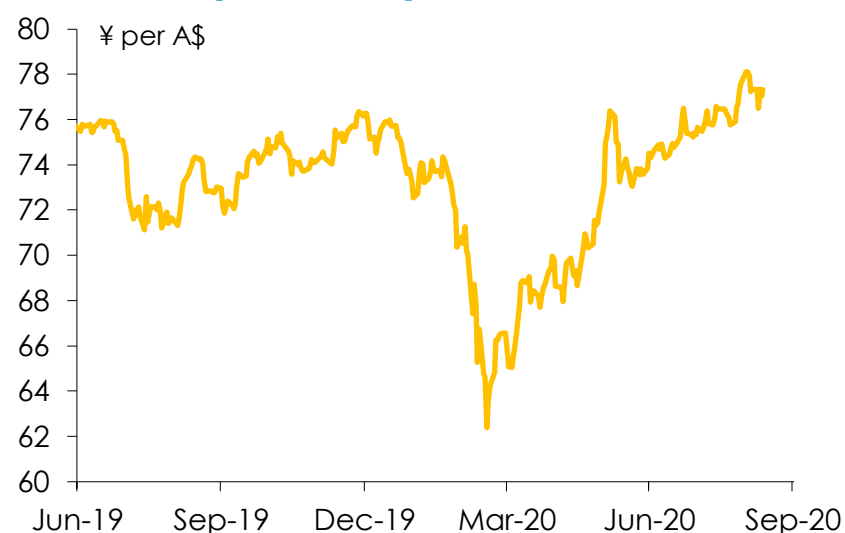
A\$-US\$ and US equity market volatility



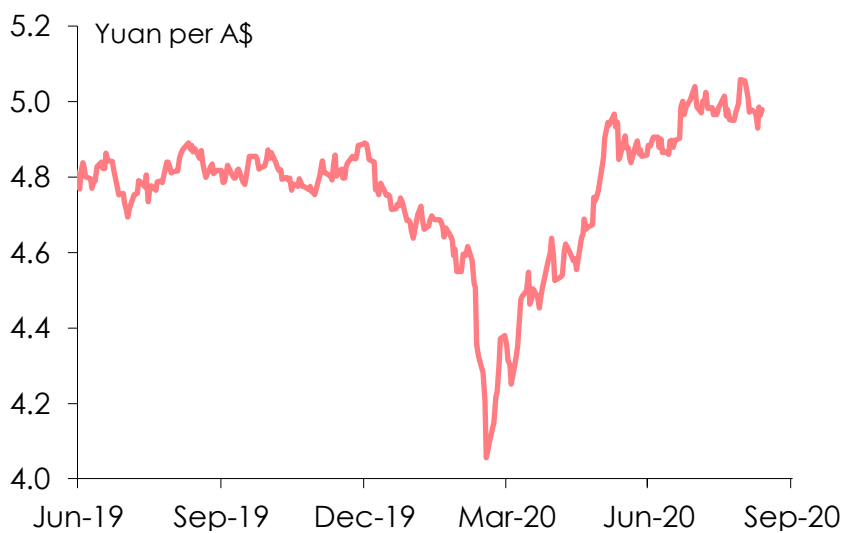
Note: The VIX index is a measure of the implied volatility of S&P500 options and is widely interpreted as an indicator of investor risk appetite or aversion. For an explanation of the factors underpinning the strength in the iron ore price see [slide 86](#) Source: Refinitiv Datastream. Data up to 11<sup>th</sup> September.

# The A\$ jumped 3¾% to a two-year high against the British pound after the £ slumped on news that the UK may fail to reach a trade deal with the EU

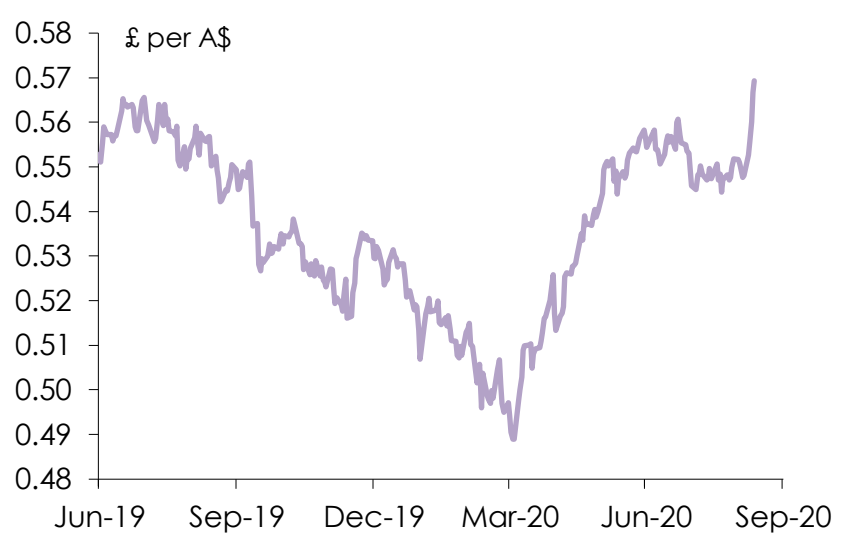
A\$ vs Japanese yen



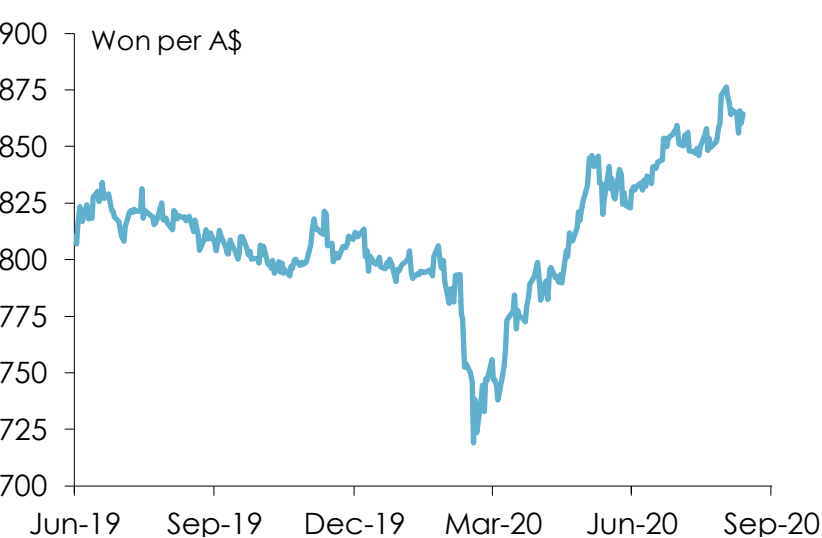
A\$ vs Chinese yuan



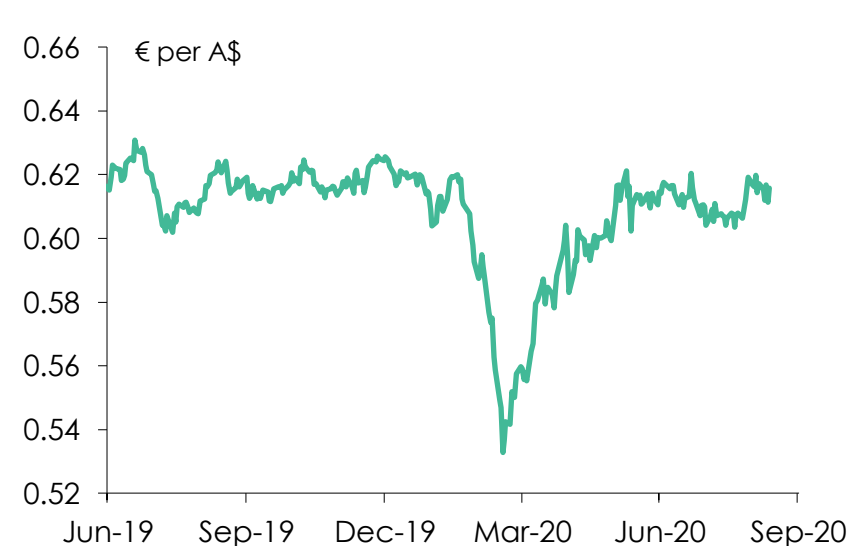
A\$ vs British pound



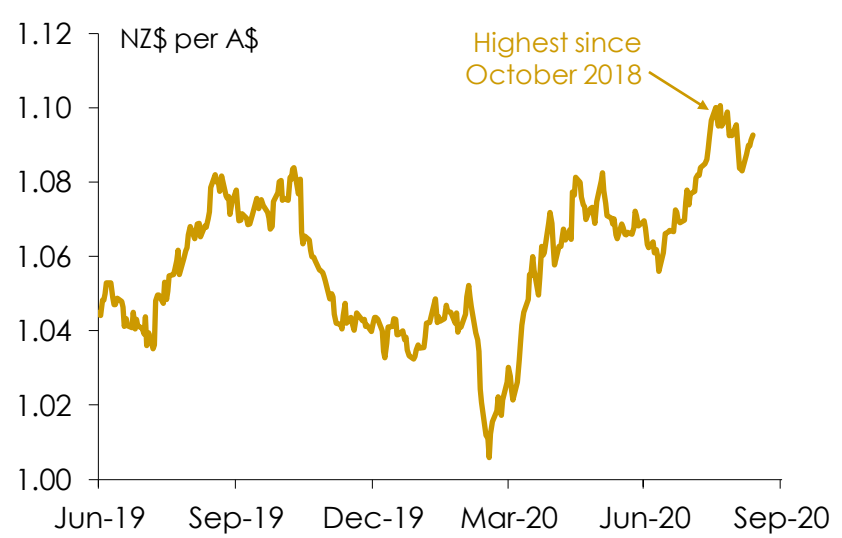
A\$ vs Korean won



A\$ vs Euro



A\$ vs NZ\$



# The factors which helped us achieve almost 30 years of continuous economic growth may not be so helpful in the post-Covid environment

Australia's record-breaking run of almost 30 years without two or more consecutive quarters of negative real GDP growth owed a lot to four factors -

## ❑ Population growth

- Australia's population grew at an average annual rate of 1.5% pa over the 19 years to 2019, compared with 0.6% pa for all 'advanced' economies
- net immigration accounted for 58% of this growth – ie, in the absence of immigration Australia's population would have grown by only 0.7% per annum, on average, and would have aged more rapidly

## ❑ Our unusual (for an 'advanced' economy) economic relationship with China

- China's rapid economic growth, industrialization and urbanization significantly boosted both the volumes and prices of many of our commodity exports, under-wrote the post-GFC mining investment boom, pushed down the prices of many of the things which we import, and contributed significantly to the growth of our tourism and education sectors
- By contrast, China's rapid economic growth undermined the competitiveness of manufacturing industries which account for a much larger share of most other 'advanced' economies, put downward pressure on the prices of their exports and put upward pressure on the prices of commodities which they import

## ❑ The 'housing boom'

- Australia's 'housing boom' started earlier (mid-1990s) and ended later (2017, rather than 2007-08) than in most other 'advanced' economies (some – such as Japan, Italy and France – didn't have a housing boom at all)
- the two-way interaction between rising house prices and rising household debt underwrote stronger growth in household consumption spending, for longer, than would have occurred otherwise

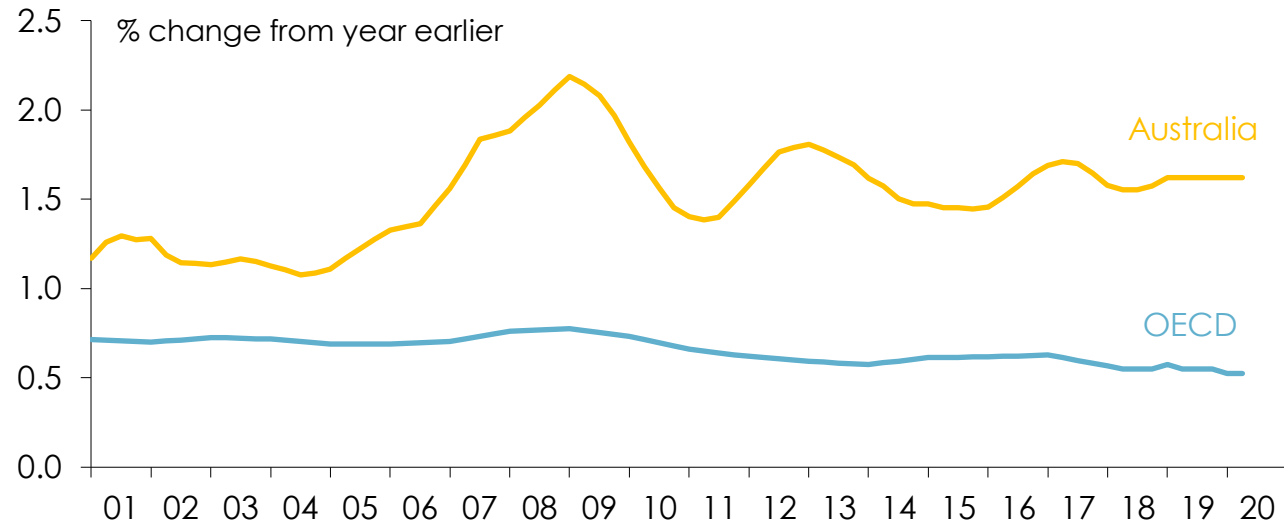
## ❑ **(Mostly) good macro-economic policy – especially by comparison with other 'advanced' economies**

