17 January 2022

Macro Weekly

Week 3/2022

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- Highlights
- The world around us
- The Norwegian economy
- Market charts & comments

Last week: The virus, some pretty good news

Rapidly towards the end of the pandemic, at least in the vaccinated part of the world

- **The Omicron waves** are steep, high at the peak but very short lived – and far less harmful than the previous variants
  - **Cases** have fallen sharply in South Africa, and last week UK joined in. Growth is slowing in Denmark, where 4% of the population was infected last week (plus a lot of hidden cases, we assume). Two weeks ago cases were exploding in many countries, last week growth slowed. Testing policy/capacity may now influence case data but face value, a good sign
  - **Hospitalisation** rates have fallen sharply, approx. by 50%, and in some cases more. The no. hospitalised persons is falling in several countries, and that takes place even if cases are still rising sharply. Hospitalisations in Denmark, Norway are on the way down
  - Just as important, the **need for ICU beds has fallen sharply** most places, by up to 60 – 70%, if hospitalised. In UK, Denmark and Norway the no. of ICU patients is falling rapidly. In Norway the ICU rate has not yet fallen, very likely as many Delta patients are still in hospitals
  - **The US is a borderline case**, with a record high no. of hospitalised persons, and still a steep increase in patients in ICU beds – which may rise to ATH too, as the no. of cases in still growing rapidly. However, growth is slowing, and in some hotspots (like New York), the cycle has peaked, both regarding infections, and hospital occupancy, the latter an undisputable hard fact
  - The reason for the US problem is very likely a **low and uneven vaccination rate**. Those unvaccinated (or immune due to previous infections) may have a 18 x higher risk for hospitalisation (Norwegian data) and perhaps even higher for need for ICU assistance
  - **China is perhaps not even a borderline case.** The combination of a very contagious variant, with an R0 at 2.5 – 3 times Delta (and Delta managed 3 – 4 new infections per infected), few people that are immune due to previous infections, a vaccine that is not that effective, and a zero tolerance policy will require long lasting, extreme restrictions too succeed (if possible at all). Supply chain disruptions due to Chinese lockdowns may become a global challenge
  - There are still many reports (but few hard data) that many more patients **are admitted to hospitals with Covid, but due to other diagnoses**, and not due to Covid illness
- Taken together, it seems **very likely that Omicron is not able to create too much trouble** in countries with a high vaccination rate
  - It is rather the opposite, as Omicron burns rapidly through the population without creating too much sickness and need for hospital support, even more immunity is build up, hopefully vs. future variants, at least vs. serious illness

Last week: The economy, part I

- **Global Auto Sales**
  - Sales rose some 1% in December, and the short term trend is up. Still, sales are down 15% vs the 2019 average level. China is 4% above, most others -27 to – 30% (except Norway, +54% ☺). Global 2022 total sales were down 9% vs. 2019. Auto production has gained some pace recent months, especially in Germany (but auto production fell in the US in Dec)
- **China – mediocre growth, and 2 signal rates cut this morning**
  - **H2 was stronger than assumed/expected** but growth slowed in 2021, partly due to corona (services) but construction starts have fallen in a spectacular way (without so far crunching the Chinese economy, or hurting the global economy. Still, growth has clearly slowed and the construction sector is struggling. The authorities are trying to keep growth up – and to stimulate at least some segments of the credit market Investments , construction. The POBC cut two more signal rates this morning, by 0.1 pp – and may cut more
    - **Credit growth** slowed m/m in Dec but has accelerated from the local through in early 2021 – though mostly due to local governments bond issuances – they have to pick up some bills from the construction sector, including less sale of land?
    - **Investments** were a tad stronger than expected in Dec, but still up just 0.2%. **Construction starts** fell sharply again but sales have stabilised since last Sept – and the inventory of unsold homes is reduced. **House prices** have been falling since August but at a measured pace, and does not signal that housing 'investors' have fled the market
    - **Retail sales** has flattened, and was much weaker than expected in December (but we estimate a 0.4% volume growth in Dec)
    - **Industrial production** rose further in Dec, as did **service sector production**
    - **CPI inflation** is low, and declining, and **PPI inflation** has probably peaked
    - **Exports** rose marginally in Dec, **imports** fell more and was almost 10% weaker than expected. The **trade surplus** was the highest ever. Export volumes are far above the strong pre-pandemic trend, imports are slightly below but has fallen since the spring
- **USA**
  - **CPI inflation** accelerated further, in line with (total) or above expectations (core). Price inflation is probably close to the peak as energy inflation very likely will slow down. However, beneath energy, price inflation on other goods and services is broadening, and underlying inflation is well above 2%. In the **SME survey**, even more companies reported they plan to lift prices the coming months. This survey also reported an unprecedented gap between supply and demand challenges for these businesses – a spectacular view
  - The **Atlanta Fed median wage tracker** reported a further acceleration, not surprising given the tight labour market, and business compensation plans. On the positive side: **Producer price inflation** at early stages are declining, as supply chains tightness eases (which the PMIs reported, at least in the manufacturing sector)
  - **Retail sales** stumbled in December, mostly due to a sharp decline in internet sales. However, net sales have fallen 3 of the past 4 years, as a change in the seasonal pattern may take place. If so, 'real' sales were stronger than reported. Anyway, sales are well above pre-pandemic levels & trends. **Manufacturing production** also fell in December, partly due to lower auto production
  - **Univ. of Michigan consumer confidence** fell again in January, and is close to the weakest level in 10 years. Our models can not explain if, even if inflation and inflation expectations are included
  - **Fed's Beige book reports**: *compensation growth remained well above historical averages across industries, across worker demographics, and across geographies. And some FOMC members start talking about 4 hikes (or more) in 2022. The market now says that 4 or 5 is more likely than 3 (which was the median FOMC estimate in mid December) or less*

Last week: The economy, part II

- **EMU**
  - **Unemployment** is falling steadily, now down to 7.2%, below the pre-pandemic level
  - **Industrial production** rose in November, well above expectations
  - **Germany GDP** fell in Q4, by 0.5 – 1.0% as activity in services were hit by Covid restrictions. GDP is 1.8% below the Q4-19 level
- **UK**
  - **GDP** grew 0.9% in November, and is finally above the Feb-20 level, 0.7%. Services are recovering. Some Omicron impacts are likely in December/January but not any drama
- **Sweden**
  - **GDP** rose 0.2% in November, and the level is 3.4% above the Q4-19 level, one of the best these days
  - **Inflation** is still just about energy, the core rate fell to 1.7% from 1.9% - and was lower than expected. Energy explains the gap to 3.9% headline inflation
- **Norway**
  - **CPI inflation** was far higher than we expected in January, 5.3% vs. 4.7%, up from 5.1% in December. Electricity prices rose 7% m/m, in line with our expectations (and the annual rate fell by 20 pp to 103%) but core inflation accelerated to 1.8% from 1.3%, we expected unchanged, as did Norges Bank. Food, furnishing and airfare tickets were mostly to blame for our miss. Some of these increases may be transitory but NoBa will probably revise core CPI upwards in the next MPR
    - Electricity prices (total bill, including distribution cost – subsidies) will probably decline some 20% m/m in January, both due to lower market prices and the increase in government subsides. If so, annual electricity inflation will decline to 20% from 103% (prices rose sharply in January 2021). Headline CPI will collapse, luckily just before the wage negotiations start up. The electricity futures signal a 10% decline in February – and if so electricity is flat y/y. Inflation may become very low in 2022!
    - The total loss of real income for households during the surge in electricity prices – and the expected decline the coming months – will equal less than 1¼ % of disposable income
    - CPI rose 3.5% last years, just 0.2 – 0.4 pp more than wages, and real wages fell just marginally, following a 2% gain in 2020. What a crisis!
  - **Mainland GDP** rose 0.7% in November, somewhat above expectations. Growth has broadened – and the Mainland GDP is 3.1% above the Feb-20 level
  - **Airline traffic** fell 10% m/m in December, and the total is down 40% vs. the 2019 level (domestic -21%, international -53%)
  - **NAV unemployment** is still heading down as the no. of part time unemployed has fallen recent weeks
  - .. Even before **the most harming Omicron restrictions** were eased/lifted last week
  - We expect **activity to recover rapidly** in hotels/restaurants/travel the coming weeks

The short Calendar: US housing, Norges Bank (which will do nothing)

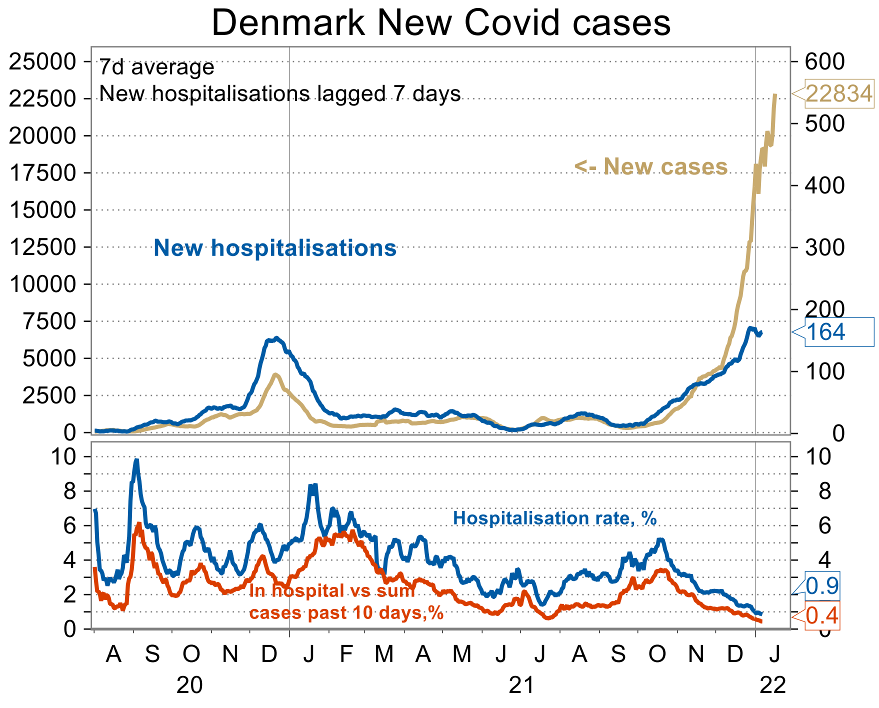
Time	Count.	Indicator	Period	Forecast	Prior
Monday Jan 17					
08:00	NO	Trade balance	Dec		78.6b
Tuesday Jan 18					
05:30	JN	Industrial Production MoM	Nov F		7.2%
08:00	UK	Average Weekly Earnings	Nov	4.2%	4.9%
08:00	UK	Payrolled Employees Monthly	Dec	130k	257k
08:00	UK	Unemployment, LFS	Nov	4.2%	4.2%
11:00	GE	ZEW Survey Expectations	Jan	32	29.9
14:30	US	Empire Manufacturing	Jan	25	31.9
16:00	US	NAHB Housing Market Index	Jan	84	84
Wednesday Jan 19					
08:00	UK	CPI YoY	Dec	5.2%	5.1%
08:00	UK	CPI Core YoY	Dec	3.9%	4.0%
14:30	US	Building Permits	Dec	1700k	1712k
14:30	US	Housing Starts	Dec	1650k	1679k
Thursday Jan 20					
08:00	NO	Housing starts	Dec		
08:00	NO	Industrial Confidence	4Q	(7)	8.8
10:00	**NO**	**Deposit Rates**	**Jan-20**	**0.5%**	**0.5%**
11:00	EC	CPI YoY	Dec F	5.0%	4.9%
11:00	EC	CPI Core YoY	Dec F	2.6%	2.6%
14:30	US	Initial Jobless Claims	Jan-15	220k	230k
14:30	US	Philadelphia Fed Survey	Jan	19.8	15.4
16:00	US	Existing Home Sales	Dec	6.41m	6.46m
Friday Jan 21					
08:00	UK	Retail Sales Inc Auto Fuel MoM	Dec	-0.6%	1.4%
16:00	EC	Consumer Confidence	Jan A	-9.0	-8.3
16:00	US	Leading Index	Dec	0.8%	1.1%
Monday Jan 24					
01:30	JN	Manufacturing PMI	Jan P		54.3
01:30	JN	Services PMI	Jan P		52.1

- **USA**
  - » **The housing market** is still strong but housing starts have flattened. Construction costs are up, lumber prices are soaring again
  - » The first **January manufacturing surveys** are expected unch (in average)
- **EMU**
  - » **Consumer confidence** has so far kept up well, far better than (the average of surveys) in the US
- **UK**
  - » **Wage inflation** is moderating, and is expected further down in Nov
  - » **Price inflation** is expected to stabilise – at a high level
- **Norway**
  - » **No change:** Norges Bank's meeting, without a MPR or a press conference can impossibly alter market's expectation of a March hike. The Omicron variant will not kill the economy

Sources: Bloomberg. SB1M est. in brackets. Key data are highlighted, **the most important in bold**

Denmark: Case growth is slowing, hospital occupancy, ICU beds down

4% of the population infected last week (23.000). Still just 59 persons in an ICU bed. ***Pandemic exit?***



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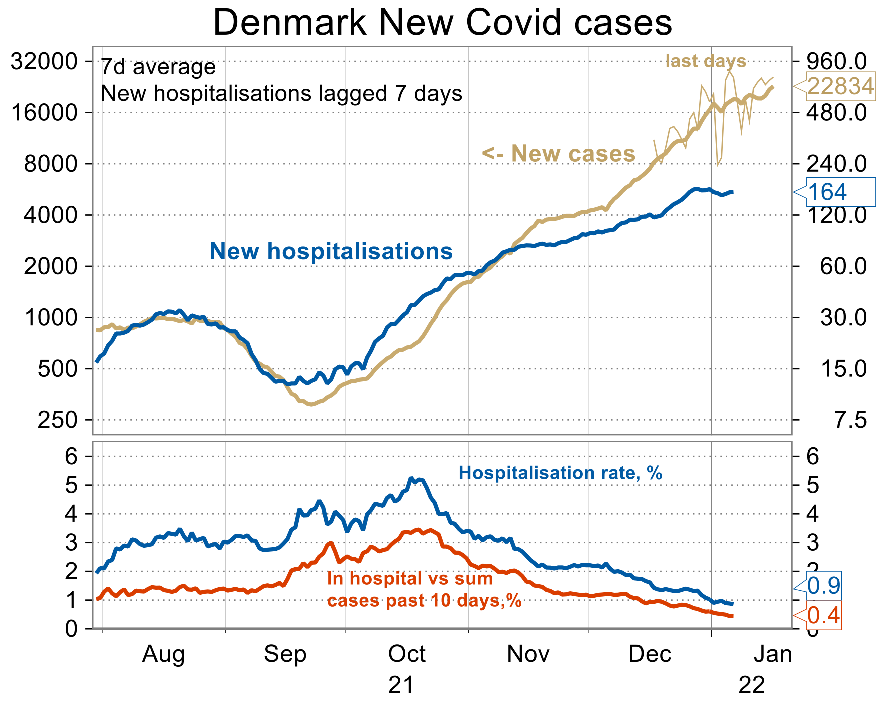

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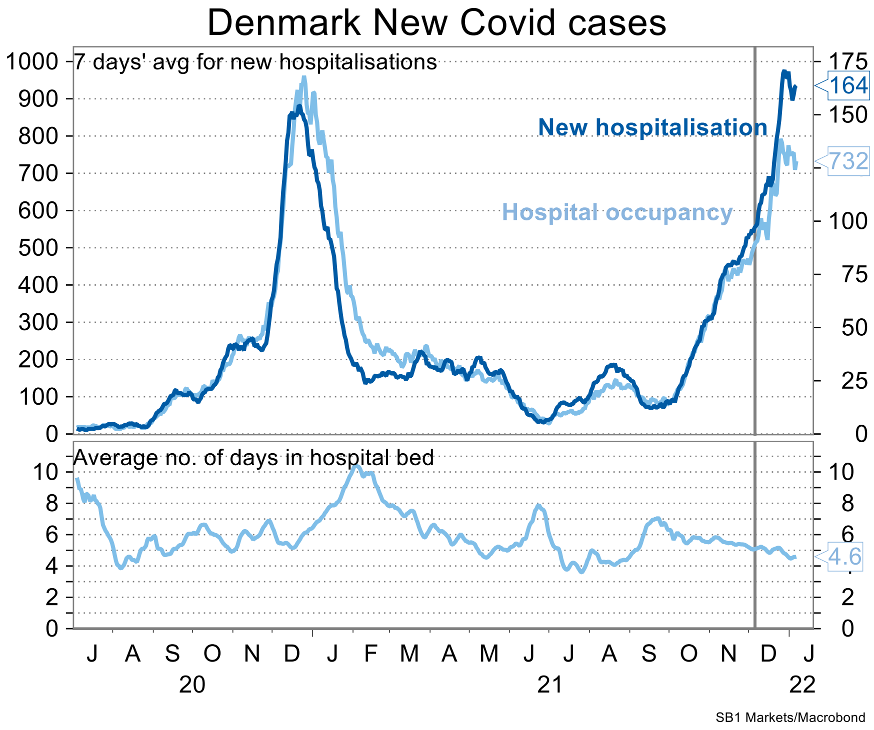
- The **Omicron** is now burning through the Danish population at a rapid rate
- Still, **hospital occupancy** is declining, even in absolute numbers. The hospitalisation rate is down 50%, to 0.8% from 2% (which was our forecast in late December)
- The number of **patients in ICU beds** is falling too, due to a decline in the ICU rate 8% of those hospitalised, from 15%
  - » The risk of needing an ICU bed if infected, is down some 75% from November (Delta)
- **The pandemic is very likely over! At least until a new, and more dangerous variant turns up**

Denmark: Fewer at hospitals, especially in ICU beds

If hospitalised, the risk for ending up in ICU bed is cut by 50%



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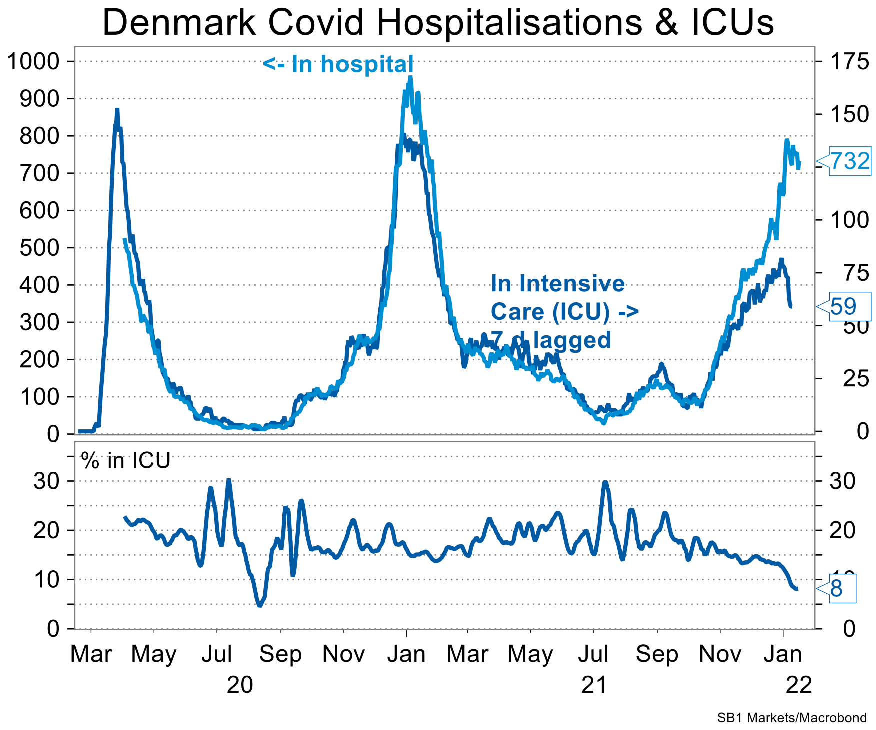

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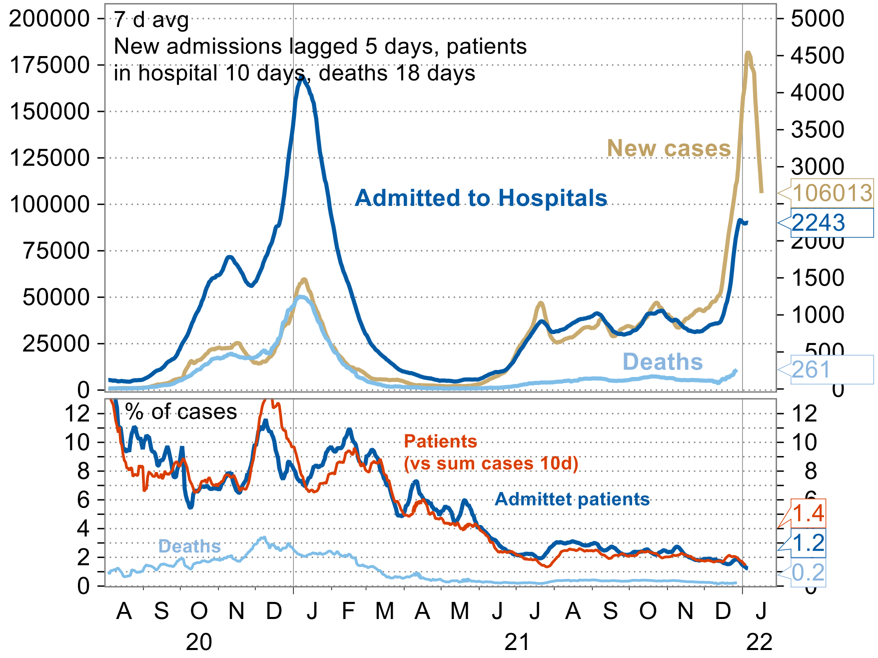
UK: If the case data are anything close to correct: The END!

Anyway, hospitalisation rates finally yielded, and the ICU rate has collapsed

UK Covid-10 cases, hospitalisations



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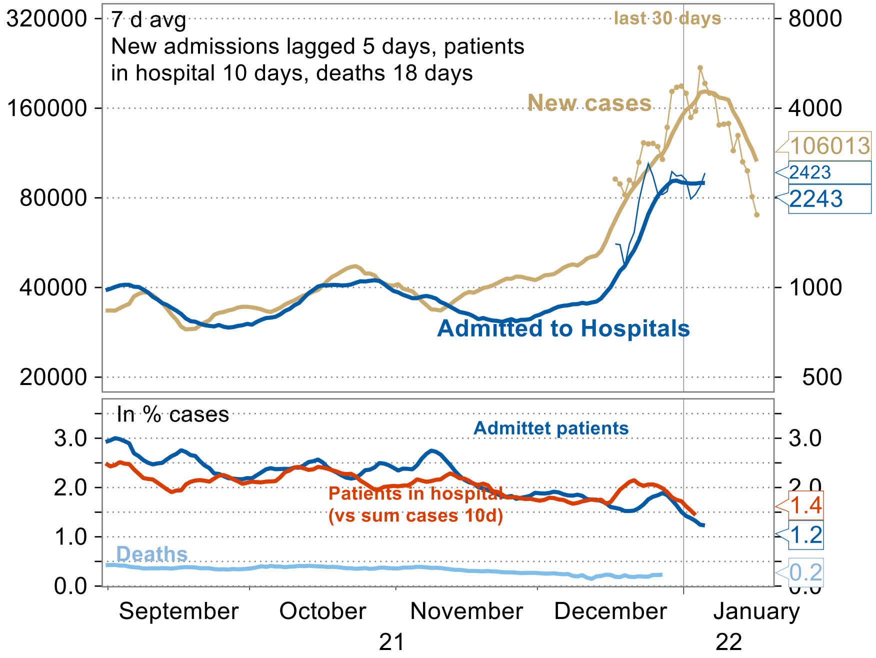
UK Covid-10 cases, hospitalisations



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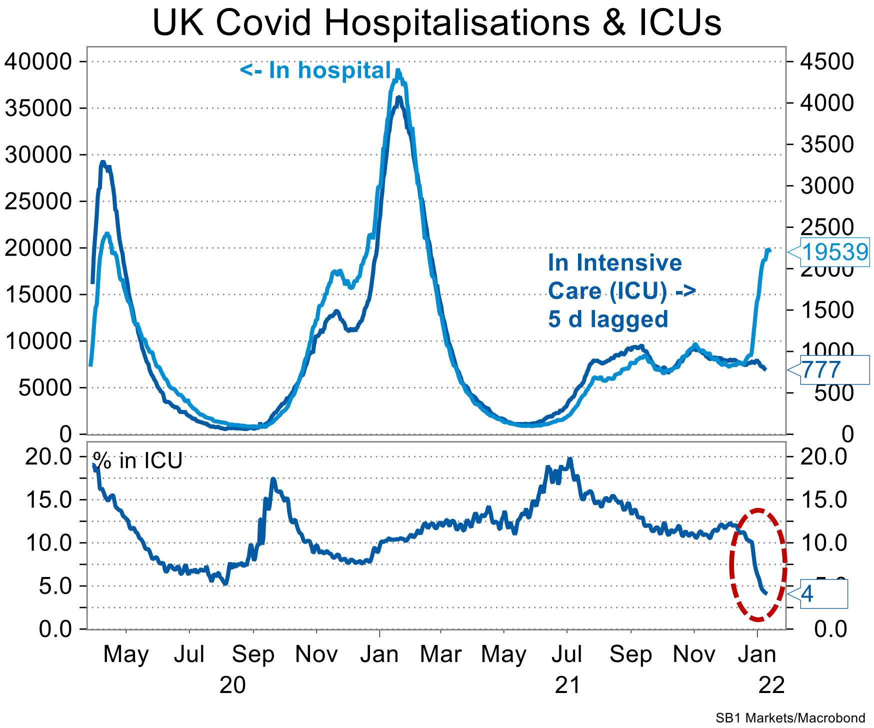
UK: More patients hosptialised but fewer patients in ICU wards!

The ICU rate, if hospitalised has fallen to 4%, from 12% (down 65%)



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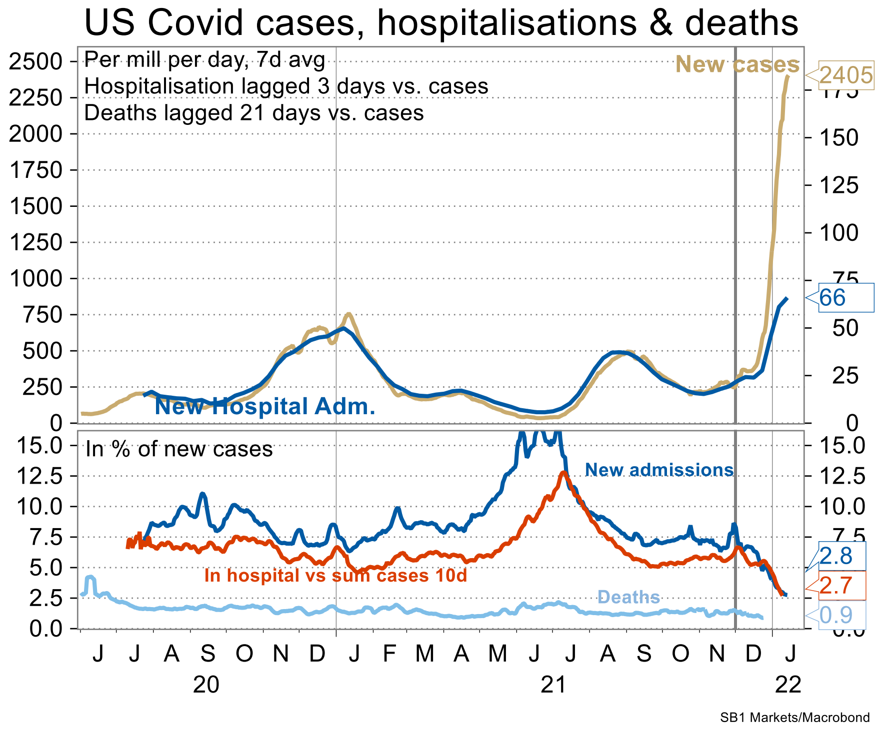
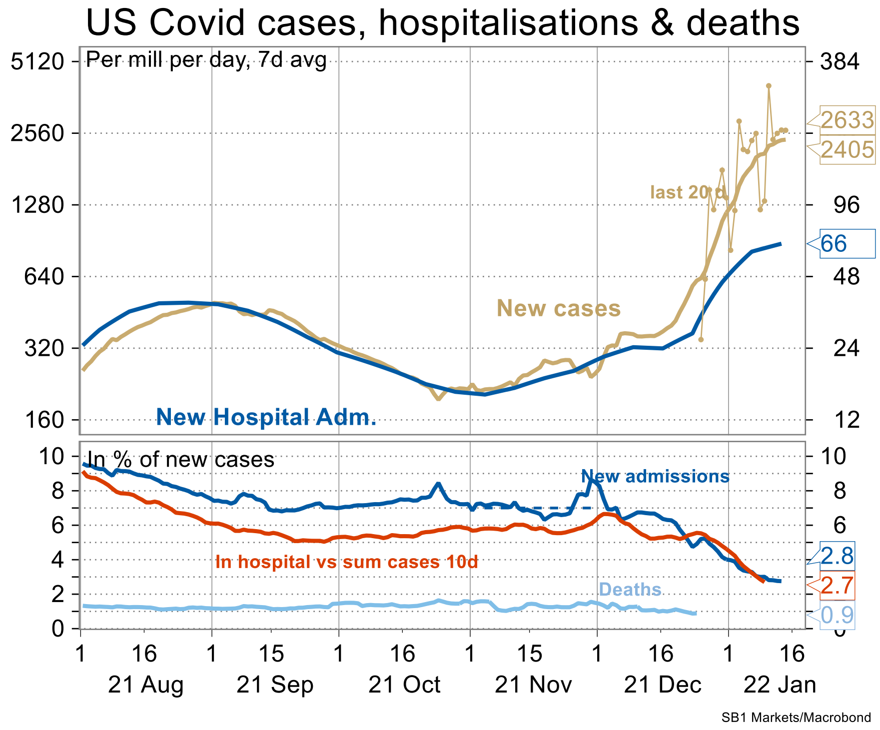
- The number of hospitalised patients are almost 50% below the peak one year ago
- The ICU capacity is not stretched, at least not by Covid patients (including patients with Covid, not just patients hospitalised due to Covid)
  - The no. ICU patients is 80% down vs the peak one year ago
- And now the no. of new cases is very likely falling!

US: Growth in new cases are slowing but hospitals are struggling

The Omicron hospitalisation rate is almost 3%, vs 7% for Delta. Still more hospital patients


US Covid cases, hospitalisations & deaths

SB1 Markets/Macrobond


US Covid cases, hospitalisations & deaths

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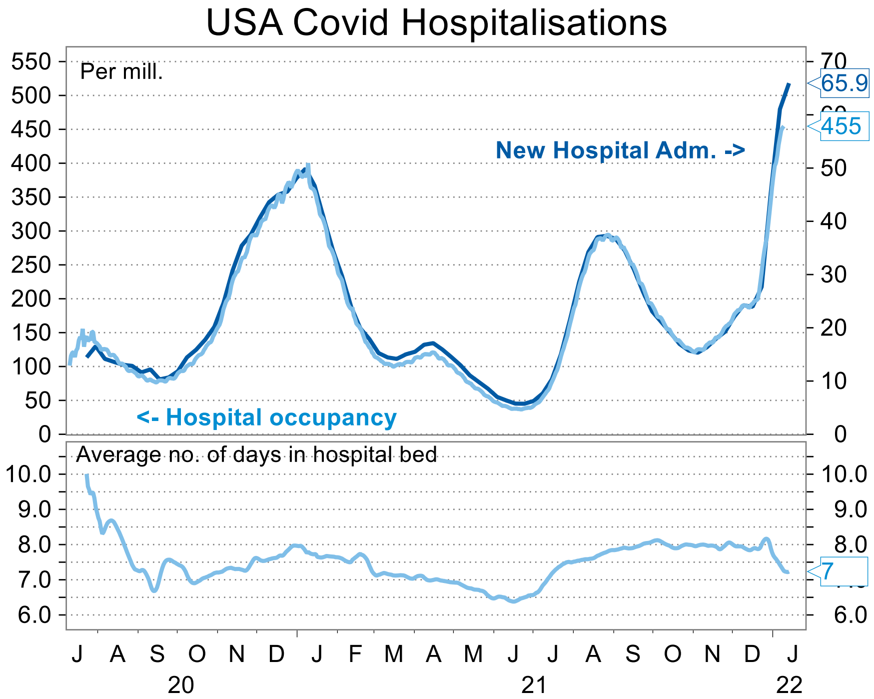
- **New cases:** Growth is slowing. 2.6% are infected per week. Officially, that is. The actual rate is far higher (and the difference is probably greater than ever, given the mild symptoms)
- **The hospitalisation rate** is cut in half, but the no of patients is still higher than anytime before
- **The ICU rate** (if hospitalised) is down to 18% from 25%, less than in Europe. Very likely due to lower vaccination rates
  - » The no. of ICU patients is close to previous peaks, and capacity is stretched in several regions
- Death rates have fallen, and are still declining as the ‘remaining’ Delta patients pass away. We assume the CRF death rate will fall to well below the current 0.9%

US: Hospital admissions, hospital occupancy – and soon ICU beds (?) at ATH

The ICU rate has fallen but not by that much


USA Covid Hospitalisations

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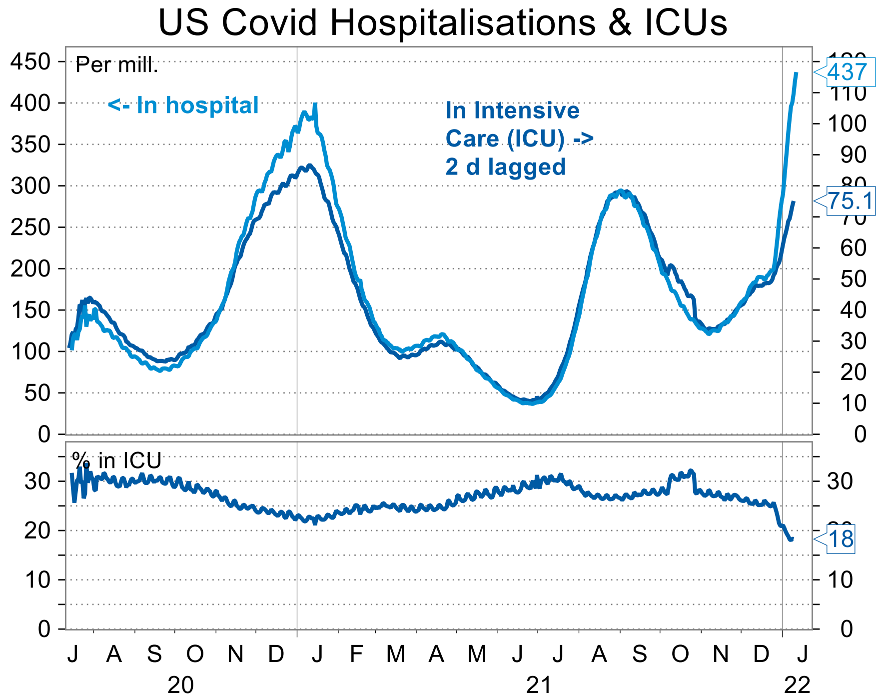
US Covid Hospitalisations & ICUs

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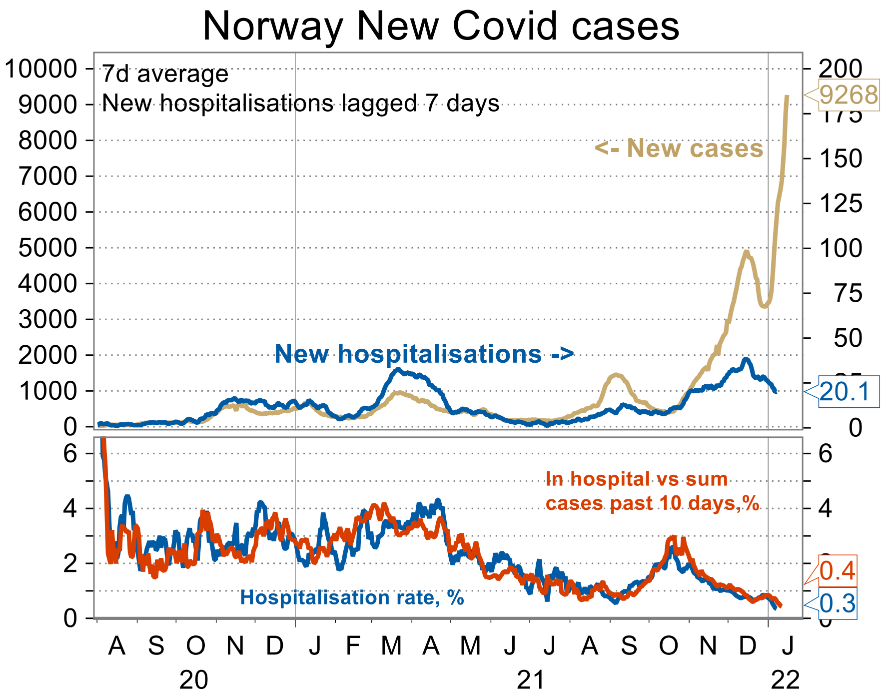
Norway: Many more cases but hospitalisations, ICU occupancy sharply down!

The pandemic is over? Very likely, and more restrictions should be lifted very soon



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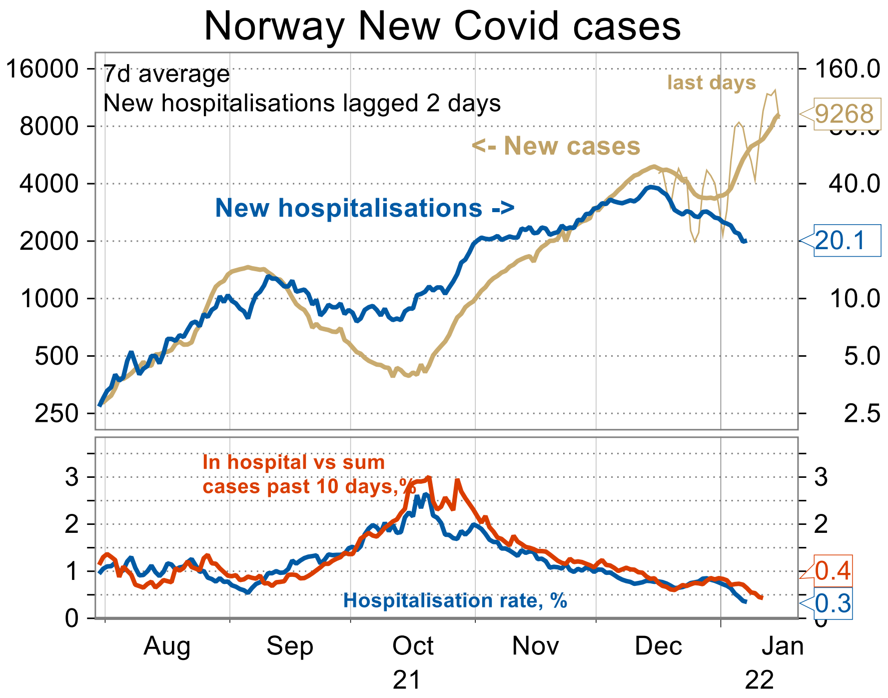

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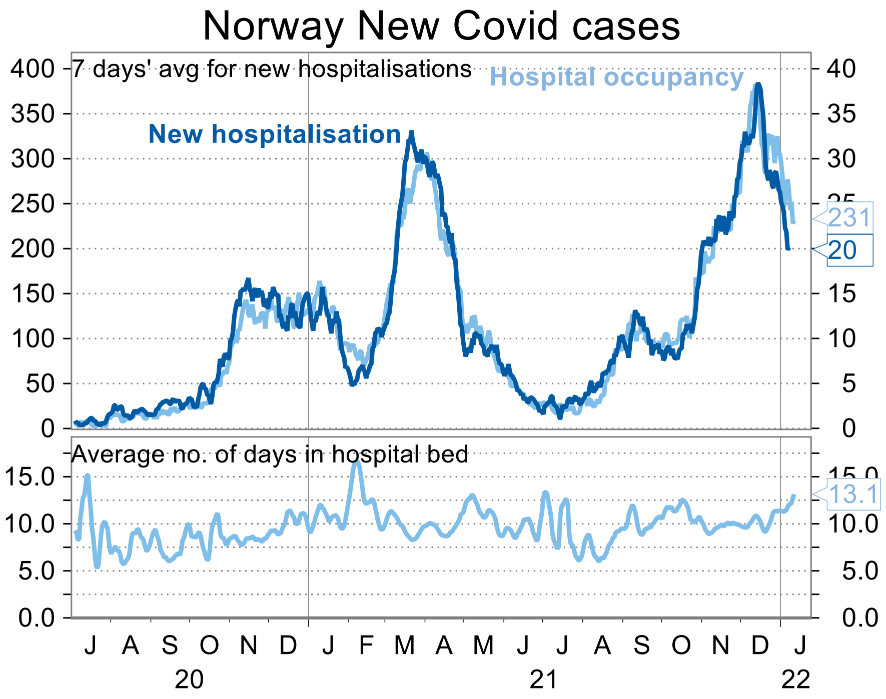
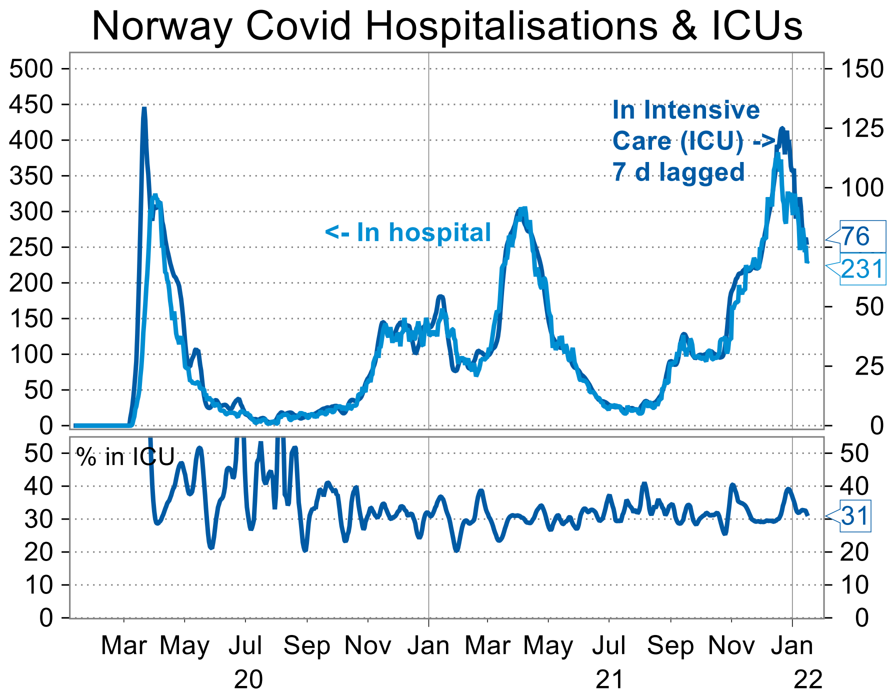
- **Strong growth in new cases**, but just 1.7% infected per week – still a rapid increase in immunity
  - » Growth will probably slow in a couple of weeks
- Anyway, **the hospitalisation rate** is falling rapidly, now down to 0.3% from 1.5% in November.
  - » The **number of new hospitalisations** is declining! The **number of hospitalised patients** is falling rapidly too
- **The ICU rate** (if hospitalised) remains at 31%, probably kept up by Delta patients
  - » The **number of ICU patients** is neglectable, at 76 – down 40% since late December

Norge: Så langt, ingen nedgang i andel av innlagte som er på intensivavdeling


Norway New Covid cases

SB1 Markets/Macrobond

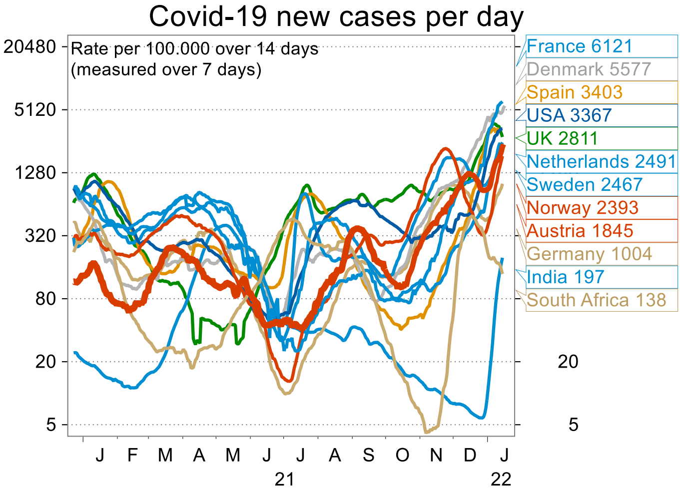

Norway Covid Hospitalisations & ICUs

SB1 Markets/Macrobond

Last week: Less drama – growth has slowed more places!