- although we haven't done nearly as well as we once did on the micro-economic front (especially with regard to productivity)

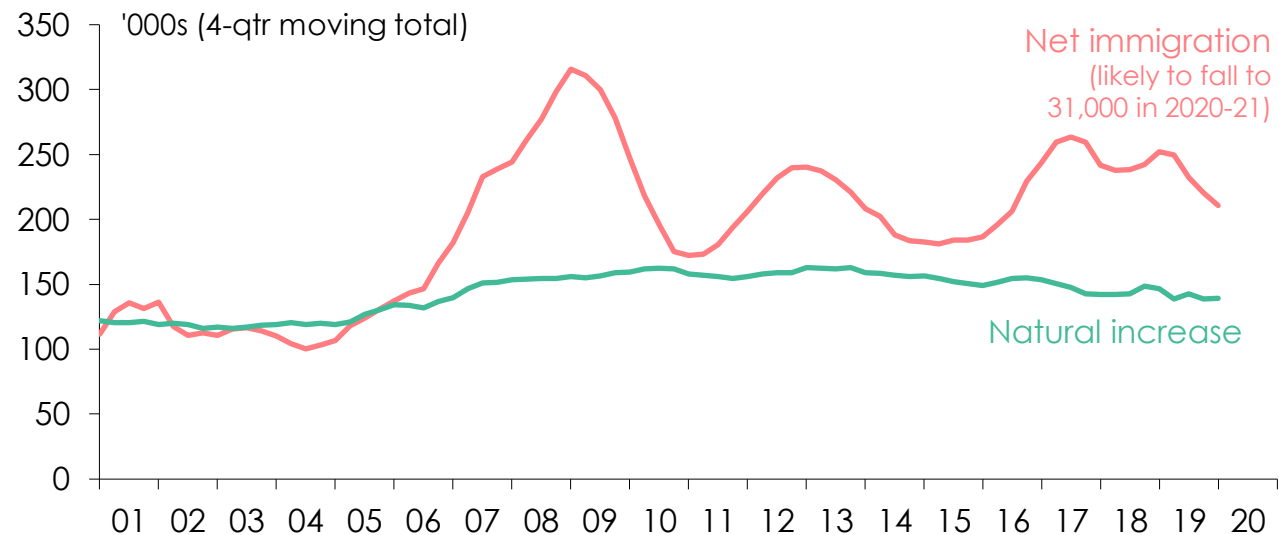
The first three of these are likely to be of less assistance from now on

# Australia's above-average economic growth over the past 20 years owes a lot to above-average population growth: that's about to change

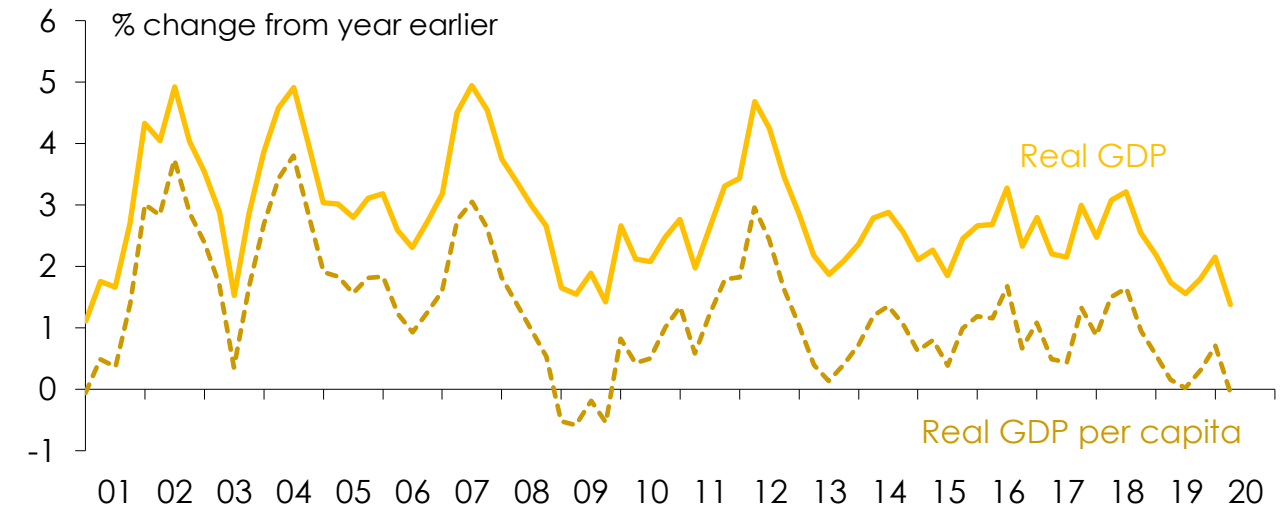
## Australia and OECD population growth



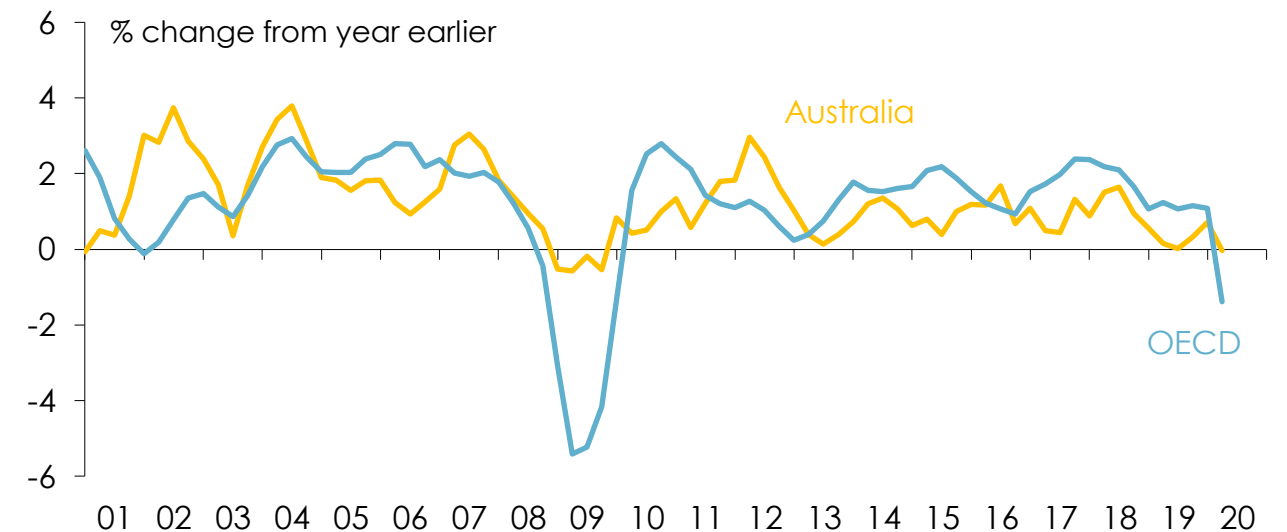
## Sources of Australia's population growth



## Australian GDP and per capita GDP growth



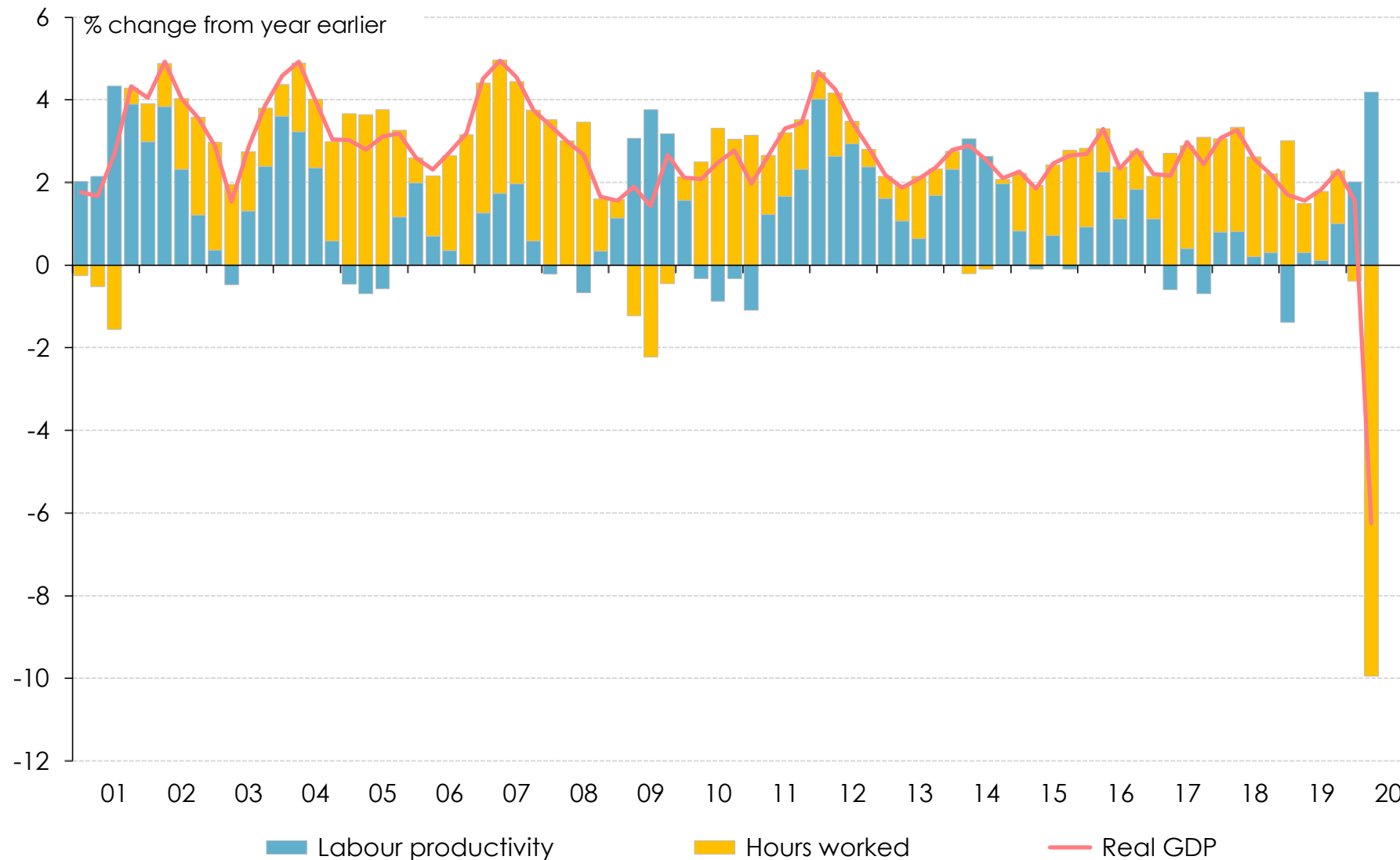
## Australia and OECD per capita real GDP growth



Note: Q2 2020 data not shown in the charts of GDP and per capita GDP growth. Sources: ABS; OECD.

# Australia has come to rely much more heavily on increased labour input to drive economic growth in recent years – we can't keep doing that

## Labour input and labour productivity contributions to Australian real GDP growth

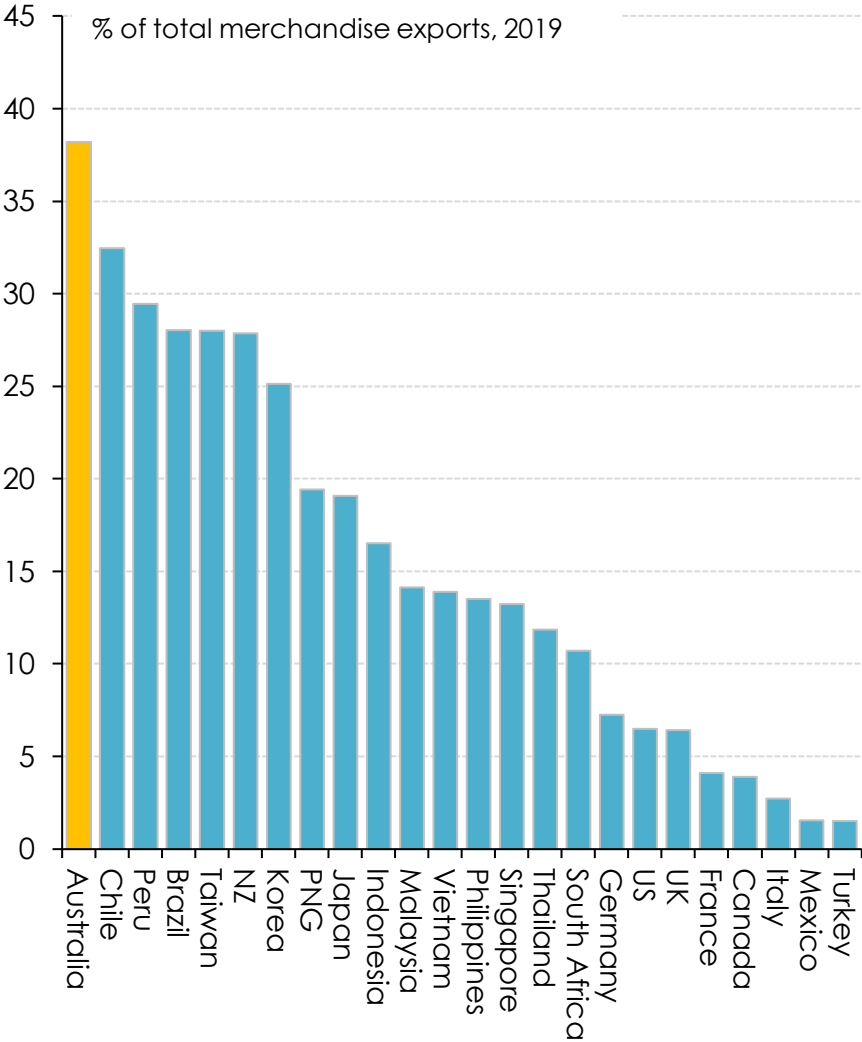


- Over the five years between the end of the 'mining boom' and the onset of the Covid-19 pandemic, 72% of Australia's real GDP growth came from increased labour input, and only 28% from labour productivity growth
- By contrast, between the end of the early 1990s recession and the onset of the global financial crisis, 46% of Australia's real GDP growth came from increased labour input and 54% from productivity growth

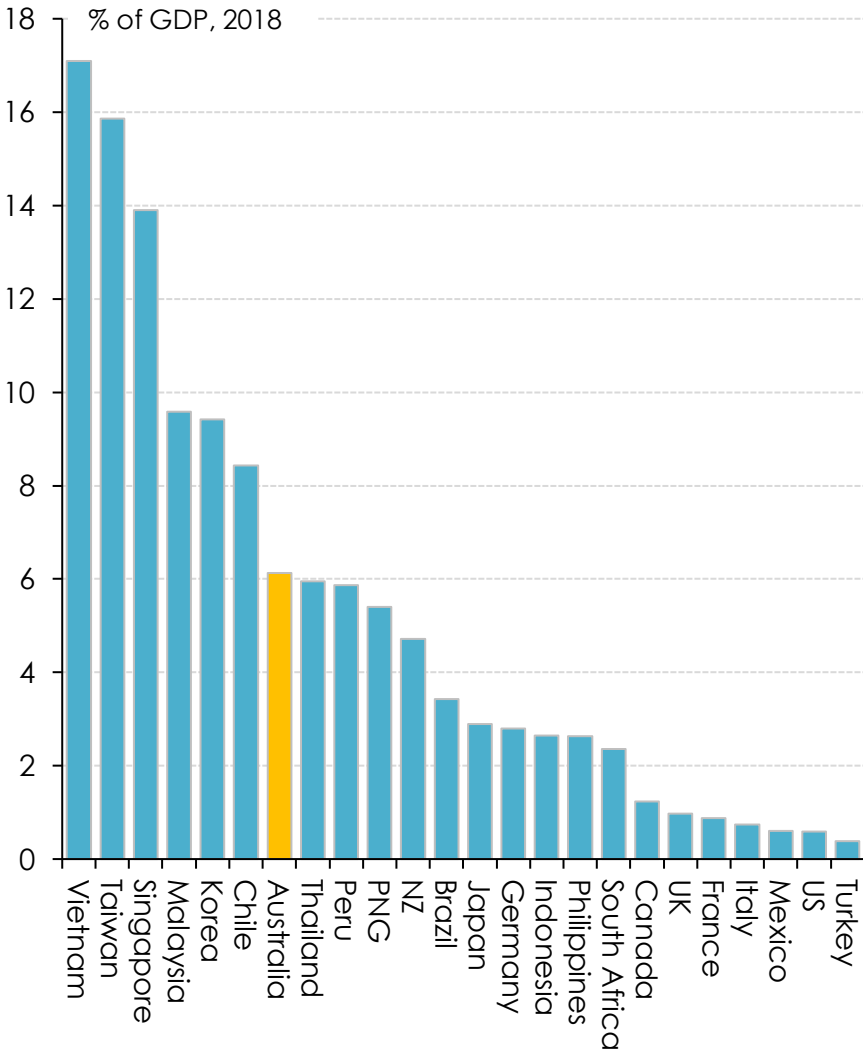
Source: ABS, [Australian National Accounts: National Income, Expenditure and Product](#), June quarter 2020; Corinna.

# Australia has benefited enormously from its economic relationship with China over the past 25 years, but will that continue to be the case?

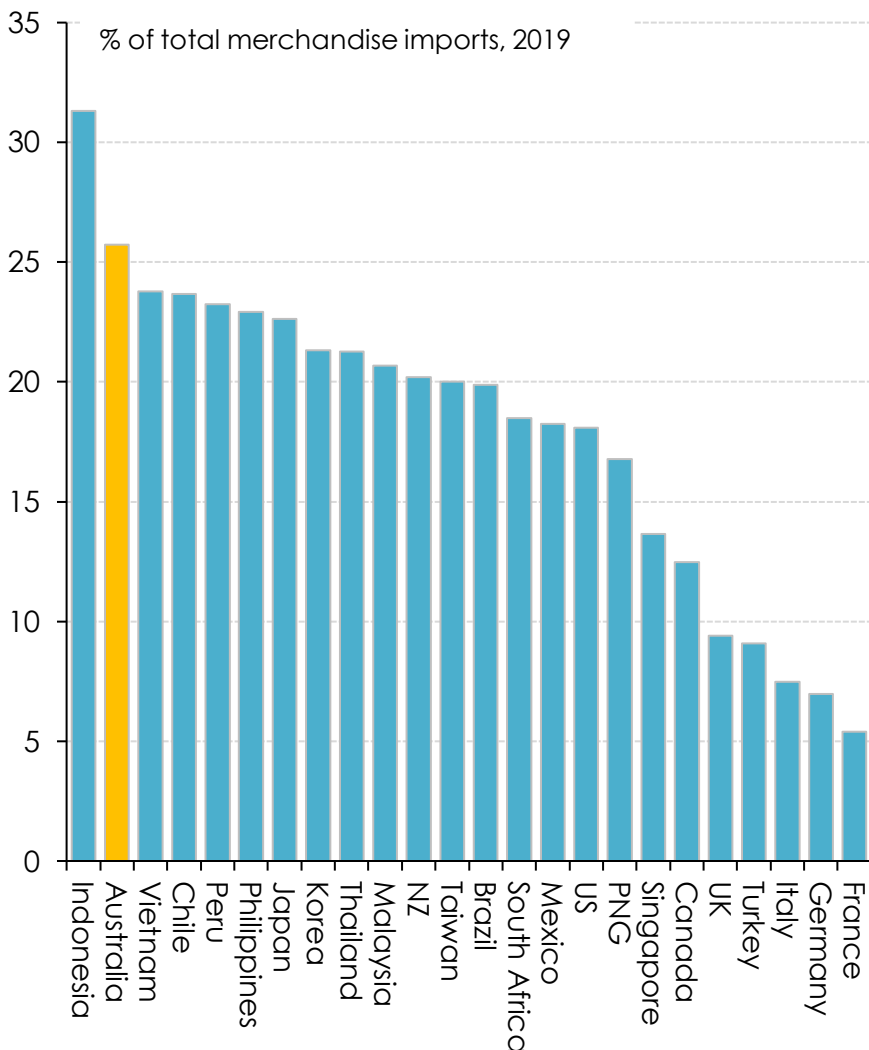
Merchandise exports to China as a pc of total



Merchandise exports to China as a pc of GDP



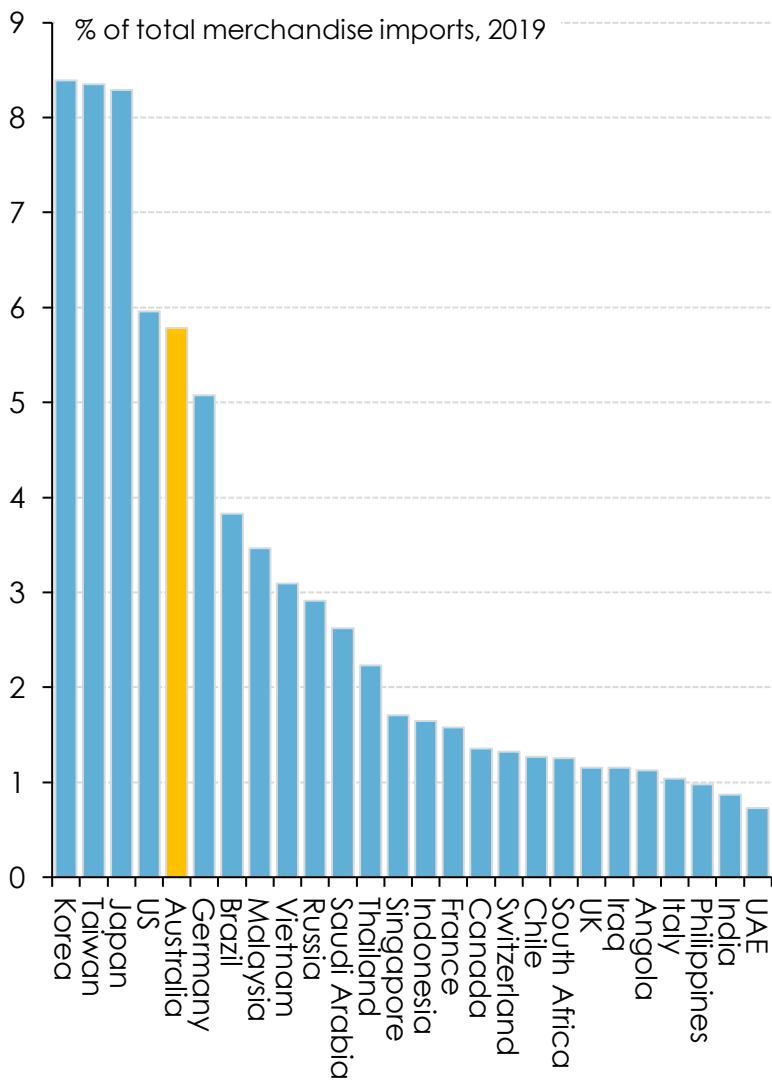
Merchandise imports from China as a pc of total



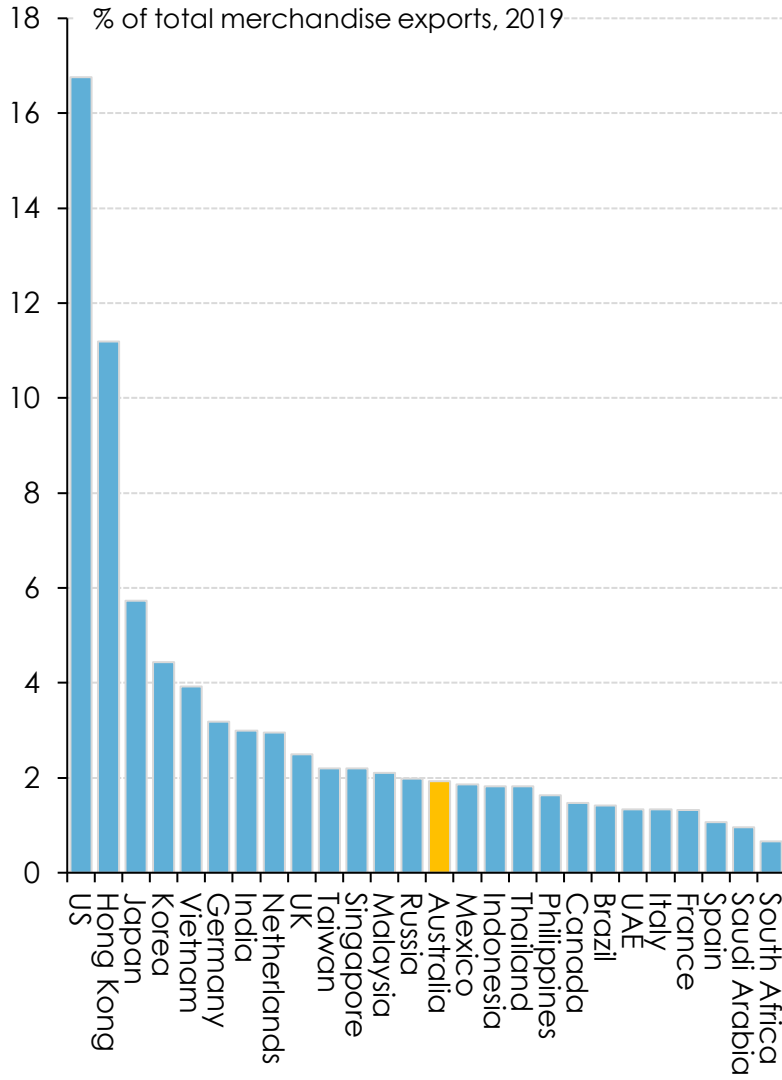
Sources: IMF, Direction of Trade Statistics; Taiwan Ministry of Economic Affairs, Bureau of Foreign Trade.