It might be testing policies – but Omicron is short-lived!

- On week ago, we reported that the no. of cases exploded almost everywhere
- Now, many countries report a slowdown, and some more countries a decline
- The Omicron cycle has been very short, probably has immunity has been build rapidly up through infections, without much harm on the infected or the hospital system – at least in South Africa and among the leaders in the rich part of the world (Denmark, UK), where vaccination rates were high
- It remains to be seen if Emerging markets can repeat the trick
- China might be in the least favourable position. No immunity is build up through previous infections, and their vaccine is far from perfect. The zero tolerance policy is probably not possible, given the super-high R for the Omicron variant



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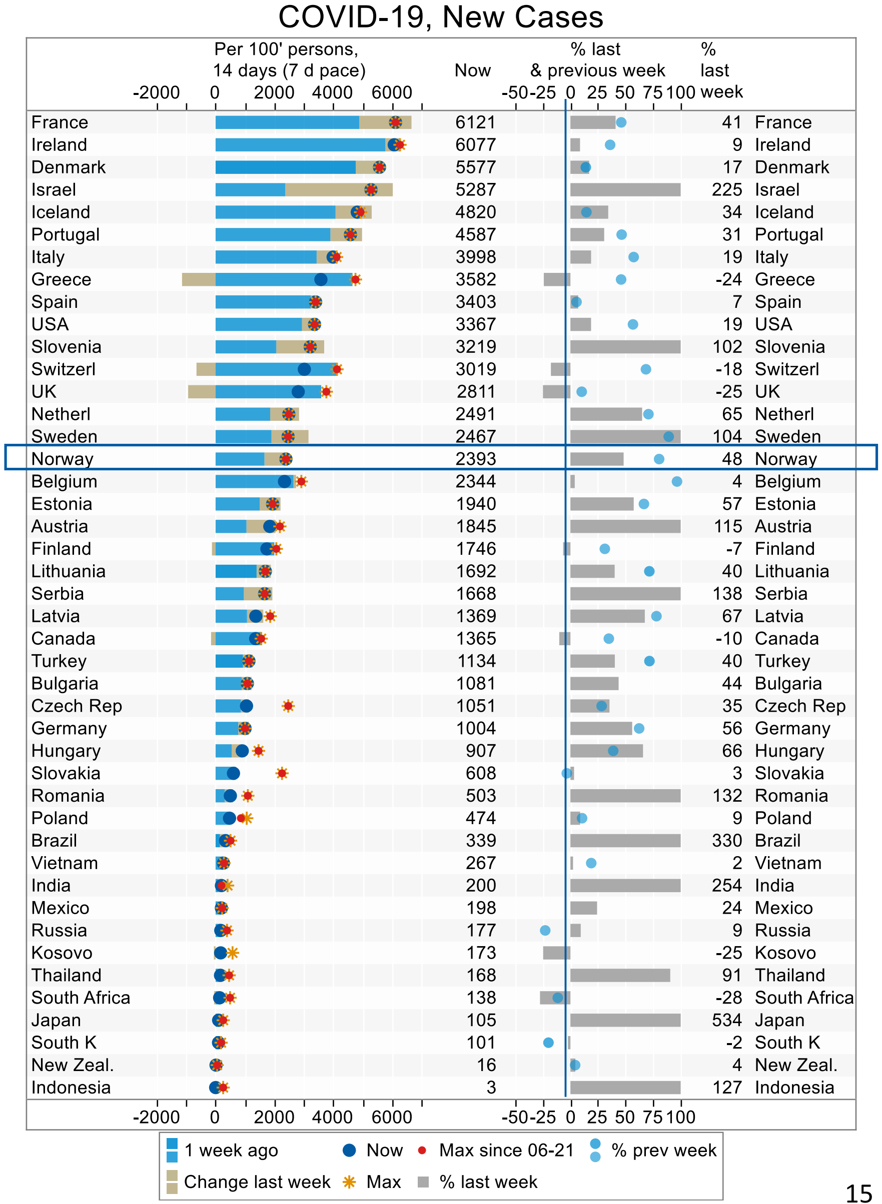

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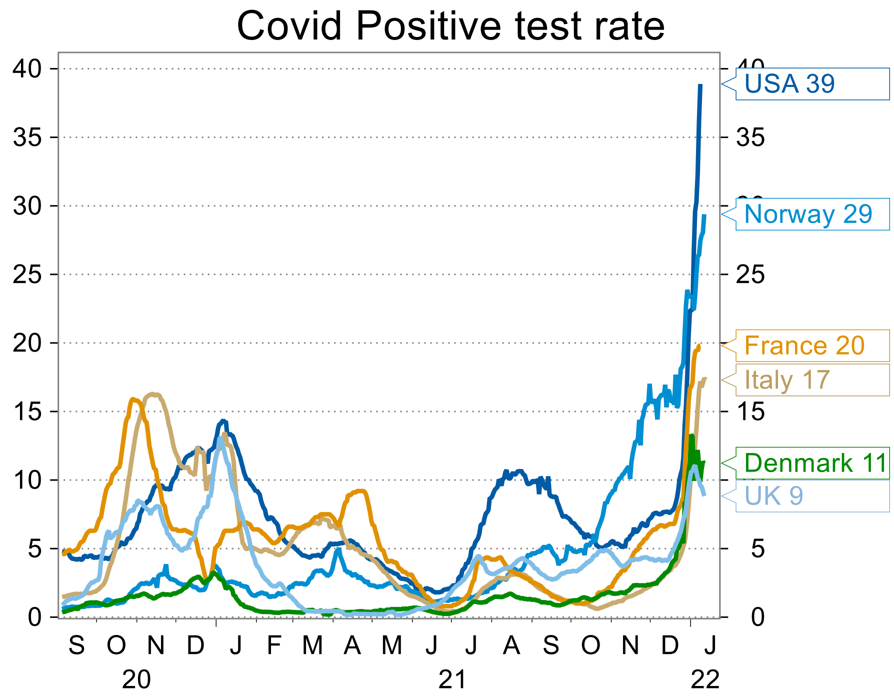
Some positivty rates are really high

There are different explanations – and no clear conclusions vs. hidden infections



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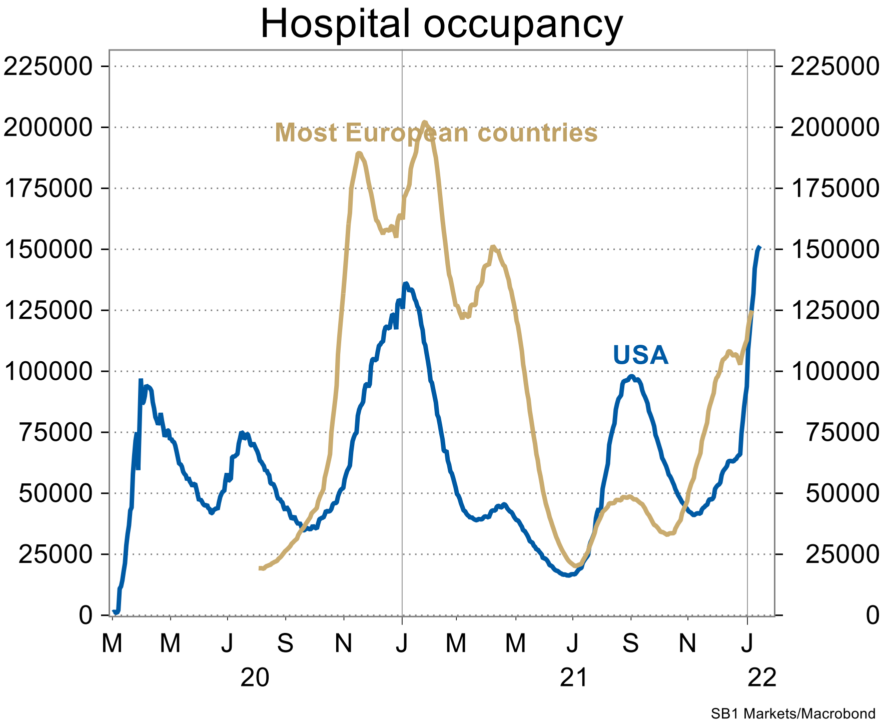
- However, if the no. of cases is falling sharply, like in the UK, a declining positivity rate is very encouraging!

More hospitalisation than ever before in the US (due to or with Covid)

Europe is still on the way up, Italy in the lead



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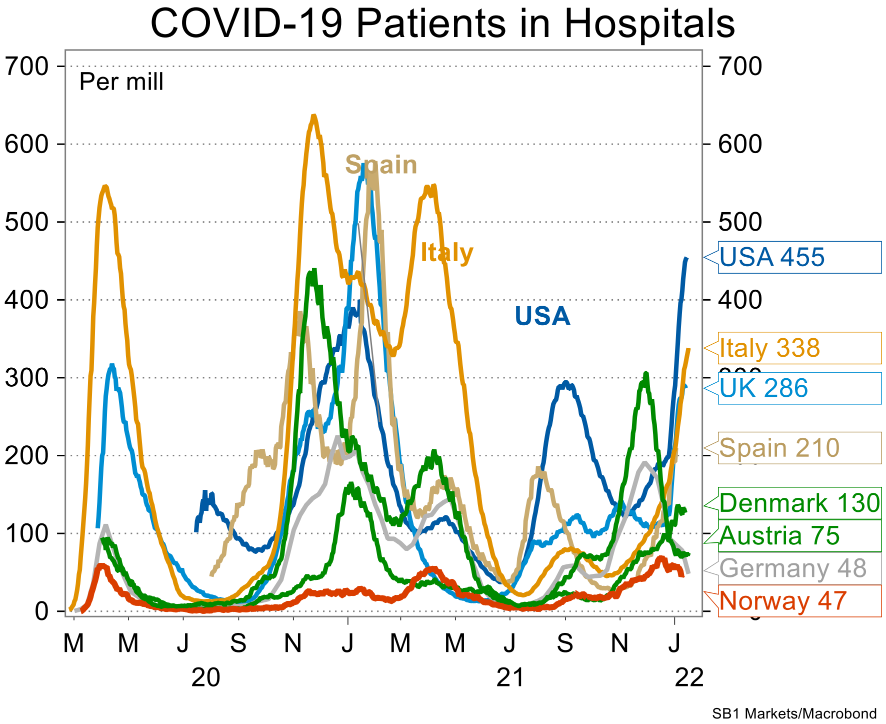

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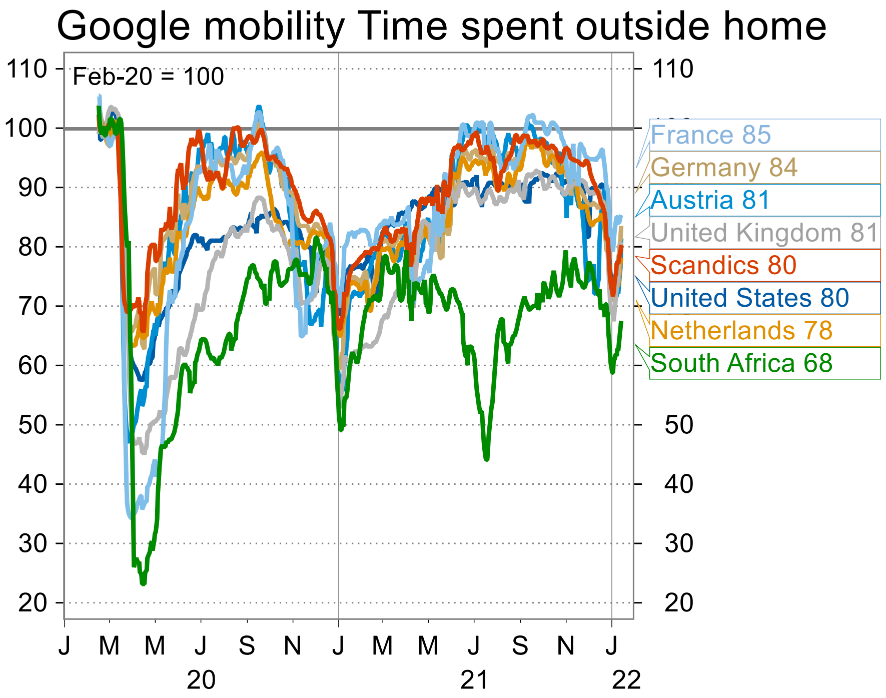
- Norway has still a very low number of hospitalised patients, and few in ICU beds – and the number of patients is declining

Mobility ‘hit’ by the Christmas holidays – and some Omicron measures



Google mobility Time spent outside home

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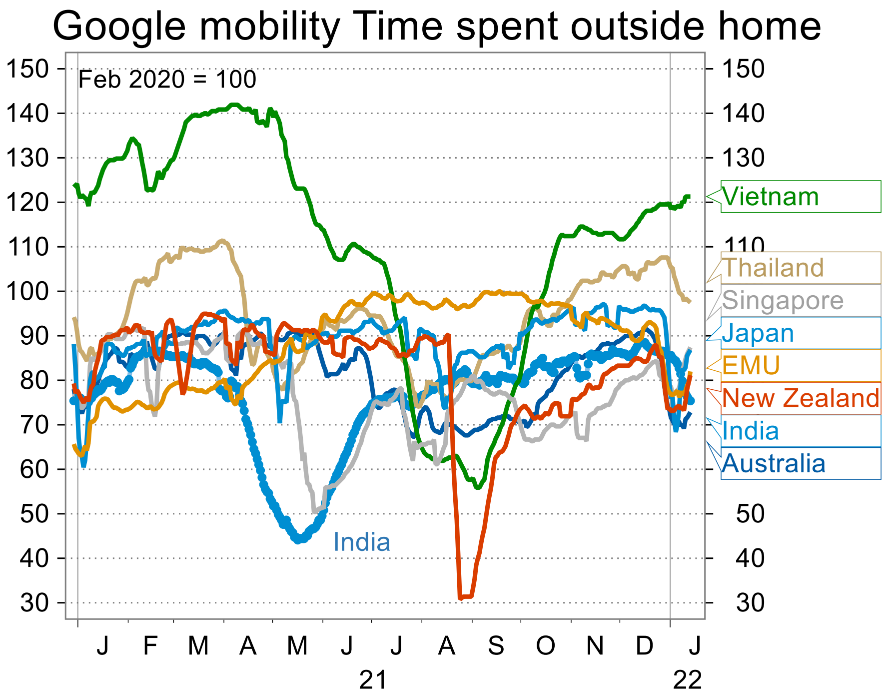

Google mobility Time spent outside home

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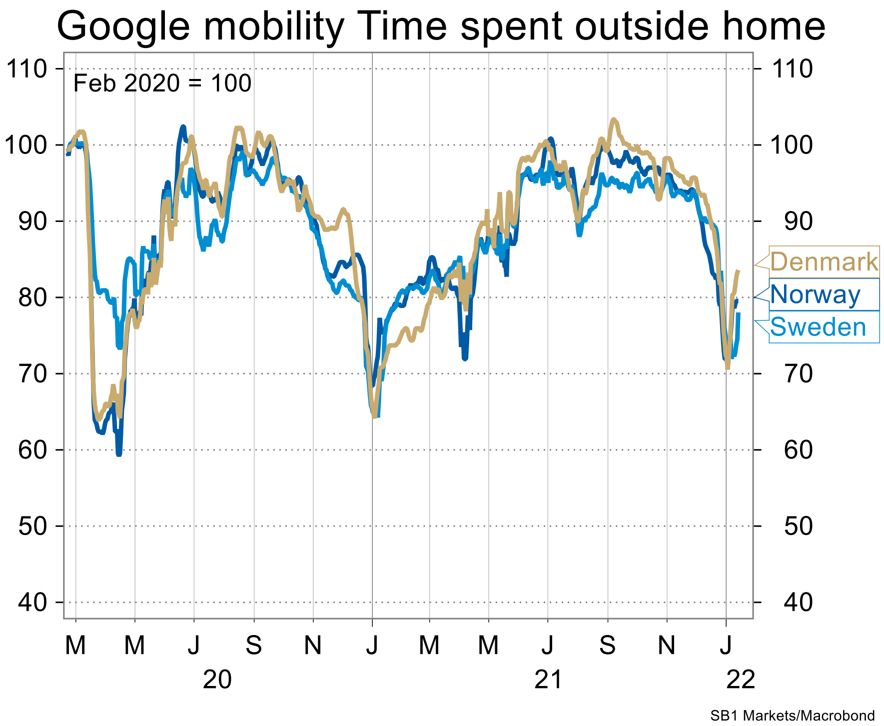
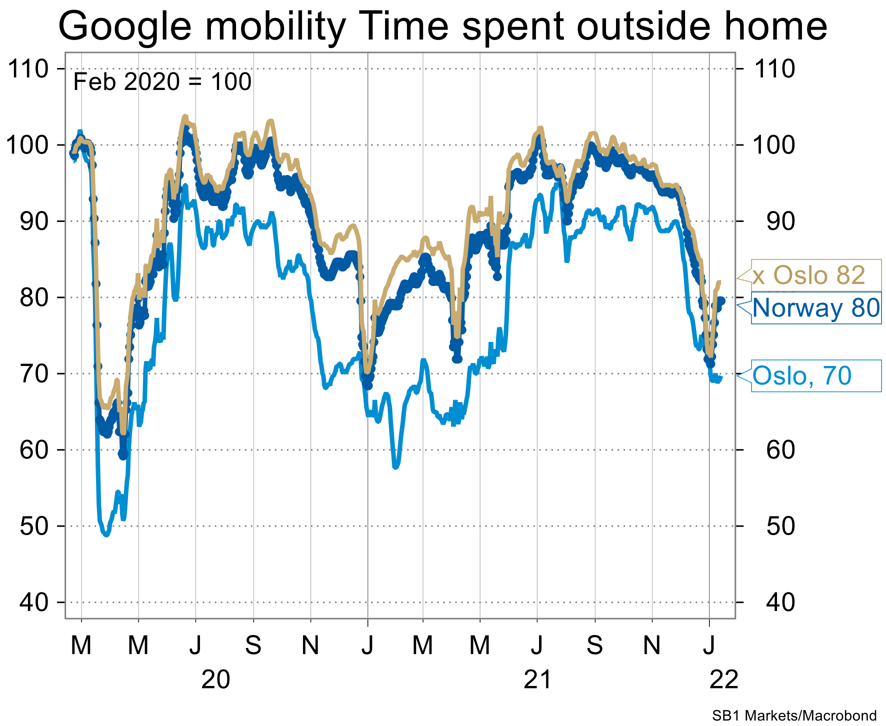
Mobility on the way up after the holiday season

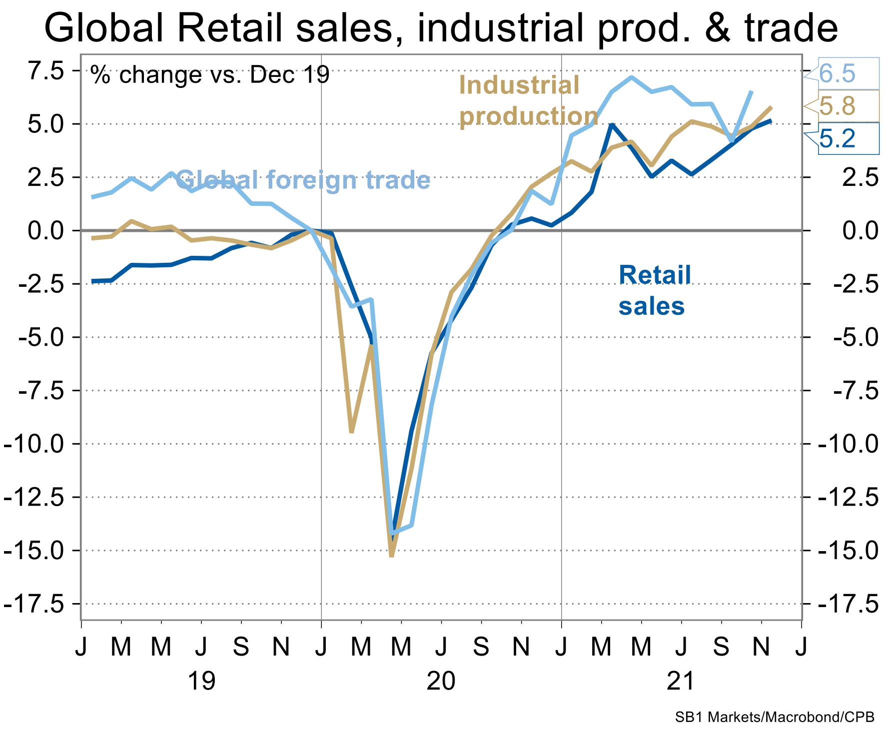
.. And the impact of easing of restriction will soon be visible



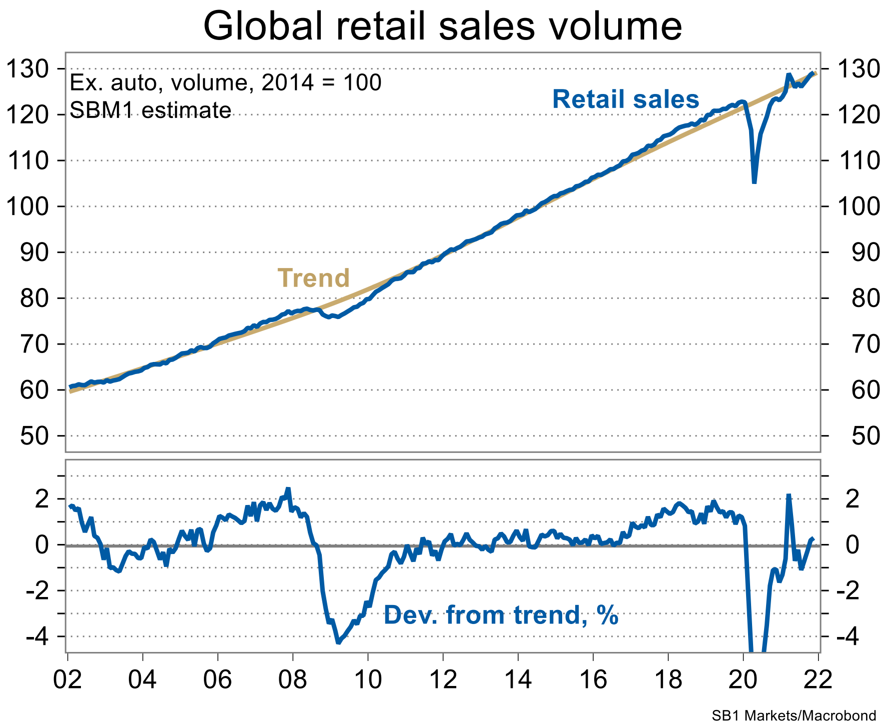


Global retail, industrial production has strengthened recent months

Global trade has flattened



SB1 Markets/Macrobond/CPB

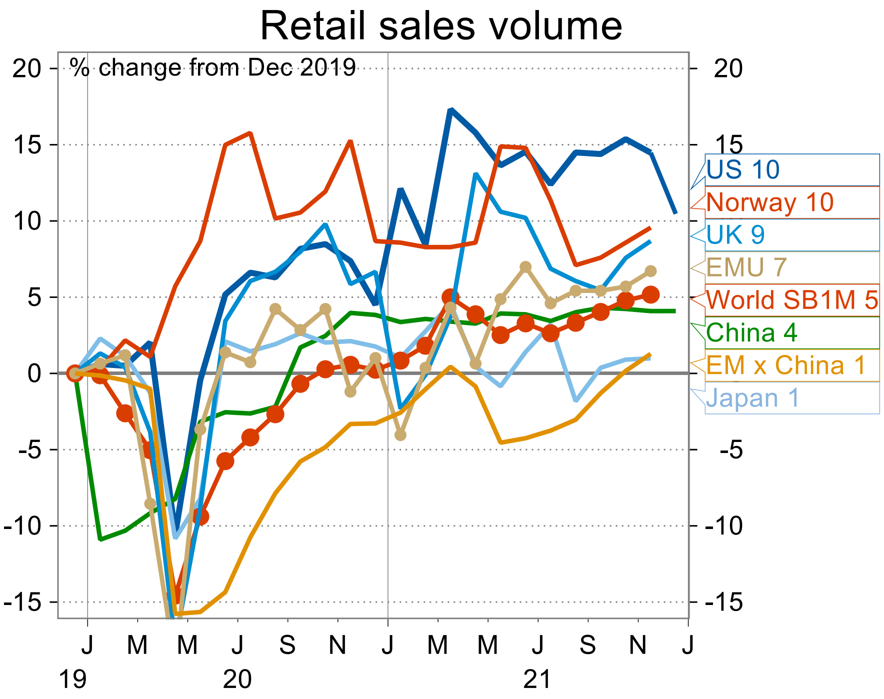


SB1 Markets/Macrobond

- **Global retail sales** rose at slower pace November, with slow/no growth. China & US on the downside, EMU surprised at the upside. Global sales (mostly excluding autos) are 5% above the pre-pandemic level
- **Global manufacturing production** has recovered since the summer, and growth was strong in both October and November – the latter due to 6 – 7% growth in both South Korea and Japan. Production is up 6% from Dec-19
- **Global foreign trade** rose sharply in October, following the setback in September (and several weak months since last May)

DM demand for consumer goods has peaked, EMs are recovering from a low lev.

The upside potential is large for Emerging Markets x China, and the recovery has started



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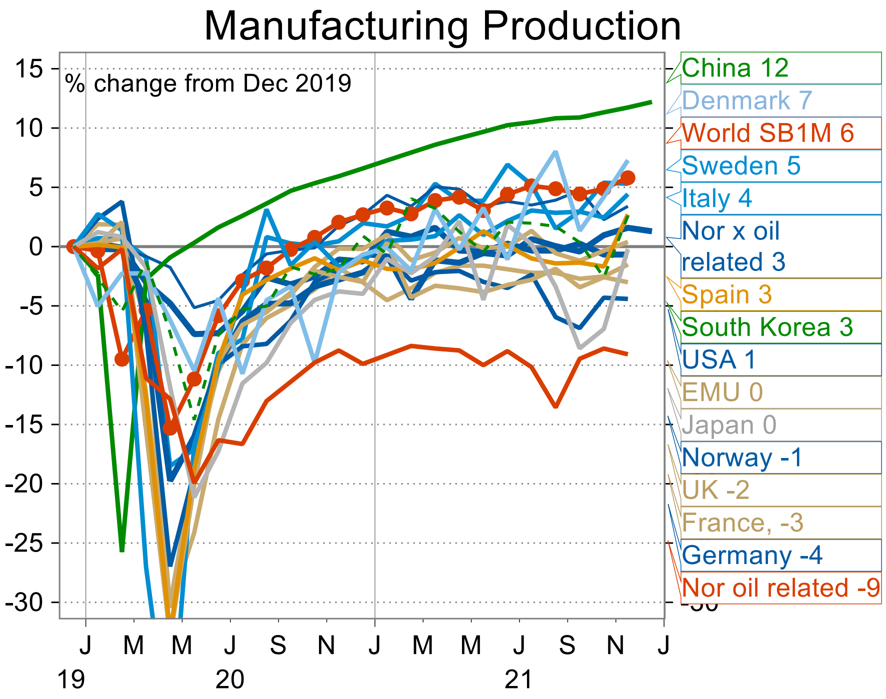

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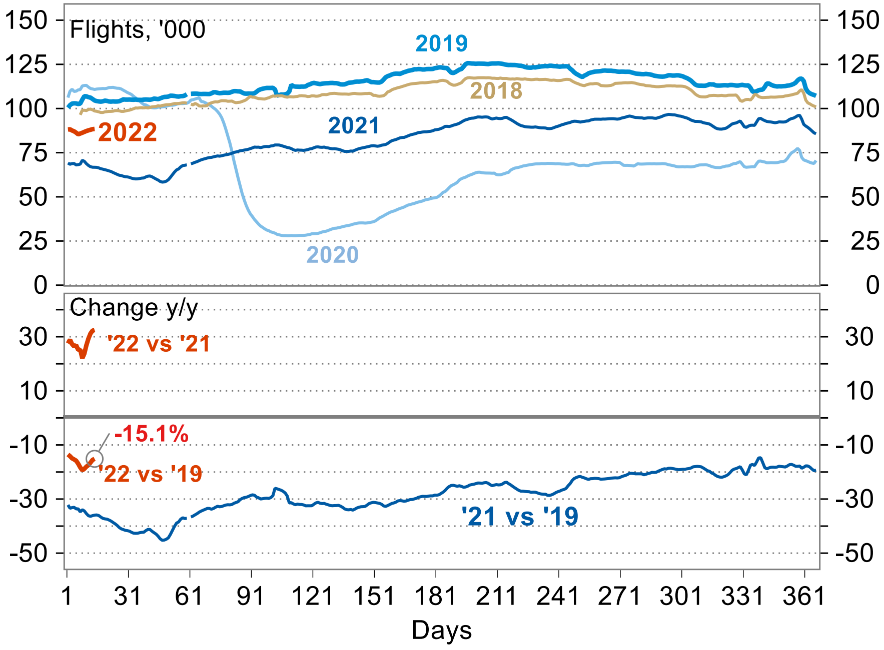
- **Retail sales** in Emerging Markets x China are recovering but is far below pre-pandemic trends
- **US retail demand** fell sharply in December, however mostly due to another weak December for internet sales. A recovery in January? Still, the trend is flat, at the best – and the level too high
- **Manufacturing production** has been hampered by a deep decline in auto production, but this sector is now recovering. The manufacturing PMIs are still strong, and delivery times very likely easing

Global airline traffic just down 15% vs the 2019 level (the best so far)

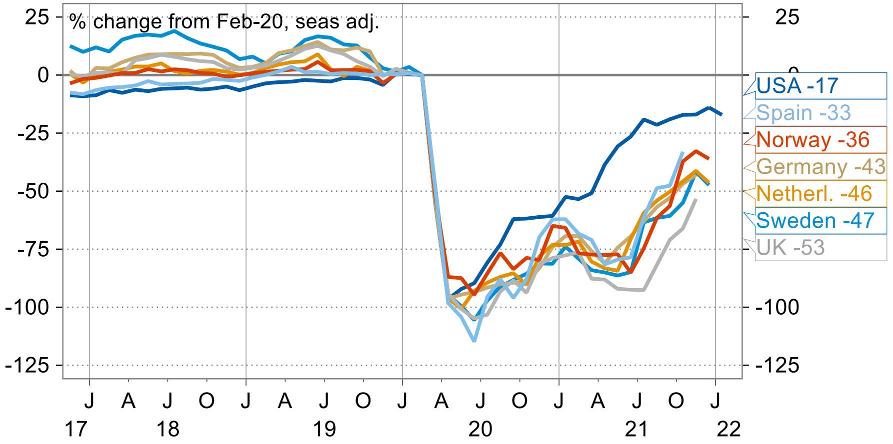
Omicron has not – at least not yet – killed global airline traffic. Some weaknes sin Europe though

World Commercial flights



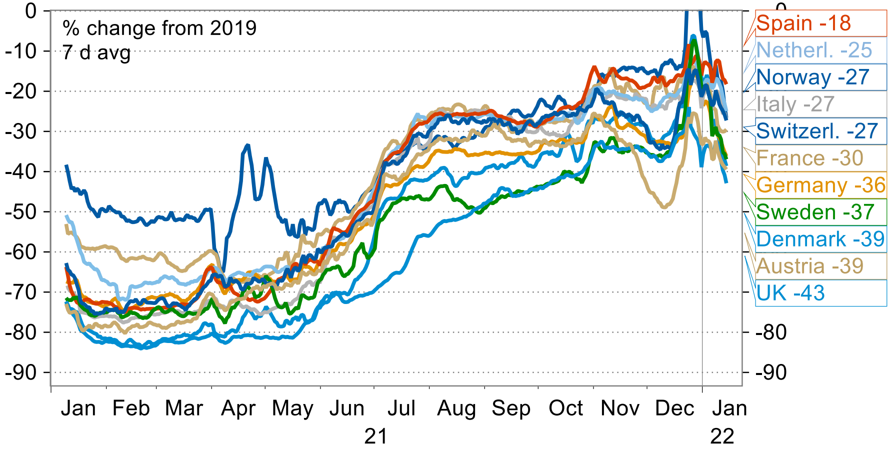
Flightradar24 SB1 Markets/Macrobond

Airline passengers



National authorities, SB1 Markets/Macrobond

Air traffic

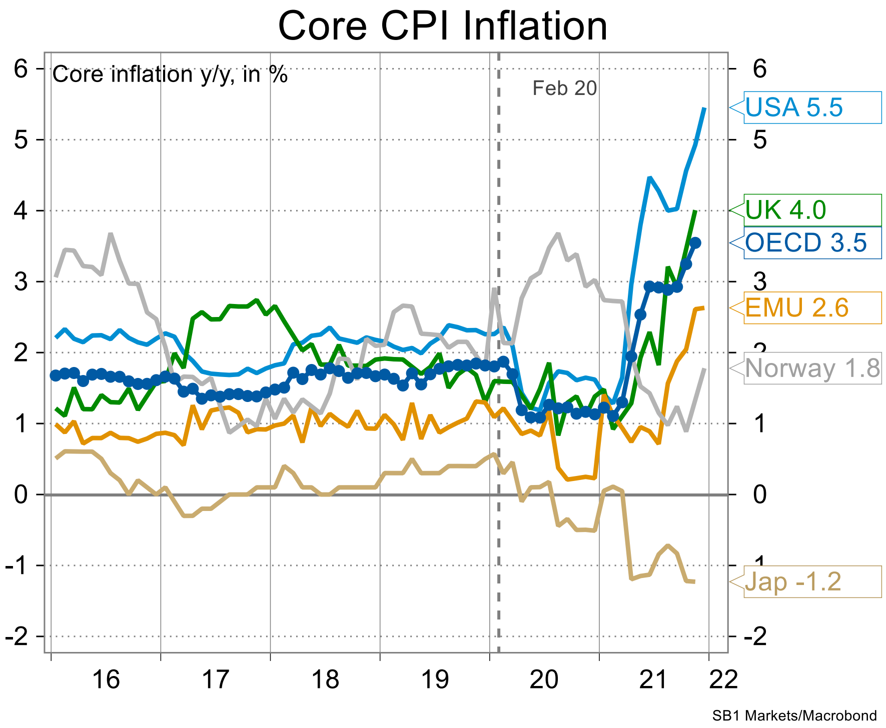


Eurocontrol/SB1 Markets/Macrobond

- Until November, strong growth in no. of passengers in Europe, and the gap vs the US was reduced
- The fight against the Delta reduced aircraft movements in Europe somewhat, and the Omicron may create more havoc for a while

Inflation may be peaking ~~now~~ soon – at a high level

Energy prices the main culprit, but core inflation has turned up more places



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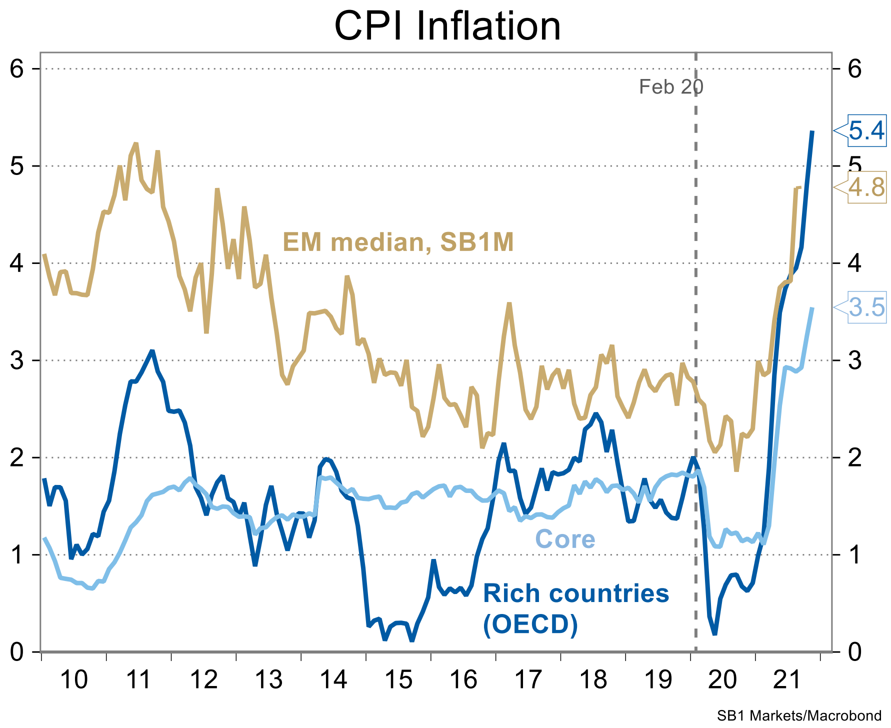

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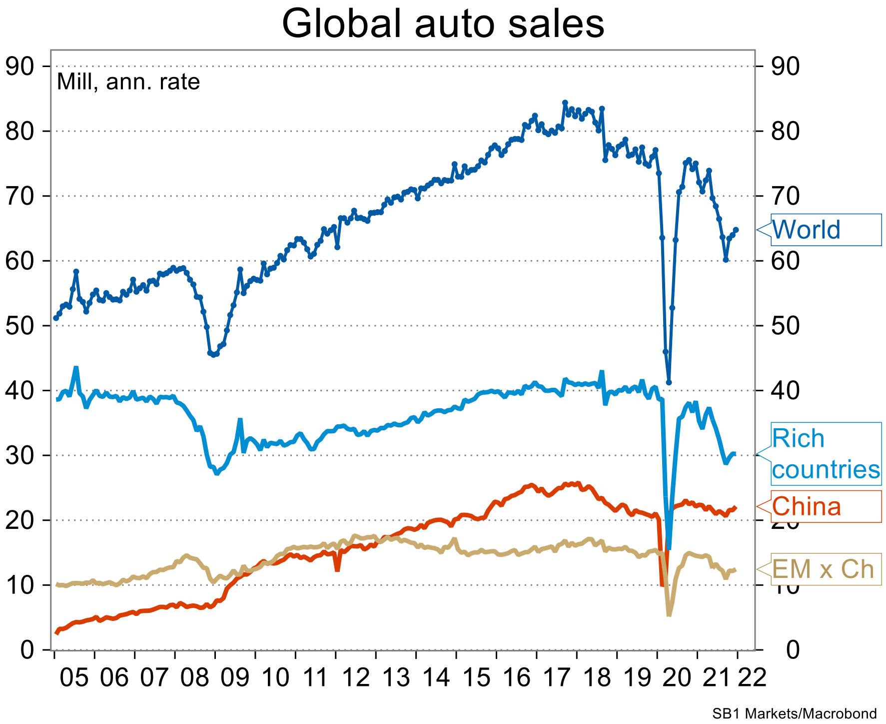
Auto sales slowly on the way up, still down 15% vs. 2019. A huge upside potential

Sales fell in the US in Dec but rose most other places. Chinese sales are 4% up vs. the 2019 level



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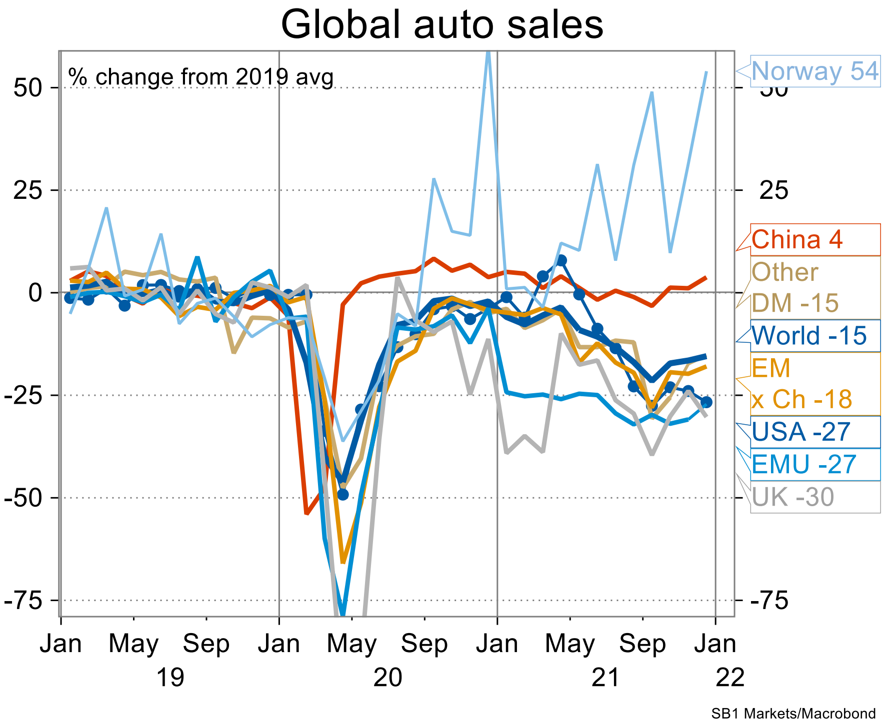

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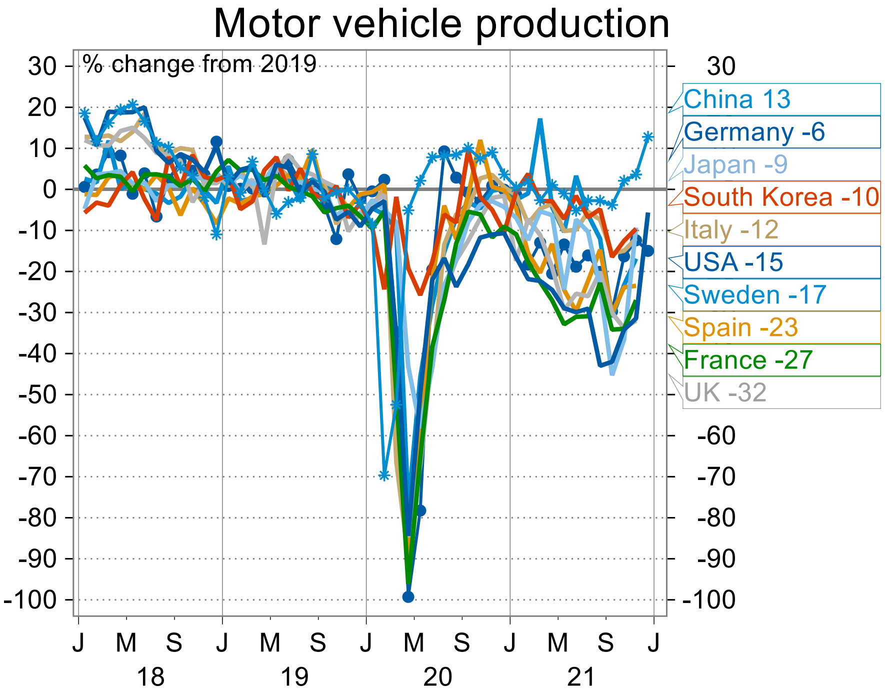
- Global sales rose by 1%, according to our calculations (some countries have not yet reported). Sales are down 15% vs. the average 2019 level, from -21% at the bottom in September
- Sales in **China** are trending slightly upwards, and are now 4% above sales in 2019 average – but are at the same level as first reached in 2015 (and sales are down almost 20% from the 2017 peak, not a the mainstream scenario at that time!) Sales in **other Emerging Markets rose too**, but are down 18 % vs. 2019. The trend was down before the pandemic – and sales are below the peak in 2012!
- **Sales in the US** fell but very likely rose in the EMU. Both are down 27% vs. 2019
- **Norwegian** sales were up 54% vs 2019 and sales in 2021 were the highest ever!
- **Auto production** is now recovering, especially in Germany

Auto production on the way up!

Germany just 6% below the '19 level, was down 43%! China is 13% above, from -4%



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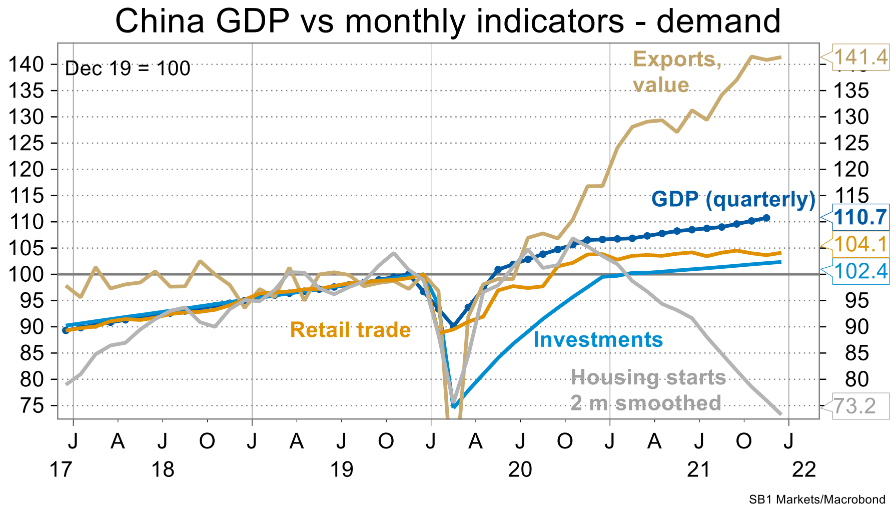
Growth much higher than assumed/expected in H2, but weakness around

Monthly data in sum better than expected, but retail sales construction is weak. 2 signal rates cut today



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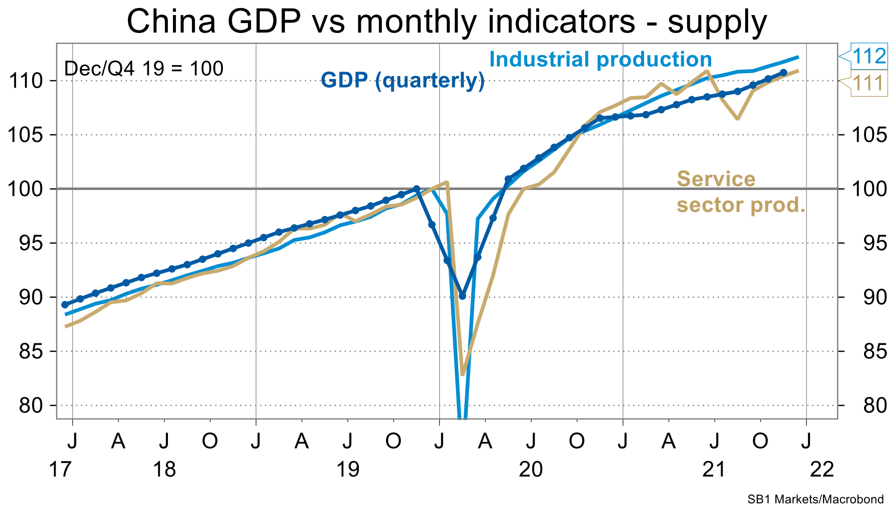

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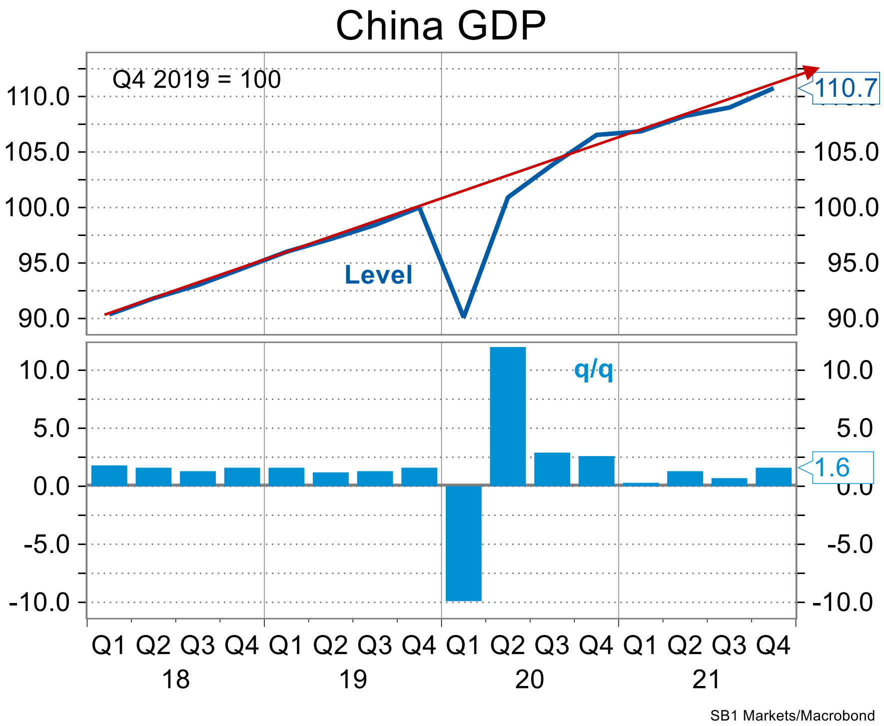
- **GDP grew by 1.6% (6.6% annualised), well above expectations (1.2%). In addition Q3 was revised up to 0.7% from 0.2%! The annual Q4 growth rate was higher than expected too, 4.0% vs. 3.8%. Still, growth has slowed through 2021. Even so, GDP is at the pre-pandemic trend growth path, up 10.7% vs Q4-19 level. Any better??**
- **Industrial production** rose by 0.4% in Dec, as in Sept- Nov, a tad faster than during Jun-Aug. Measured y/y, growth accelerated 0.5 pp to 4.3%, <u>0.7 pp better than expected</u>. Production is still 2% <u>above</u> the pre-corona trend path. Steel production grew 22% m/m, reversing most the steep decline since early 2021. An incredible data point??
- **Service sector production** rose 0.5% in Dec, like in Nov – no signs of any fight against the virus. Production is just back to the June level, and it is still **2%** <u>below the pre-pandemic growth path</u>
- **Retail sales volumes gained** 0.4% in Dec as prices fell (our est., nominal sales down 0.2%). Still, the trend is just marginally up (less than 1%), vs. the 6% pre-pandemic trend path, a remarkable change of tack. Official y/y growth decelerated sharply to 1.7% from 3.9%, expected 3.8%! **Auto sales** are recovering, up 4% vs the 2019 level, among the best
- **Investments** grew by 0.2%, as during the previous month. Prices are no doubt increasing – and in volume terms, investments are falling. Annual growth was 4.9%, 0.1 pp <u>better than expected</u>. **Housing and other construction** starts fell again in December, and are down 30% and 25% vs. peak levels last year, resp. However **new home sales** have stabilised since September, and the inventory is now reduced, which is good news. **New and existing house prices** have fallen the past 4 – 5 months, but so far not dramatic
- **Credit growth** slowed in Dec but has been trending up m/m through most of last year in Nov, as local governments like are borrowing more in the bond market (to support the building industry, compensate for lower land sales?) while bank lending slows. **The PBoC cut 2 signal policy rates** by 0.1 pp this morning. There is still ample room for stimulating more, if warranted
- Exports were still strong but imports weak in Dec, and the trade surplus record high
- **CPI inflation** slowed substantially in December, and **PPI infl.** may have peaked

In sum: H2 was stronger than assumed/expected but growth slowed in 2021, partly due to corona (services) but construction starts have fallen in a spectacular way (without so far crunching the Chinese economy, or hurting the global economy. <u>The authorities are trying to keep growth up</u> – and to stimulate at least some segments of the credit market

Q4 GDP up 1.6%, 0.4 pp more than expected, up from 0.7% in Q3 (rev from 0.2%!)

In sum, GDP grew 0.9% faster than assumed/expected in H2 – all figures NOT annualised!



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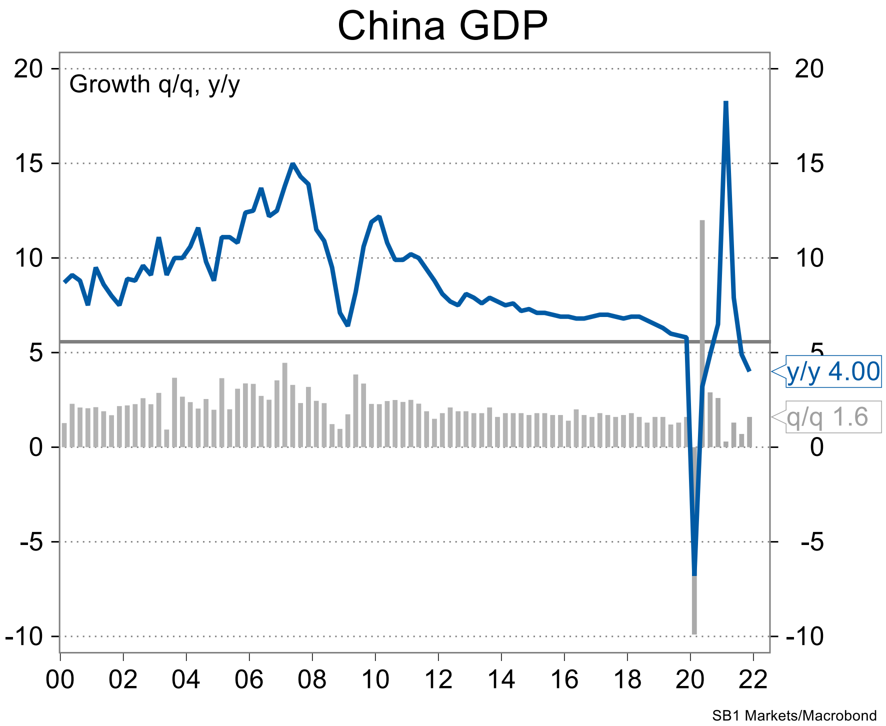

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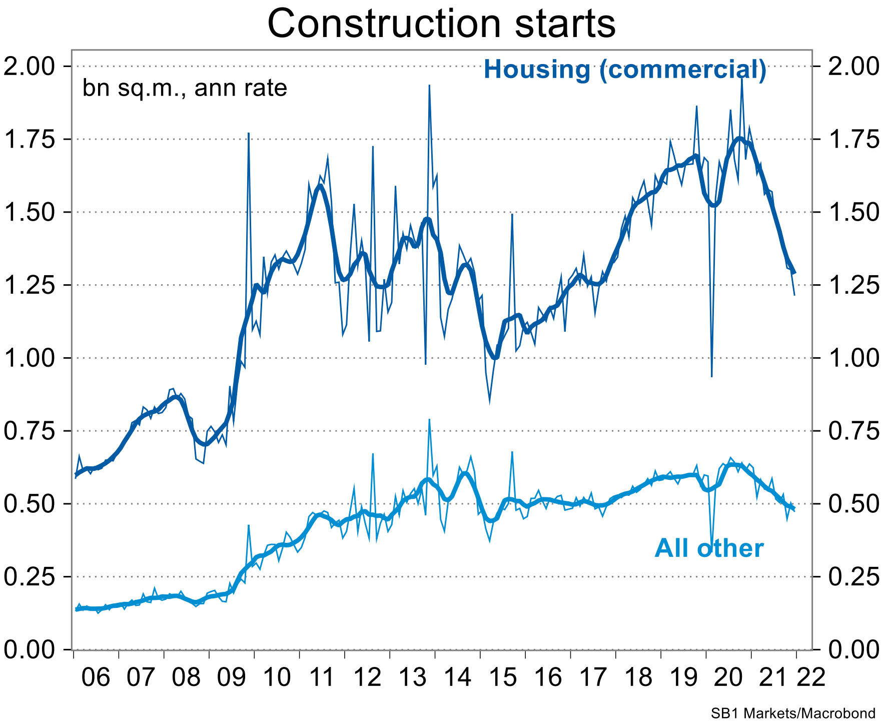
- The **annual growth rate** fell to 4.0% in Q4, down from 4.9% in Q3, expected down to 3.8% (there is not precise connection between quarterly and annual data, of course…). Last year, GDP grew by 8.1%, following the slow 2.2% growth in 2020
- **A 1.6 % q/q rate** equals a 6.6% annualised growth pace. Growth reached the pre-pandemic growth path in Q4-20 but growth has slowed through last year, activity was 'just' back on trend in Q4-21, up 10.7% vs. the Q4-19 level. Not many has achieved that
  - » Corona has no doubt influence the growth pattern the past 2 years. The risk now is that a fight against Omicron may hurt the economy again – and that it would be close to impossible to succeed as China has beaten down the previous variants – because it is far more contagious (and the immunity level is low, as few have been infected, and vaccines are ineffective)

Housing starts further down in Dec but new home sales have stabilised

Starts down >30% since late 2021. Sales have flattened since Sept, an inventory clean-up underway?



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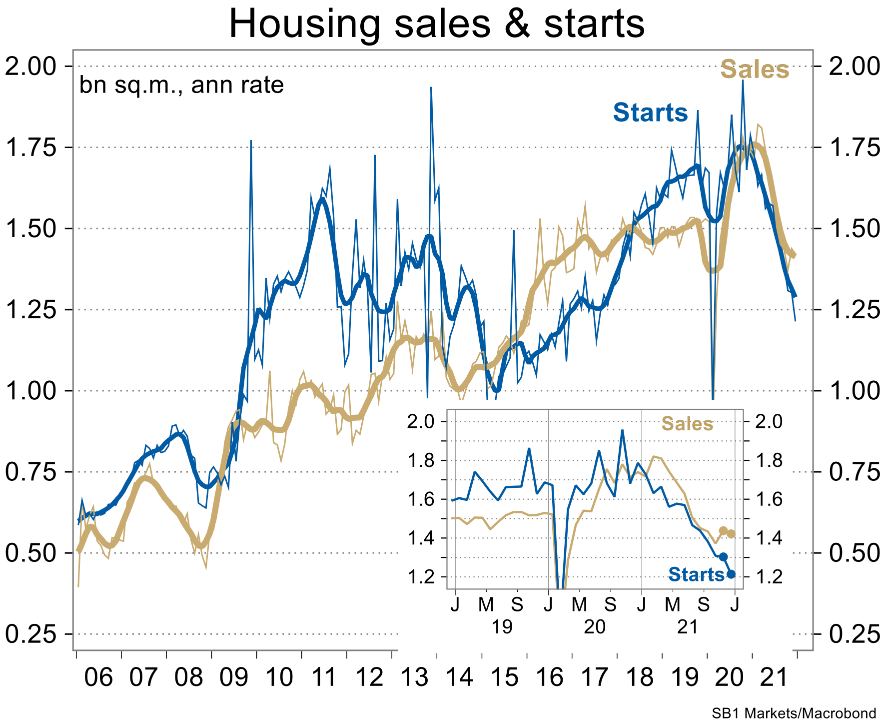

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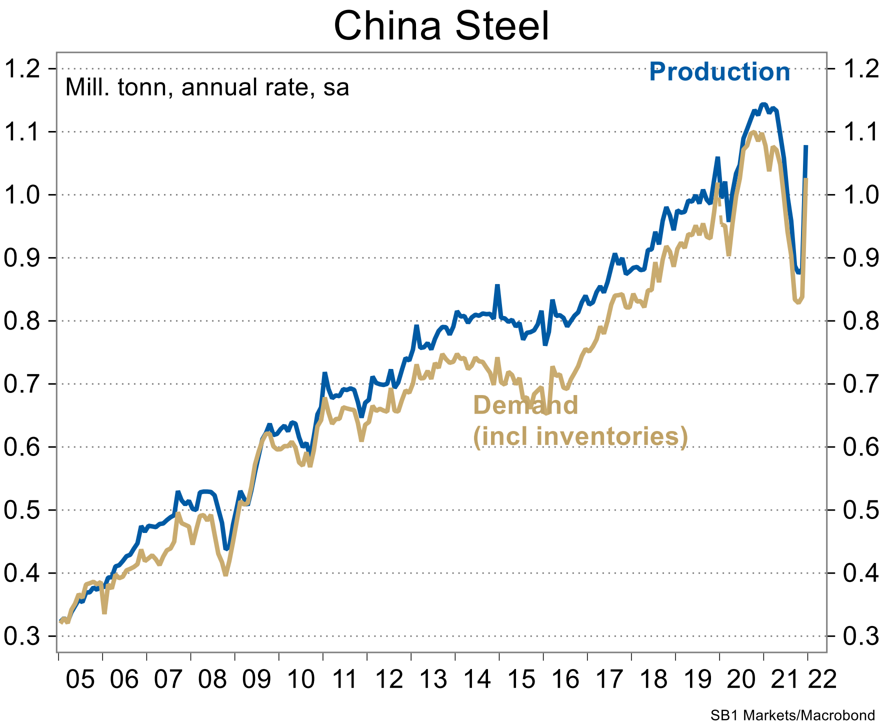
- **New home sales** have fallen 25% from early 2021, following the spectacular recovery after the pandemic last year. Sales are down more than 10% below the pre-pandemic level - which was record high until then. Sales were close to unchanged in Dec, and sales have stabilised since last Sept, a positive sign – buyers are not running away from a sinking market
- **Housing starts** fell 7% m/m in Dec, and are down more than 30% vs. the early 2021 level. Sales have been running higher than starts in most of 2021, and the gap is now visible at distance – signalling a rundown of inventories, which of course is good news these troublesome days for the building sector
- **Non-residential construction starts** fell too in December, and are down 25% since last summer, and the level is 20% below the pre-pandemic level
- In sum, the decline in **construction starts** has been among the largest ever. Still, the downside is substantial as several property developers are struggling. A stabilisation of now home sales last autumn indicate that the main risk, a sudden death in demand for homes, is not materialising. *Check prices next page.*

Construction even weaker in Dec but steel prod/domestic demand up 22%

The correlation is far from tight but we thought we had ‘a story’. No more, given these steel prod. data



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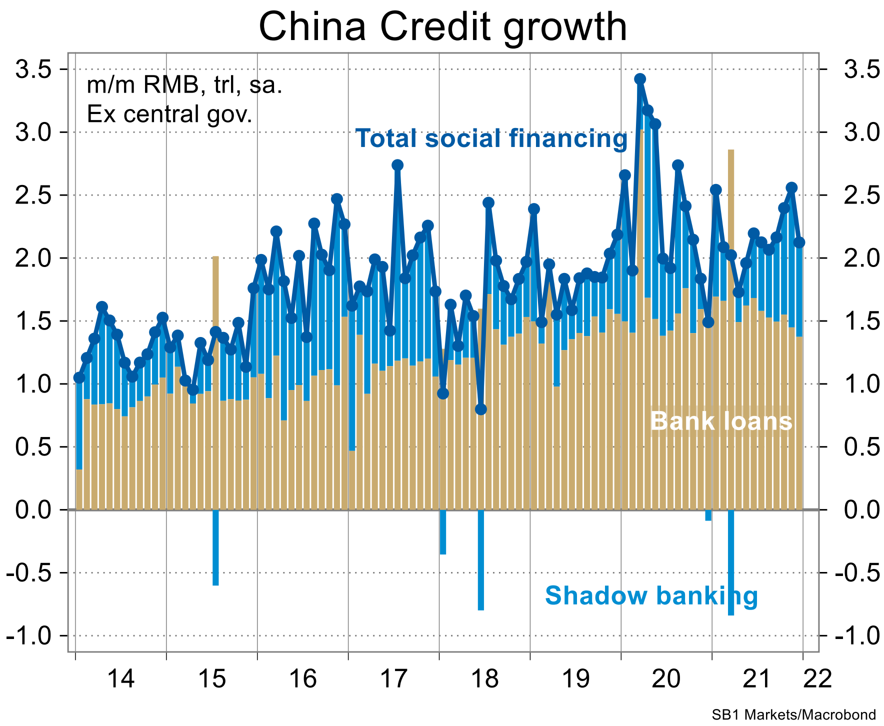
Credit growth down in December, but growth has accelerated in H2

Local gov. are issuing more bonds to compensate for slower land sales? 2 more signal rates cut today



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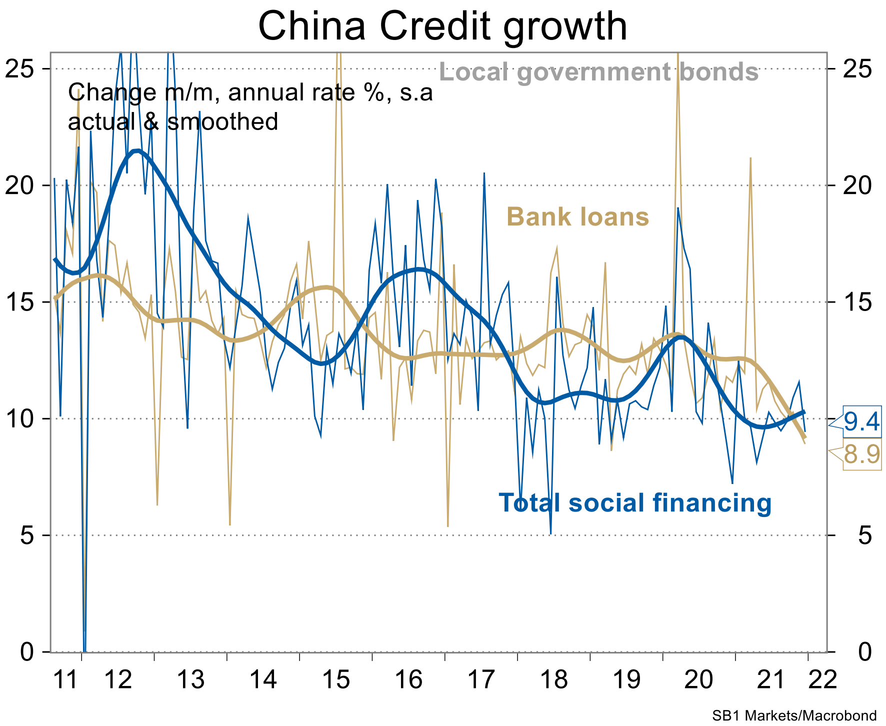

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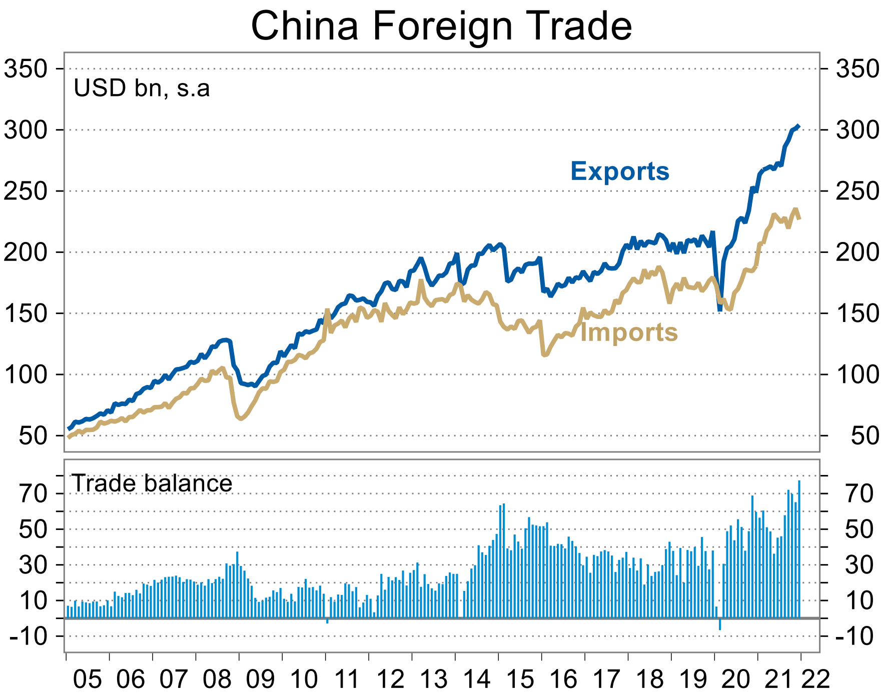
- **Total credit** grew at a 9.4% rate in Dec (m/m, seas. adj. annualised), down from 11.6% in Nov. Smoothed, the underlying rate is at some 10%. The underlying growth rate is still above the trend growth in nominal GDP (say 5.5% real growth, 2% price inflation). The annual rate accelerated to 10.2% from 10.0%
  - » **Total credit** rose by RMB 2.2 trl, expected 2.5 trl (not seas. adj). The 'core' total social credit (total ex central gov bonds & corporate equites) grew by 2.1 trl (seas adj), down from 2.6 trl in Nov, which was the highest since January. Even if credit growth slowed in Dec, no 'Evergrande shock', at least not so far
  - » **Bank loans** rose by RMB 1.4 trl, s.a, or at a 8.9% annualised pace – well below expectation. Loans are up 11.6% y/y but underlying growth has been slowing since early 2021, now at 9%
  - » **Shadow banking credit** rose by RMB 0.7 trl, well down from above 1 trl in Nov. **Local governments** were responsible for the whole (net) uptake), very likely to compensate for the decline in revenues from sale of land to builders - or in order to finance unfinished building projects, with or without being told so by the central government
- Since early 2020, credit growth has slowed, **the credit impulse** has turned negative, like it usually does every 4th year or so. The impulse is still negative at an annual basis but monthly growth has accelerated from early spring – until December, that is
- **The slowdown was by purpose**, as authorities have tightened, especially vs. credit supply outside banks, and vs the construction sector. Now, they are trying to push the accelerator, if not by supporting bankrupt building companies but by easing conditions for lending to others. A signal rate was marginally cut some weeks ago, another two – the 1 year rate by 10 bps to 2.85%, at the 7 day rate by the same amount to 2.1% - this morning, obviously in order to keep demand for credit up!

Exports further up (but slowing), imports down – and the trend is weak

The trade surplus was ATH in December, and in 2021, if not in % of GDP



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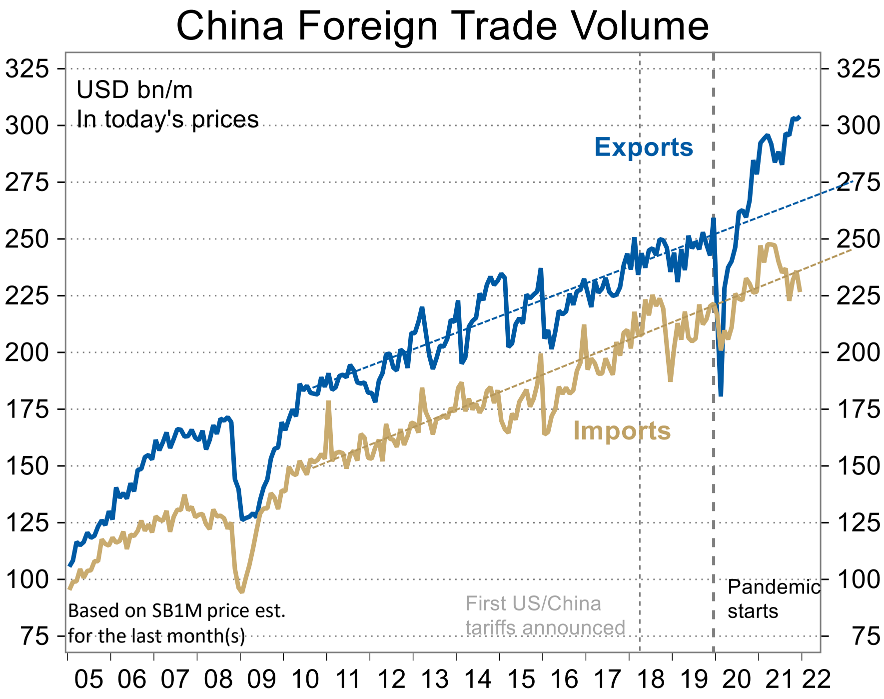


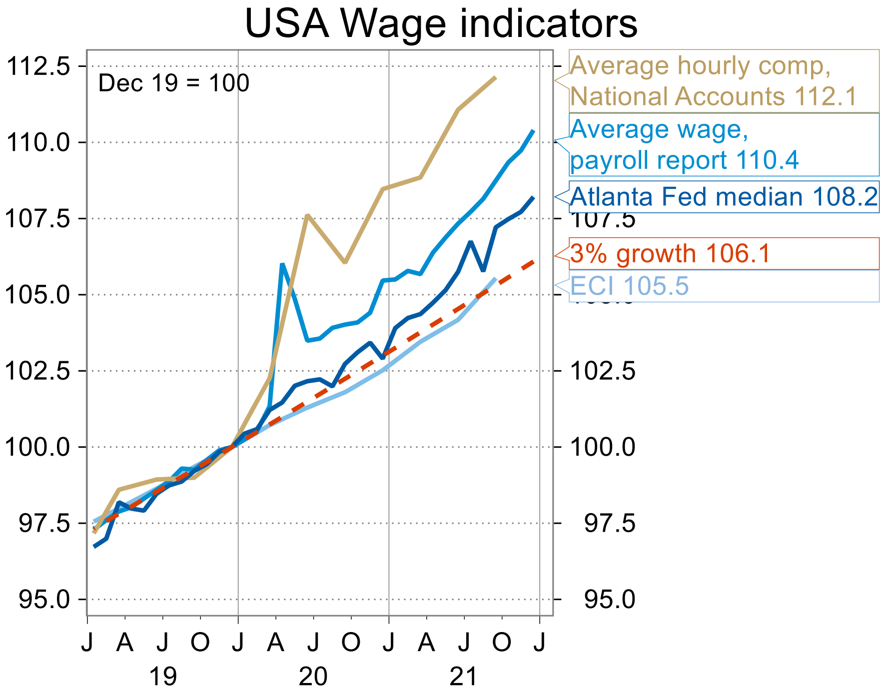
Based on SB1M price est. for the last month(s)

SB1 Markets/Macrobond

- **Exports** grew by 1% in USD terms in Dev (our seas adj), and are up 21% y/y, 1 pp more than expected. Export volumes were probably close to unch and the level is high, up 20% vs the pre-pandemic level and 13% above the p-p trend path! Signals still strong global demand for goods. Prices are up 11% y/y
- **Imports** values fell by 4% m/m but are still up 20% y/y – though far lower than expected, 28%. Recent months import values have flattened, and as prices have climbed, import volumes are down 6% to Q4 from Q4 (and weaker than we assumed in Nov). Import volumes are up 5% from before the pandemic but slightly below the pre-pandemic trend. Prices are up 22% y/y. **Oil imports** rose in Dec but the trend remains flattish (from 2019!). **Iron ore** imports fell, from a high level in Nov – but the trend is weak. **Coal imports** have soared recently
- The **trade surplus** was the highest ever in Dec, at USD 94 bn, expected 'just' 73 bn. The surplus is 77 bn, seas. adj. – still at ATH. 2021 was the best ever, too
- For some time we have expected an export slowdown due to lower demand for goods in the rich part of the world – and growth may be slowing somewhat. The decline in imports confirms a softening of domestic demand, both retail sales and investments. So far, the slowdown is modest, in imports too, and within the 'normal ups and downs in activity

Tick tock, tick tock: The tide has not yet changed – wage inflation accelerates

Growth in the median wage accelerated 0.2% to 4.5% in Dec, up 1 pp from before the pandemic



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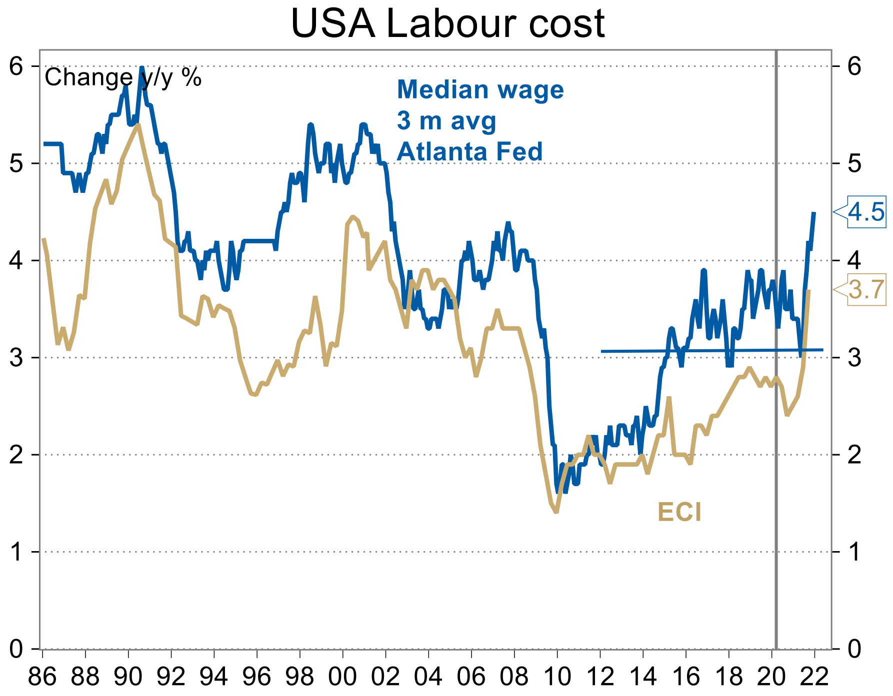

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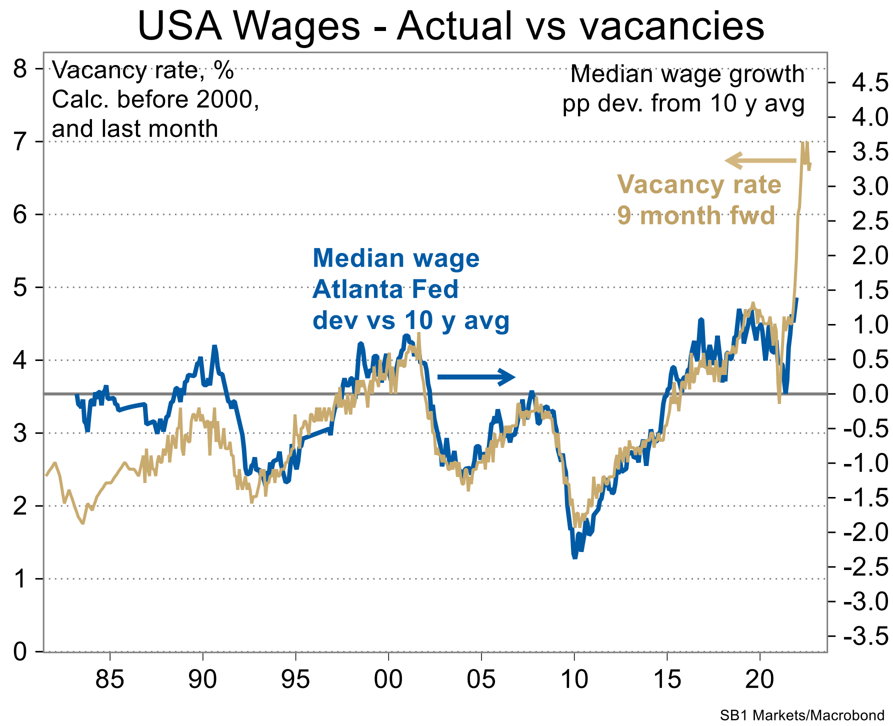
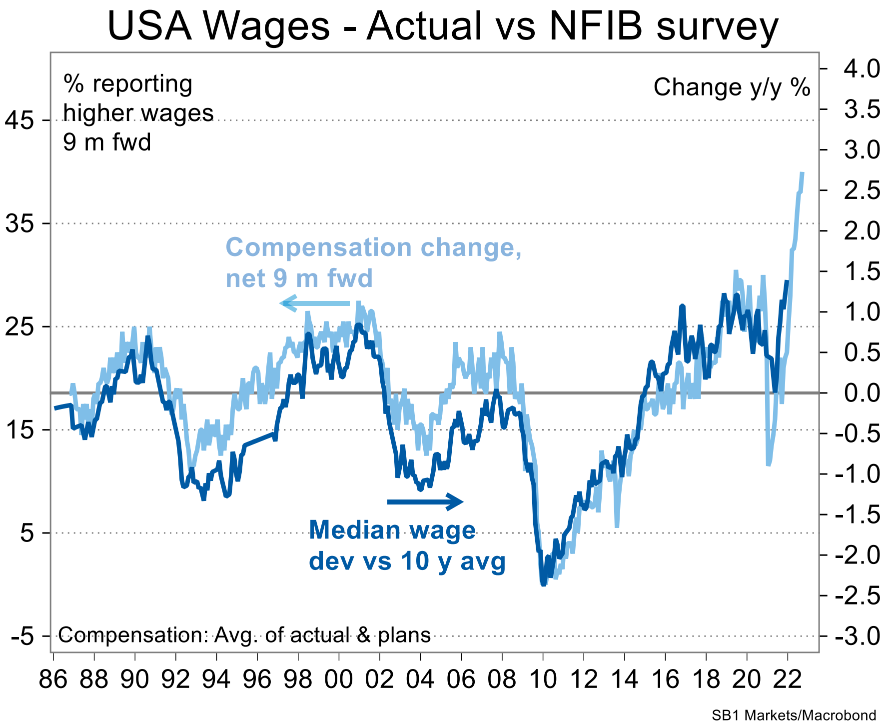
- **Atlanta Fed's median wage tracke**r reported another lift in the annual growth rate in December, the 3 m average up to 4.5% - and from a much lower level before 2016. Since the spring, the underlying growth rate has been higher, well above 5%. The average wage rate in the monthly payrolls report is up at a 5.7% pace since April
- **Various wage/earnings/compensation stats** are now running at growth rates 1.5 – 3 pp above the 10 y average. There is an obvious risk that wage inflation will accelerate further (check the next pages) – probably until the next recession hits as the labour market is extremely tight

Just remind you of our favourite wage inflation chart

Vacancies & SME's wage plans is closely correlated to actual wage inflation – 9 months later

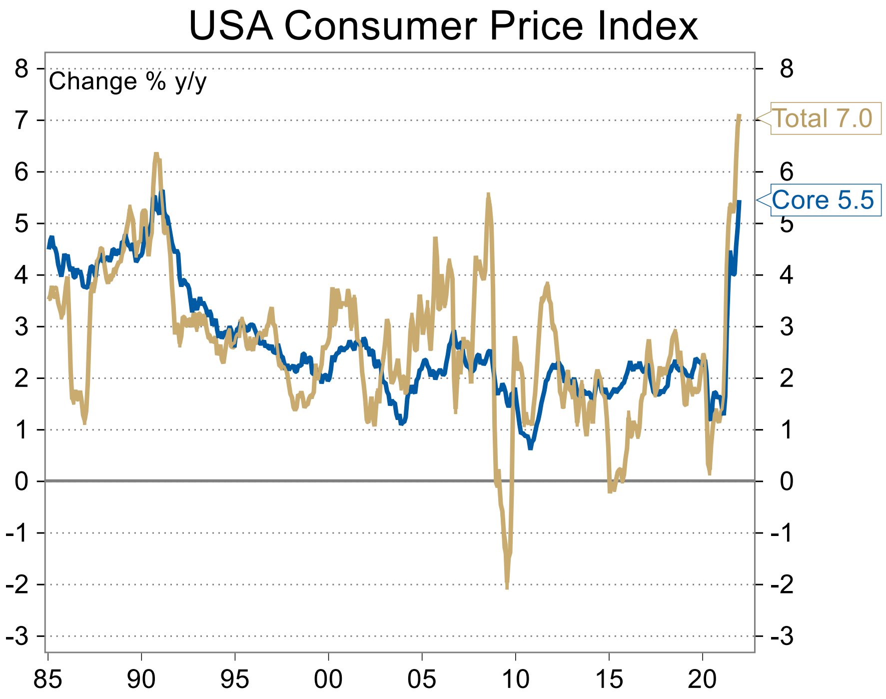




- The correlation between unfilled vacancies and actual wage growth is close, with a 9 months' lag
- More companies than ever before (data from 1986) are reporting that they plan to lift compensation the coming months – and the correlation is tight, with the same lag
- No doubt, these data points have been important for Powell and the FOMC's abrupt policy shift over the past few months. However, the risk has been obvious for many months

7%!

But why worry? It was expected, and the Fed says it will take care of it. Cheers!!



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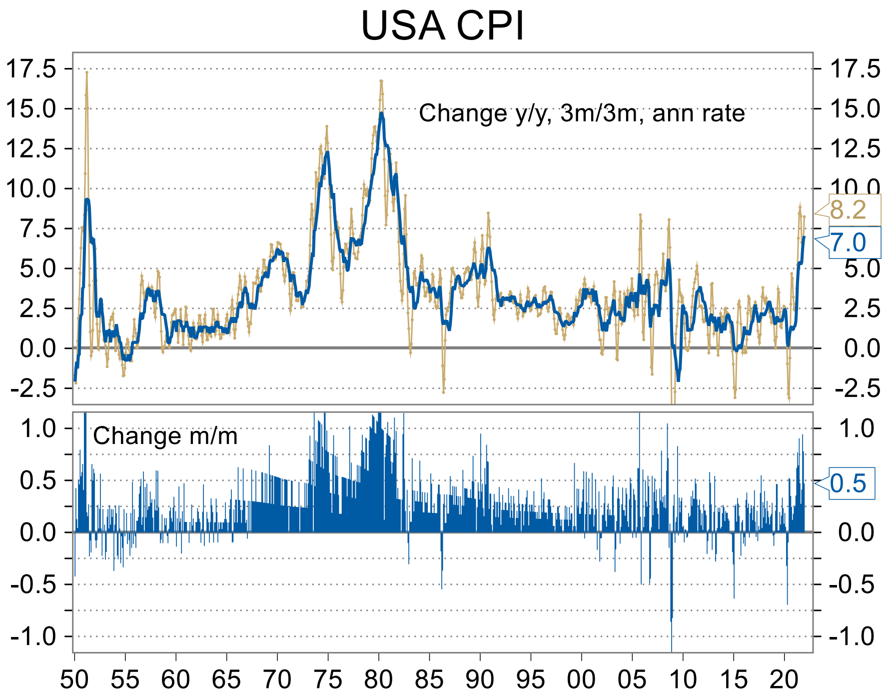
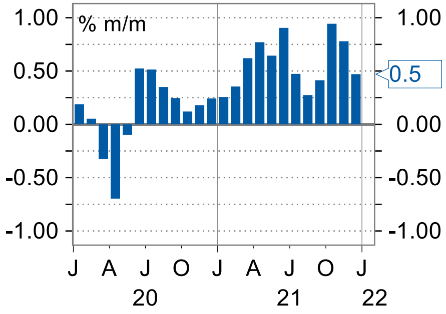


SB1 Markets/Macrobond

- **Headline CPI rose** 0.5% m/m in Dec, 0.1 pp more than expected, following the 0.8% gain in Nov. The annual rate accelerated 0.2 pp to 7.0% – <u>but as expected</u>, the highest since 1982. The 3m/3m rate is at 8.2%. In 2021 prices rose by 4.7%, somewhat above the growth in average wages the past 2 years
- **Energy prices** prices fell slightly in Dec but are still 29% up y/y, contributing 1.8 pp to the headline growth
- Both new and used **auto prices** climbed further, and explains 1.4 pp of the annual rate
- However, <u>price inflation broadened further in Nov</u>. Cleveland Fed's **trimmed median CPI** is accelerated 0.2 pp to 6.2% (6 m pace), another ATH (with data from 1983). Other 'breath' measures tell the same story
- **Surveys** signal a further increase in prices the coming months, at least high m/m increased
- The **Federal Reserve/Powell** has now signalled that the surge in inflation may not be transitory. The Bank will formalise the change of tack at this week's FOMC meeting. <u>Tapering will be sharply accelerated</u>, paving the way for a lift in the Fed funds rate before next summer. The policy change should have been taken several months ago!