# Australia is China's 5<sup>th</sup> biggest source of imports (of goods), 14<sup>th</sup> biggest export market, and has the 2<sup>nd</sup>-largest bilateral trade surplus with China

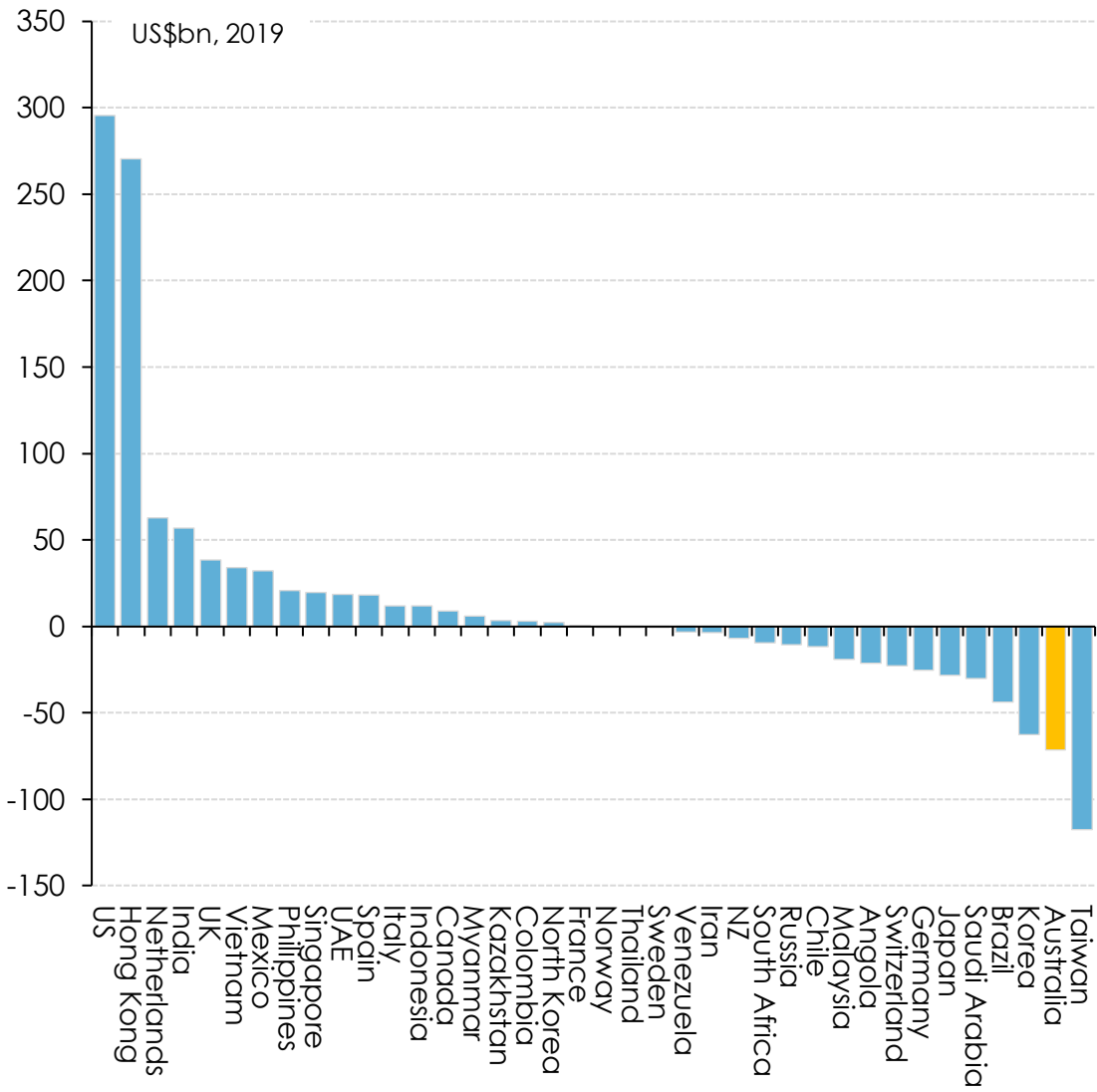
China's sources of imports



China's export destinations



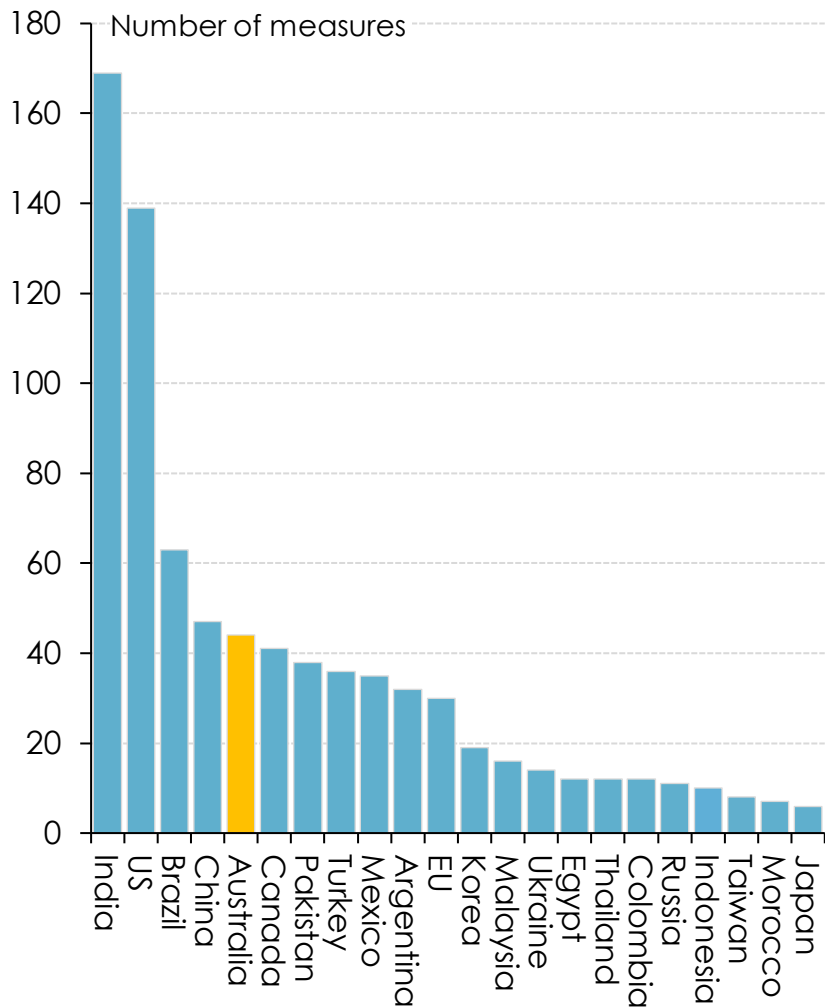
China's bilateral merchandise trade balances



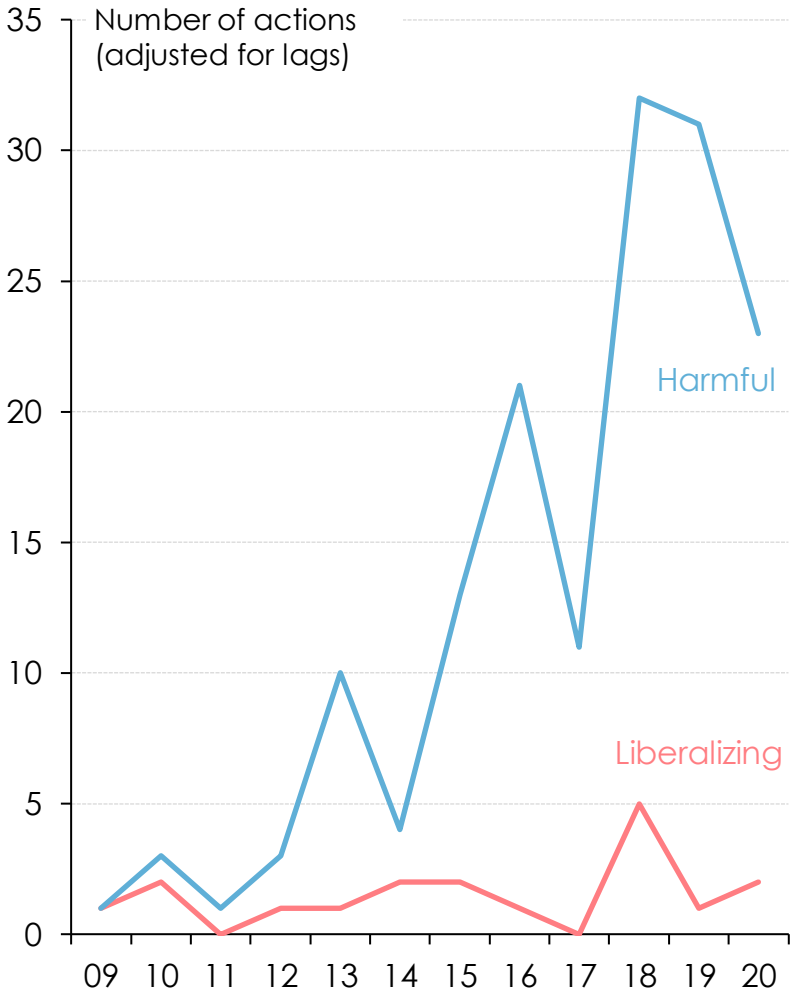
Source: International Monetary Fund, Direction of Trade Statistics.

# China's threats against Australian exports of barley, beef, wine, coal, tourism and education aren't justified, but we aren't 'Snow White' either

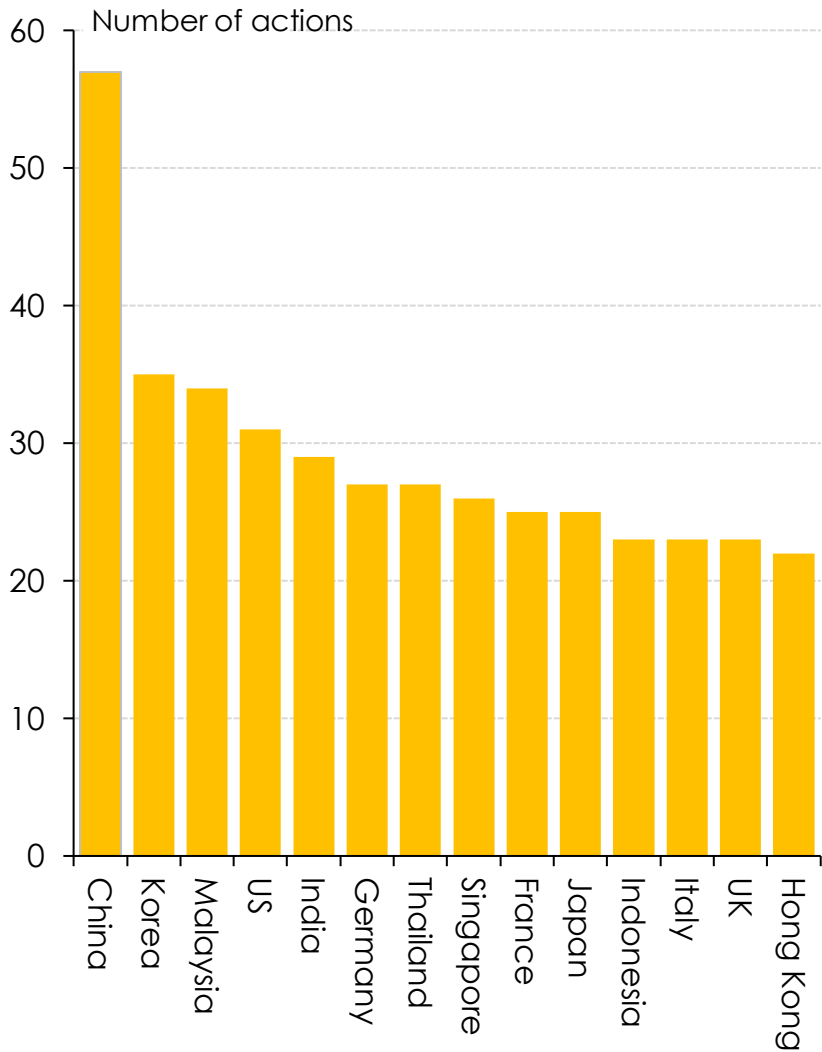
Number of anti-dumping measures imposed, 2015-19



Australian trade policy measures since 2009

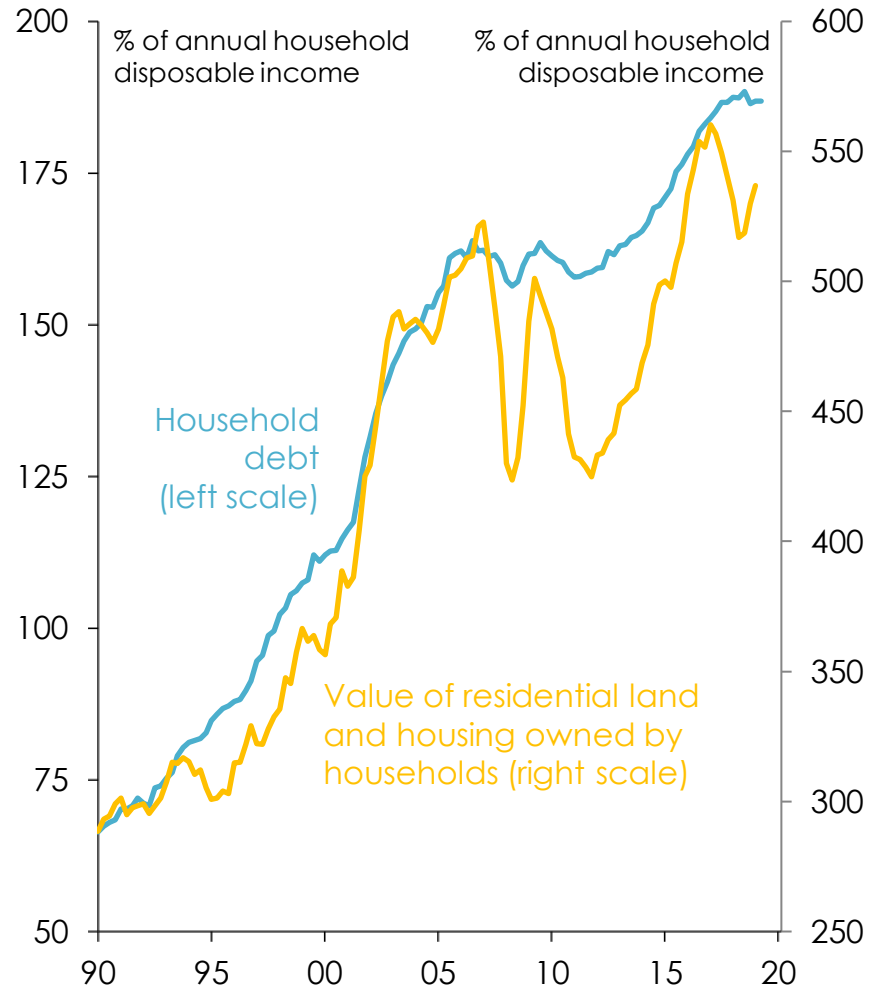


Countries adversely affected by 'harmful' Australian trade actions

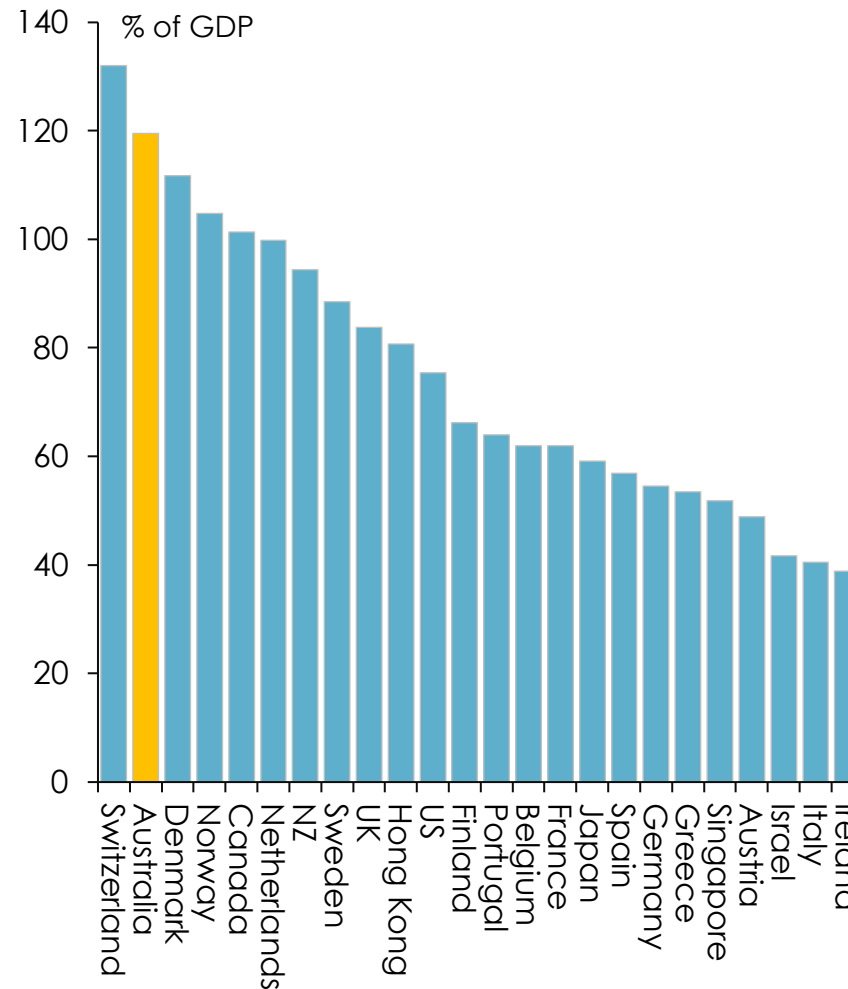


# Rising property prices and household debt are unlikely to underpin Australian economic growth as they have done for most of the past 30 years

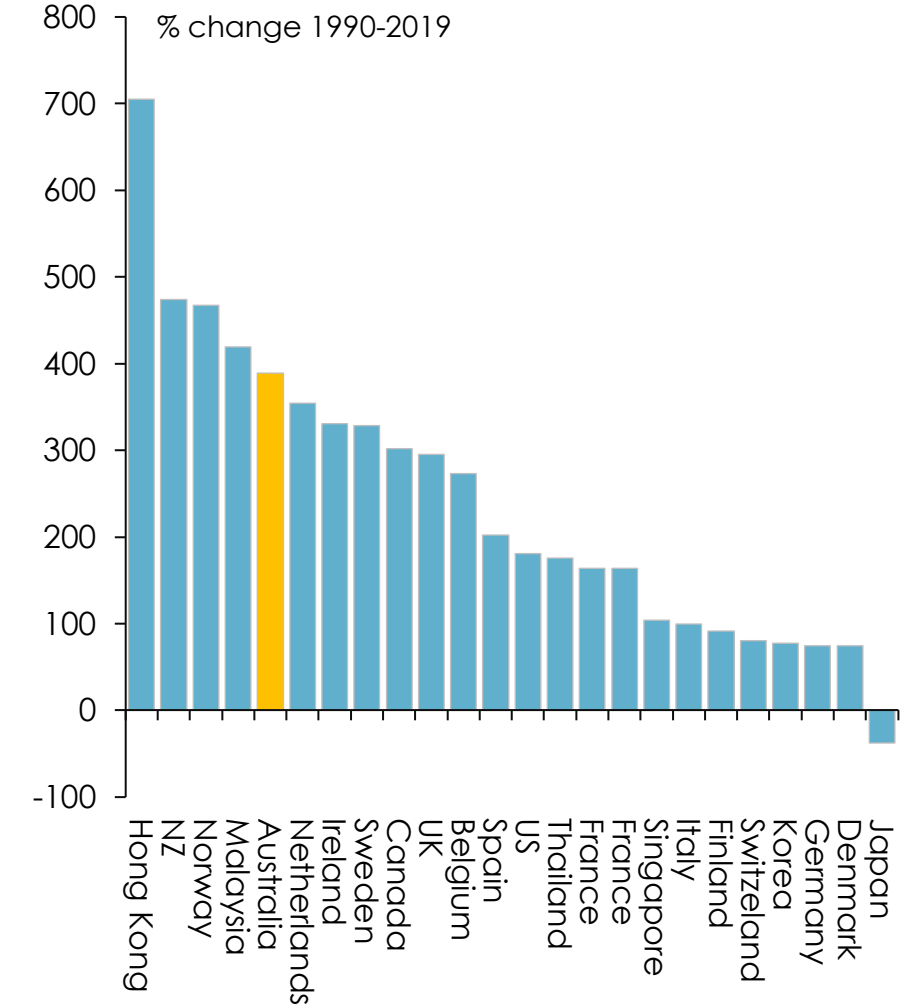
## Australian housing wealth and household debt



## Household debt as a pc of GDP, December 2019



## Increase in residential property prices, 1990-2019

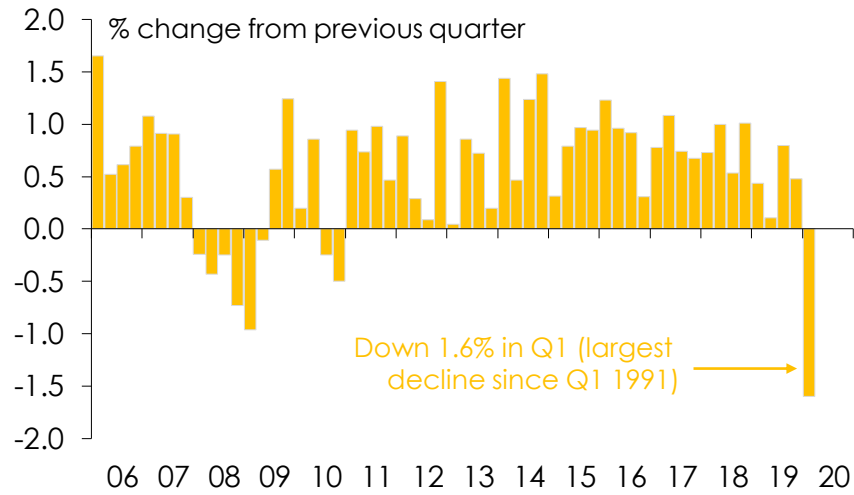


Note: Singapore property price increase is from March quarter 1999. Sources: ABS; Bank for International Settlements, [Property price statistics](#).