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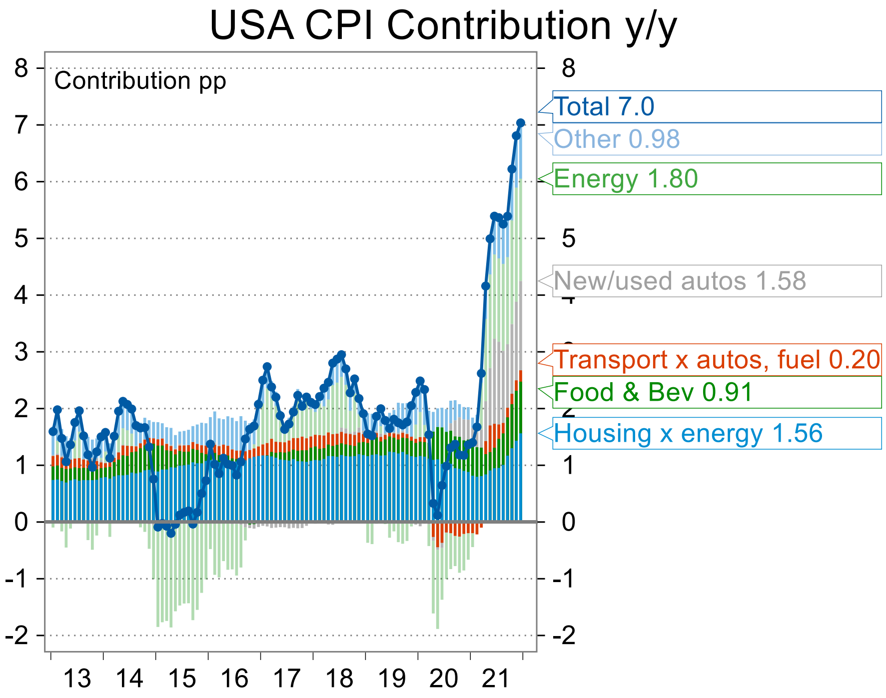
Transport & energy explain 3.6 pp of the 7.0 % lift in total CPI

Inflation in other sectors are >4%, far above the inflation target



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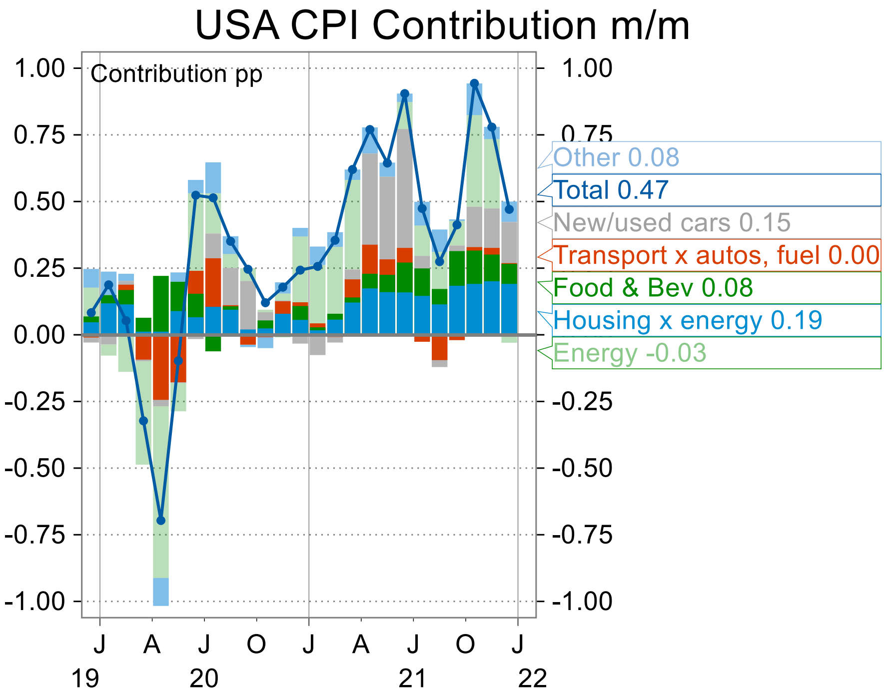

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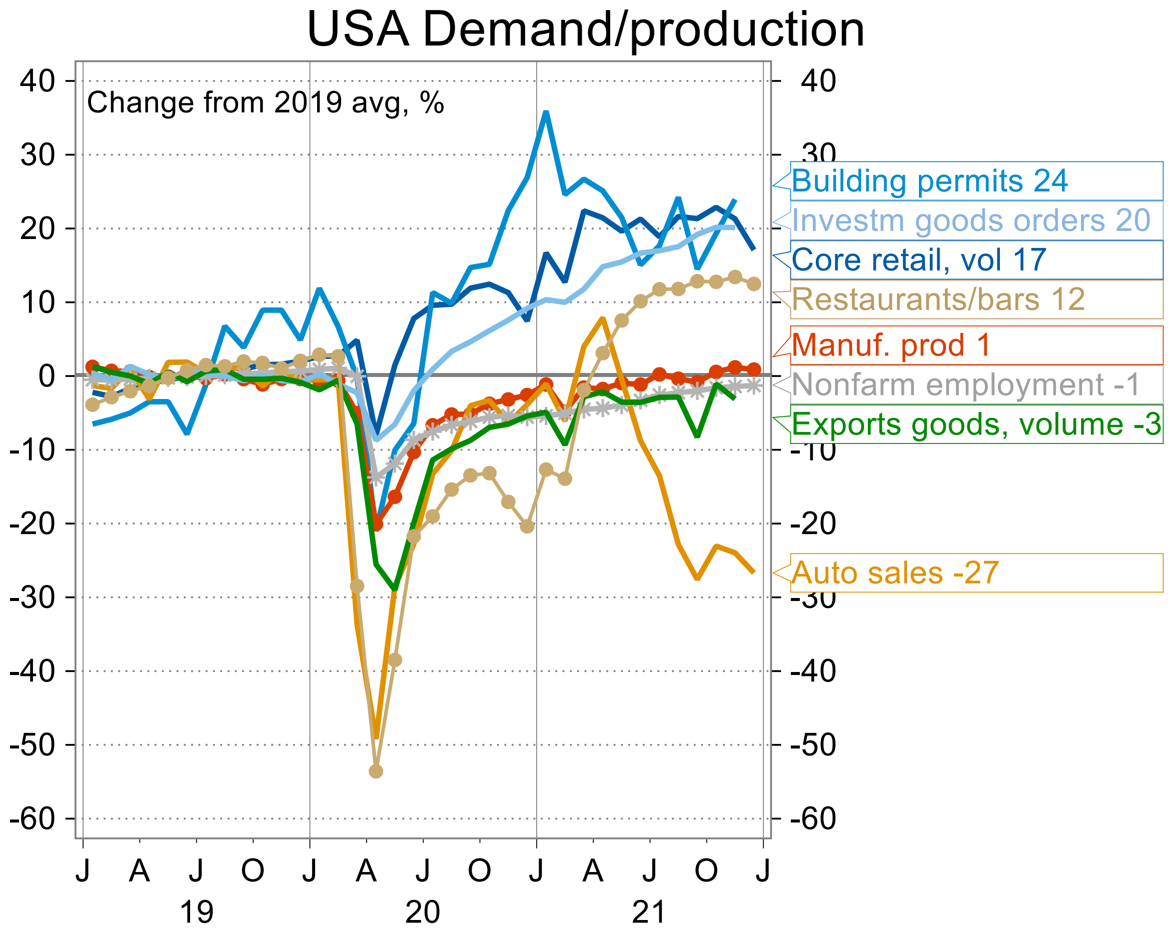
- **Energy** flattened in December but are up 29% y/y, lifting the total CPI by 1.8%
- As **used car prices** rose again in December, as did new auto prices – in sum a 0.15 pp contribution to the monthly 0.5% total gain
- However, **excluding** the 3.6 pp contribution the headline CPI from energy & transport, **"remaining" inflation** has accelerating rapidly
- **Housing x energy** (and x lodging) is contributing by 1.6 pp, the highest rate in many years. Rents are on the way up – and still rather exposed (check 2 pages fwd) but a substantial contribution to housing also comes from household equipment & furnishings, and operations

Lodging away from home (incl hotels) is a part of housing at the charts above

Big picture: Growth is slowing as the economy as ‘normalised’

The upside now: Auto production & exports

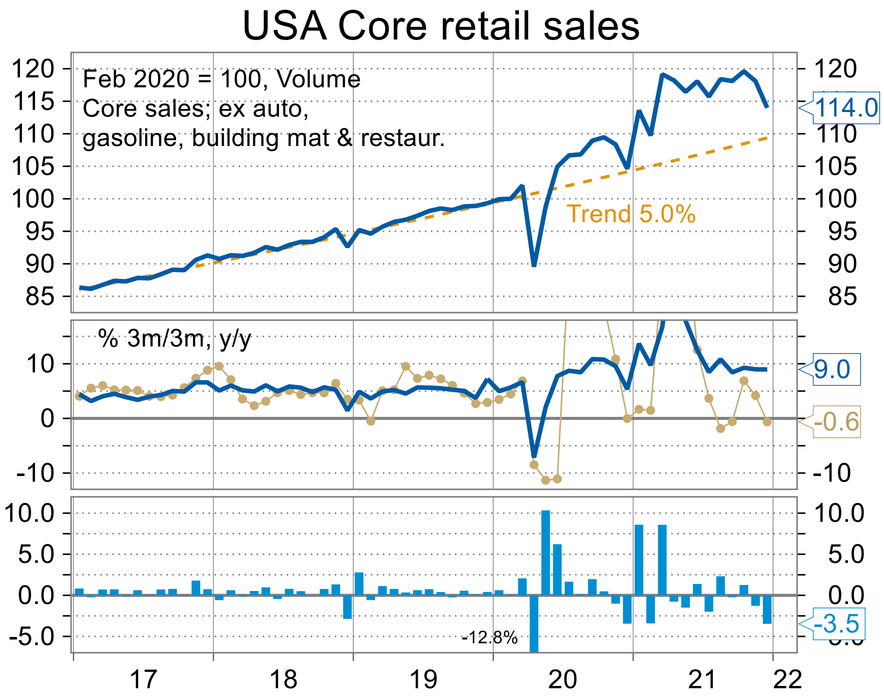


SB1 Markets/Macrobond

- Retail sales have peaked, but is still at a high level (and Dec was likely artificially weak)
- Restaurants have recovered, at least nominally (prices are sharply up)
- Home building has flattened, mostly due to supply constraints, demand is still strong
- Manufacturing production is ‘too weak’ but supply constraints, exports have kept production in check
  - » Auto sales and production are way below normal levels

Retail sales plunged in December – but is still probably ‘too high’

Core volumes lower than we assumed in November, and down 3.5% in Dec. But probably not for ‘real’



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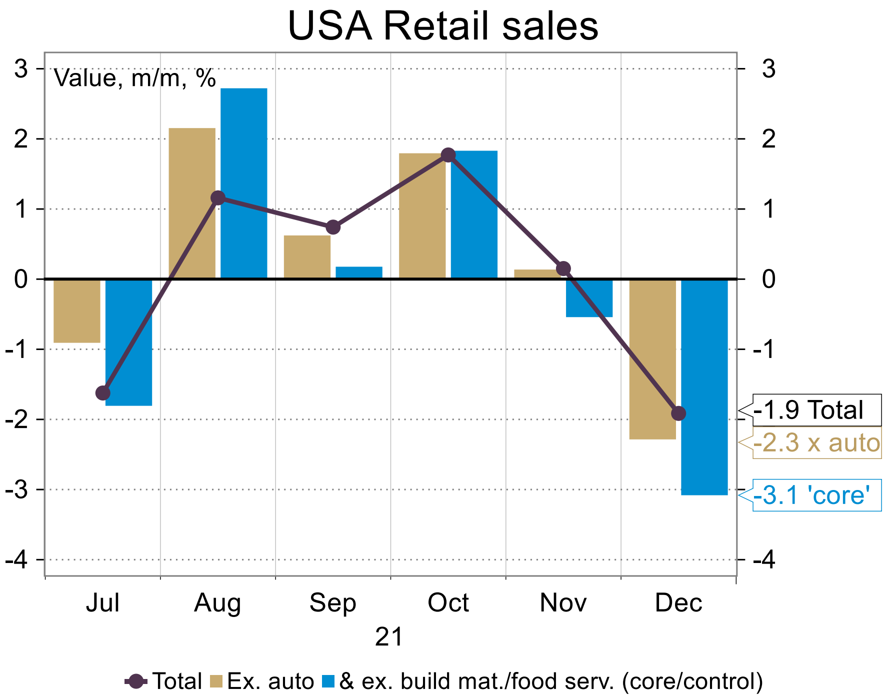
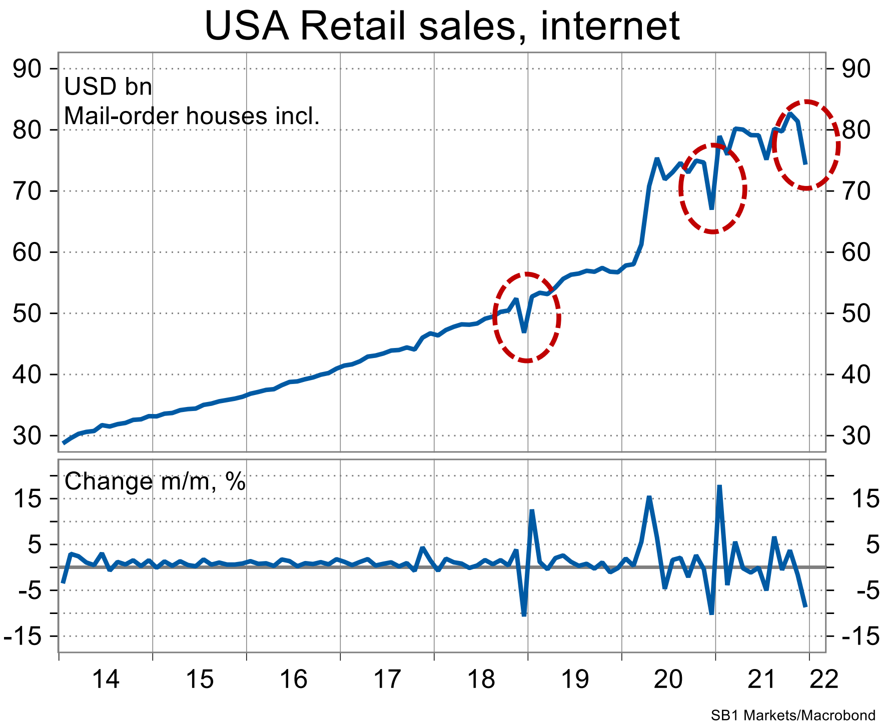


SB1 Markets/Macrobond

- **Total nominal sales** fell by 1.9% in Dec, expected down just 0.1%, an unusual miss. Ex. Auto was down 2.3% (exp. +0.2%!). Total sales are up 19% vs. the Feb 2020 level. 10 kind or stores down, just 3 (marginally) up. The main culprit was internet sales, down 8.7%, explaining 60% of the decline in total sales! However, net sales have fallen sharply 3 of the past 4 years, signalling a possible new seasonal sales pattern. Anyway, the virus not mainly to blame for the decline in sales, net sales sharply down, restaurants far less
- **Core sales of goods** (=control group, excludes autos, gasoline, building materials & restaurants) fell by 3.1% in Dec, expected up 0.2%. Nov was revised down 0.4 pp to -0.5%. In volume terms, we assume sales fell 3.5%. Still, sale volumes are 14% above the Feb-20 level, and almost 5% above the pre-pandemic 5% trend growth path
- **Consumption of goods** is very likely above a sustainable level, and we still expect sales to decline the coming months/quarters – even if parts of the adjustment already has taken place

A new seasonal pattern underway? Net sales sharply down 3 of past 4 years

Somewhat suspicious, most likely internet sales will return to a normal level again in January



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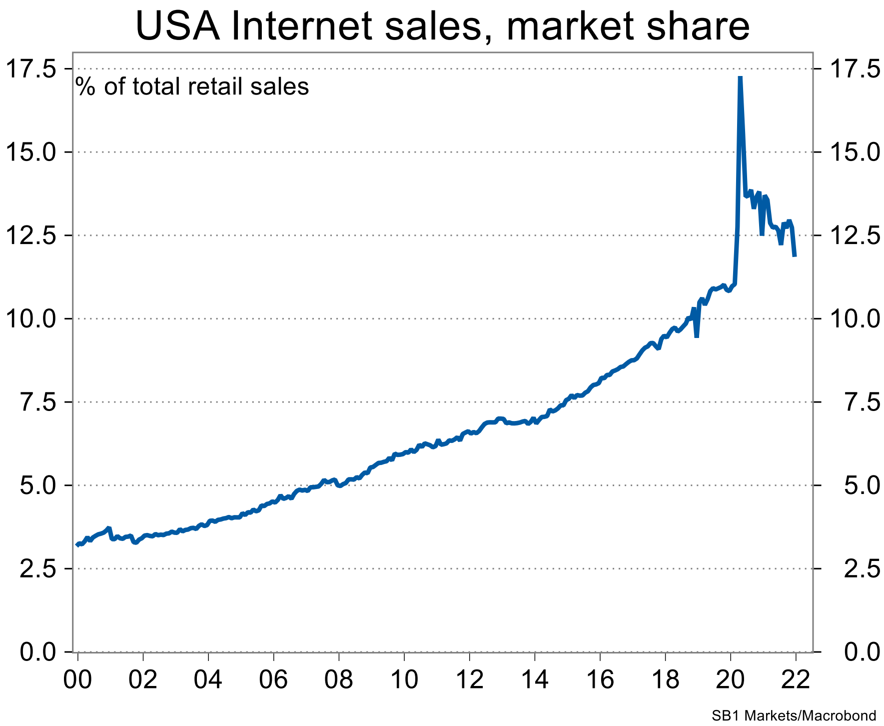
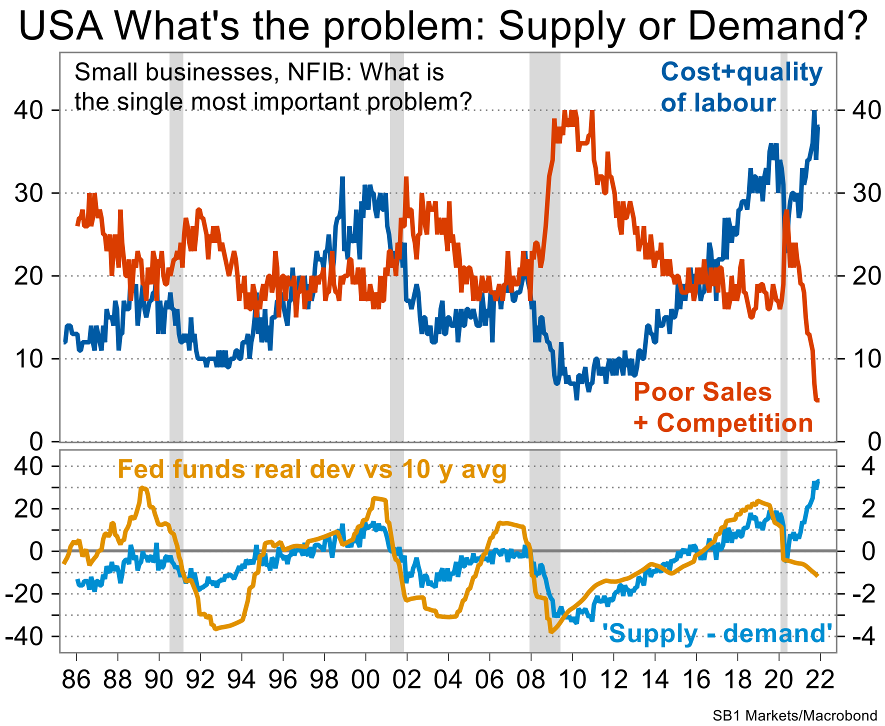


SB1 Markets/Macrobond

- Anyway, the internet sales market share (vs. total retail sales) has returned to the pre-pandemic trend growth – or in fact, it is slightly below

It's the supply side! A tad fewer companies plan to lift prices, but still an extreme print



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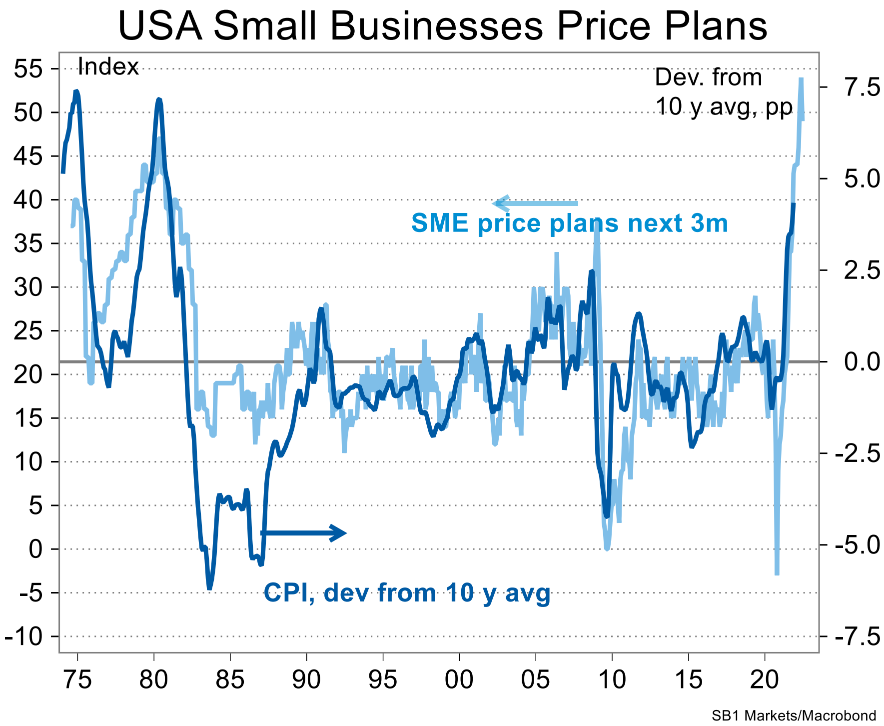

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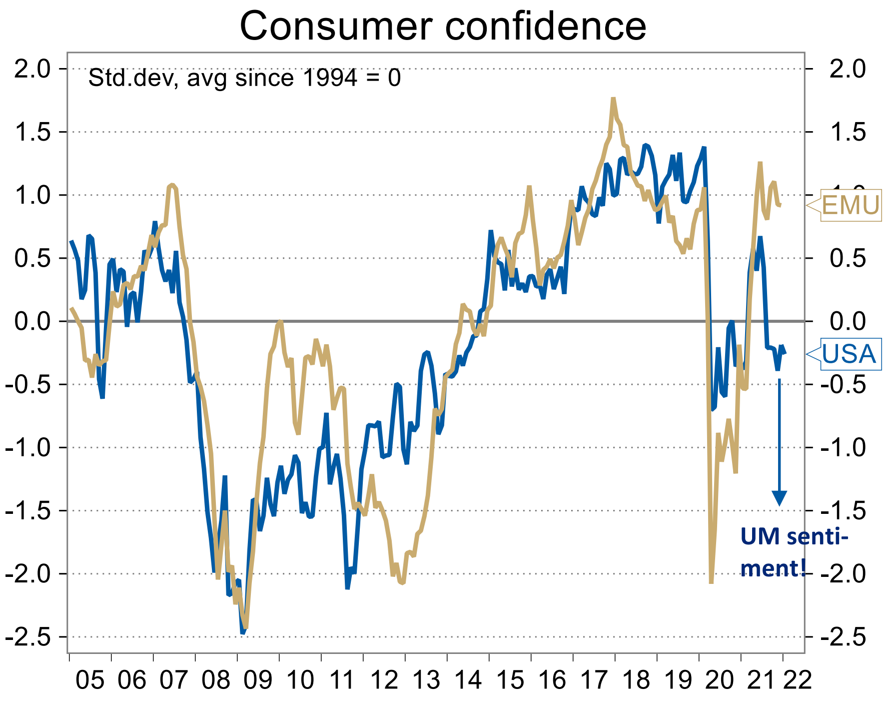
- The share of SMEs than plan to hike their **selling prices** fell 4 pp, but the shar, at 59% is an extreme print, just November higher, data from 1974
- In addition: 2 weeks ago a record share of companies reported they planned to **lift compensation** to workers
- This survey has been mentioned by Powell, as one of several data points that finally made him change his mind
- The real challenge is though that the gap between the normal policy response to demand/supply changes, and the current stance is monumental. With today's demand/supply imbalance (which has shot up into uncharted territory), Federal Reserve would normally have tightened substantially long time ago. Will it be possibly to get the labour and goods market in balance down without engineering a recession, by hiking rates much more than the FOMC so far signals?
  - » We have not seen that happen before. Perhaps Powell (the lawyer) knows something we others do not?
  - » BTW, the market believes it is possible too!

… and why are the (Continental) Europeans so happy??

The gap between consumer confidence in Europe and the US UM survey is unprecedented, by far



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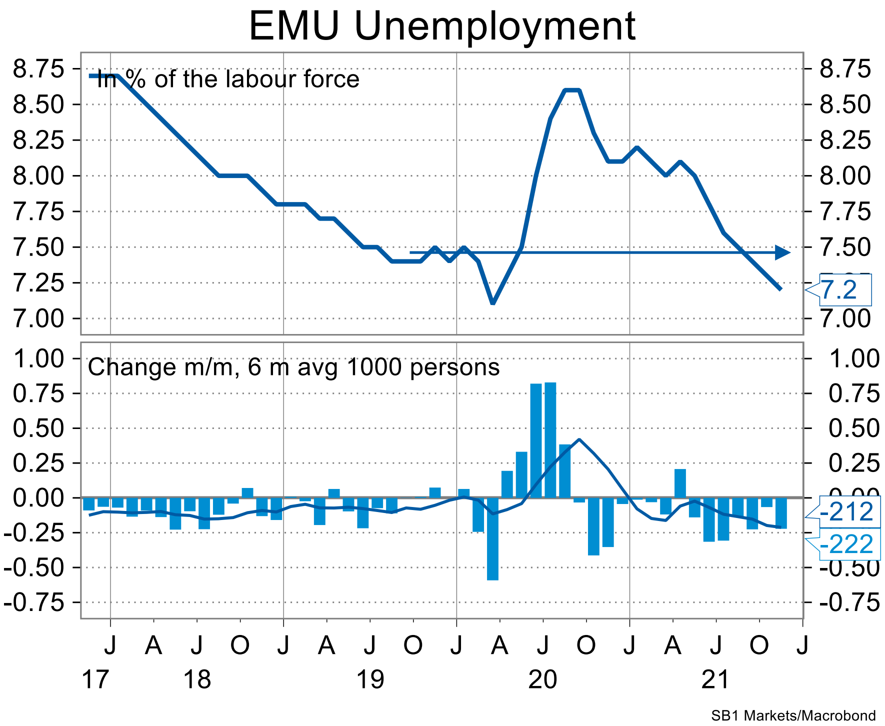
- **Inflation** is sharply up in the Euro zone too
- **Unemployment** is falling in the EMU but it is much higher than in the US
- **House prices** are up in the EMU, but less than in the US
- **Stock markets** are less upbeat in Europe than in the US
- Still, the **Americans** are in a much weaker mood than Europeans

Unemployment fell further in November – to 7.2%, as expected

Unemployment is well below the pre-pandemic level



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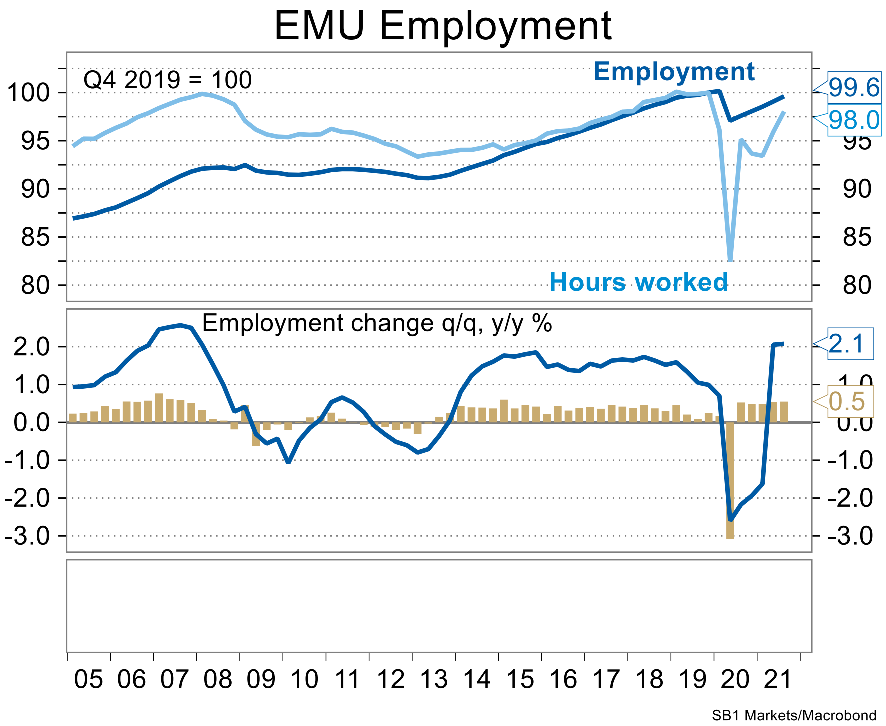

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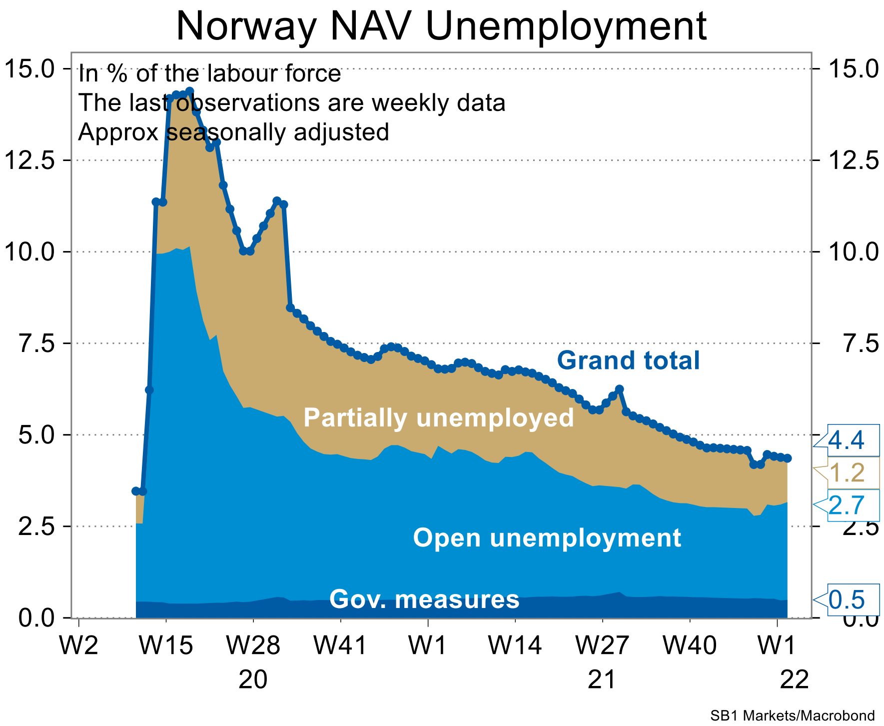
- **Unemployment** has been falling rapidly since the spring. In Nov, the unemployment rate fell 0.1 pp to 7.2%, as expected, and the level is well below the average in the months before the pandemic hit
- **Employment** rose by 0.5% in Q3, as in the previous 4 quarters but the level is still 0.4% below the pre-pandemic activity
  - » However, the best proxy for the real unemployment rate, at least vs. **demand for labour**, is the number of **hours worked**. In Q3, hours worked were down 2% vs the pre-pandemic level, as average working hours have fallen – but working hours grew rapidly in both Q2 and Q3
- The no. of **unfilled vacancies** rose sharply in Q3, to the highest level ever (chart 2 pages fwd)

NAV total unemployment is still drifting down, in spite of Omicron restrictions

… which were substantially eased last week



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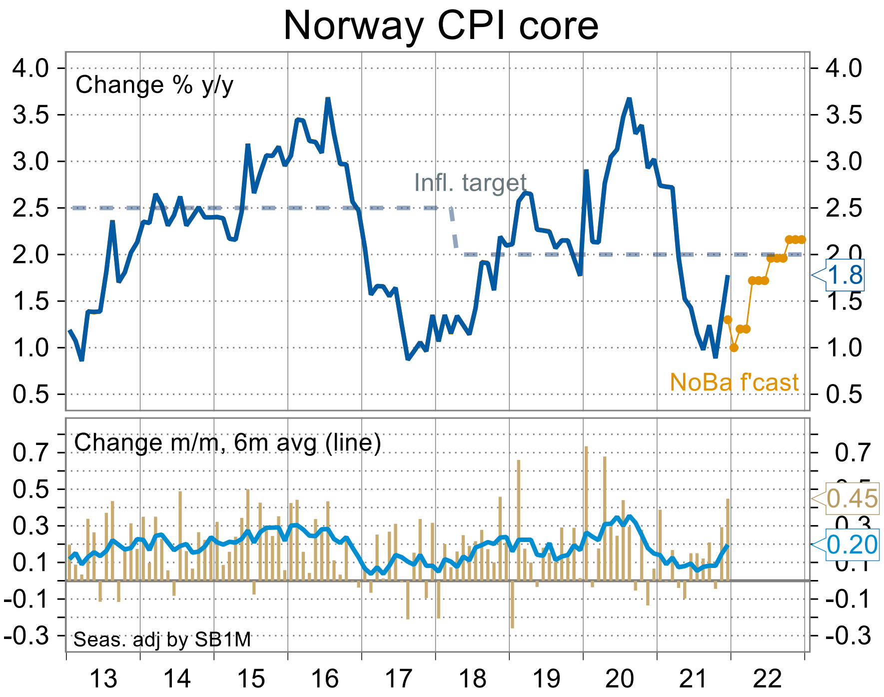
- The no. of **full time unemployed** is marginally up but including the part time, **total unemployment** is heading down
- And now restrictions are eased vs restaurants, that were hit by the mesures decided in mid December

A core CPI shock in December, and there were several ‘sinners’

Electricity prices capped by government subsidies as expected but headline inflation up to 5.3%



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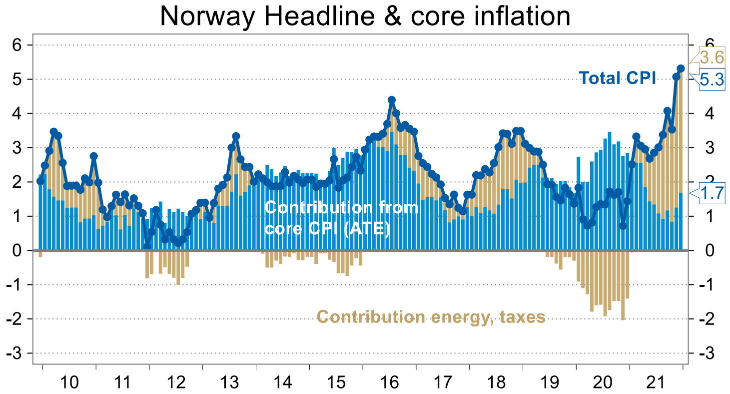
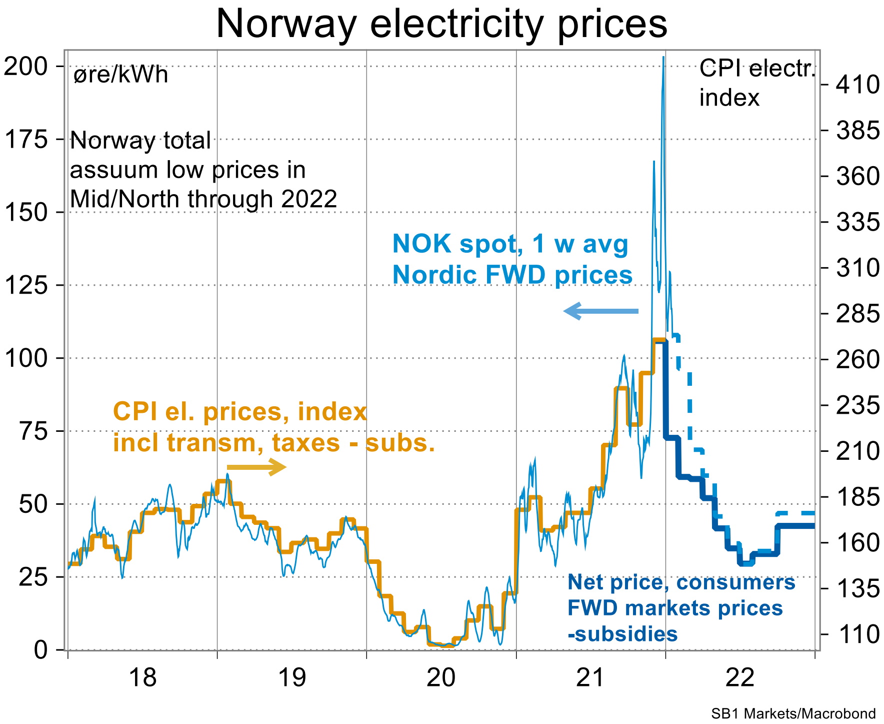


- **Total inflation** accelerated to 5.3% in December from 5.1% in Nov (and 3.5% in Oct), up to the highest level since 2008, and far above our 4.7% estimate
  - **Electricity prices** rose 7%, in line with our estimate. The annual rate fell by 20 pp to 103%
  - **Gasoline prices** rose 1% m/m, are up 20% y/y
  - Energy price (and taxes) contributed to 3.6 pp og the 5.3% headline rate
- **CPI-ATE** (ex. energy and taxes) inflation accelerated to by 0.5 pp to 1.8% in Dec, far above our (and NoBa’s) 1.3% f’cast
  - Prices rose 0.45% m/m (seas adj), after a 0.3% lift in November.
  - Food, airline tickets & furnishing/hardware contributed to most of the hike m/m
  - Core inflation is running above 2% in just <u>4 sectors</u>, and is below 2% in 9 <u>sectors</u>
  - Prices on imported goods rose 0.6% in December, domestically produced goods & services were up 0.4%
- **The outlook**
  - **The electricity bill** will decline some 20% in January, both due to a decline in spot prices, and the increases subsidy (the Government covers 80% of el. prices above 70 øre/kWh, from 55% in December), taking inflation sharply down
  - **Core inflation** surprised at the upside in December, especially for food, furnishing/hardware and airfare tickets. Strong growth at home and some impact from higher inflation abroad will contribute at the upside (even if the impact of the latter is not impressive, historically). We expect wage inflation to gain speed as well
  - Total inflation will fall sharply the coming months, and the 2022 average may be as low as 2.6&
- **So what?**
  - If electricity prices normalises through H1 in line with the future prices, inflation will come sharply down to the core rate by April. The cost during the surge will be limited, less than 1¼ % of the annual disposable income
  - Consumption may be somewhat influenced, but not by much
  - The lift in the core inflation rate may lift NoBa’s f’casts somewhat but we think at least parts of the lift is transitory. However, the risk on the upside may be increasing, here as some other places

A huge drop in the electricity bill in Jan – and market expects more of the same

Market prices are down, and substantial contribution from the enhanced subsidy scheme



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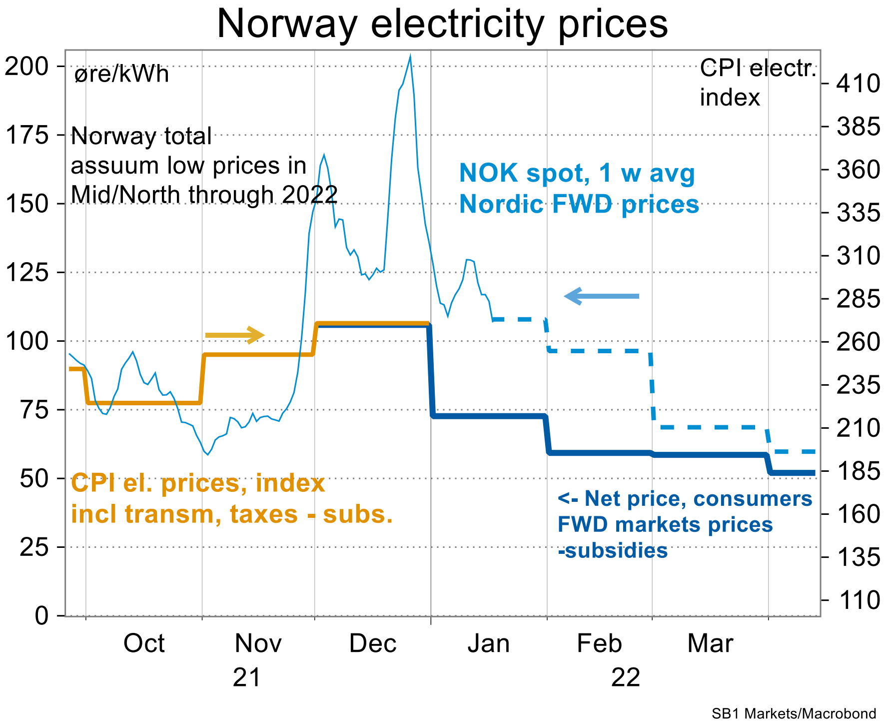