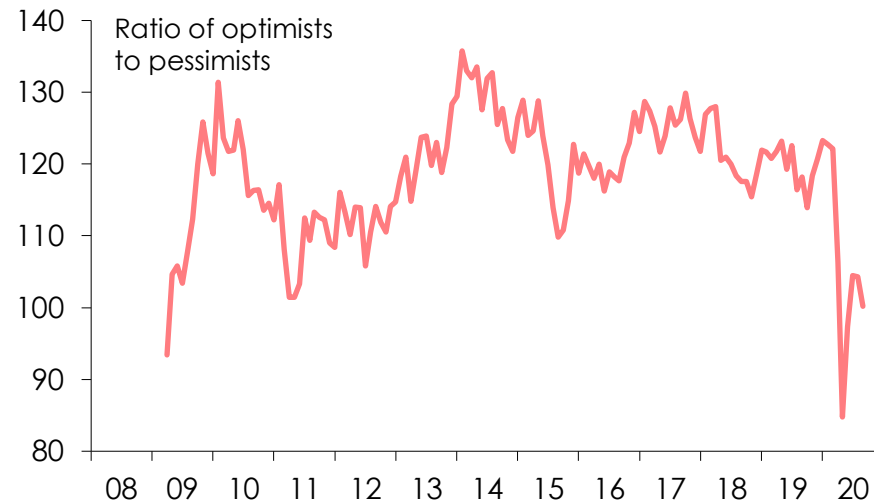
**New Zealand**

# New Zealand has thus far had a sharper economic contraction than Australia – although it has done (and will do) more by way of fiscal policy

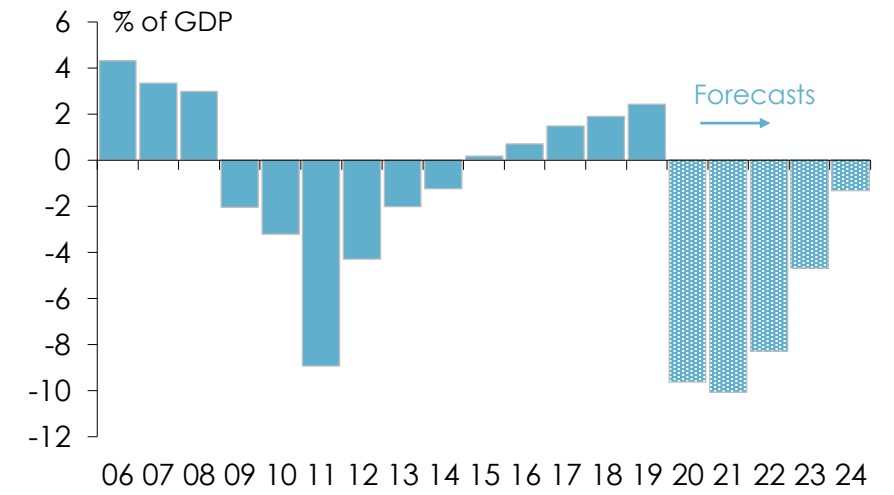
## Real GDP



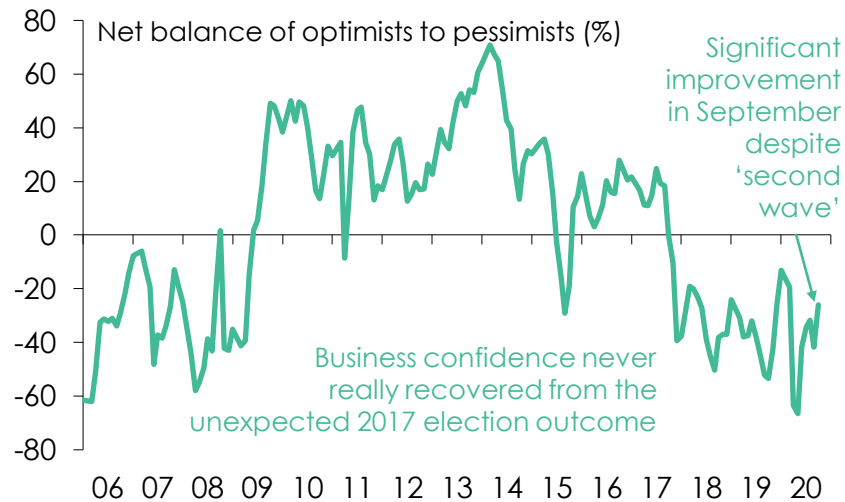
## Consumer confidence



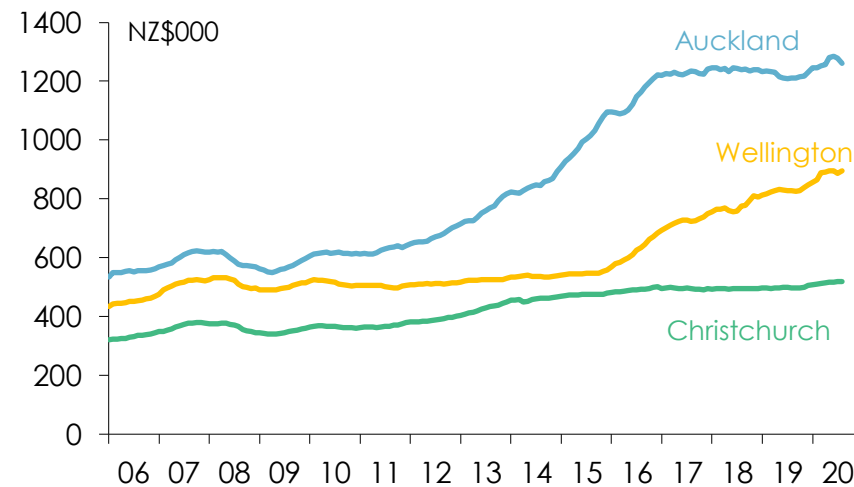
## NZ government budget balance



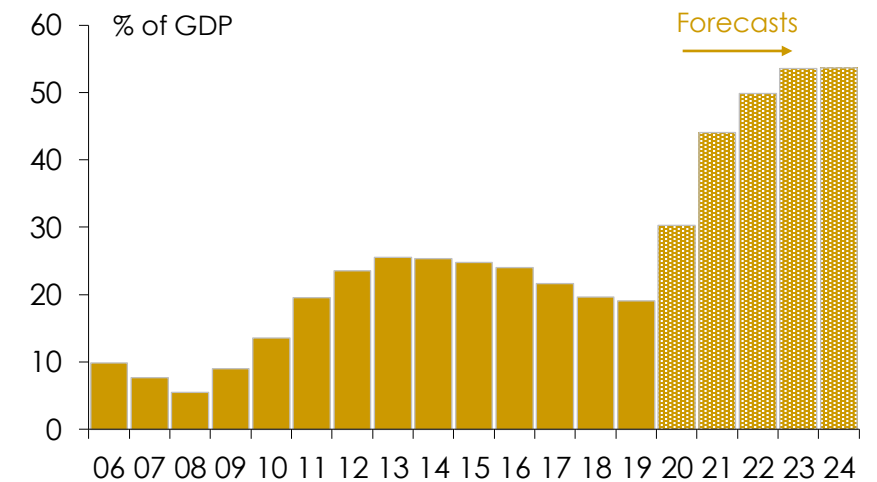
## Business confidence



## Residential property prices



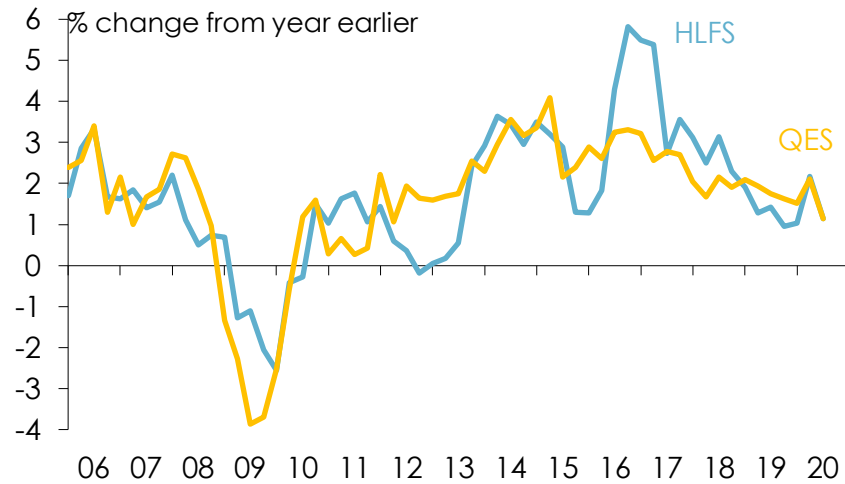
## NZ 'core Crown debt'



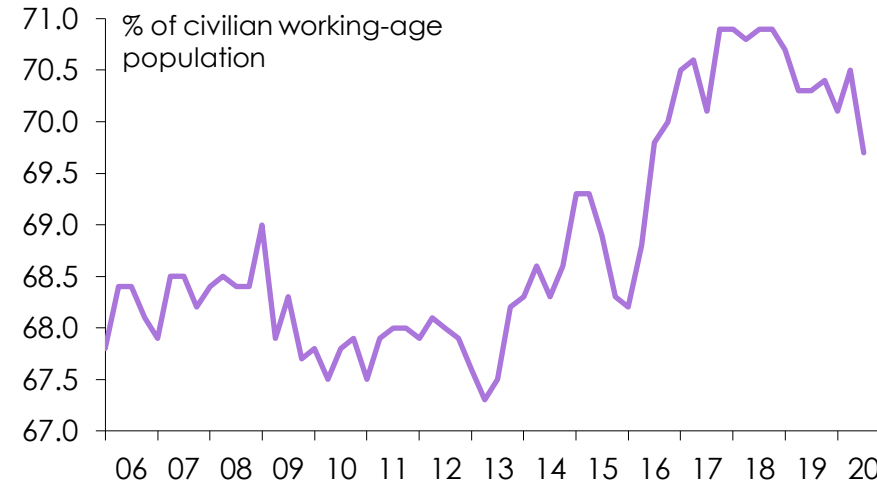
Note: New Zealand uses GDP(P) as its preferred measure of GDP. Unemployment rates are quarterly. The measure of the NZ Government budget balance is 'OBEGAL', operating balance excluding gains and losses (an accrual accounting measure). Net 'core Crown debt' excludes assets of the NZ Super Fund, student loans and other advances, and financial assets held for public policy purposes. Fiscal data (the two right-hand charts) are for fiscal years ended 30<sup>th</sup> June. Sources: [Statistics NZ](#); ANZ-Roy Morgan; ANZ Bank; Quotable Value NZ; NZ Treasury [Budget Economic and Fiscal Update](#) 2020. Q2 GDP estimates will be released on 17<sup>th</sup> September.

# New Zealand's wage subsidy scheme appears to have prevented a large rise in unemployment, although hours worked have fallen sharply

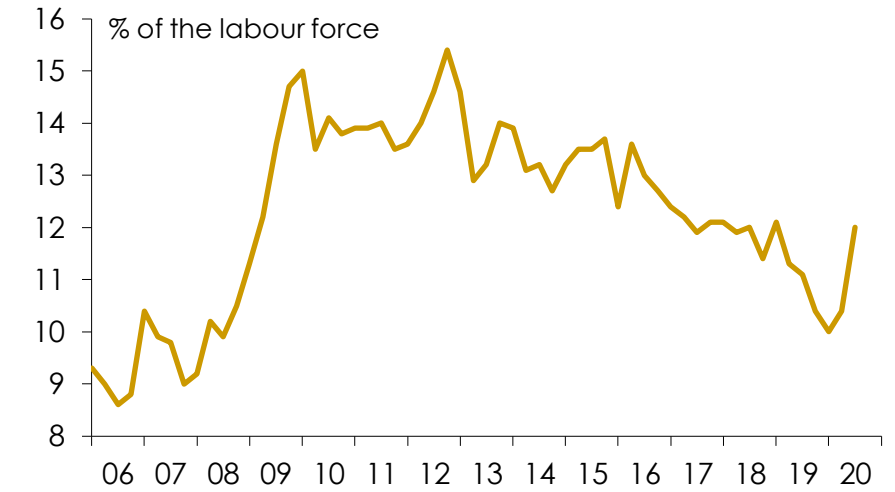
## Employment



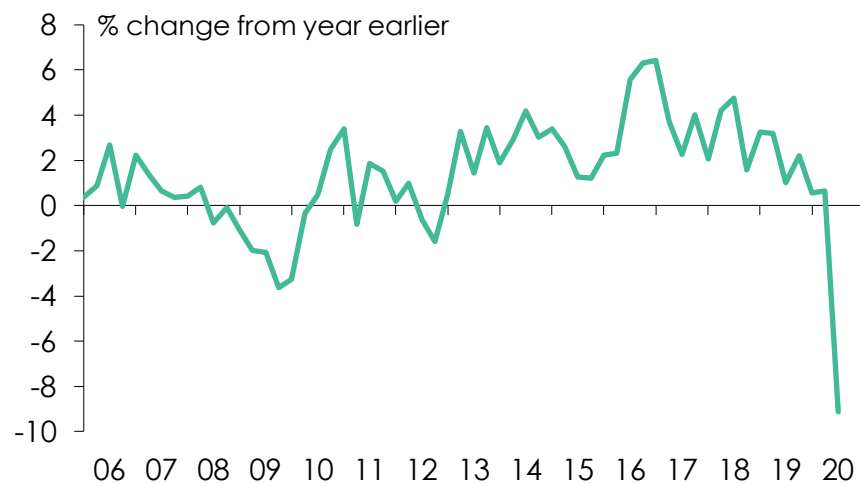
## Labour force participation rate



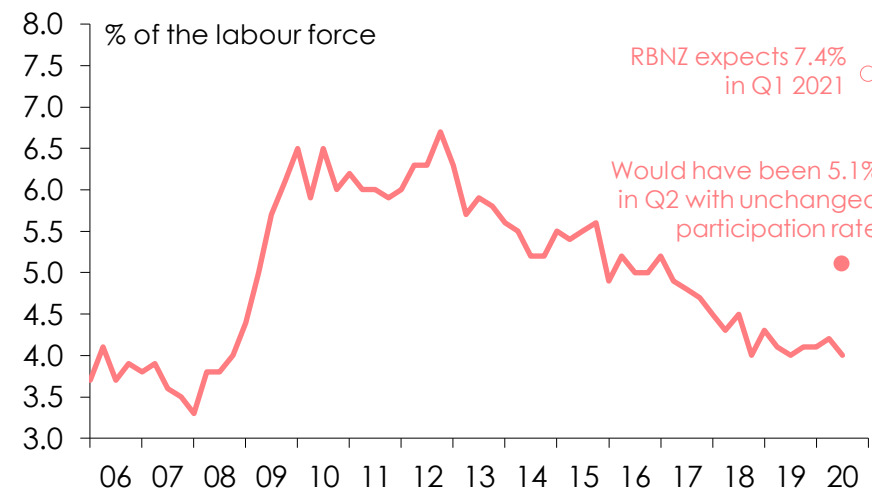
## Labour force under-utilization rate



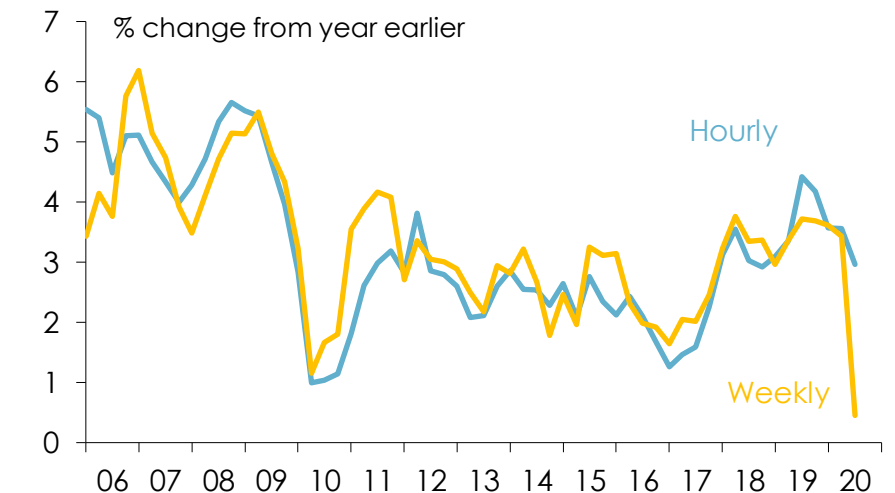
## Hours worked



## Unemployment rate



## Average weekly earnings

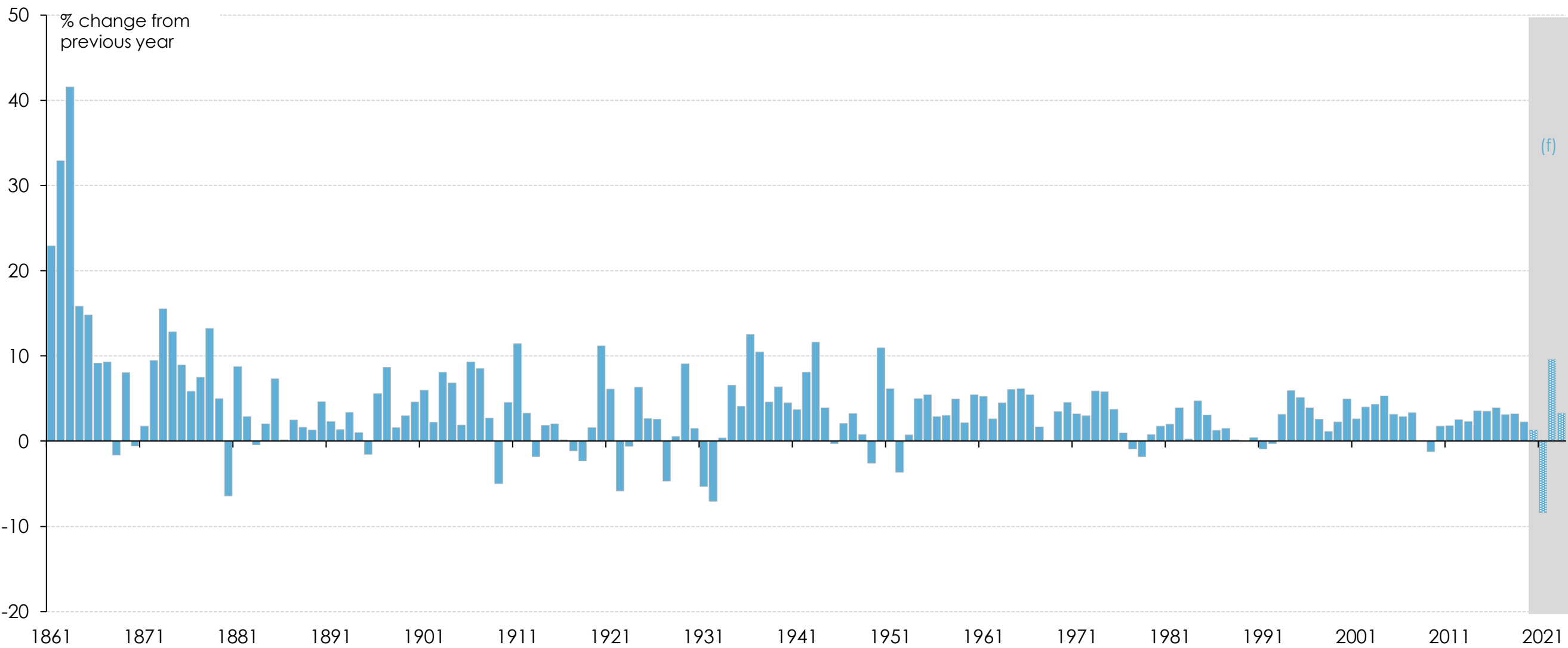


Note: New Zealand labour force data are only published quarterly. There are two 'headline' series on employment – the household labour force survey (HLFS) which counts the number of people in employment during the quarter; and the quarterly employment survey (QES), which counts the number of 'filled jobs' at 'economically significant enterprises' in the 'reference week' in the middle of the quarter, excluding the self-employed and those working in agriculture and fishing. The labour force under-utilization rate measures those who are unemployed plus those who are employed part-time but working fewer hours than they are able and willing to work.

Source: [Statistics NZ](https://www.stats.govt.nz/). September quarter data will be released on 4<sup>th</sup> November.

# The Reserve Bank of New Zealand is expecting the fall in real GDP in the year ended March 2021 to be the biggest in recorded NZ history

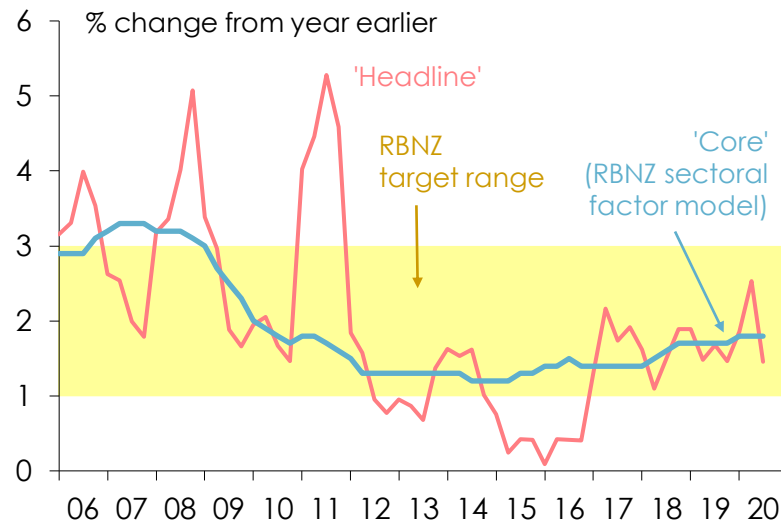
Annual growth in New Zealand real GDP, 1861-2023



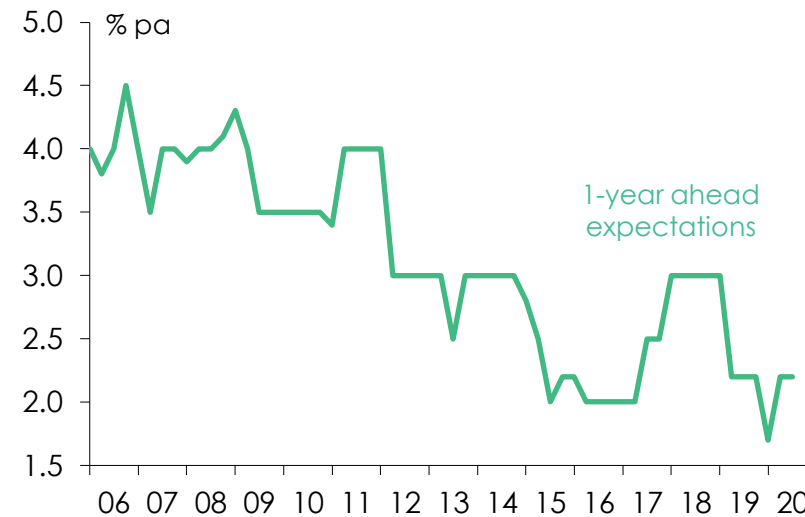
Note: Forecasts are for years ended 31 March. Source: RBNZ, [Monetary Policy Statement](#), May 2020.