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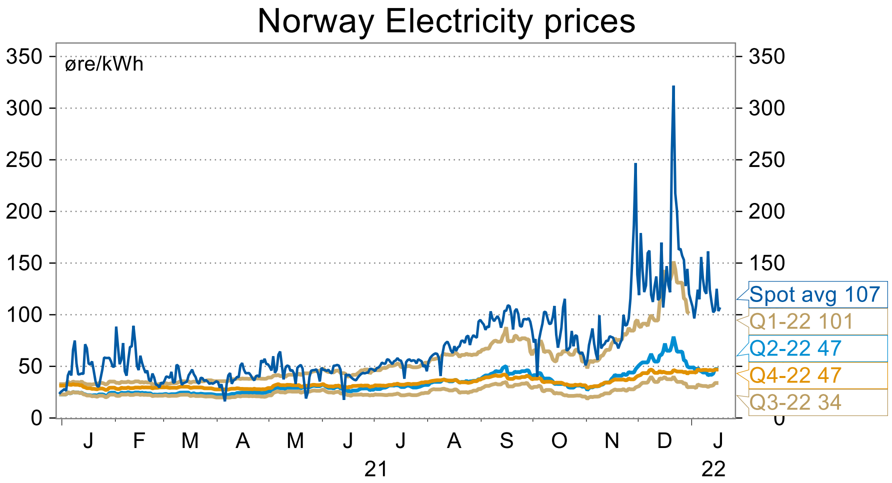
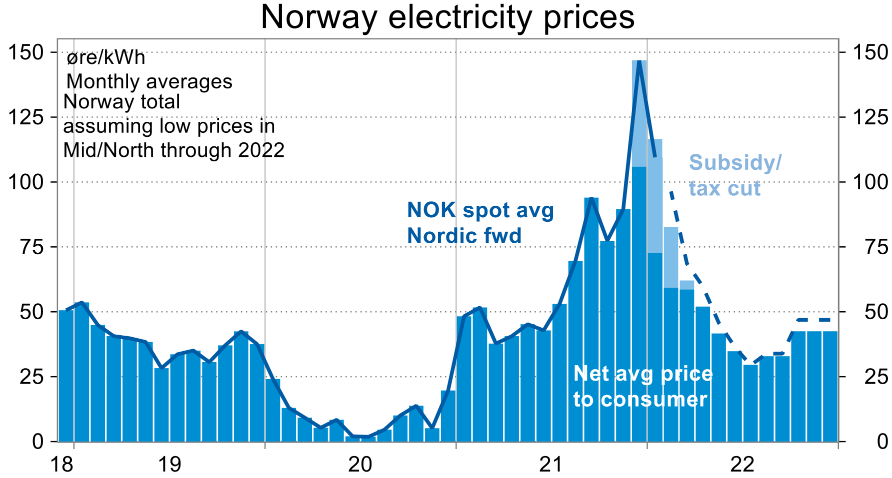
- The average net price may drop to below 75 øre/kWh in January (we have treated the 3.5 øre/kWh as a part of the subsidy regime)
- We are assuming prices in Mid/Northern Norway to remain low (25 – 30 øre/kWh) through the year

IF the future market is right (you never know), the bill will soon be back to normal

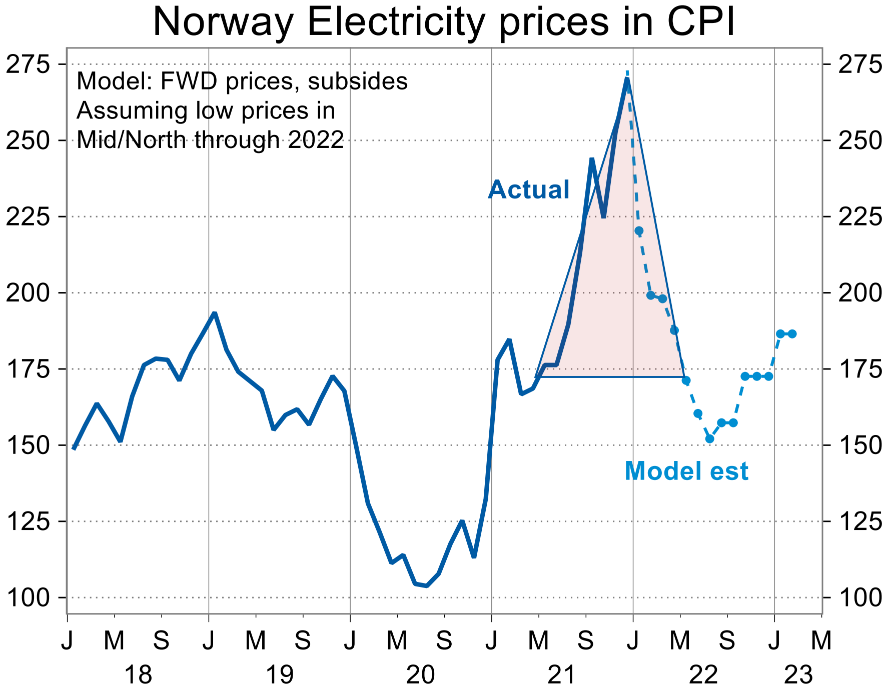
The bill down almost 20% in Jan? Last Jan prices rose by 33%. Annual infl. down to 20% from 103%


Norway Electricity prices

SB1 Markets/Macrobond


Norway electricity prices

SB1 Markets/Macrobond

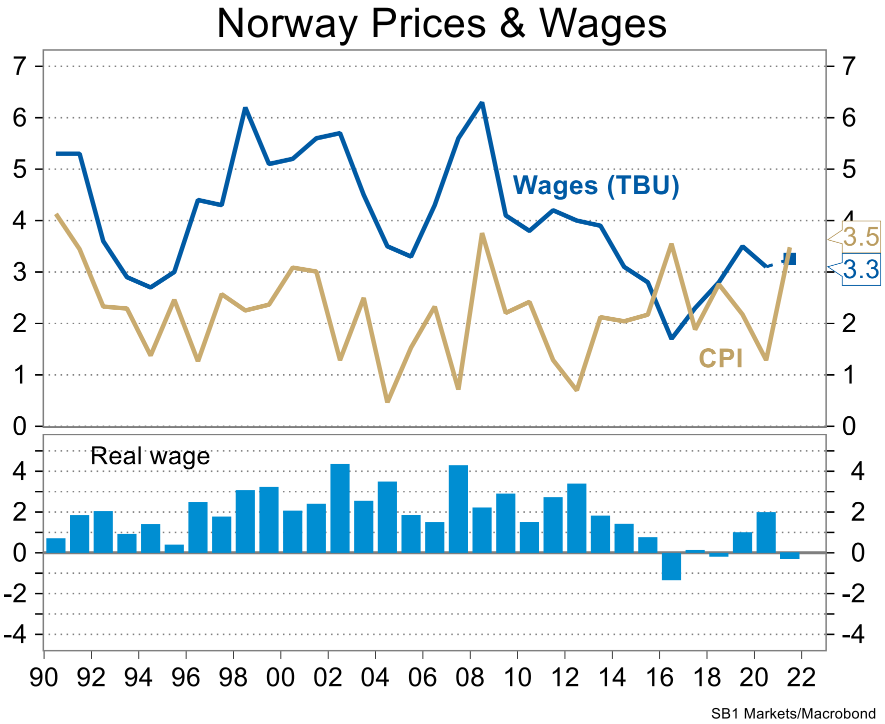

Norway Electricity prices in CPI

SB1 Markets/Macrobond

- The 'turnaround' in electricity prices (and our estimates for other components) will lower headline inflation to some 3.5% from 5.3%
  - » And before the summer, electricity prices are down y/y, without subsidies??
- The 'unprecedented surge' in electricity prices, represented by the area of the triangular above, equals some 35% of a normal annual electricity bill, <u>or less than 1¼ % of the annual disposable income</u>

What a shock: Real wages down some 0.2% in 2021, after a 2% gain in 2020

In average, CPI rose by 3.5 % last year. Wages probably added approx 3.25%



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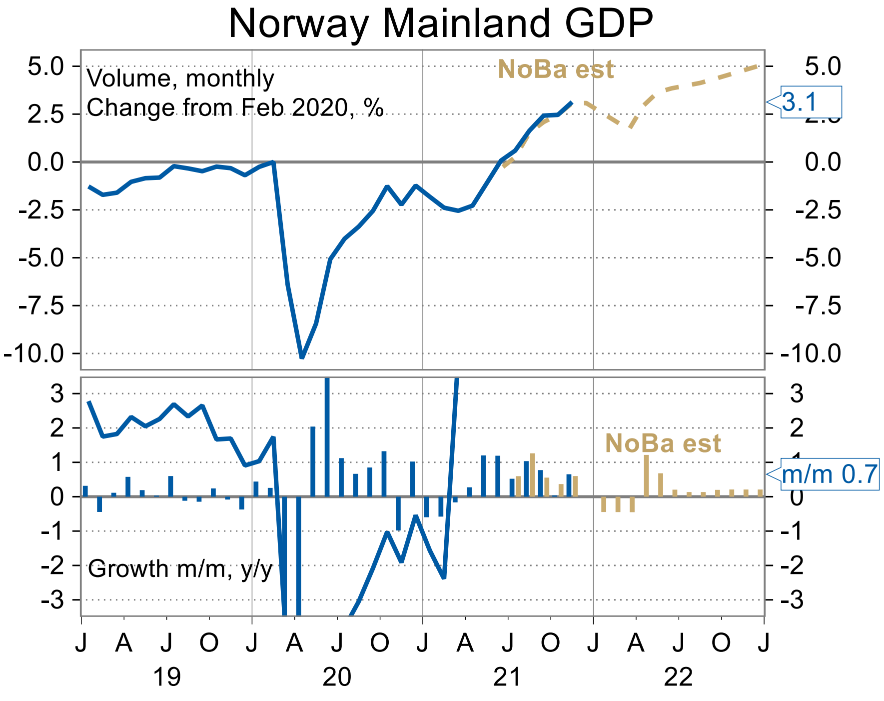
- Very likely, real wages fell in 2021, we assume by 0.1 – 0.3%
  - » In 2020, real wages gained 2%, and in 2019 by 1%, following 3 unusual weak years, in sum down by 1.2%
- There are still a huge uncertainty vs. electricty prices in 2022. The future market, cut in the electricty tax and the government subsidy program through Q1, implies a sharp decline in the annual growth rate through H1

Mainland GDP further up in November, broad based

Now, a mild and short downturn – and then a further recovery (if more labour is available, that is)


Norway Mainland GDP

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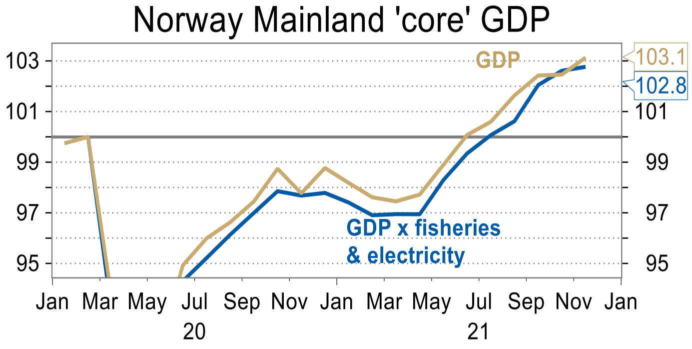
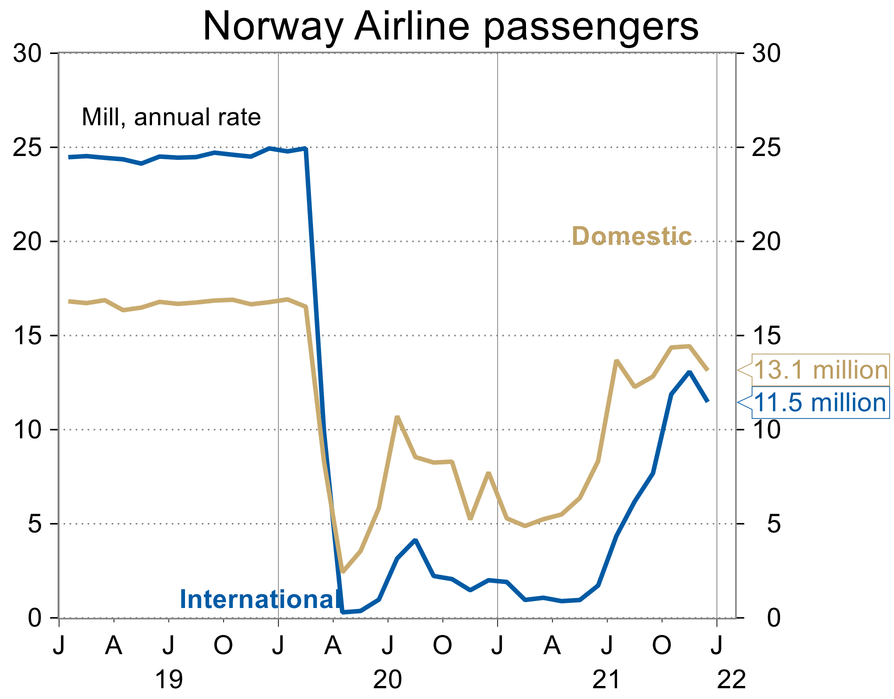

Norway Mainland 'core' GDP

SB1 Markets/Macrobond

- **'Mainland' GDP** rose 0.7% in November, just above expectations (NoBa 0.6%, consensus 0.5% following the October pause. GDP is now 3.1% above the pre-pandemic level
  - » **Production:** Private services flattened following a strong recovery the previous months. The trend in
  - » **Demand:** Norwegians' spending at home was up flat, as spending abroad rose by 40%. Goods down, services up. Oil investments rose sharply, while Mainland business investments remain weak. Exports rose, imports fell. Inventories were drawn down
- **Mainland GDP is up 2.4% vs the Feb-20 level**
  - » **Production:** Services are back in black, Hotels & restaurants are in plus, while business services and transport is still below the Feb-20 level. Manufacturing is flat, construction is down 1.6%
  - » **Demand:** Norwegians' spending at home is up 7% from Feb-20, goods 10% (and now heading down), services up 1.5% - but still rapidly on the way up. Spending abroad is still down 56 %, and total household spending is up 1.8%. Oil investments are in plus, ML business investments are still below par
- **We expect a 1.3% Mainland GDP growth in Q4 (5.2% annualised pace), given a small decline in activity in December (-0.1%)**
- **The recovery has been strong. Now, virus restrictions will dampen activity in parts of the service once more. We expect a mild slowdown in Dec/Jan, and the a new start – more shallow and shorter than NoBa assumed in December**

Airline traffic down in December, as travel became more complicated again

Both domesic and international traffic fell some 10% m/m – and are down 21% and 53% vs. ‘19 resp.



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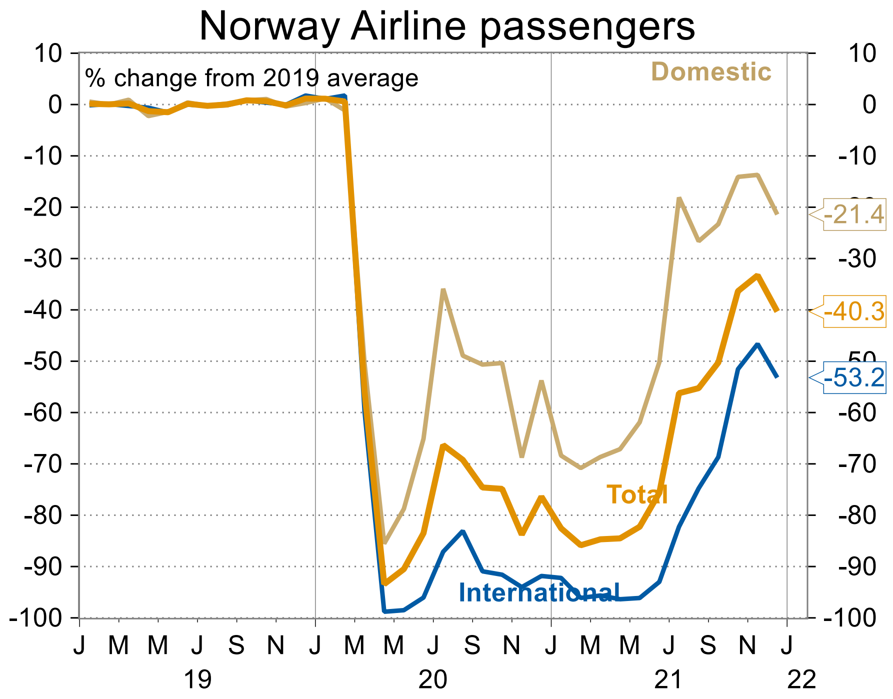

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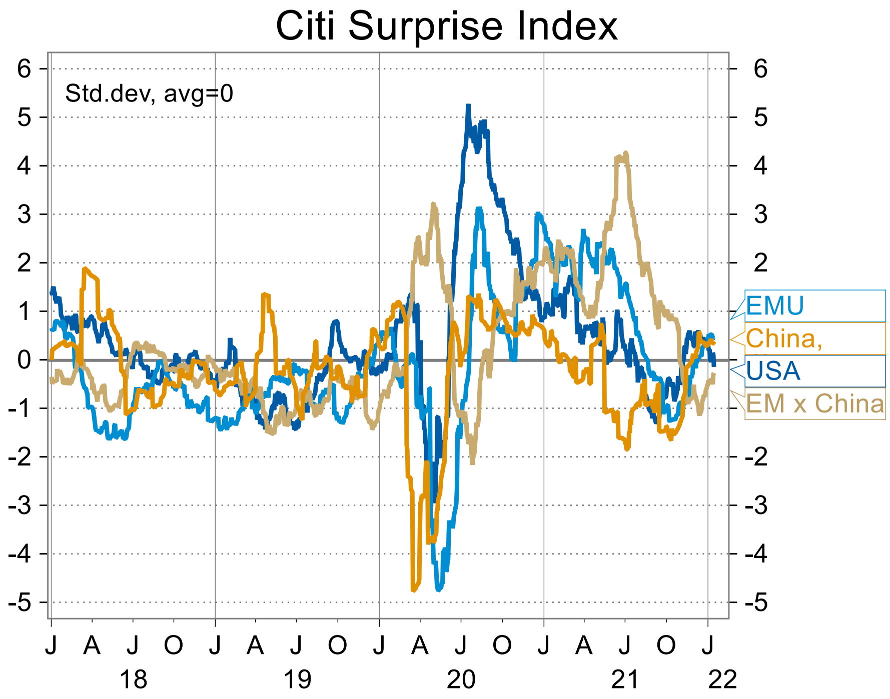
- Total traffic is down 40% vs. the average 2019 level

The global surprise index further up and slightly above par

Both EMU, China above. US down to par, EM x China still below but less recent weeks



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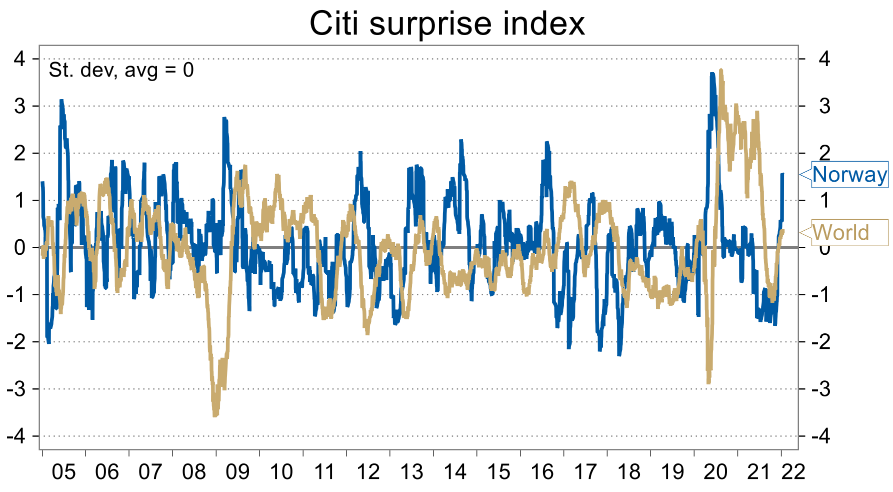

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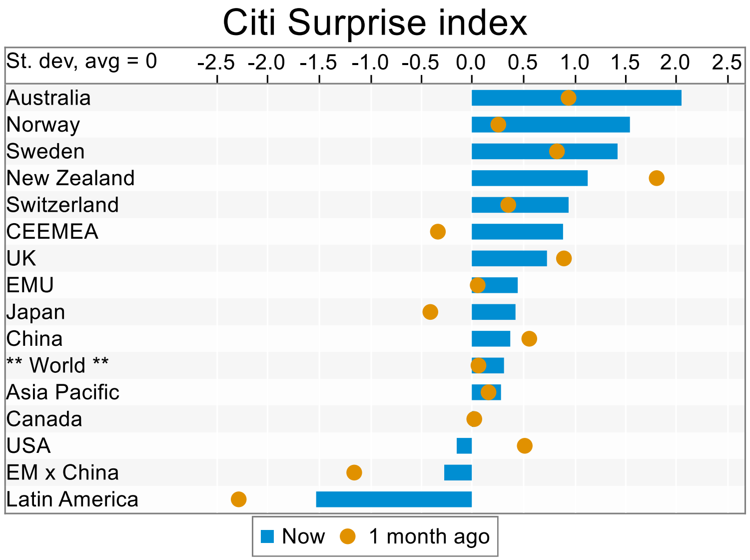
- **Norway** was surprising sharply on the downside through most of 2021, according to Citi. But in early December we crossed the zero line, and now we have suddenly moved up to the upper part of the list
  - » GDP, CPI data last week?



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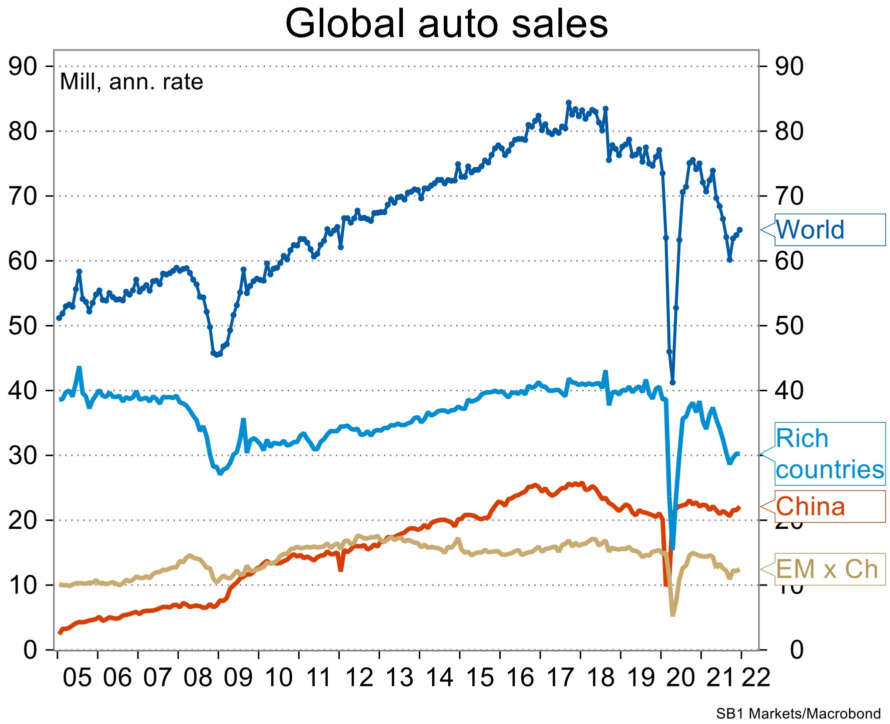
Surprise-indices measure the difference between economists' expectations and the actual outcome over a 3 month rolling window

Auto sales slowly on the way up, still down 15% vs. 2019. A huge upside potential

Sales fell in the US in Dec but rose most other places. Chinese sales are 4% up vs. the 2019 level



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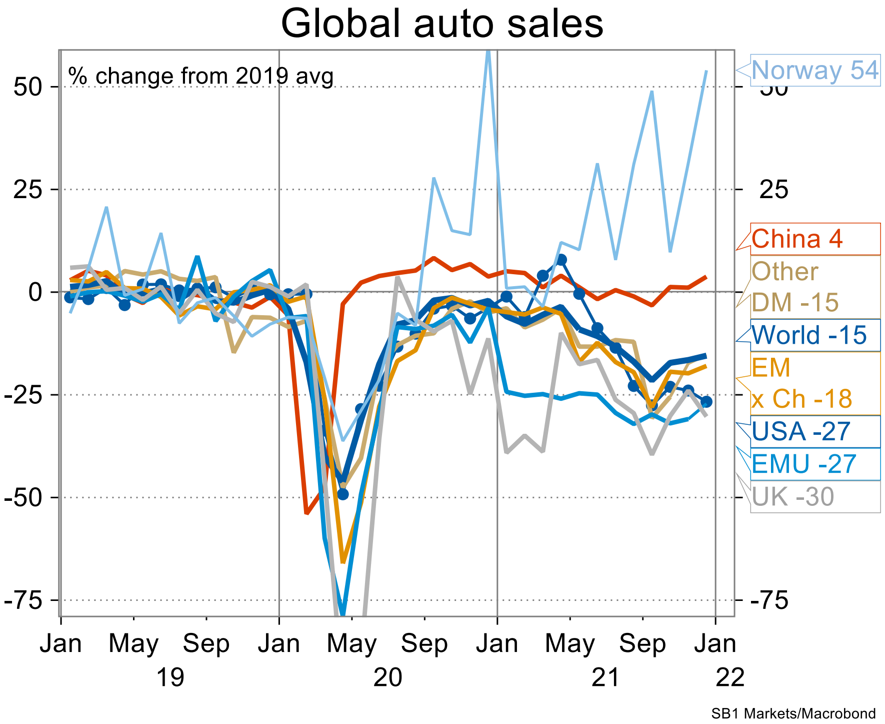

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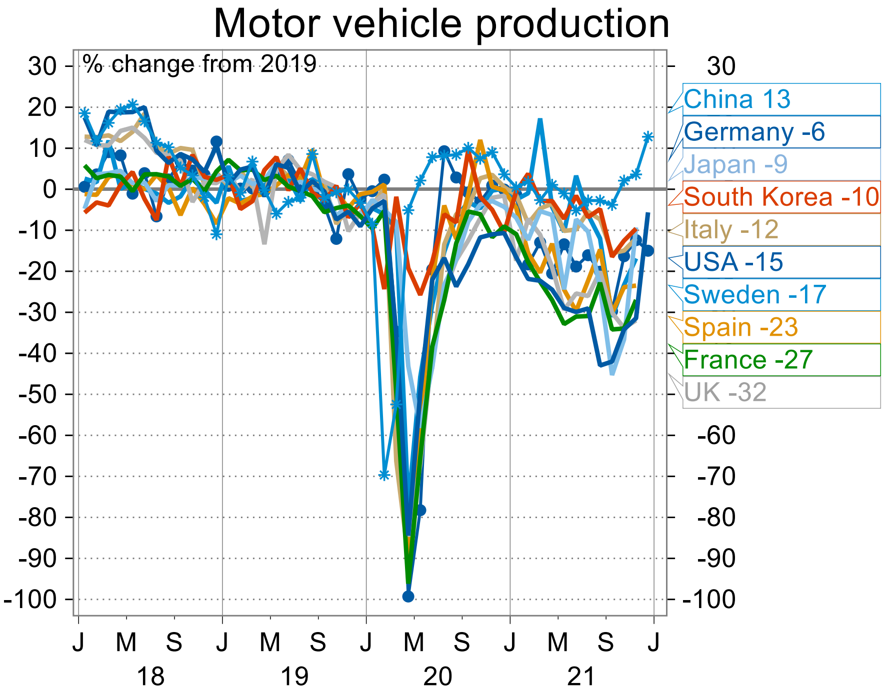
- Global sales rose by 1%, according to our calculations (some countries have not yet reported). Sales are down 15% vs. the average 2019 level, from -21% at the bottom in September
- Sales in **China** are trending slightly upwards, and are now 4% above sales in 2019 average – but are at the same level as first reached in 2015 (and sales are down almost 20% from the 2017 peak, not a the mainstream scenario at that time!) Sales in **other Emerging Markets rose too**, but are down 18 % vs. 2019. The trend was down before the pandemic – and sales are below the peak in 2012!
- **Sales in the US** fell but very likely rose in the EMU. Both are down 27% vs. 2019
- **Norwegian** sales were up 54% vs 2019 and sales in 2021 were the highest ever!
- **Auto production** is now recovering, especially in Germany

Auto production on the way up!

Germany just 6% below the ‘19 level, was down 43%! China is 13% above, from -4%



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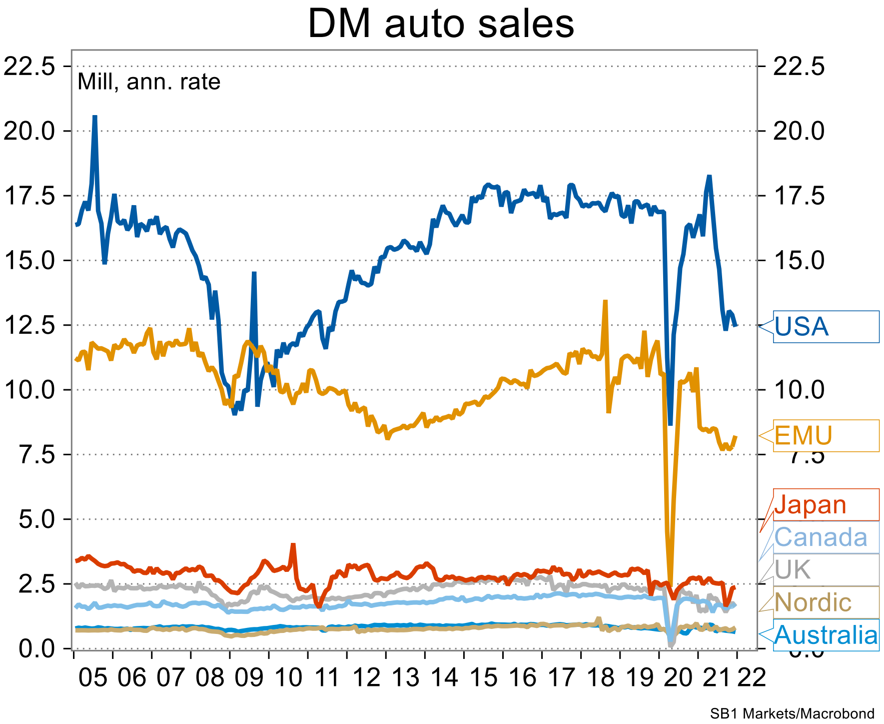
DM sales: The worst is behind us?



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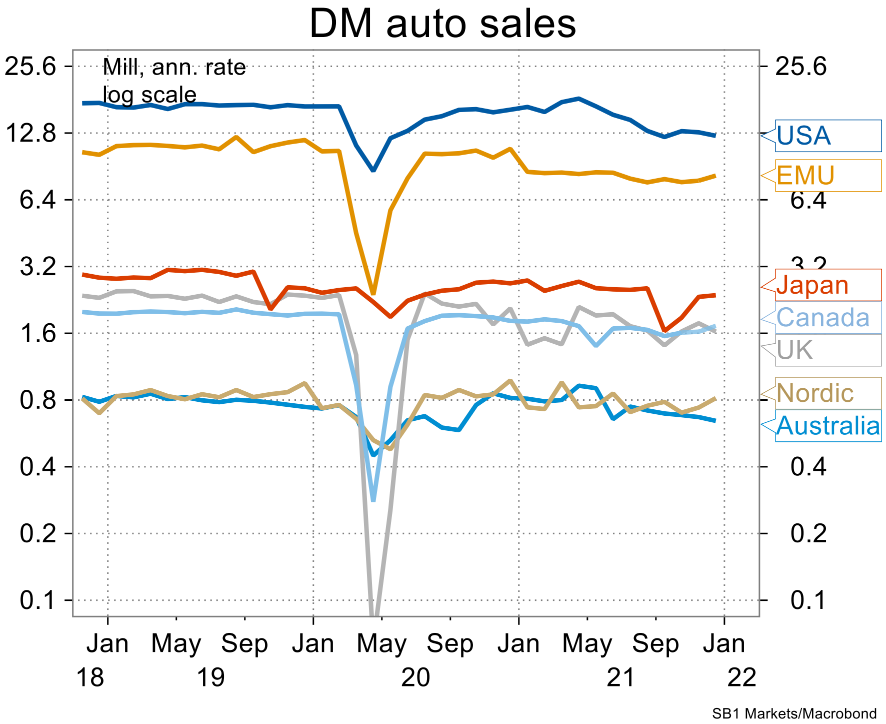

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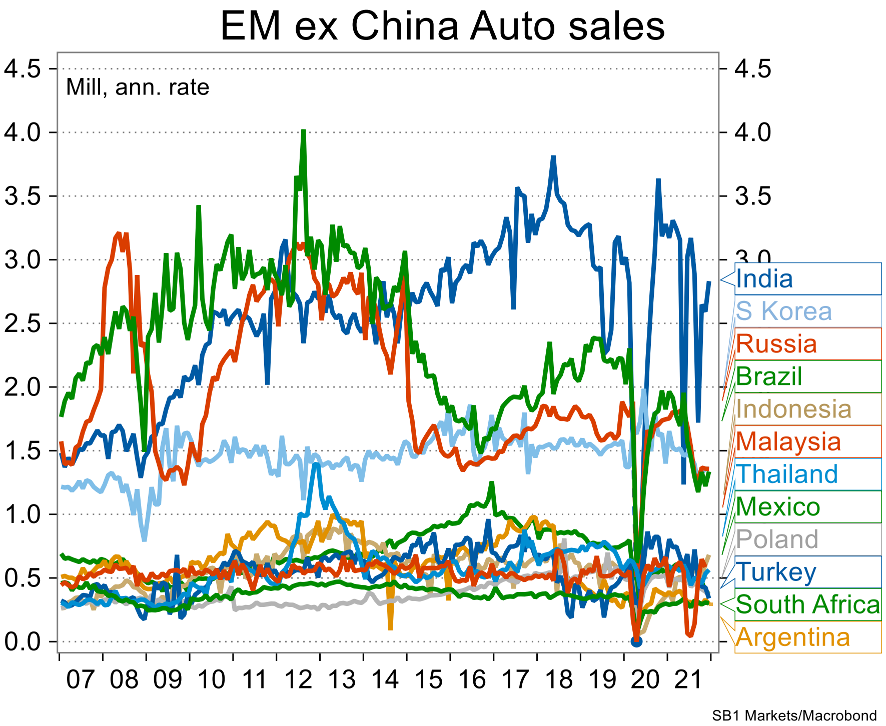
EM: Mostly up but most are well below normal levels



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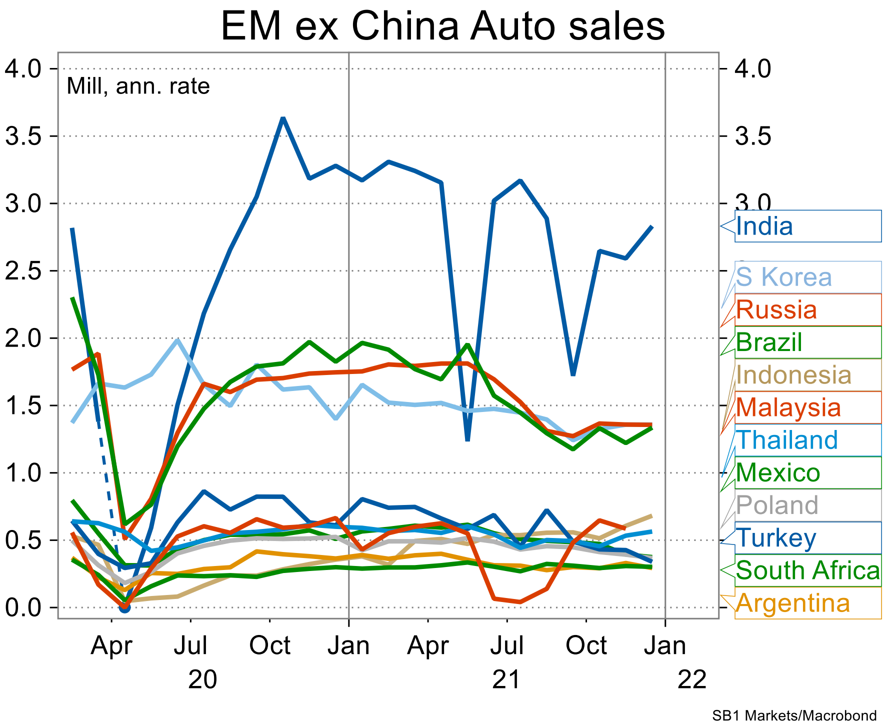

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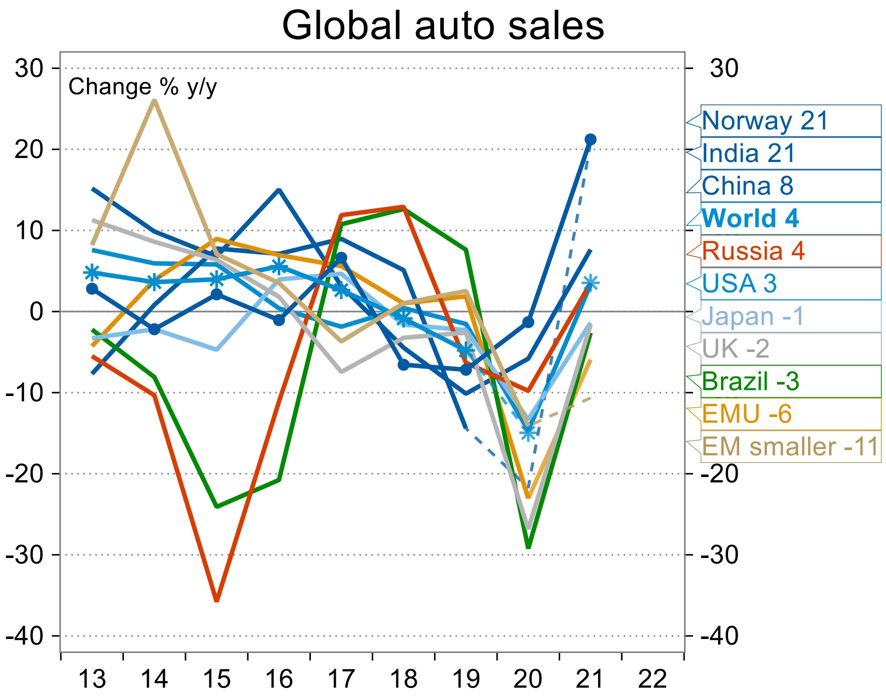
- Sales in Turkey is now falling again, but they have been much higher than before the pandemic, where Turkey also had some special challenges

Not all countries have reported yet, and for some countries we have just plugged in figures from media reports that are not always correct

2 years of Covid: What happened to auto sales? Not one story, it seems

Norway no. 2. After Turkey



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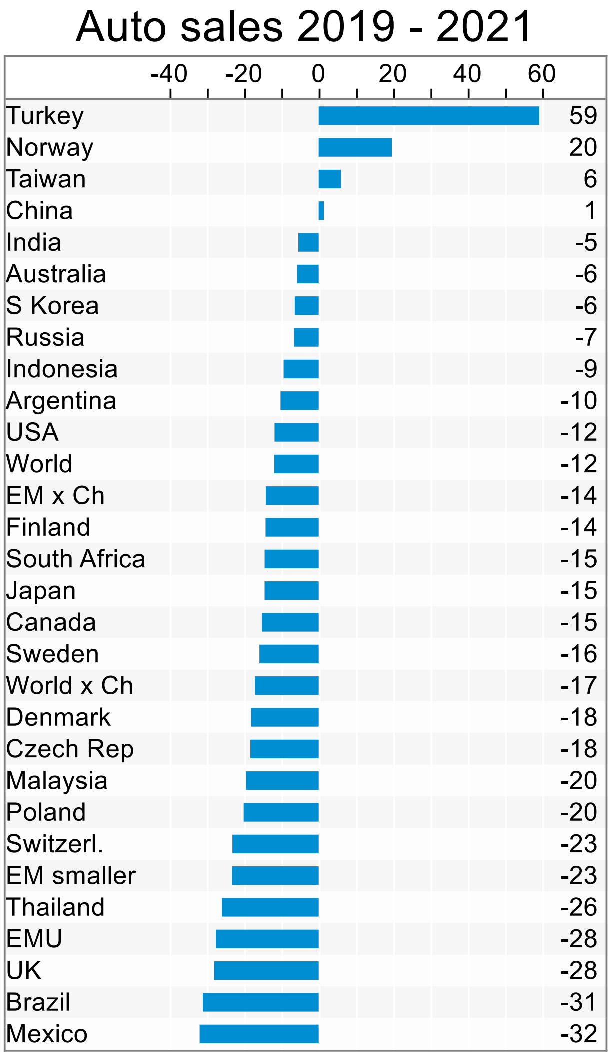

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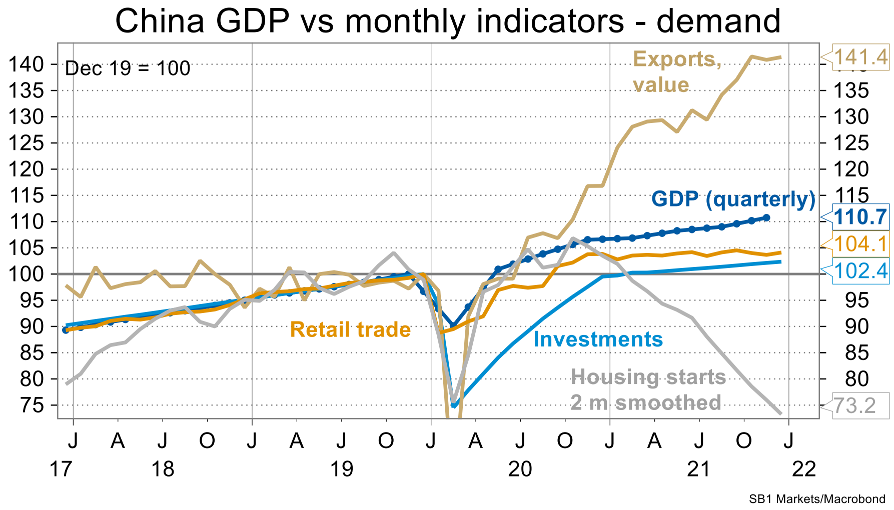
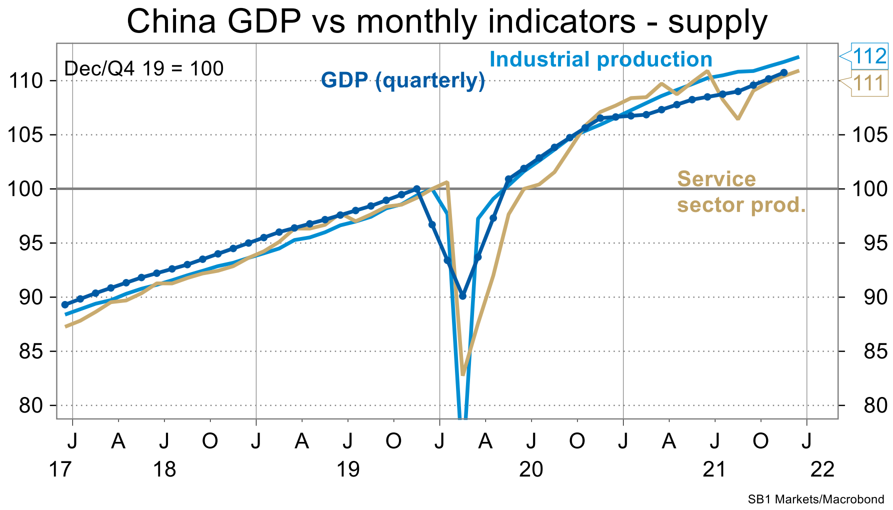
- 2021 global sales are down 12% vs. 2019, even if sales rose 4% last year
- Turkey at the top vs a 2019 disaster. Norway at the top, 'for real'
- Sales in China flat over the past 2 years
- Others are down by up to 32% (Mexico), EMU & UK down 28%. US is down just 12%

Growth much higher than assumed/expected in H2, but weakness around

Monthly data in sum better than expected, but retail sales construction is weak. 2 signal rates cut today


China GDP vs monthly indicators - demand

SB1 Markets/Macrobond


China GDP vs monthly indicators - supply

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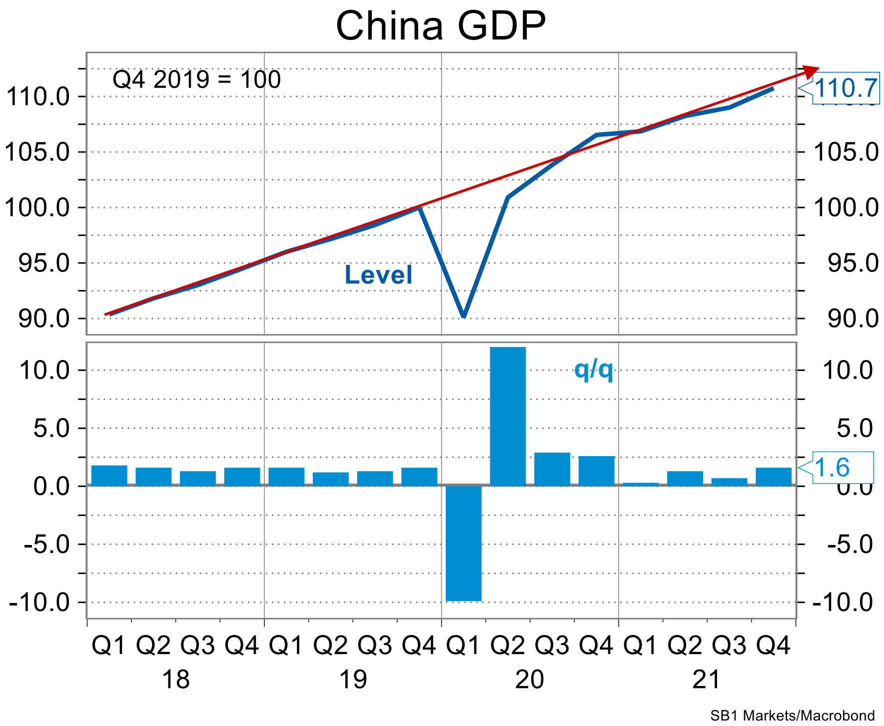
- **GDP grew by 1.6% (6.6% annualised), well above expectations (1.2%). In addition Q3 was revised up to 0.7% from 0.2%! The annual Q4 growth rate was higher than expected too, 4.0% vs. 3.8%. Still, growth has slowed through 2021. Even so, GDP is at the pre-pandemic trend growth path, up 10.7% vs Q4-19 level. Any better??**
- **Industrial production** rose by 0.4% in Dec, as in Sept- Nov, a tad faster than during Jun-Aug. Measured y/y, growth accelerated 0.5 pp to 4.3%, <u>0.7 pp better than expected</u>. Production is still 2% <u>above</u> the pre-corona trend path. Steel production grew 22% m/m, reversing most the steep decline since early 2021. An incredible data point??
- **Service sector production** rose 0.5% in Dec, like in Nov – no signs of any fight against the virus. Production is just back to the June level, and it is still **2%** <u>below the pre-pandemic growth path</u>
- **Retail sales volumes gained** 0.4% in Dec as prices fell (our est., nominal sales down 0.2%). Still, the trend is just marginally up (less than 1%), vs. the 6% pre-pandemic trend path, a remarkable change of tack. Official y/y growth decelerated sharply to 1.7% from 3.9%, expected 3.8%! **Auto sales** are recovering, up 4% vs the 2019 level, among the best
- **Investments** grew by 0.2%, as during the previous month. Prices are no doubt increasing – and in volume terms, investments are falling. Annual growth was 4.9%, 0.1 pp <u>better than expected</u>. **Housing and other construction** starts fell again in December, and are down 30% and 25% vs. peak levels last year, resp. However **new home sales** have stabilised since September, and the inventory is now reduced, which is good news. **New and existing house prices** have fallen the past 4 – 5 months, but so far not dramatic
- **Credit growth** slowed in Dec but has been trending up m/m through most of last year in Nov, as local governments like are borrowing more in the bond market (to support the building industry, compensate for lower land sales?) while bank lending slows. **The PBoC cut 2 signal policy rates** by 0.1 pp this morning. There is still ample room for stimulating more, if warranted
- Exports were still strong but imports weak in Dec, and the trade surplus record high
- **CPI inflation** slowed substantially in December, and **PPI infl.** may have peaked

In sum: H2 was stronger than assumed/expected but growth slowed in 2021, partly due to corona (services) but construction starts have fallen in a spectacular way (without so far crunching the Chinese economy, or hurting the global economy. <u>The authorities are trying to keep growth up</u> – and to stimulate at least some segments of the credit market

Q4 GDP up 1.6%, 0.4 pp more than expected, up from 0.7% in Q3 (rev from 0.2%!)

In sum, GDP grew 0.9% faster than assumed/expected in H2 – all figures NOT annualised!



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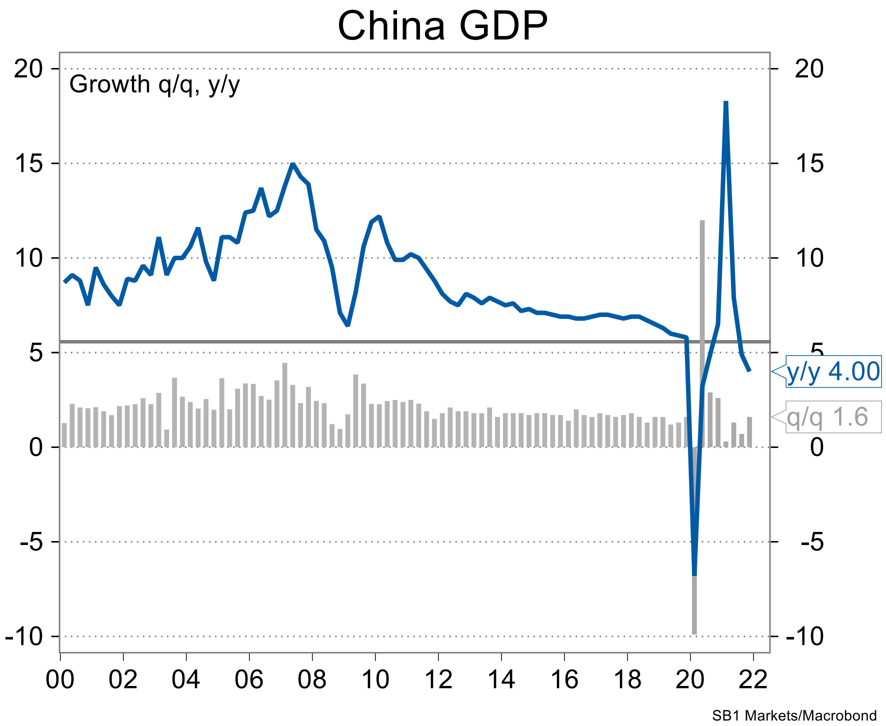

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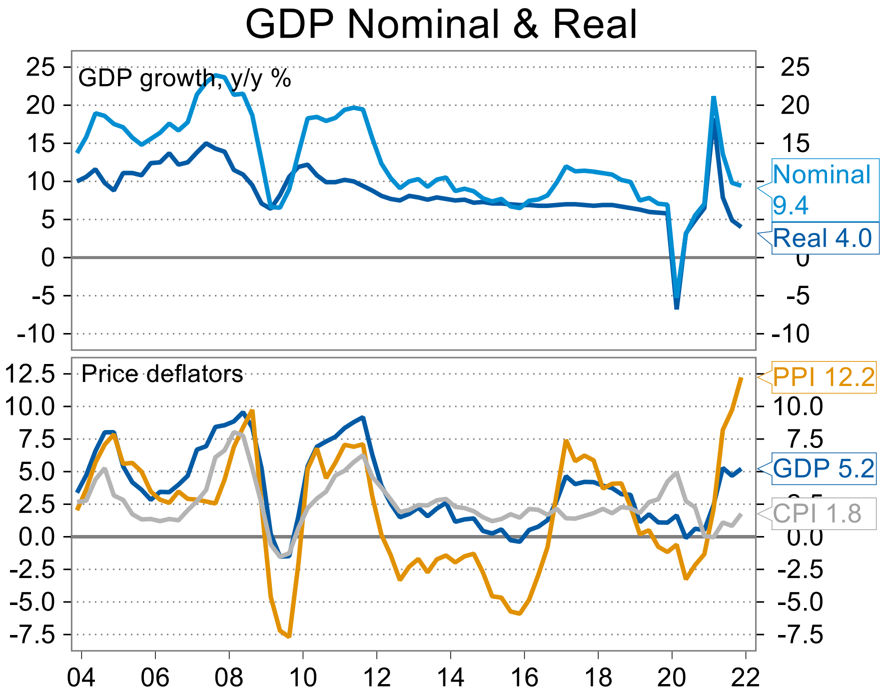
- The **annual growth rate** fell to 4.0% in Q4, down from 4.9% in Q3, expected down to 3.8% (there is not precise connection between quarterly and annual data, of course…). Last year, GDP grew by 8.1%, following the slow 2.2% growth in 2020
- **A 1.6 % q/q rate** equals a 6.6% annualised growth pace. Growth reached the pre-pandemic growth path in Q4-20 but growth has slowed through last year, activity was 'just' back on trend in Q4-21, up 10.7% vs. the Q4-19 level. Not many has achieved that
  - » Corona has no doubt influence the growth pattern the past 2 years. The risk now is that a fight against Omicron may hurt the economy again – and that it would be close to impossible to succeed as China has beaten down the previous variants – because it is far more contagious (and the immunity level is low, as few have been infected, and vaccines are ineffective)

The GDP price deflator up to 5.2% from 4.7%

Nominal GDP up by 9.4% y/y – both higher than normal. CPI inflation is still below 2%

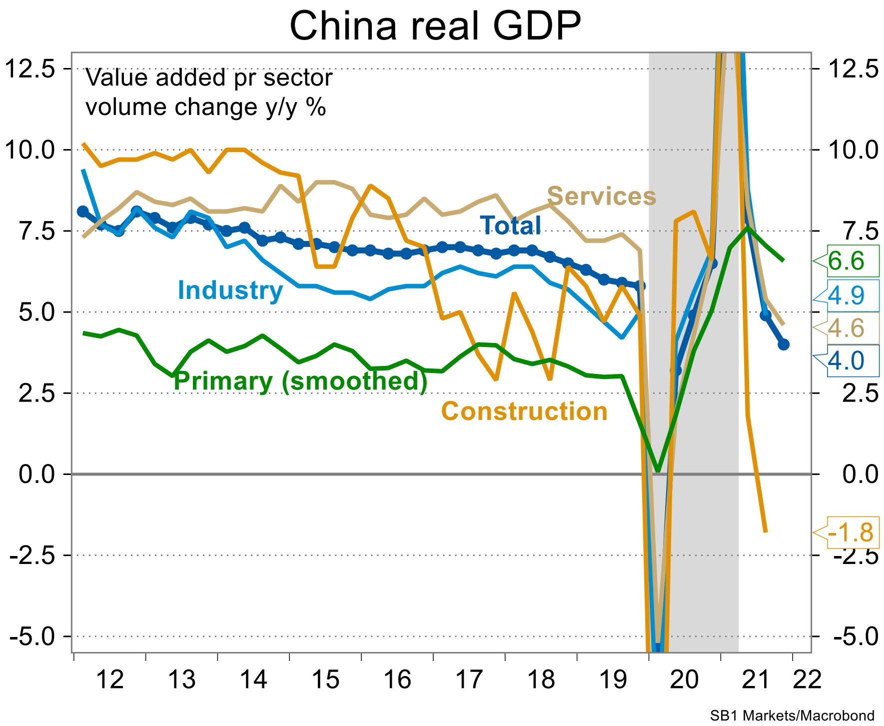


SB1 Markets/Macrobond

- Manufacturing producer prices (PPI) are up 12% y/y (quarterly avg), while CPI prices are up just 1.8% y/y in Q4 (and 1.5% Dec)

Industry (and exports) have taken the lead during the pandemci

The steady rise of services as share of GDP is not re-established – but it soon will



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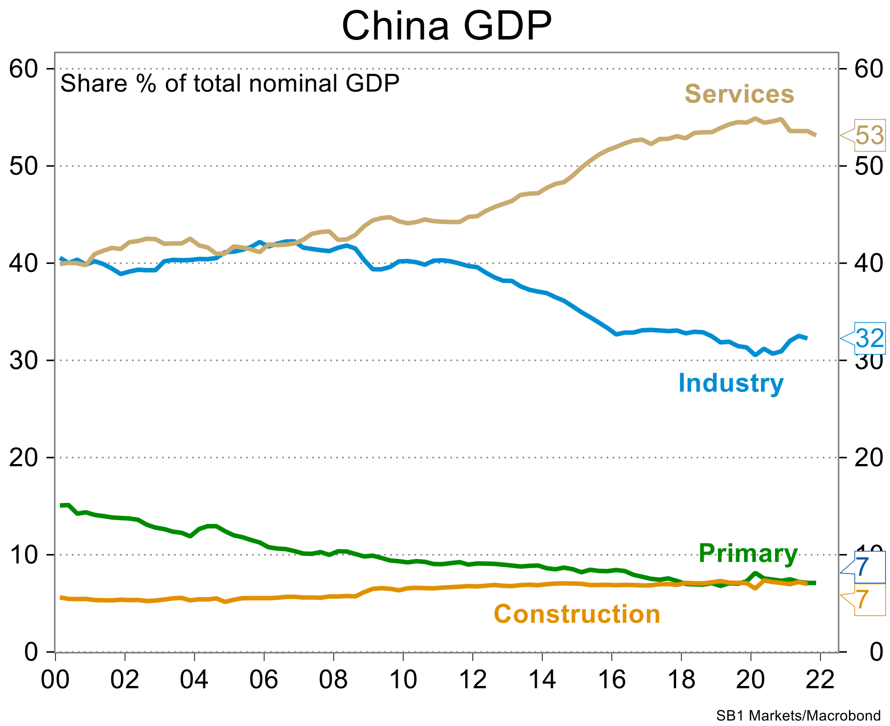

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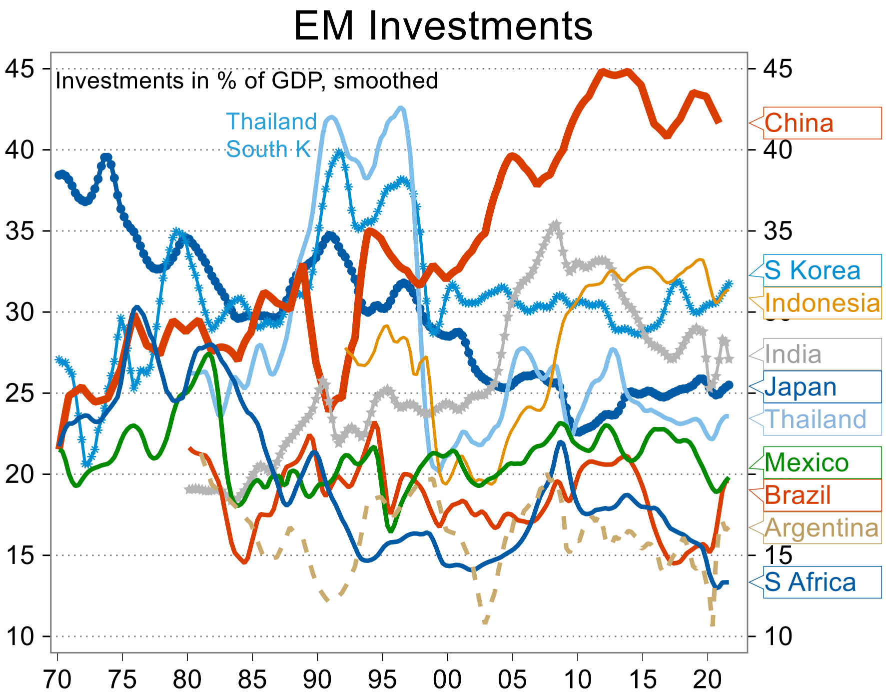
- Not all sectors have yet reported Q4 data yet

Value added per sector (= sales – cost of purchases from other sectors)

The investment/GDP ratio is trending down but is still very high, above 40%

Just few countries have invested more than 35% of GDP for more than a short period

EM Investments



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China Investment/GDP ratio

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- Such a high investment level is no doubt a warning sign, the risk of overbuilding must be substantial. In several countries, periods with high investments, have been followed substantial setbacks (if investments contracts rapidly, like Thailand and South Korea) or a prolonged period of slow growth if the investment level declines over time (Japan)
- However, some researchers questions Chinese investment data. They are aggregated from local governments, and these regional data do not seem reasonable. A calculation *) indicates that the investment level is far lower than stated in the national accounts (and that GDP growth has been slower than official figures tell).

**) Wen Chen et al: A Forensic Examination: of China's National Accounts, Brookings, 2019*

We may blame China for many things. But it <u>has not been</u> a drag on the world ec.

The risk going forward: A substantial decline in construction activity

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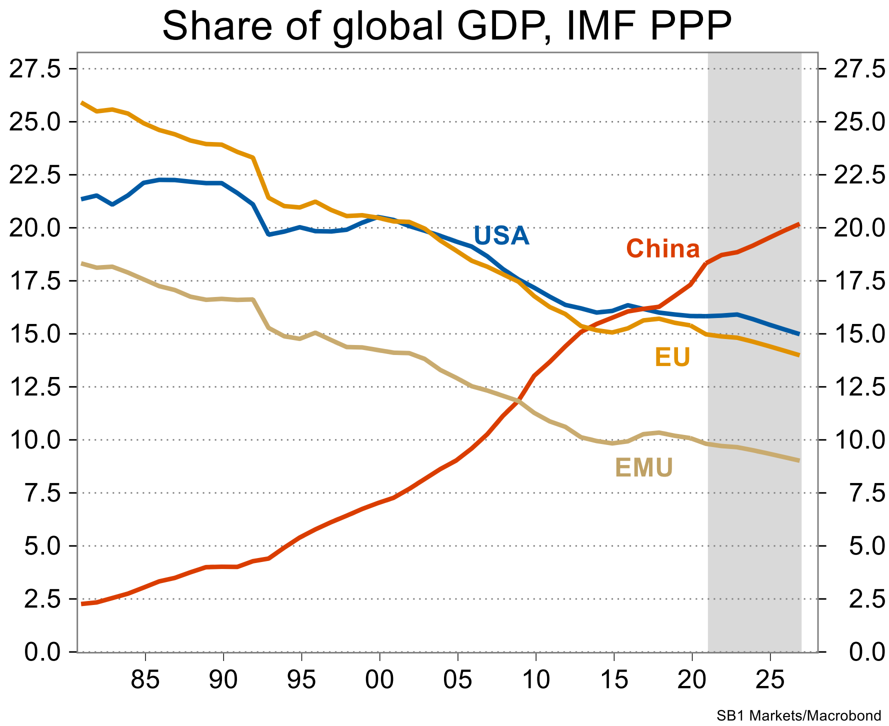

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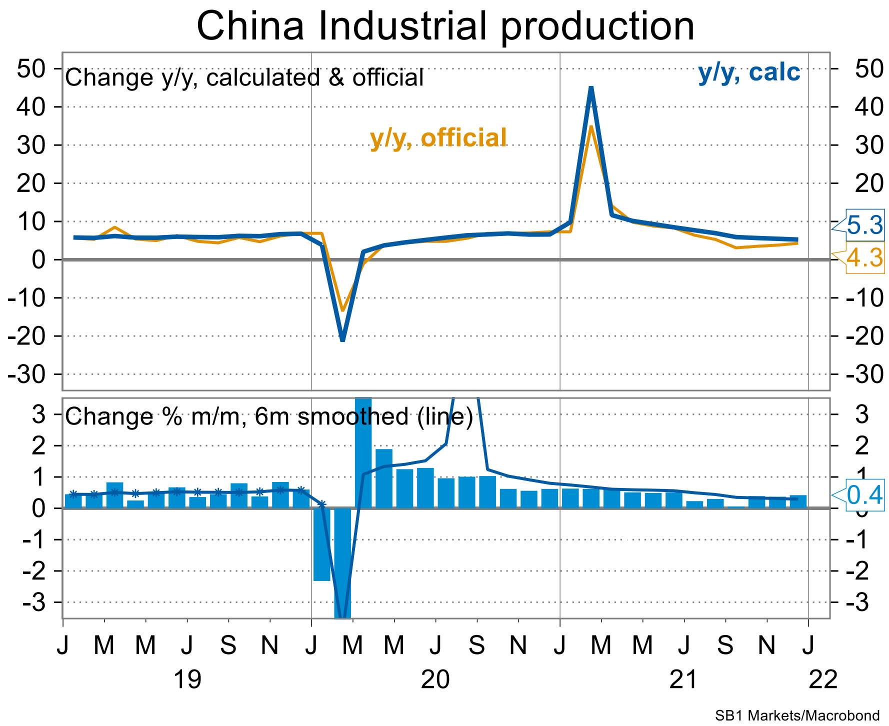
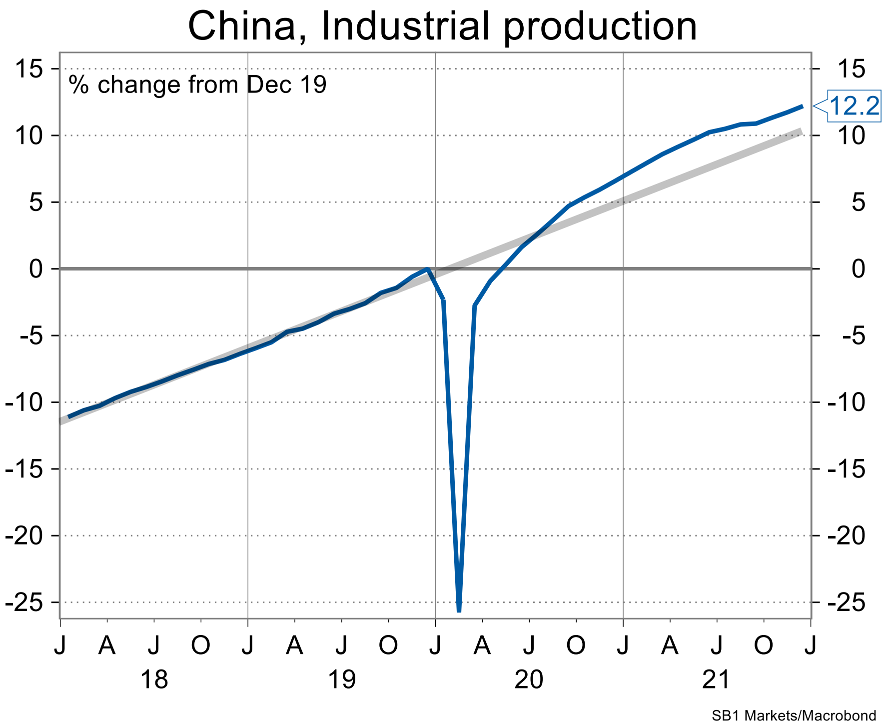
- There have been any downturns in the world economy for which we can really blame the Chinese
- Just China has so far reported Q4 data
- Measured in purchasing parity adjusted prices, the Chinese GDP has been larger than the US GDP since 2017

Industrial production up 0.4% in Dec too, no further slowdown recent months

Official y/y growth rate up <u>0.5 pp to 4.3%%, expected down 0.2 pp</u>. Level 2% <u>above</u> p-p trend

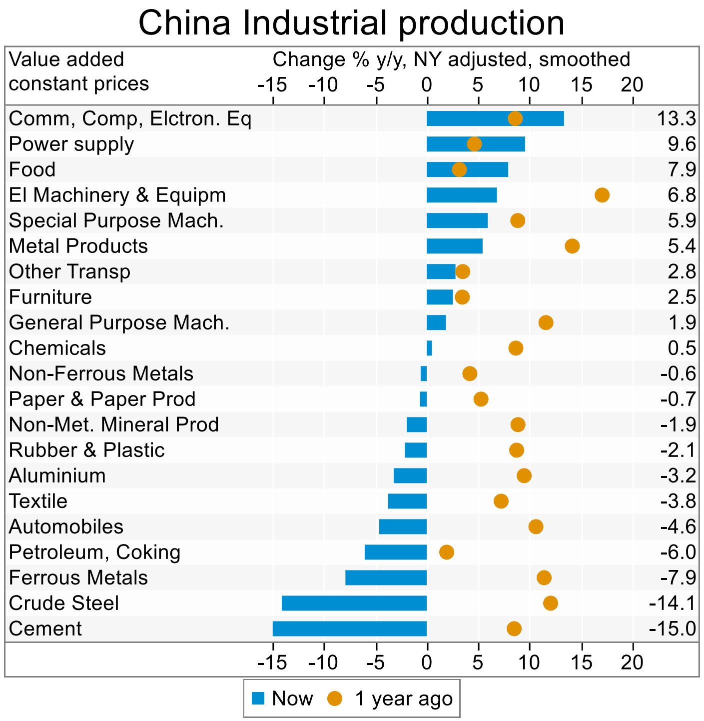




- **Production** growth has accelerated marginally past 3 months, following a slowdown in June – August period. Still, at 0.4% per month, growth is slightly below the pre-pandemic 0.5% pace. Production is 12.2% above the Dec '19 level and 2% <u>above</u> a reasonable pre-corona growth path. <u>Not that bad!</u>
- **Both supply and demand** factors may be limiting factors the coming months. The zero Covid strategy is challenging, and local lockdowns are still imposed (as Omicron may become a real challenge). According to surveys, delivery times/prices have not been a serious challenges so far, and not at all in December. Construction is a substantial risk on the demand side, but steel production suddenly surged by 22% m/m in December, even in the decline in construction starts continued. The manufacturing surveys strengthened in December – and the level signals normal growth

Steel production rose 22% m/m in Sept, reversing most of the decline since April

A strange data point. Cement has stabilised, other construction related sectors as still heading down



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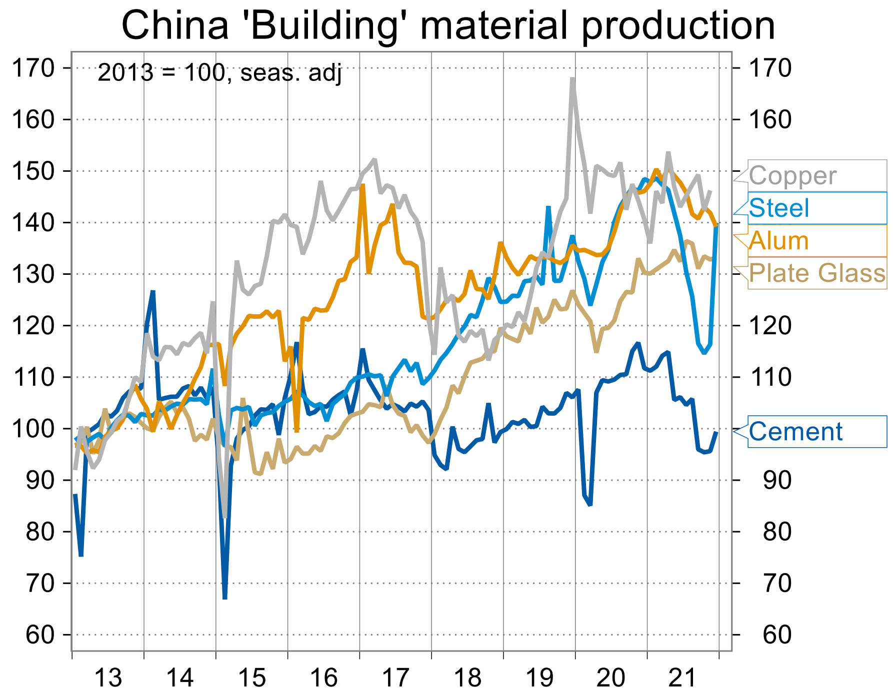

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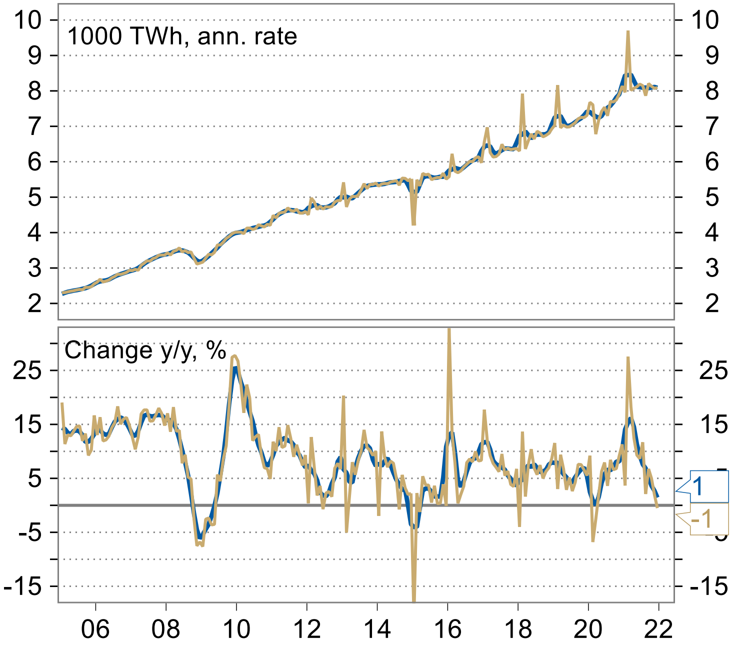
Electricity production has flattened recent months

Transport activity has slowed too – partly Covid related (data just through Oct)

China Electricity production



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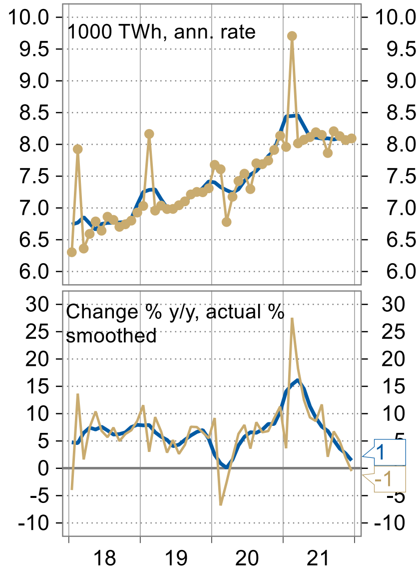

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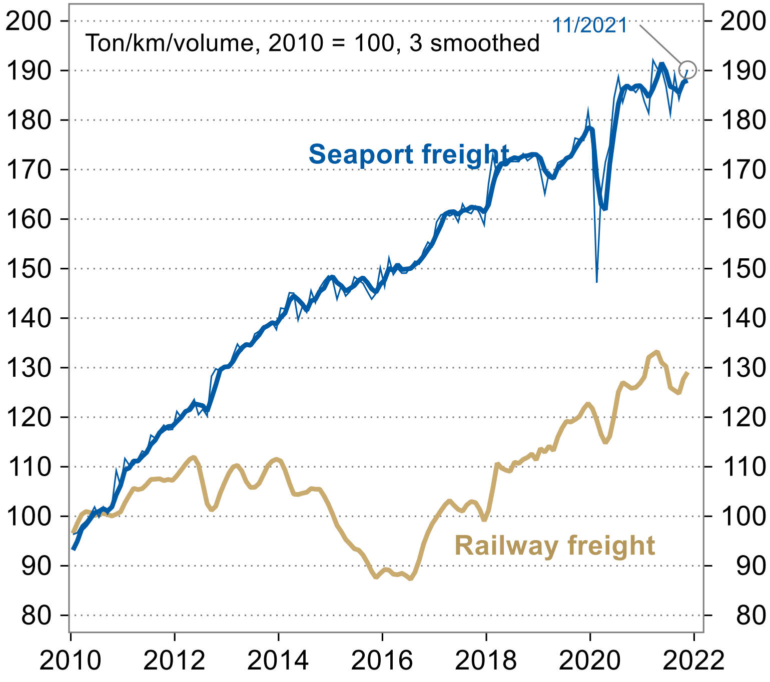
China Trade and transport



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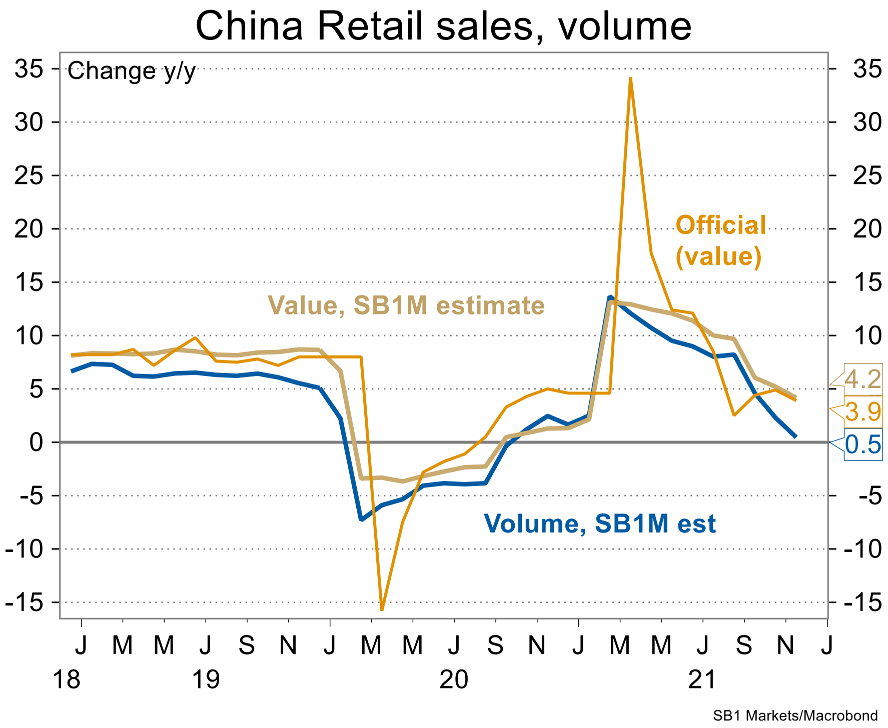
- Seaport traffic is not terrific either, with imports on the downside, exports on the upside (but the sum should have been positive)

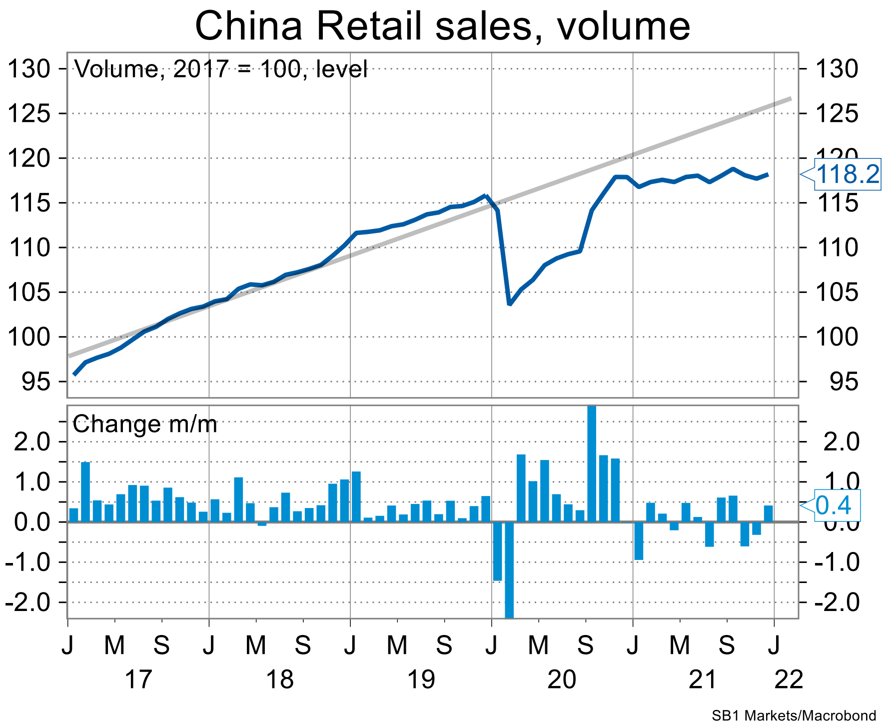
Retail sales up in December but the trend is close to flat!

Real sales rose 0.4% in volume terms in Dec, following a decline in Oct/Nov



China Retail sales, volume

SB1 Markets/Macrobond



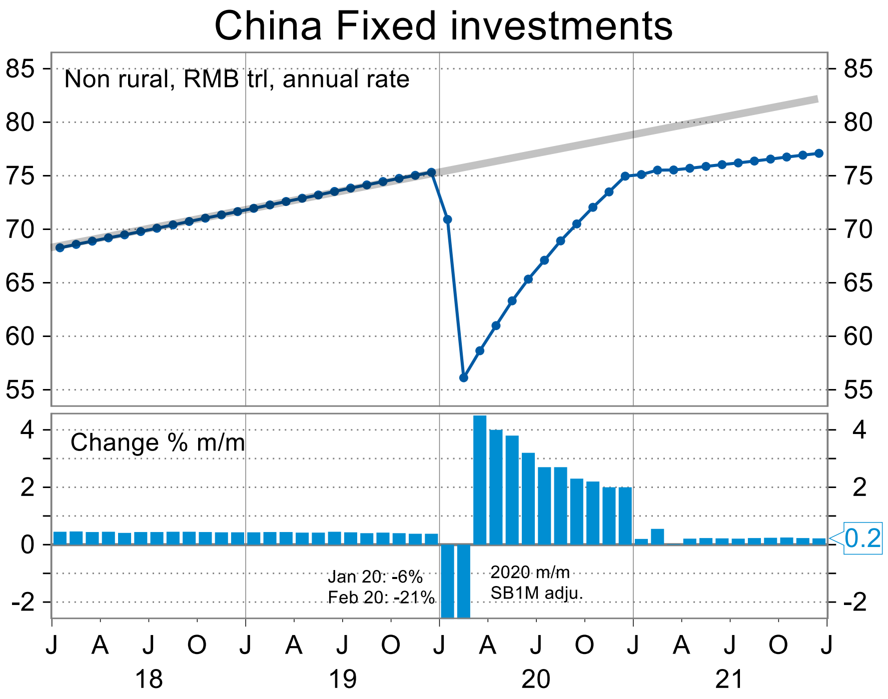
China Retail sales, volume

SB1 Markets/Macrobond

- **Official nominal retail sales** were up 1.7% y/y in Dec, down from 3.9% in Nov, expected just down 3.6% a 1.9 pp miss
- In nominal terms sales fell by 0.2% m/m in Dec, but due to a decline in energy prices, we estimate a 0.4 % lift in **volume terms**, following the 0.6% volume decline in Oct and 0.2% in Nov
  - » Since November 2021 the underlying volume growth rate has been very low, less than 1%. Before the pandemic growth equalled some 6% p.a, and the slowdown is dramatic. The fight against the virus may explain some of the slowdown, but it is probably more than that
- **Sales volumes** are 6% below the pre-pandemic trend path

Investments on a new, and a much slower growth path, is declining in real terms

Monthly growth has accelerated marginally but at 0.2% far lower than before the pandemic



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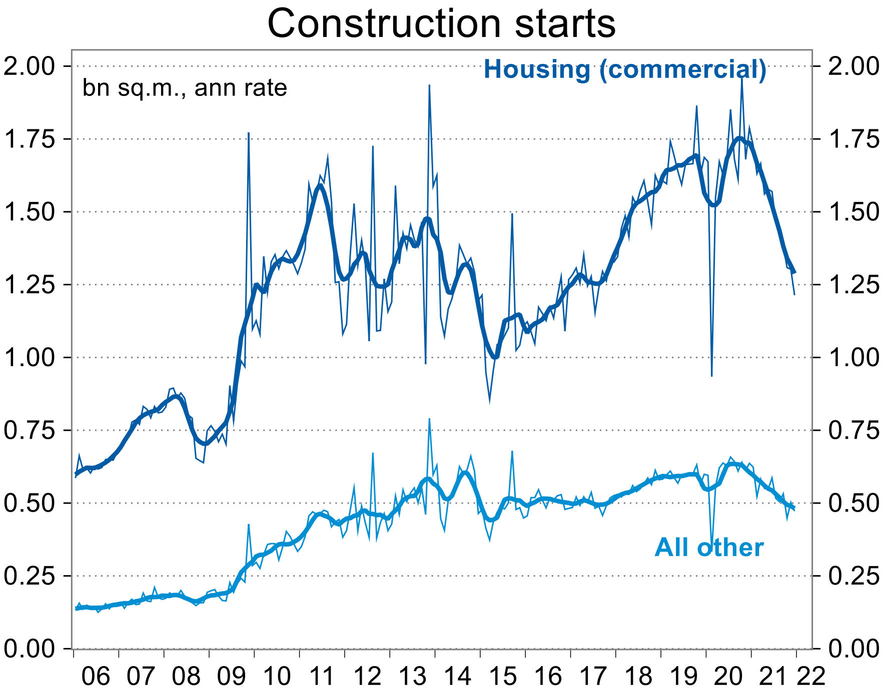
- **Measured YTD**, nominal urban investments rose 4.9% in Dec =2021 growth of course), down from 5.2% in Nov, expected 4.8%. Nominal investments are up 3% y/y in December. The history was marginally revised up, following several months with downward revisions in 2021
- **Growth m/m** has been stable at 0.2% in nominal terms m/m. Growth was gradually slowing before the pandemic, to some 0.4% per month. Now growth is far slower. As inflation has picked up, investments are falling in real terms!
- The **investment level** is 6.5% below the pre-pandemic growth trajectory – and the gap is off course not closing now. The only positive twist: The level is higher than in Dec-19. The correlation to construction starts is <u>not</u> obvious. *Check next page*

Housing starts further down in Dec but new home sales have stabilised

Starts down >30% since late 2021. Sales have flattened since Sept, an inventory clean-up underway?