# Inflation remained comfortably in the RBNZ's target band in the June quarter

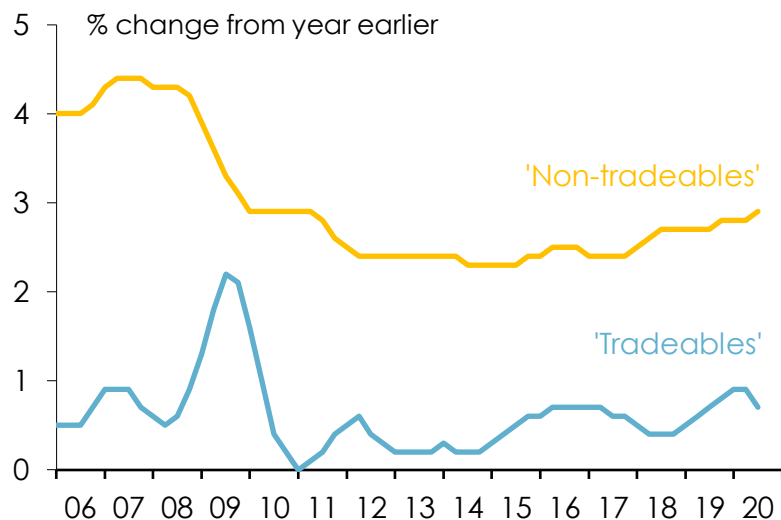
## Consumer prices



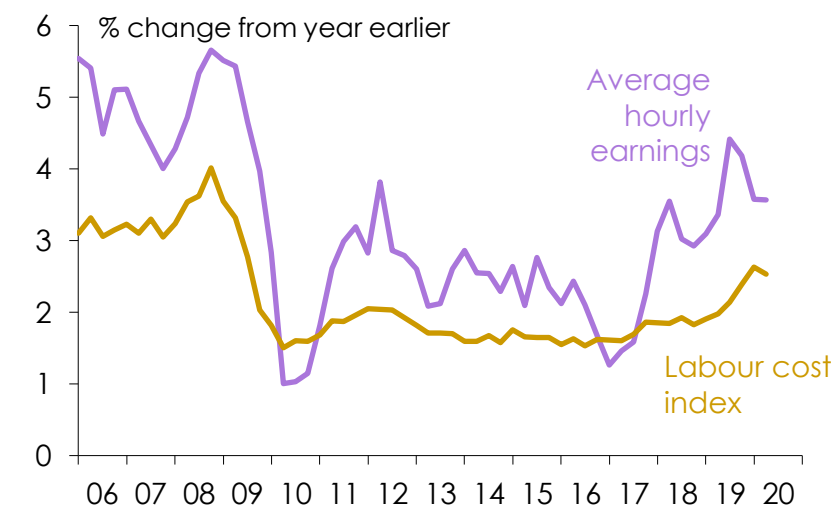
## Household inflation expectations



## Components of 'core' inflation



## Labour costs

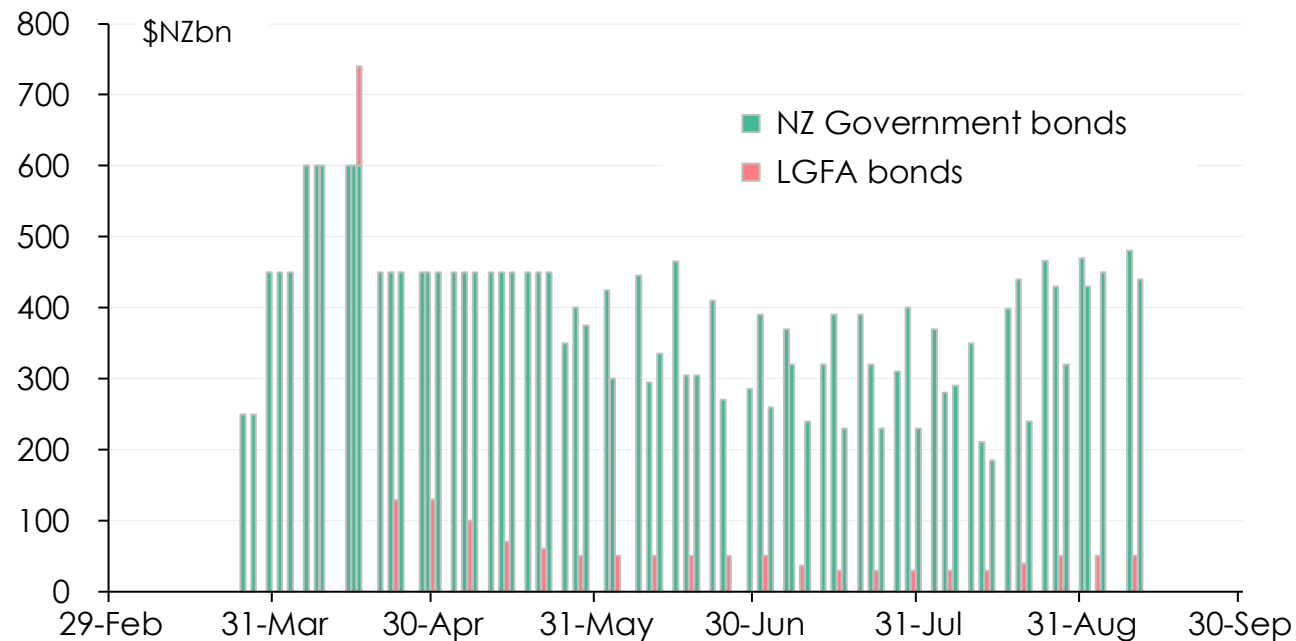


- ❑ The CPI fell 0.5% in the June quarter, reflecting a 12% fall in petrol prices, partly offset by a 16% increase in food prices and SNZ's inability to capture fully the effect of freeze on residential rents between 26<sup>th</sup> March and 25<sup>th</sup> September
- ❑ The June quarter result cut the annual 'headline' inflation rate to 1.5%, from the 8-year high of 2.5% recorded in the March quarter (which resulted from large increases in rents, food and cigarette & tobacco prices)
- ❑ The annual 'core' inflation rate remained unchanged at 1.8%, with a further slight acceleration in 'core' non-tradeables inflation (to its highest level in 9 years) offset by an easing in 'core' tradeables inflation
- ❑ Inflation expectations remain low, and pressures from labour costs are likely to abate given the weakening in the labour market since March

Sources: [Statistics NZ](#); Reserve Bank of New Zealand. September quarter CPI will be released on 23<sup>rd</sup> October.

# The RBNZ has expanded its 'QE' program, floated the possibility of negative rates (again), as well as a 'funding for lending' program

## RBNZ open market bond purchases



## New Zealand interest rates

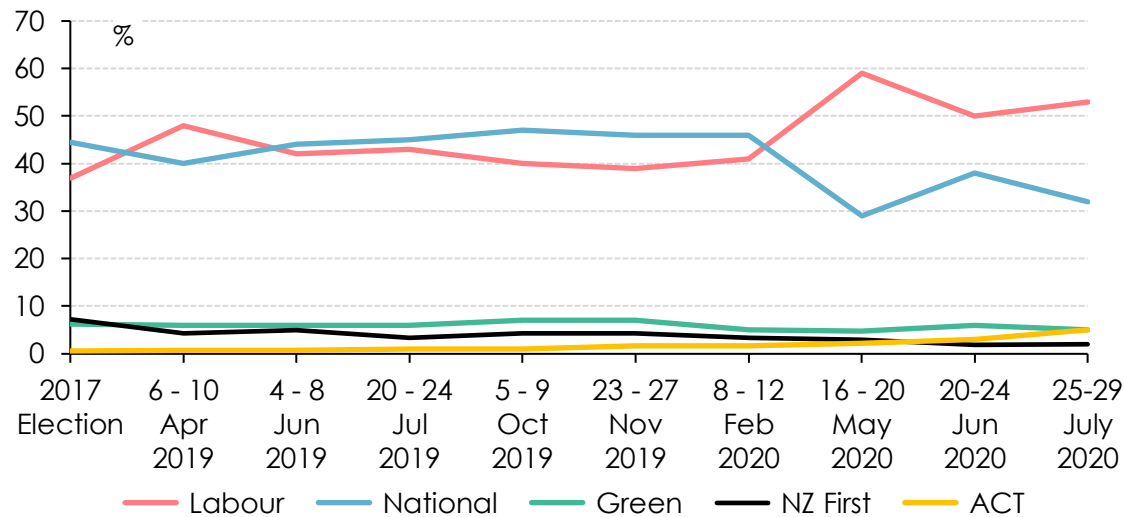


- ❑ RBNZ has adopted an ECB-style QE, establishing a Large Scale Asset Program initially set at \$NZ33bn (10½% of GDP), increased to \$60bn (19% of GDP) in May, and last month to \$100bn (32% of GDP) by June 2022
- ❑ This week the RBNZ bought NZ\$970mn of bonds, the smallest in four weeks, and bringing its total purchases since 25<sup>th</sup> March to \$NZ29.4bn (9.5% of GDP): 3- and 5-year yields traded down to 0.01% and 0.05% this week
- ❑ At last month's RBNZ Monetary Policy Committee meeting the RBNZ again floated the possibility of a negative OCR target, possibly backed by a 'Funding for Lending Program' to make funds available to banks at close to the OCR (on the understanding that they in turn lent to their customers at negative rates), as well as outright purchases of foreign assets in pursuit of a lower NZ\$

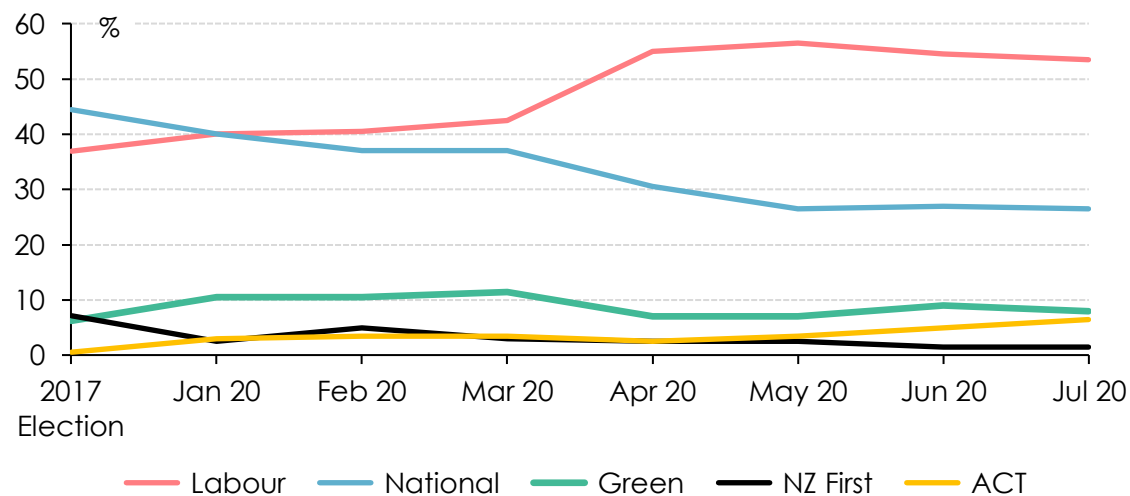
Note: LGFA = Local Government Financing Authority. Source: Reserve Bank of New Zealand, [Statistics](#) Tables B2 and D3. Data up to 11<sup>th</sup> September.

# PM Jacinda Ardern's Labour Party continues to hold a commanding lead in opinion polls for the 17<sup>th</sup> October election

## Colmar-Brunton 1-News poll



## Roy Morgan poll



Note: 'ACT' is the Association of Consumers and Taxpayers, a libertarian party which currently holds one constituency seat in the NZ Parliament. Sources: [New Zealand Electoral Commission](#); [Colmar Brunton](#); [Roy Morgan Research](#).

- ❑ New Zealand uses a 'mixed member proportional' (MMP) system to determine the composition of its 120-seat Parliament
  - each voter has two votes, one for his or her constituency and one for a party list
  - 71 members are elected from constituencies, while the other 49 are chosen from party lists such that each party has the same share of seats in the Parliament as its share of the national vote, provided it has won at least 5% of the national vote or one constituency seat
- ❑ At the 2017 election, the then incumbent centre-right National Party won 56 seats with 44.6% of the vote, but Labour which won 46 seats with 36.9% of the vote was able to form government in coalition with the conservative-populist NZ First (9 seats with 7.2% of the vote) and the Greens (8 seats with 6.3% of the vote)
- ❑ This week Labour promised to introduce a new top personal income tax rate of 39% on incomes over NZ\$ 180K (currently the top rate is 33% and it applies to incomes of over NZ\$70K)
- ❑ For the second time this year, National changed leaders, installing Judith Collins (known to her colleagues as 'Crusher' Collins) after the resignation of Todd Muller for 'health reasons'
- ❑ The most recent poll, by Roy Morgan, if repeated at the election would give Labour enough seats to govern in its own right
  - The NZ First Party of veteran Deputy PM Winston Peters would lose all its seats, while the libertarian ACT could potentially win six seats

**Some possible longer-term consequences**

# Some other possible longer-term consequences of the pandemic

- ❑ **An accelerated retreat from 'globalization'**
  - prompted by mistrust of international supply chains and desire for greater self-sufficiency in 'essential' products
  - greater government control over movement of people and capital across international borders likely to persist
- ❑ **Greater expectations of government**
  - having done things previously considered 'unthinkable' during this downturn, governments may be expected to do more during future downturns
  - there may as a result be heightened demand for hitherto unprecedented government intervention to address other issues (for example climate change)
- ❑ **A reduced role for (conventional) monetary policy in managing economic cycles**
  - implying a greater role for fiscal policy (or, alternatively, bigger and perhaps more frequent cycles)
  - and as Treasury Secretary Stephen Kennedy has pointed out, "it is highly likely that fiscal multipliers are larger when interest rates are near zero and expected to remain there for the foreseeable future"
- ❑ **Changes in ways of working**
  - at least some employers and employees are likely to maintain the option of (or preference for) 'working from home'
  - possible implications for demand for commercial office space
- ❑ **Diminished use of mass transit (see [slide 57](#) and [slide 75](#))**
- ❑ **Accelerated decline in the use of cash for transactions (see [slide 79](#))**
- ❑ **Re-think of relationships with China (see [slide 88](#) and [slides 113-115](#))**
  - especially challenging for Australia given our unusual (for an 'advanced' economy) economic relationship with China
- ❑ **Erosion of respect for US leadership and competence**
  - unless Trump loses the November election (see [slide 45](#)) and Biden can reverse the damage done to perceptions of US credibility, competence and commitment

This document has been prepared by Saul Eslake on behalf of Corinna Economic Advisory Pty Ltd, ABN 165 668 058 69, whose registered office is located at Level 11, 114 William Street, Melbourne, Victoria 3000 Australia.

This document has been prepared for the use of the party or parties named on the first page hereof, and is not to be further circulated or distributed without permission.

This document does not purport to constitute investment advice. It should not be used or interpreted as an invitation or offer to engage in any kind of financial or other transaction, nor relied upon in order to undertake, or in the course of undertaking, any such transaction.

The information herein has been obtained from, and any opinions herein are based upon, sources believed reliable. The views expressed in this document accurately reflect the author's personal views, including those about any and all financial instruments referred to herein. Neither Saul Eslake nor Corinna Economic Advisory Pty Ltd however makes any representation as to its accuracy or completeness and the information should not be relied upon as such. All opinions and estimates herein reflect the author's judgement on the date of this document and are subject to change without notice. The author and Corinna Economic Advisory Pty Ltd expressly disclaim any responsibility, and shall not be liable, for any loss, damage, claim, liability, proceedings, cost or expense ("Liability") arising directly or indirectly (and whether in tort (including negligence), contract, equity or otherwise) out of or in connection with the contents of and/or any omissions from this communication except where a Liability is made non-excludable by legislation.

Any opinions expressed herein should not be attributed to any other organization with which Saul Eslake is affiliated.

---

SAUL ESLAKE