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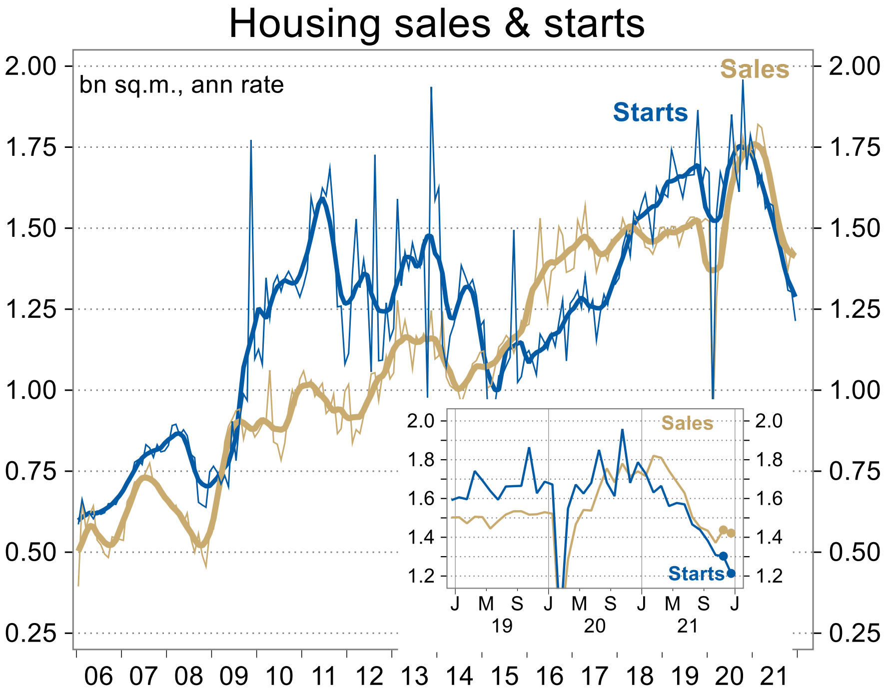

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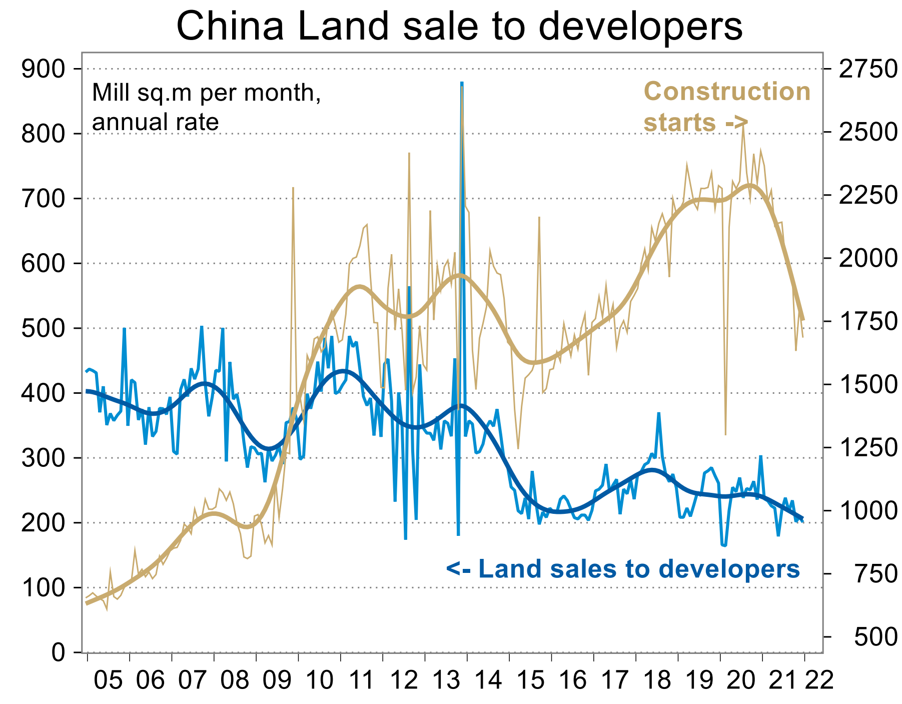
- **New home sales** have fallen 25% from early 2021, following the spectacular recovery after the pandemic last year. Sales are down more than 10% below the pre-pandemic level - which was record high until then. Sales were close to unchanged in Dec, and sales have stabilised since last Sept, a positive sign – buyers are not running away from a sinking market
- **Housing starts** fell 7% m/m in Dec, and are down more than 30% vs. the early 2021 level. Sales have been running higher than starts in most of 2021, and the gap is now visible at distance – signalling a rundown of inventories, which of course is good news these troublesome days for the building sector
- **Non-residential construction starts** fell too in December, and are down 25% since last summer, and the level is 20% below the pre-pandemic level
- In sum, the decline in **construction starts** has been among the largest ever. Still, the downside is substantial as several property developers are struggling. A stabilisation of now home sales last autumn indicate that the main risk, a sudden death in demand for homes, is not materialising. *Check prices next page.*

Local government land sales have fallen but less than construction starts

Some further downside for sales? Date for value of sales are still strong (but incredible)



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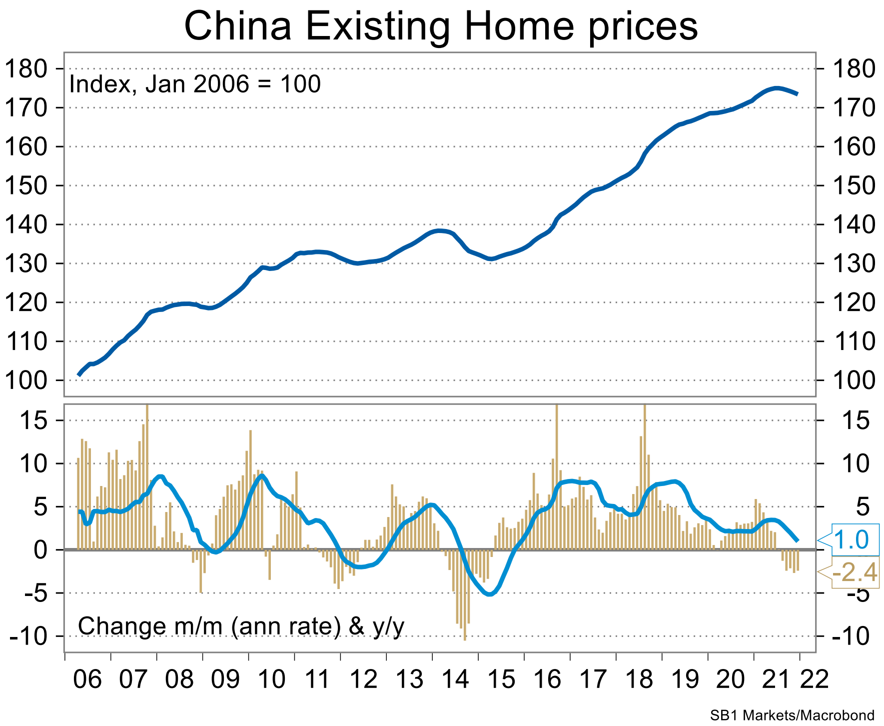
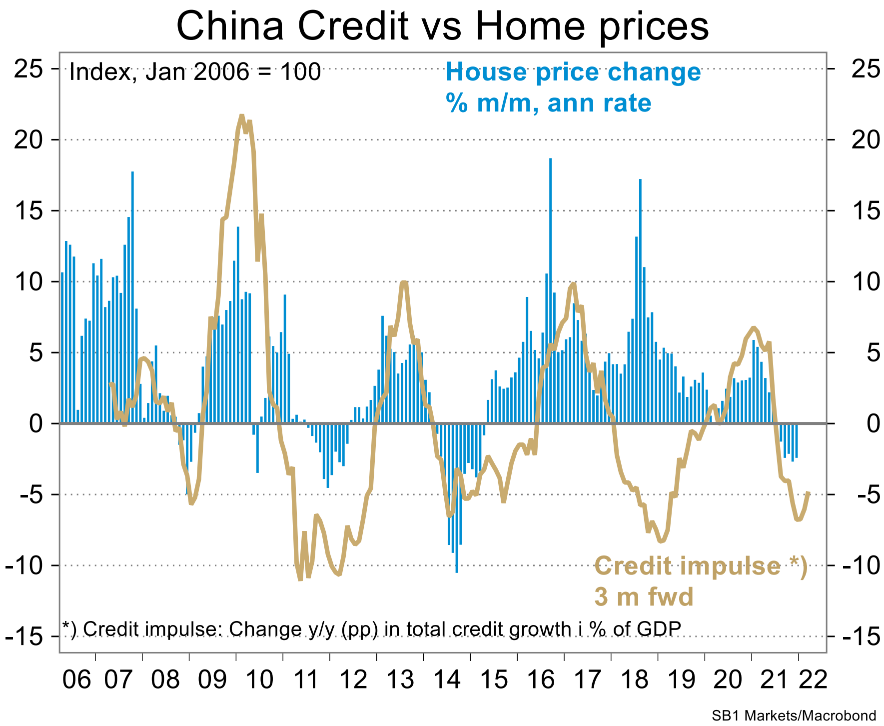
House prices turn south, so far at a measured pace – still the main Chinese risk?

Prices fell for the 4th month in row but are still up 1% y/y


China Existing Home prices

SB1 Markets/Macrobond


China Credit vs Home prices

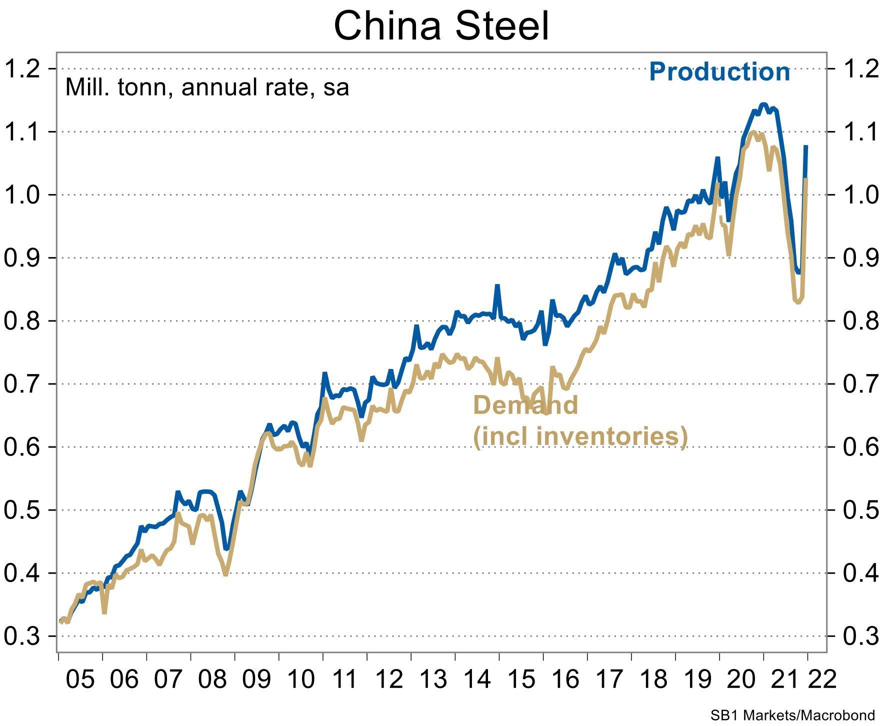
*) Credit impulse: Change y/y (pp) in total credit growth i % of GDP

SB1 Markets/Macrobond

- **Existing home prices** peaked in July, and have fallen at a 2 – 2.5% pace since then – and by 2.4% annualised in Dec. Prices are still up 1.0% y/y
- **New home prices** peaked in August, and have fallen slower than existing home prices. So far, not any signs of distressed sales from 'bankrupt' property developers
- **Credit growth** accelerated marginally during last year, mostly due to increased borrowing from local governments
- **Several heavy indebted property developers** are struggling which surely poses a treat vs the housing market & construction activity. The builders may be restructured, with a helping hand from the authorities, who also can supply credit to bail out buyers, and support sales of buildings under construction
- We think the **main risk is** that home buyers at one stage loses confidence in housing – even in empty homes – as a safe and profitable investment. Several small setbacks in prices have so far not made a dent in the investment appetite, and the current modest setback in prices does not signal a buyers strike. Should that happen, a much harsher setback in construction activity would take place

Construction even weaker in Dec but steel prod/domestic demand up 22%

The correlation is far from tight but we thought we had ‘a story’. No more, given these steel prod. data



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Apparent steel demand = Production – exports + imports
Apparent demand includes changes in inventories

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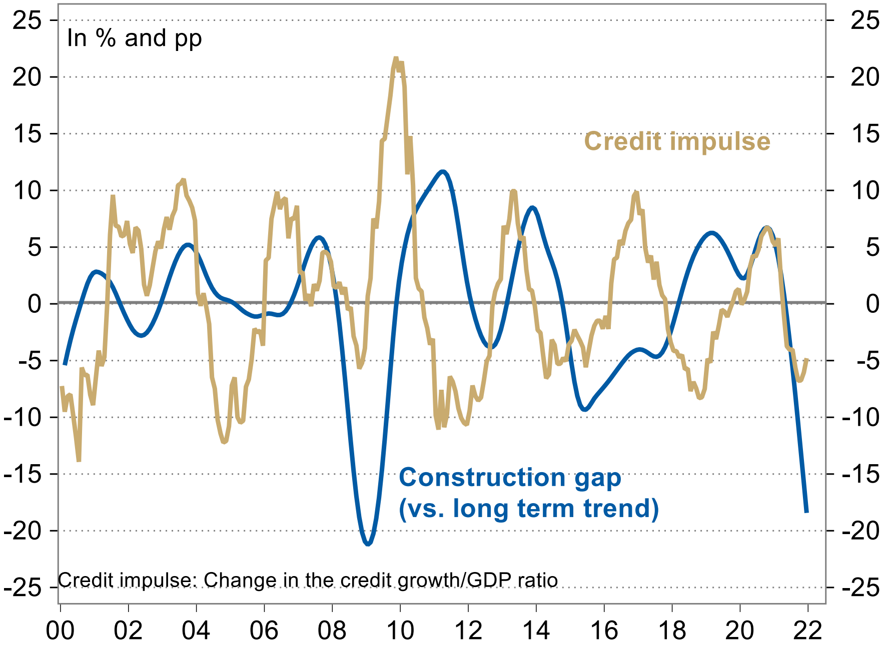
Credit growth has slowed– and construction is rapidly on the way down

The two are dancing together but not that closely (and it varies who takes the lead too)

China Credit vs construction



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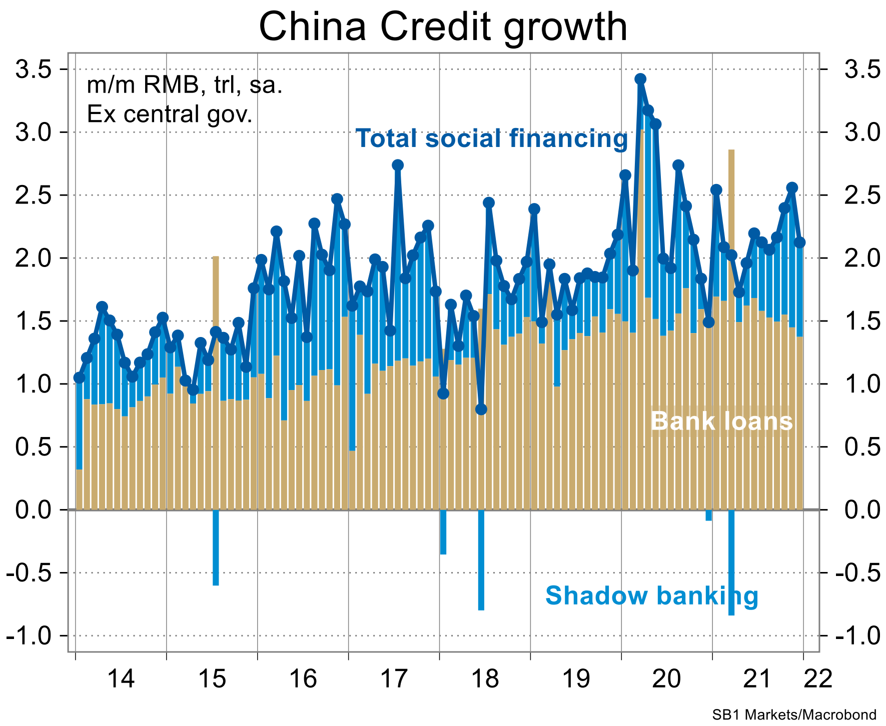
- … still they are at least normally on the same floor
- The recent credit tightening may have had some impact on the property market – but basically the slowdown in construction started ‘too early’ this time
- The credit tightening signals some downside risk for construction, raw materials & steel
- However, there is always a risk when construction and debt levels are high, especially if many are buying property for investment/speculation purposes

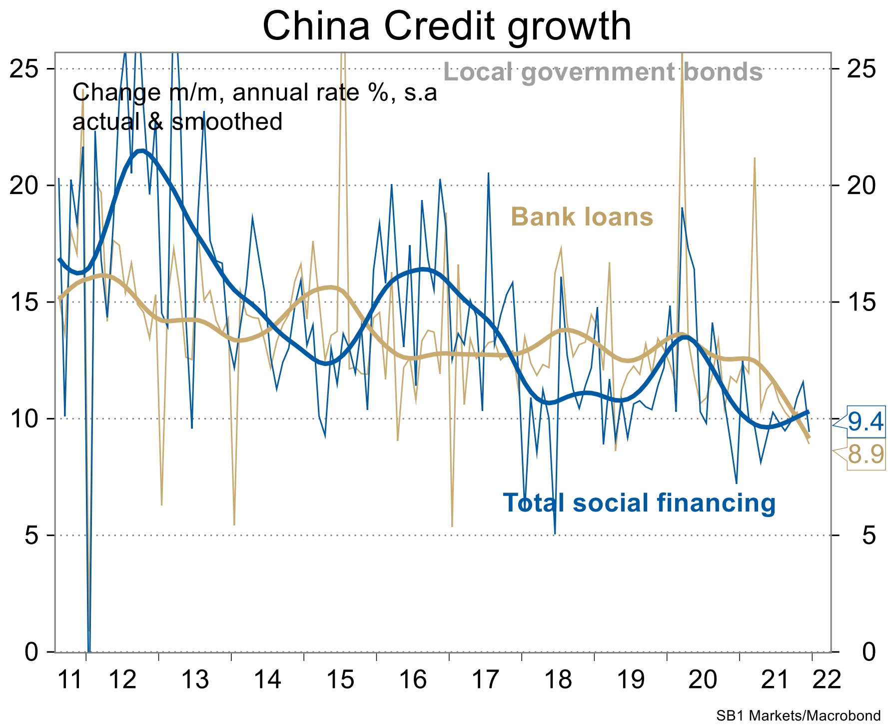
Credit growth down in December, but growth has accelerated in H2

Local gov. are issuing more bonds to compensate for slower land sales? 2 more signal rates cut today



China Credit growth

SB1 Markets/Macrobond

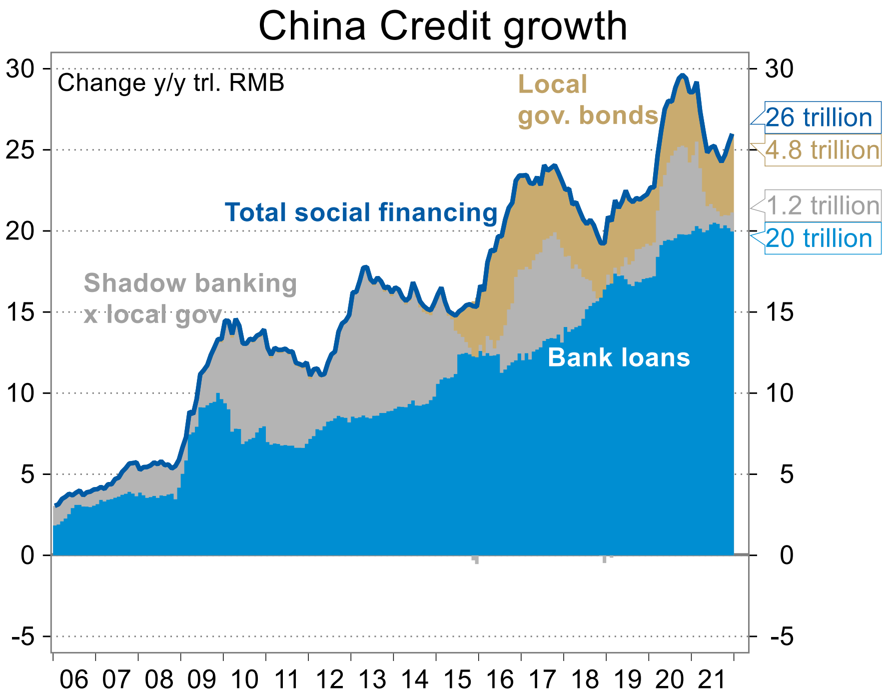


China Credit growth

SB1 Markets/Macrobond

- **Total credit** grew at a 9.4% rate in Dec (m/m, seas. adj. annualised), down from 11.6% in Nov. Smoothed, the underlying rate is at some 10%. The underlying growth rate is still above the trend growth in nominal GDP (say 5.5% real growth, 2% price inflation). The annual rate accelerated to 10.2% from 10.0%
  - » **Total credit** rose by RMB 2.2 trl, expected 2.5 trl (not seas. adj). The 'core' total social credit (total ex central gov bonds & corporate equites) grew by 2.1 trl (seas adj), down from 2.6 trl in Nov, which was the highest since January. Even if credit growth slowed in Dec, no 'Evergrande shock', at least not so far
  - » **Bank loans** rose by RMB 1.4 trl, s.a, or at a 8.9% annualised pace – well below expectation. Loans are up 11.6% y/y but underlying growth has been slowing since early 2021, now at 9%
  - » **Shadow banking credit** rose by RMB 0.7 trl, well down from above 1 trl in Nov. **Local governments** were responsible for the whole (net) uptake), very likely to compensate for the decline in revenues from sale of land to builders - or in order to finance unfinished building projects, with or without being told so by the central government
- Since early 2020, credit growth has slowed, **the credit impulse** has turned negative, like it usually does every 4th year or so. The impulse is still negative at an annual basis but monthly growth has accelerated from early spring – until December, that is
- **The slowdown was by purpose**, as authorities have tightened, especially vs. credit supply outside banks, and vs the construction sector. Now, they are trying to push the accelerator, if not by supporting bankrupt building companies but by easing conditions for lending to others. A signal rate was marginally cut some weeks ago, another two – the 1 year rate by 10 bps to 2.85%, at the 7 day rate by the same amount to 2.1% - this morning, obviously in order to keep demand for credit up!

Credit growth has bottomed – but just due to local governments bond



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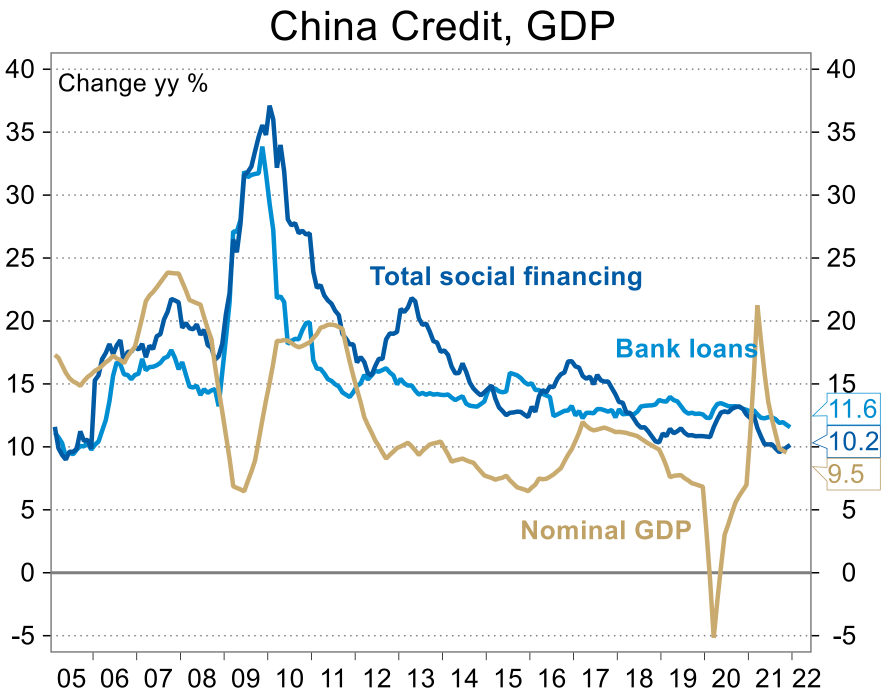

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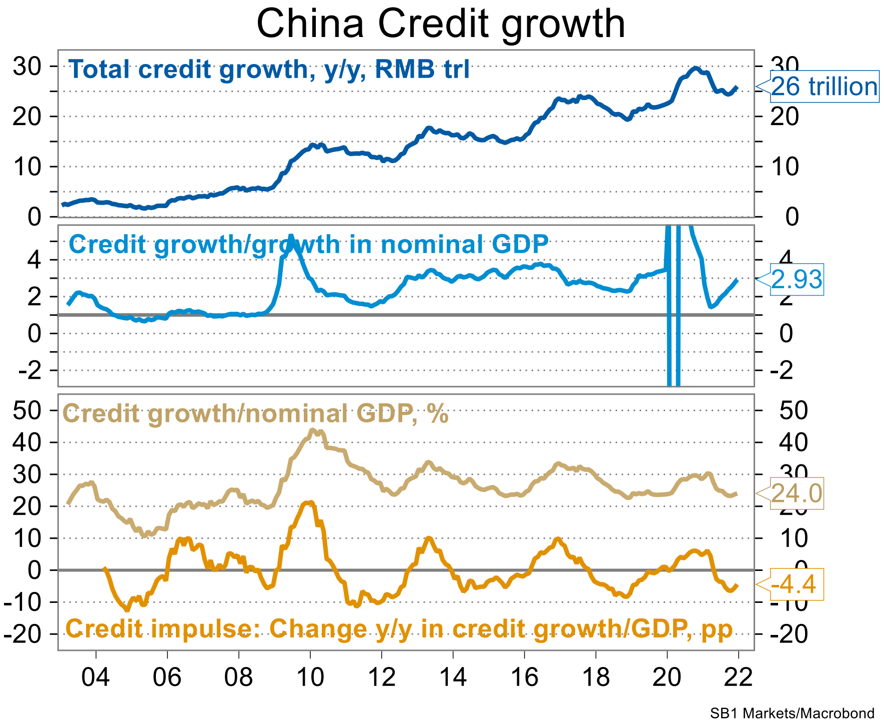
- Over the past year, **total credit** has expanded by RMB 25 trl, equalling almost 23% of annual GDP, down from RMB 30 trl at the peak in 2020
- **Banks** supplied RMB 20 trl of the y/y increase
- **Local governments** have accelerated their credit growth, now up 4.8 trl – to 19% y/y in December from 13% y/y
- Growth in other credit – via the **shadow credit market x local gov bonds** – has slowed to RMB 1 trl from 5 trl, a dramatic slowdown (like many times before) – and is up just 1% y/y
- **Total credit** growth accelerated 0.2 pp to 10.2% y/y, still above nominal GDP growth before the pandemic, and above our estimate of 5.5% potential GDP growth + a 2% rate of inflation

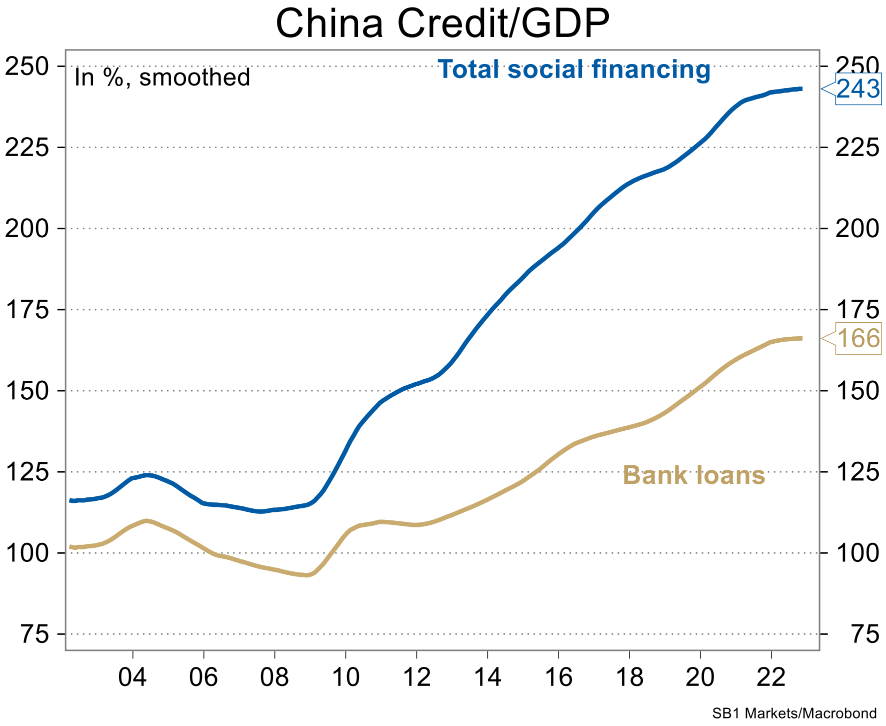
The credit impulse has bottom (and in reality it is positive already)

At least until December, credit growth accelerated somewhat vs. the local Q4-20/Q1-21 through



China Credit growth

SB1 Markets/Macrobond



China Credit/GDP

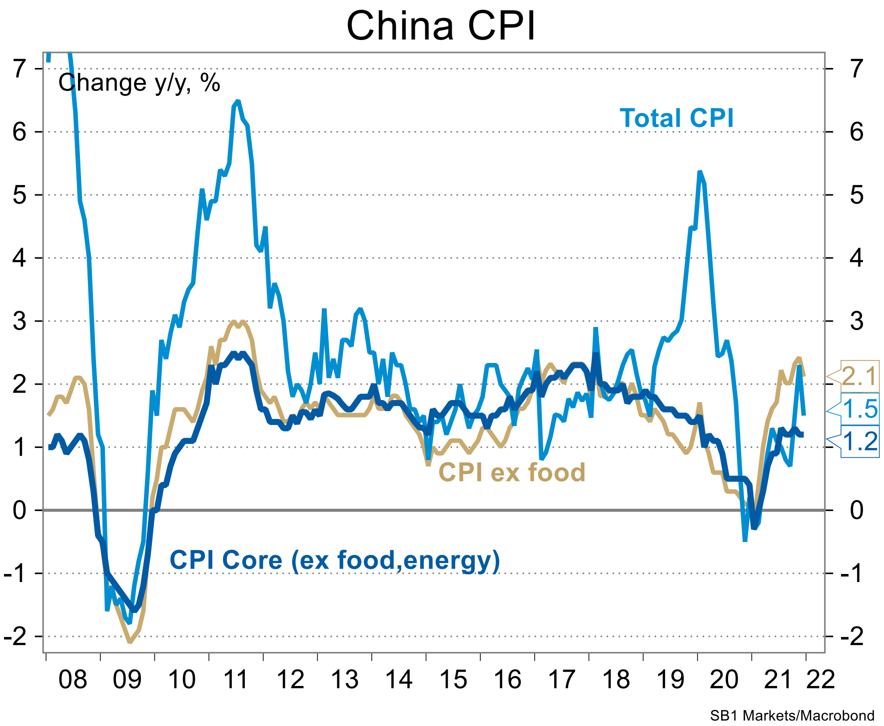
SB1 Markets/Macrobond

- A positive **credit impulse** implies that the credit growth/GDP ratio is increasing (the 2nd derivative of credit vs the GDP level)
  - » A negative credit impulse indicates credit tightening (or weaker demand) and has been associated with slowdowns in the Chinese economy, which have had impacts at other markets
- The **credit impulse** (here measured as the 12 m change in the 12 m credit growth/GDP ratio) bottomed in late 2018, turned positive one year later, peaked last autumn, fell into negative territory in May last year, bottomed at -6.5% in October, and is now at 4.4%
- Are authorities worried that they have tightened too much, in sum? Probably not too much, yet. Reserve requirements for banks are cut, but not any policy rate.

GDP is smoothed in the calculations in the charts above

Headline inflation down, core inflation low: No price pressures

Total CPI 1.5% y/y, down from 2.3%



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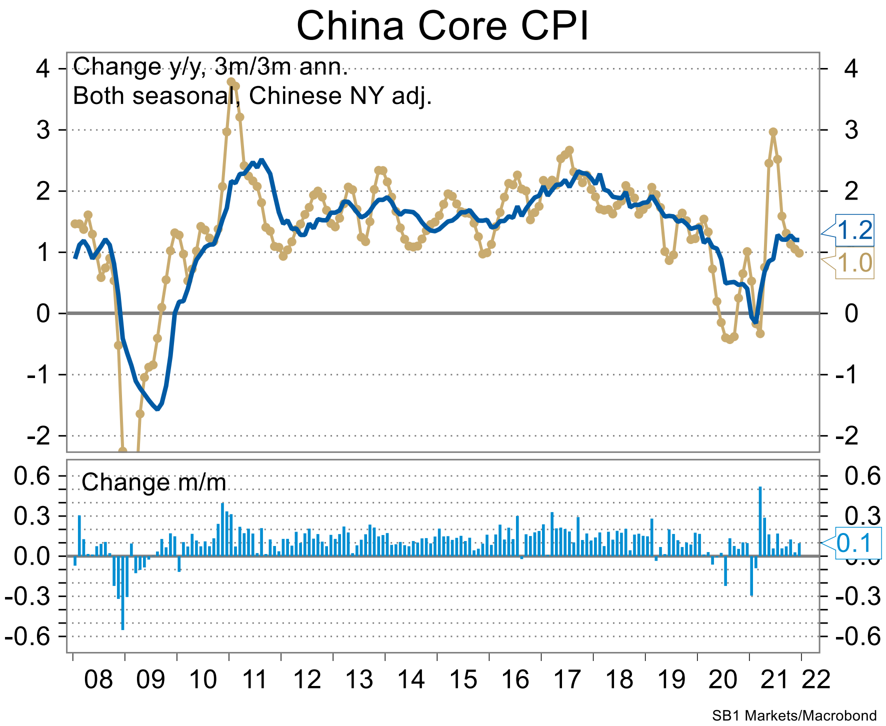

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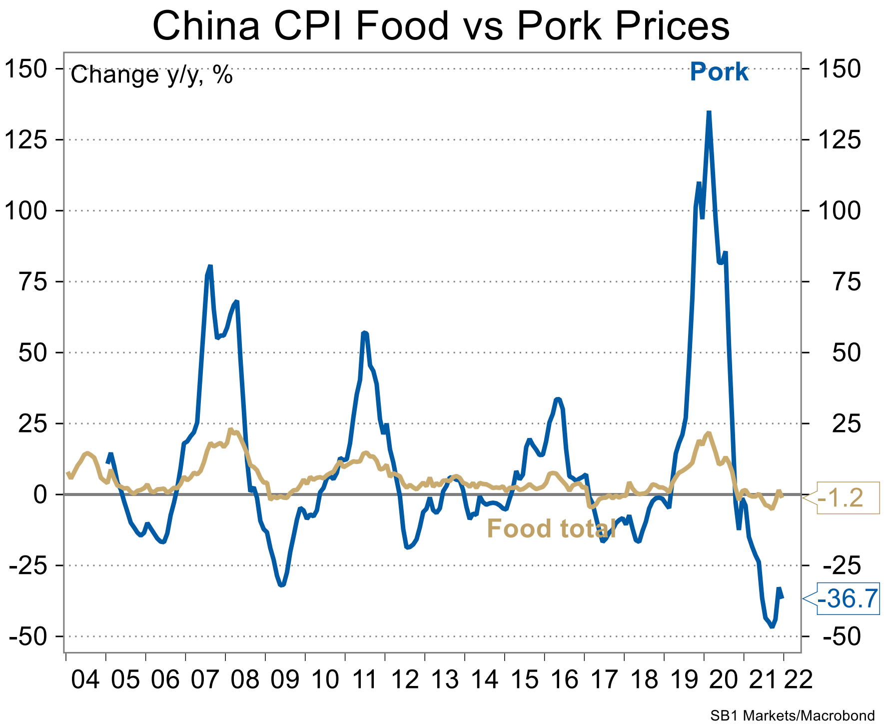
- **Total annual CPI** growth slowed to 1.5% in Dec, from 2.3% in November. Prices were unch m/m
- **The core CPI (x energy, food)** slowed 0.1 pp to 1.2%. Prices grew 0.1% m/m – with no signs of acceleration
- **Auto fuel** prices are up 22% y/y (from 30% in Nov). Household energy prices are up just some few per cent
- **Food prices** rose marginally mm, and are still down 1.2% y/y, due to the normalisation of pork prices – even if vegetable prices rose sharply
- Inflation is low. **Monetary policy** will not respond to actual inflation data if inflation is not really high or low, the real economy and the credit market is more important

Pork prices are coming back to a normal level

.. And the negative contribution to headline CPI will now fade



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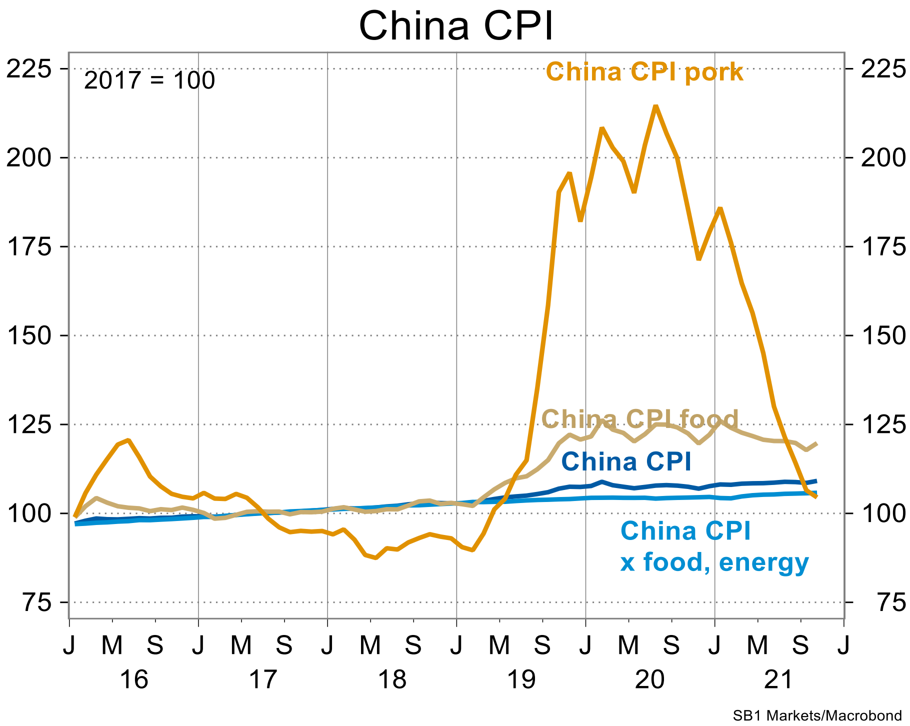

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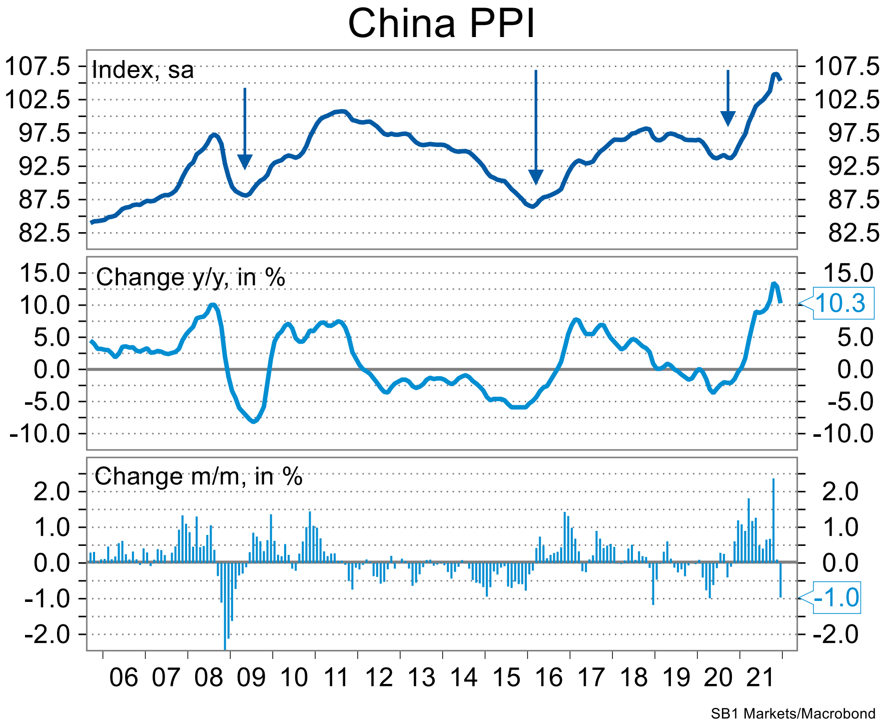
Peak PPI?

Prices fell 1% m/m in Dec, but are still at high level, following the 2.3% hike in Oct. Headline at 10.3%



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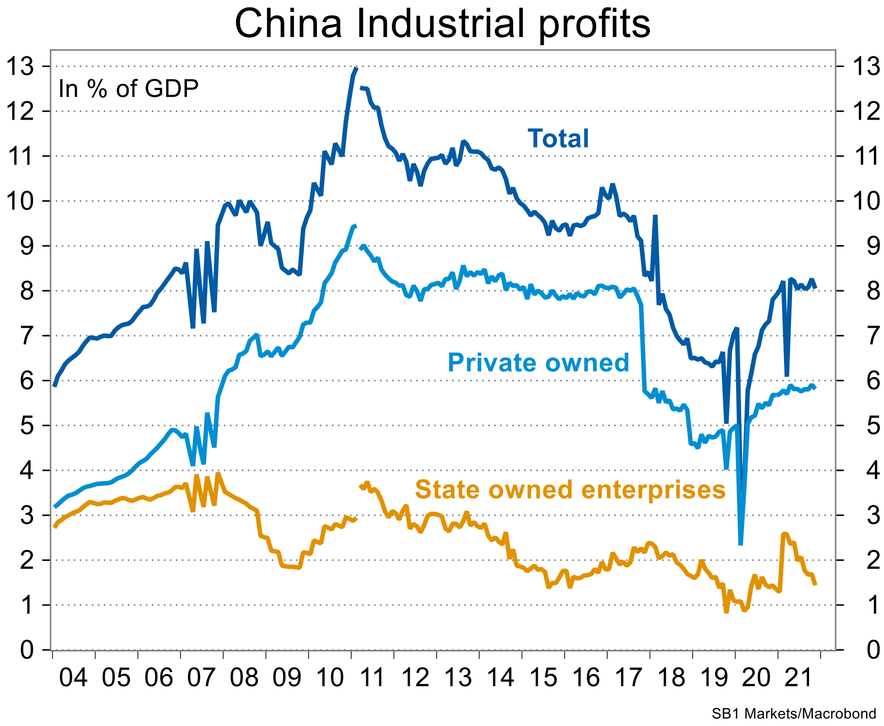

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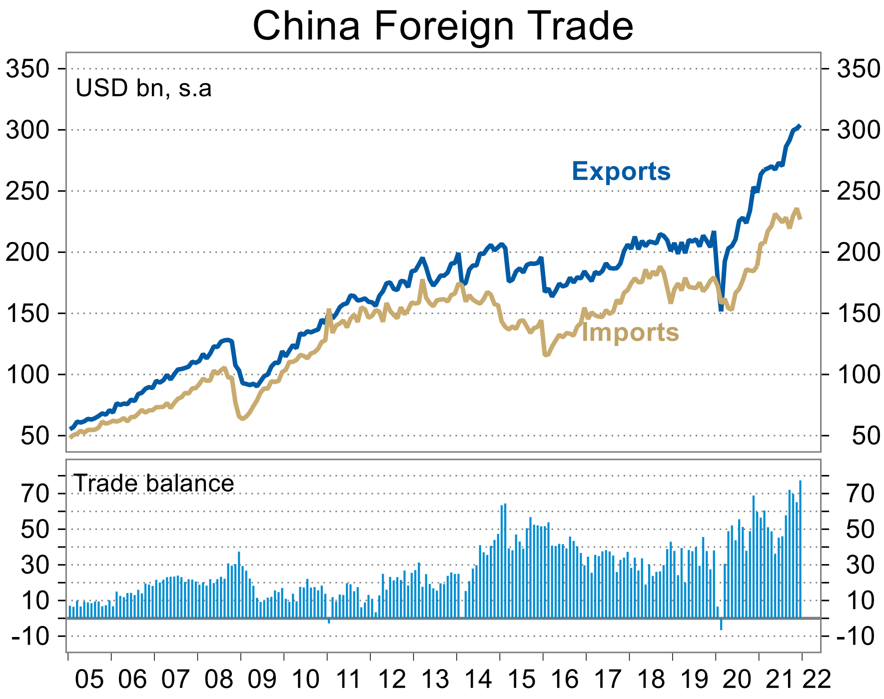
- **The rise in PPI** in the last few months can largely be contributed to an increase in commodities prices, including energy
  - » Consumer goods are up just 1% (one), durable consumer goods are up 0.4% y/y. The correlation between PPI and CPI in China is normally not impressive
- **Profits in privately owned industrial enterprises** fell by 50% in February ‘20. Profits rose to a normal level in April/May ‘20 – if we label the profit level in 2019 and early 2020 as normal – at 5% of GDP – and now it has climbed to 5.9%
- **Profits in state owned enterprises profits** are now around 1.5% of GDP – and on the way down again

Exports further up (but slowing), imports down – and the trend is weak

The trade surplus was ATH in December, and in 2021, if not in % of GDP



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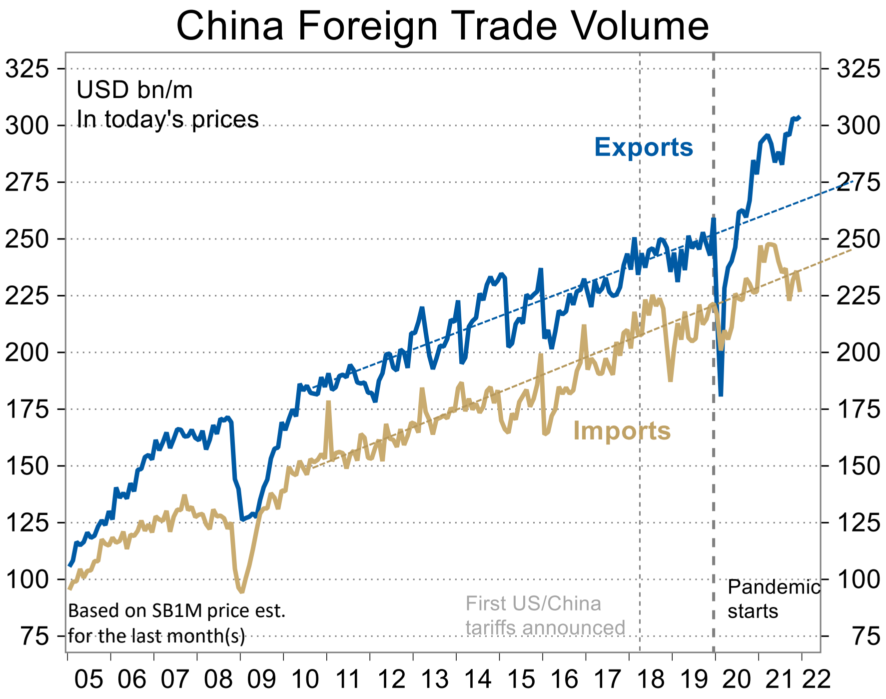

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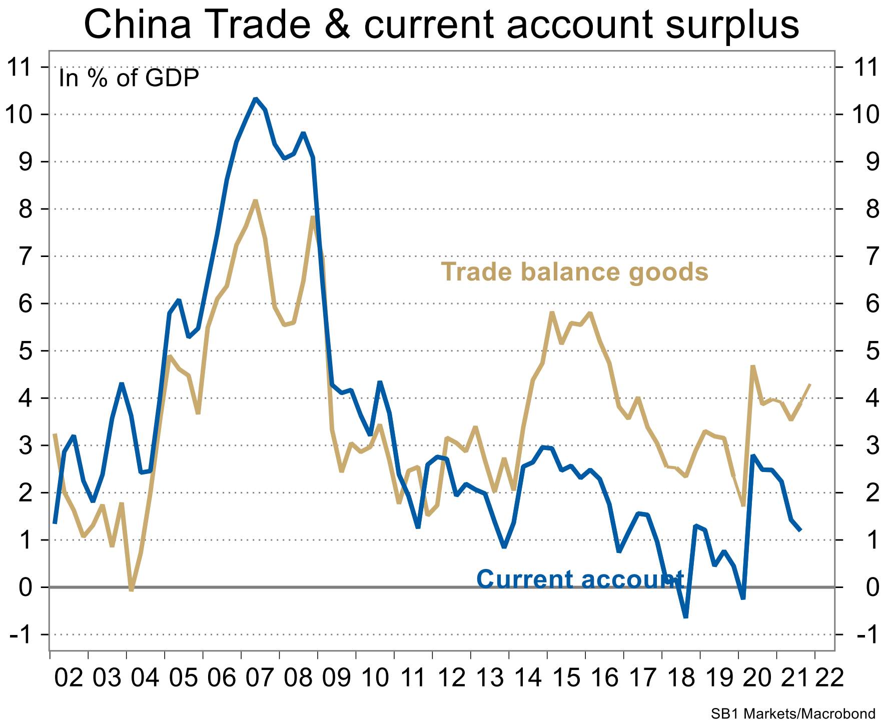
- **Exports** grew by 1% in USD terms in Dev (our seas adj), and are up 21% y/y, 1 pp more than expected. Export volumes were probably close to unch and the level is high, up 20% vs the pre-pandemic level and 13% above the p-p trend path! Signals still strong global demand for goods. Prices are up 11% y/y
- **Imports** values fell by 4% m/m but are still up 20% y/y – though far lower than expected, 28%. Recent months import values have flattened, and as prices have climbed, import volumes are down 6% to Q4 from Q4 (and weaker than we assumed in Nov). Import volumes are up 5% from before the pandemic but slightly below the pre-pandemic trend. Prices are up 22% y/y. **Oil imports** rose in Dec but the trend remains flattish (from 2019!). **Iron ore** imports fell, from a high level in Nov – but the trend is weak. **Coal imports** have soared recently
- The **trade surplus** was the highest ever in Dec, at USD 94 bn, expected 'just' 73 bn. The surplus is 77 bn, seas. adj. – still at ATH. 2021 was the best ever, too
- For some time we have expected an export slowdown due to lower demand for goods in the rich part of the world – and growth may be slowing somewhat. The decline in imports confirms a softening of domestic demand, both retail sales and investments. So far, the slowdown is modest, in imports too, and within the 'normal ups and downs in activity

A large trade surplus but far from ATH vs. GDP

However, the C/A surplus is just above 1% of GDP, though higher than before the pandemic



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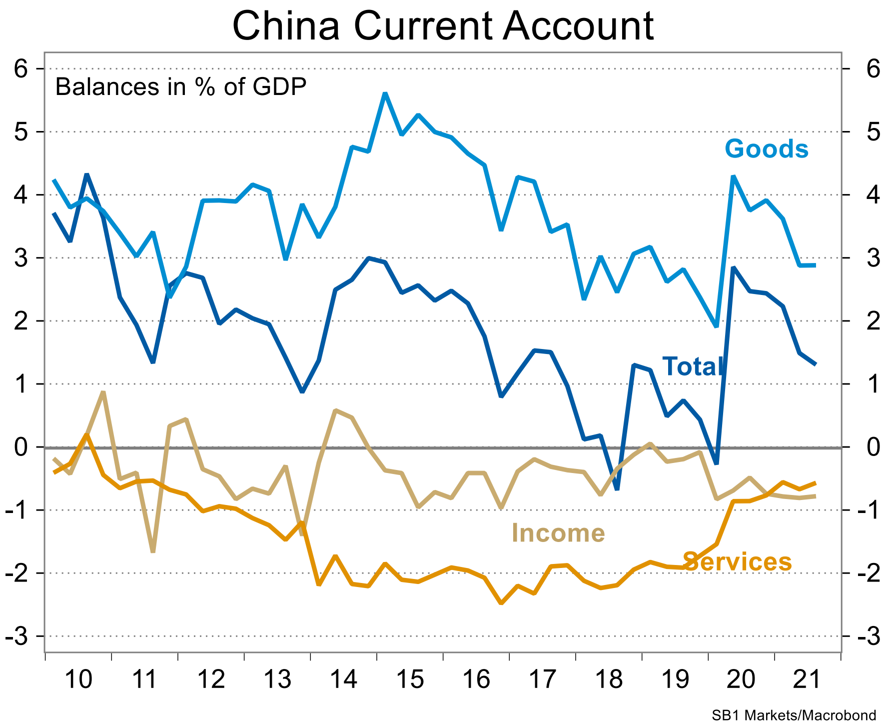

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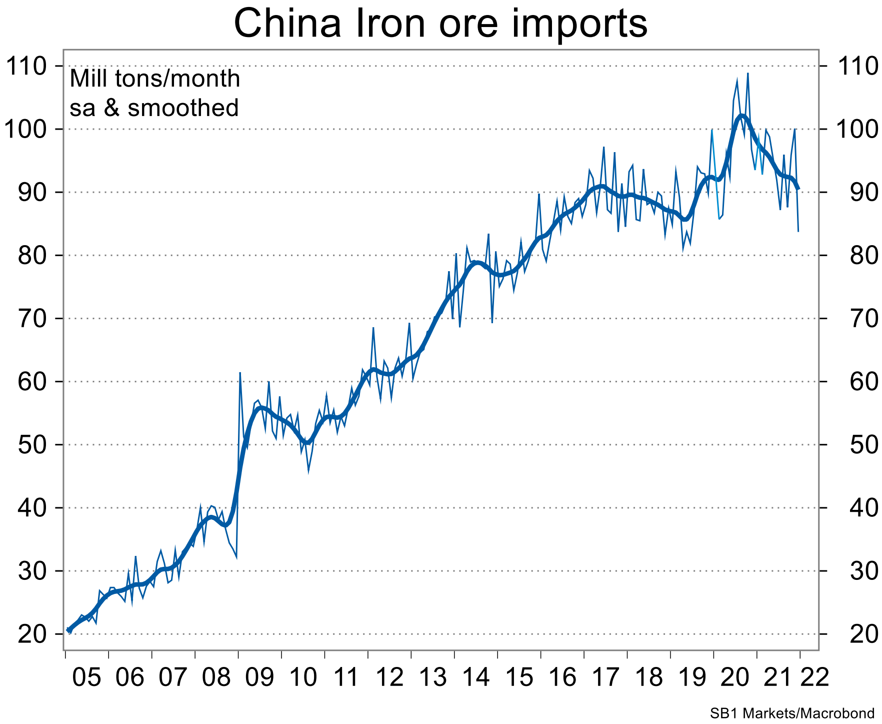
- The trade surplus in goods was 4¼ % of GDP in Q4
- In services, China runs a 0.6% deficit, down from -2% in 2015 – 2019 (but from zero 10 years ago). For the time being, the Chinese do not travel abroad (and we do not visit them either)
- China runs a deficit in net (mostly capital) income from abroad, even if the country has a huge net + financial position
  - » China has invested much in low yielding US government bonds (and other low yielding investments); foreigners have been investing in profitable production capacity in China

Iron ore imports down in December – from a 'high' level in Nov

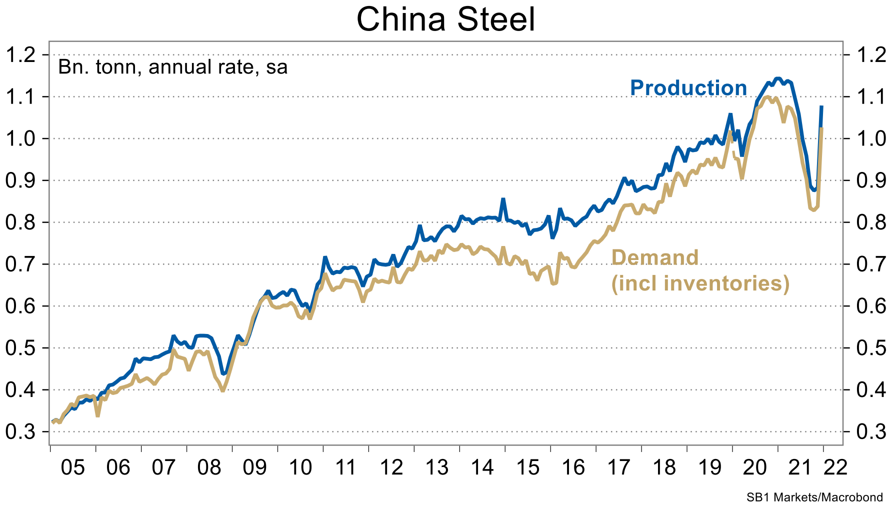
The average of Nov/Dec is in line with the level over the previous months. A strange lift in steel prod.



SB1 Markets/Macrobond

- **Iron ore** imports have fallen more than 10% since late last summer
- Net steel exports rose in December
- … but far less then the incredible (literally speaking) 22% increase in steel production
    - » Until Dec, steel production had fallen almost 25% from April, we assumed both due to a decline in demand form the construction sector and measures take to meet targets of 10% decline in production (and emissions) in 2021. The Dec print is rather special

SB1 Markets/Macrobond



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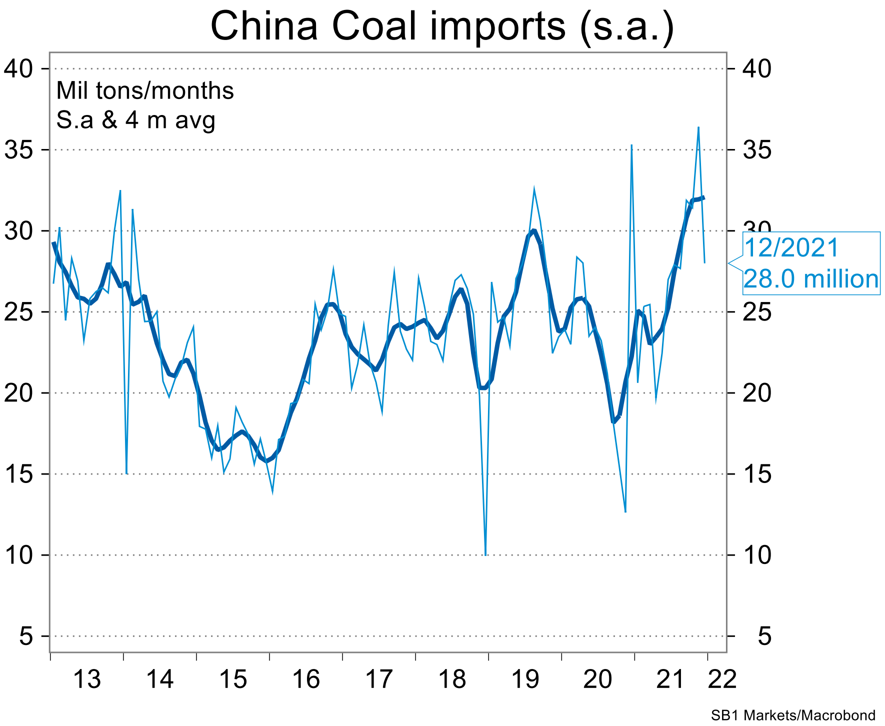
Coal imports down in Dec but record high over the recent months

Most imports are still trending up, at least in value terms



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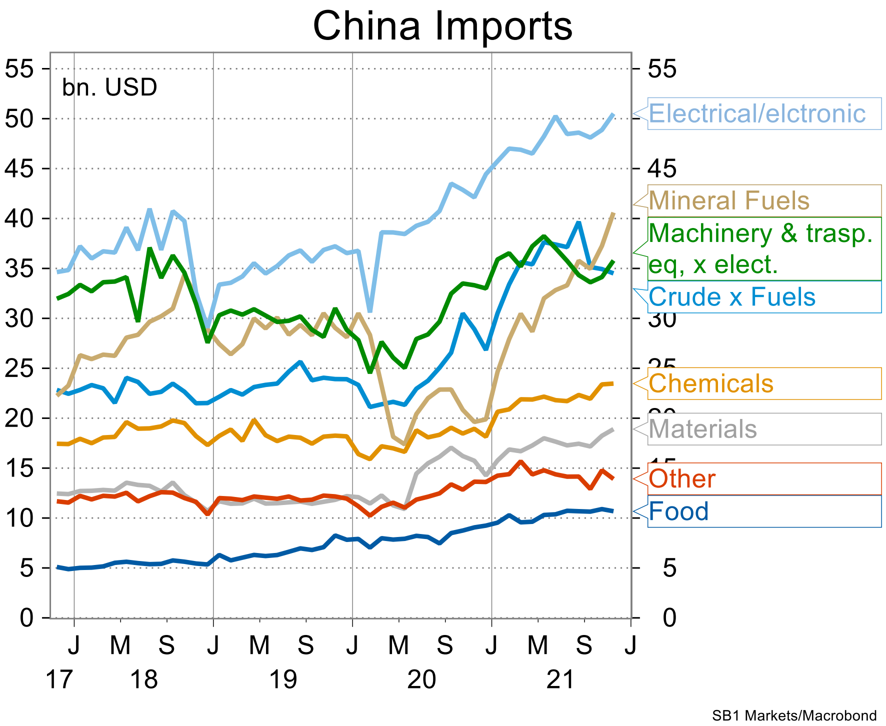

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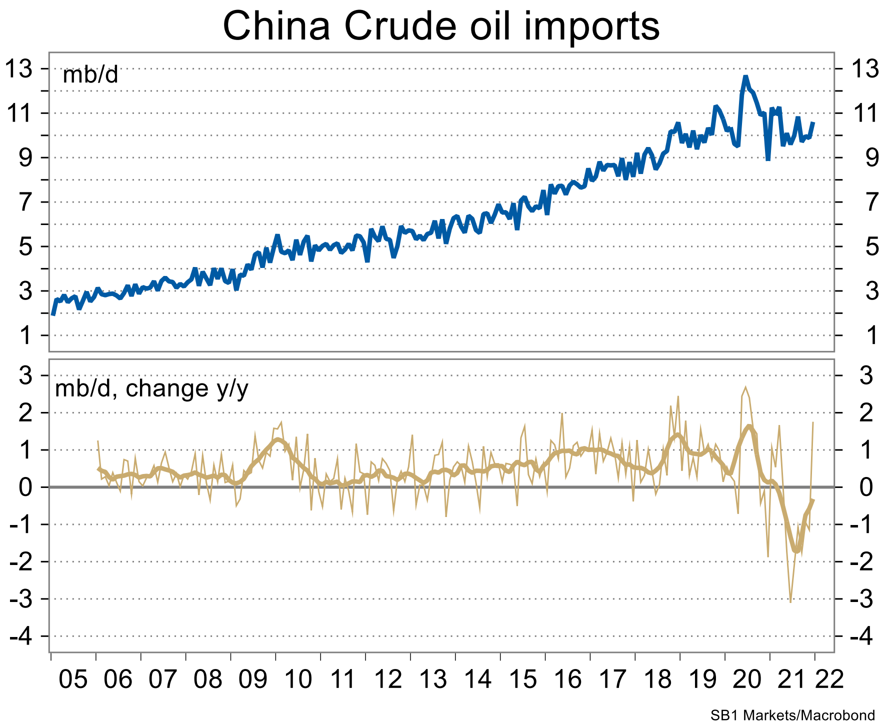
Oil imports up in December but the trend is completely flat



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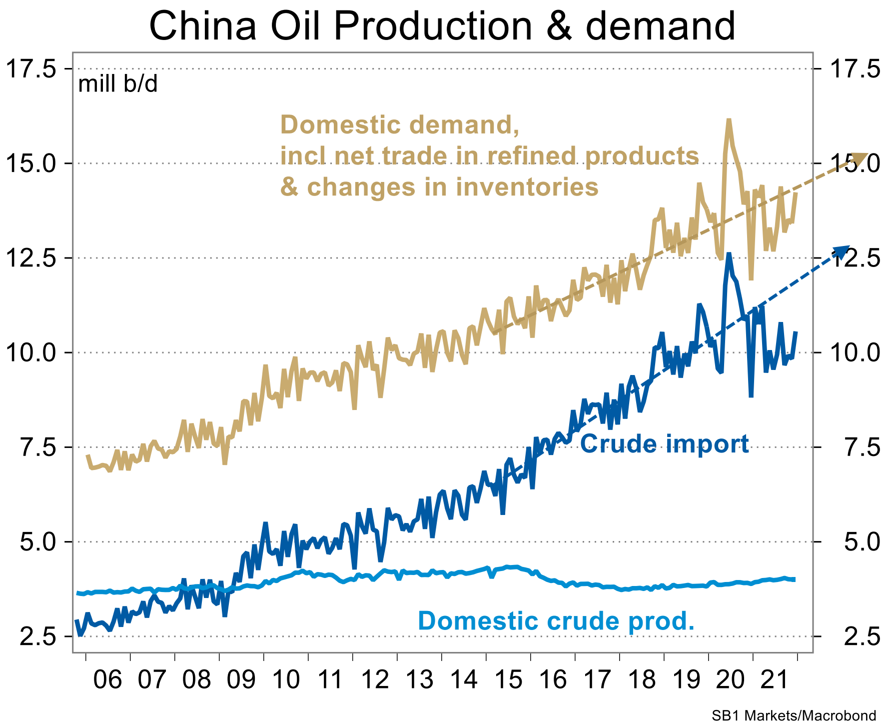

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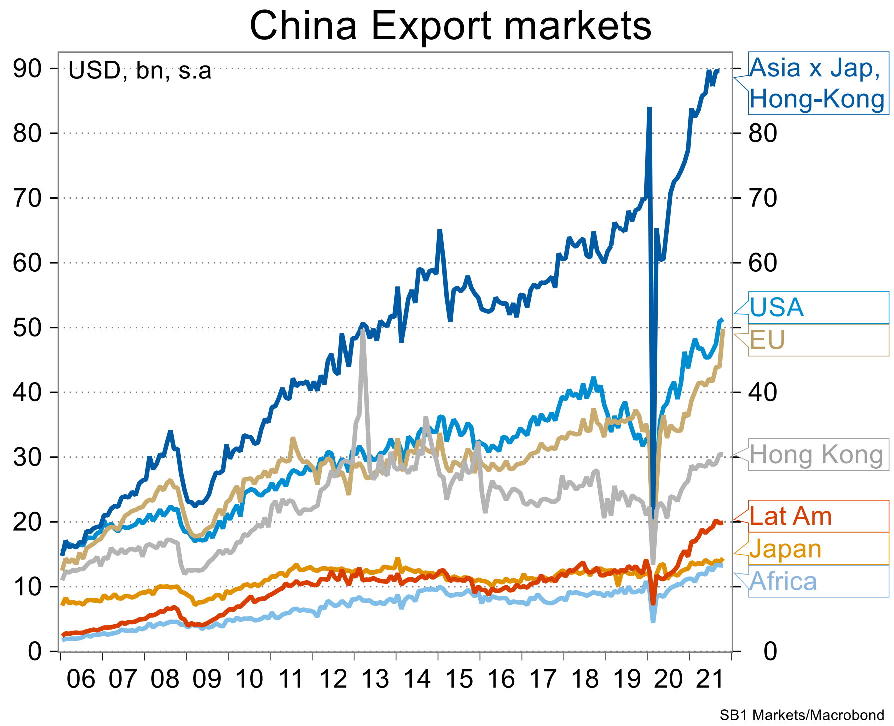
- 4 years without growth in oil import or domestic demand is rather surprising?
- Some inventory/reserve building/drawdowns may explain short term deviations but not the stabilisation since 2018

Chinese exports to all corners of the world sharply up

The recovery in exports through the pandemic has so far been impressive

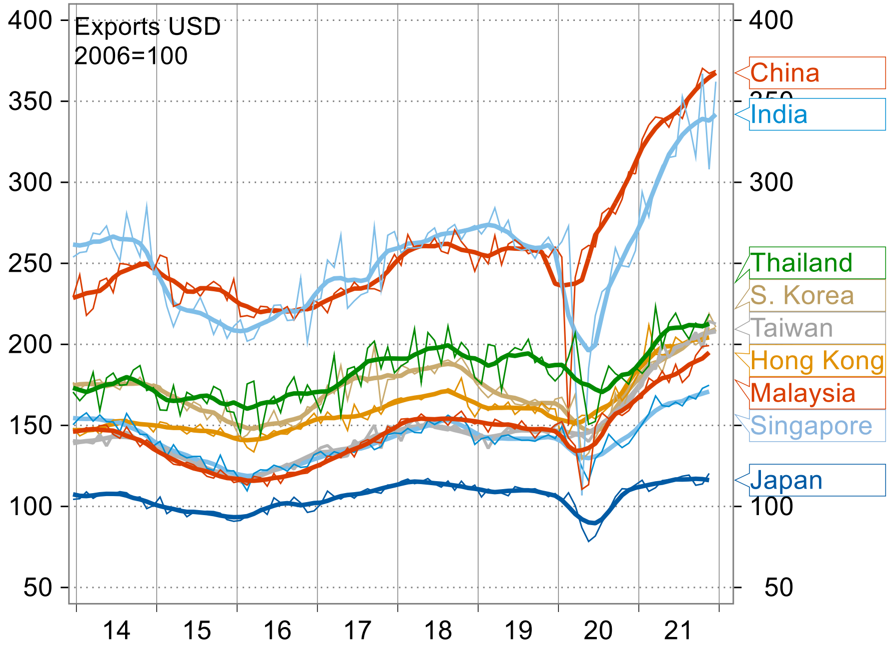


- Some slowing in exports to Hong Kong, Japan – and to rest of Asia

SpareBank 1 MARKETS

Exports from other Asian counties are slowing – at high levels

Asia Exports



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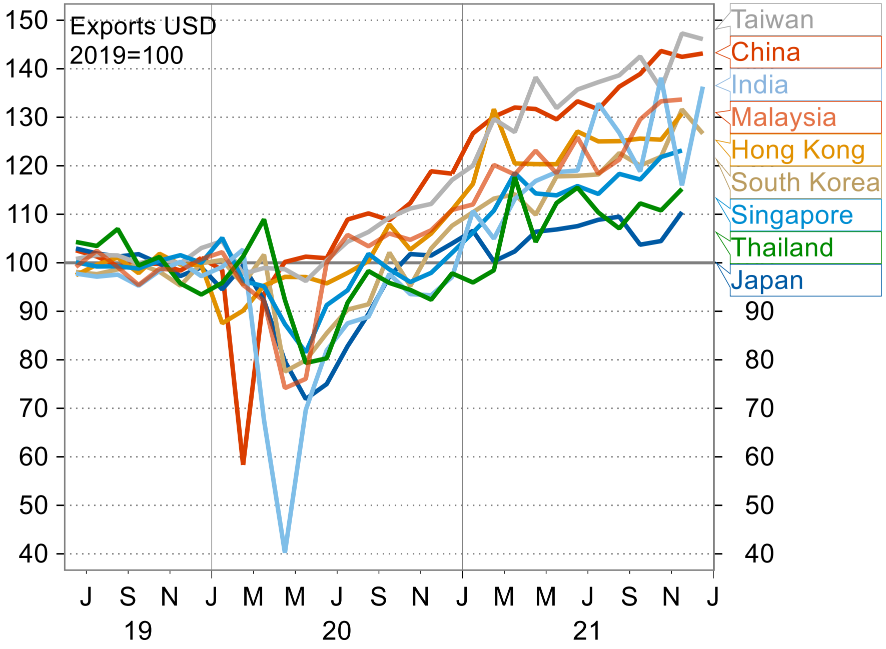
Asia Exports



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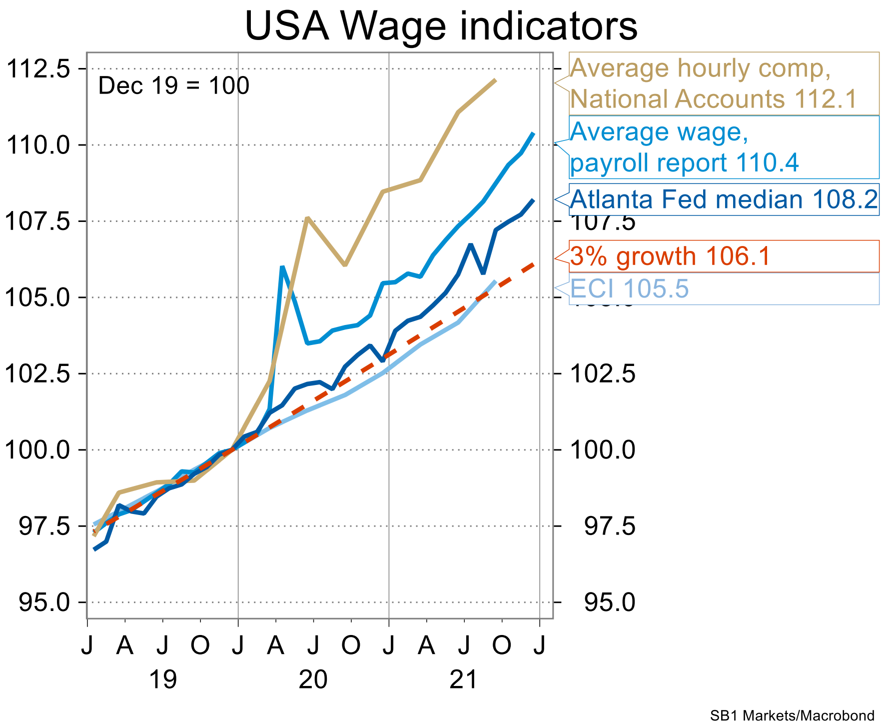
Tick tock, tick tock: The tide has not yet changed – wage inflation accelerates

Growth in the median wage accelerated 0.2% to 4.5% in Dec, up 1 pp from before the pandemic



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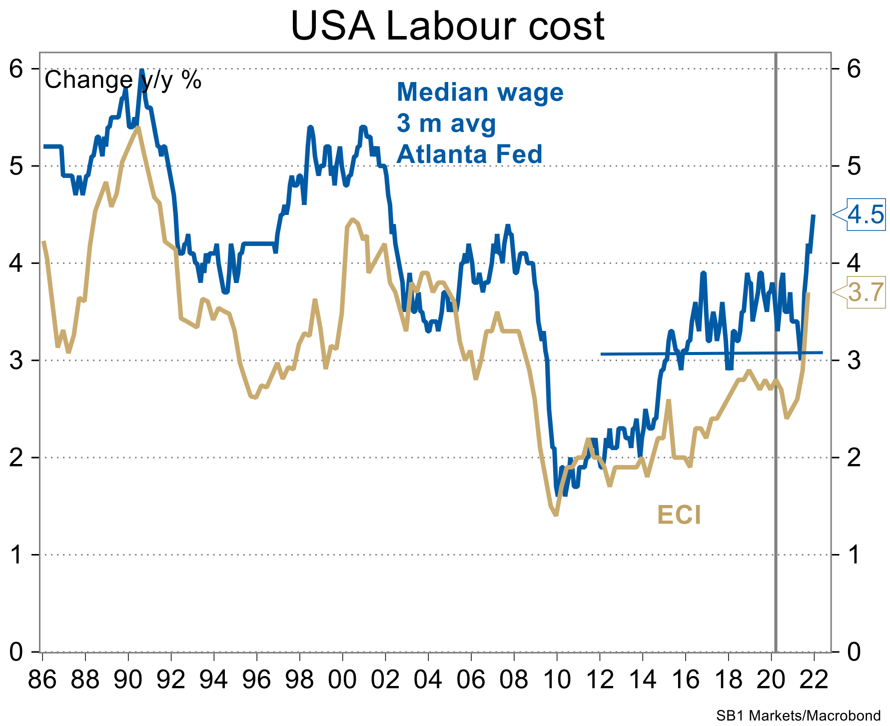

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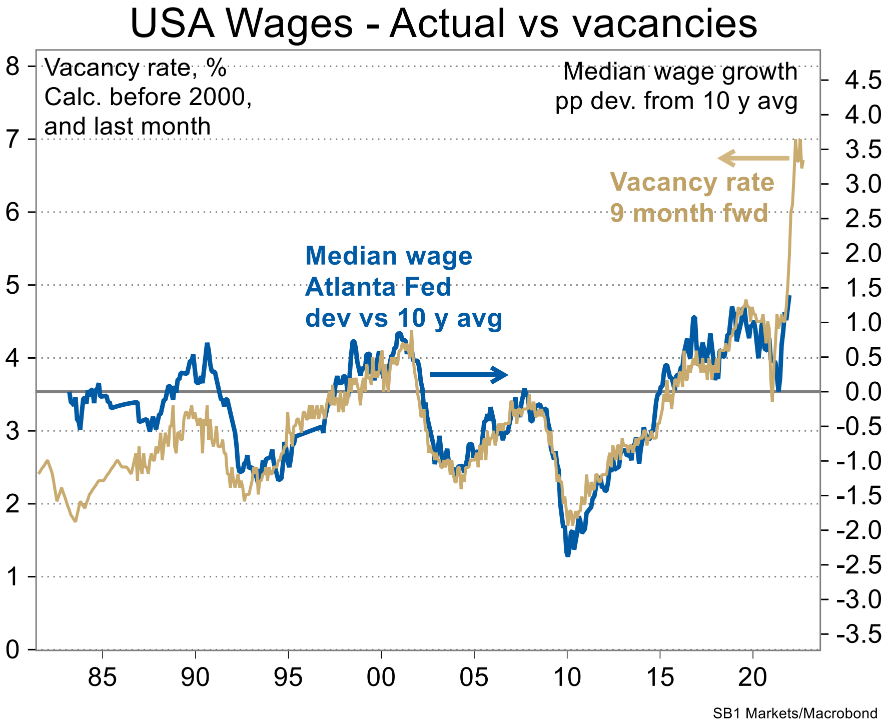
- **Atlanta Fed's median wage tracke**r reported another lift in the annual growth rate in December, the 3 m average up to 4.5% - and from a much lower level before 2016. Since the spring, the underlying growth rate has been higher, well above 5%. The average wage rate in the monthly payrolls report is up at a 5.7% pace since April
- **Various wage/earnings/compensation stats** are now running at growth rates 1.5 – 3 pp above the 10 y average. There is an obvious risk that wage inflation will accelerate further (check the next pages) – probably until the next recession hits as the labour market is extremely tight

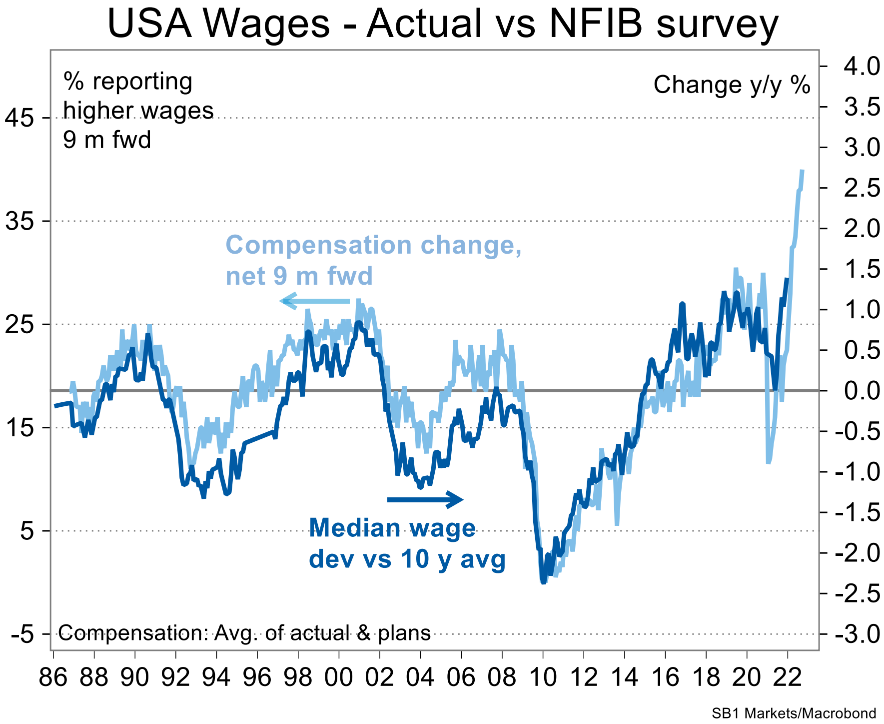
Just remind you of our favourite wage inflation chart

Vacancies & SME's wage plans is closely correlated to actual wage inflation – 9 months later



USA Wages - Actual vs vacancies

SB1 Markets/Macrobond

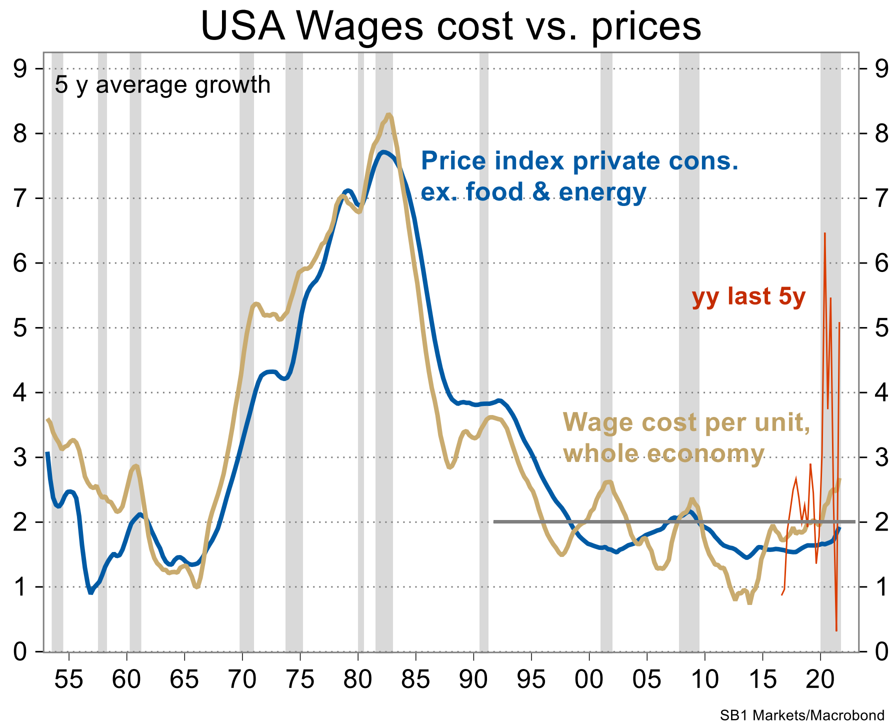


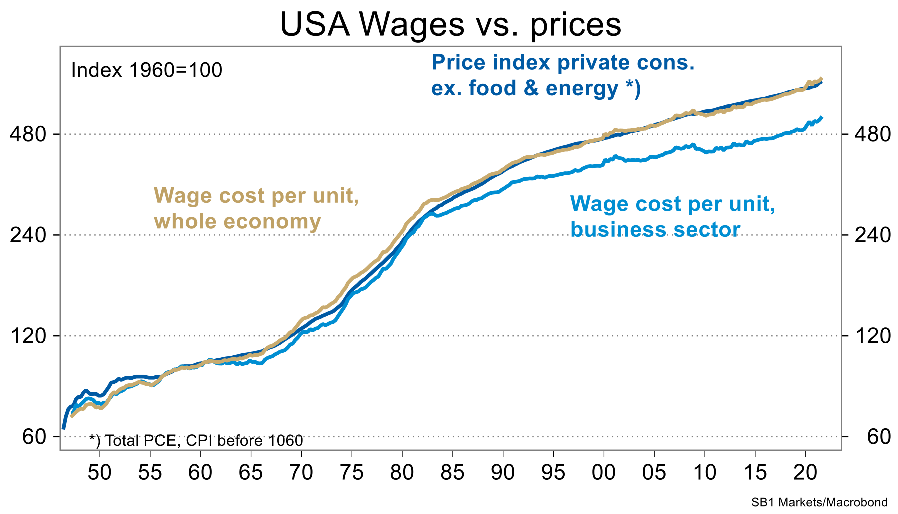
USA Wages - Actual vs NFIB survey

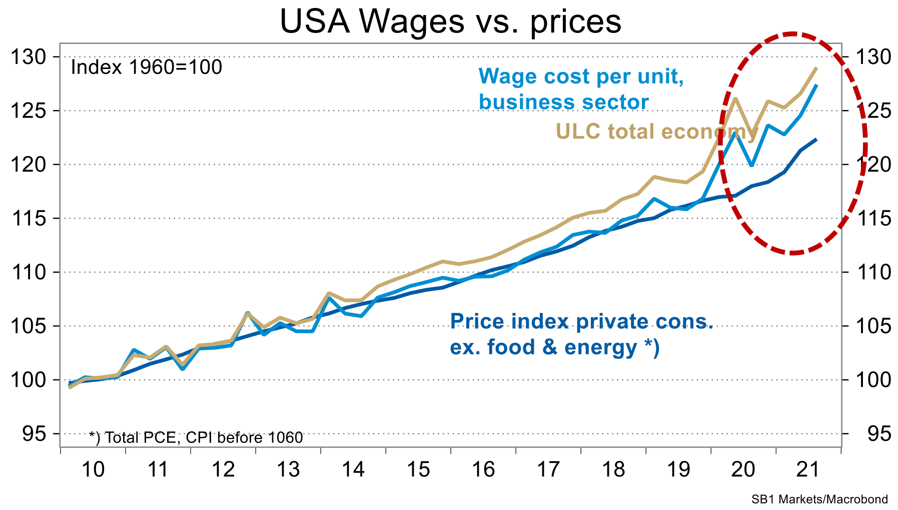
SB1 Markets/Macrobond

- The correlation between unfilled vacancies and actual wage growth is close, with a 9 months' lag
- More companies than ever before (data from 1986) are reporting that they plan to lift compensation the coming months – and the correlation is tight, with the same lag
- No doubt, these data points have been important for Powell and the FOMC's abrupt policy shift over the past few months. However, the risk has been obvious for many months

Wage inflation is the main risk, not raw materials/energy/corp. margins

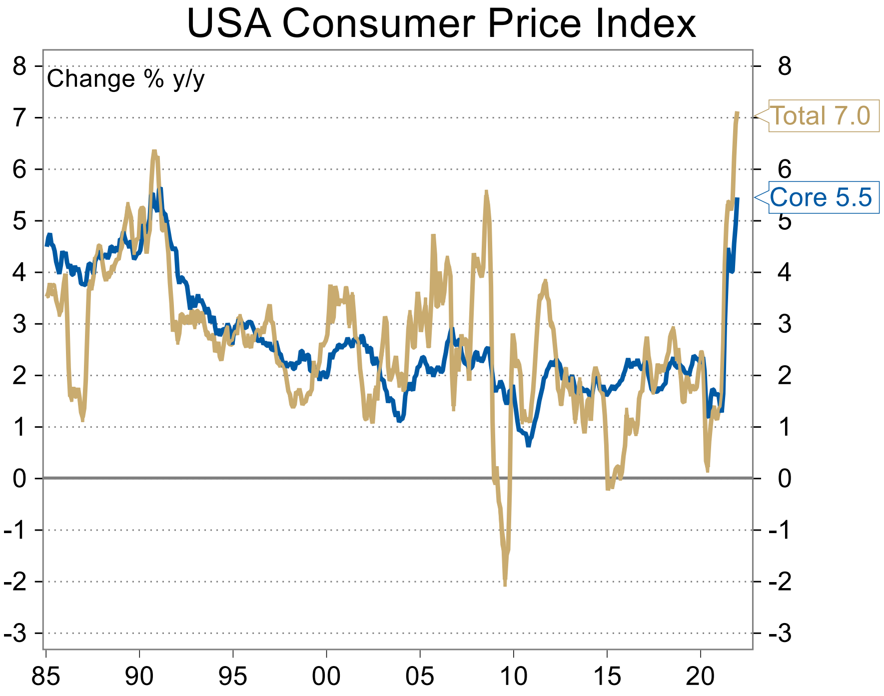






7%!

But why worry? It was expected, and the Fed says it will take care of it. Cheers!!



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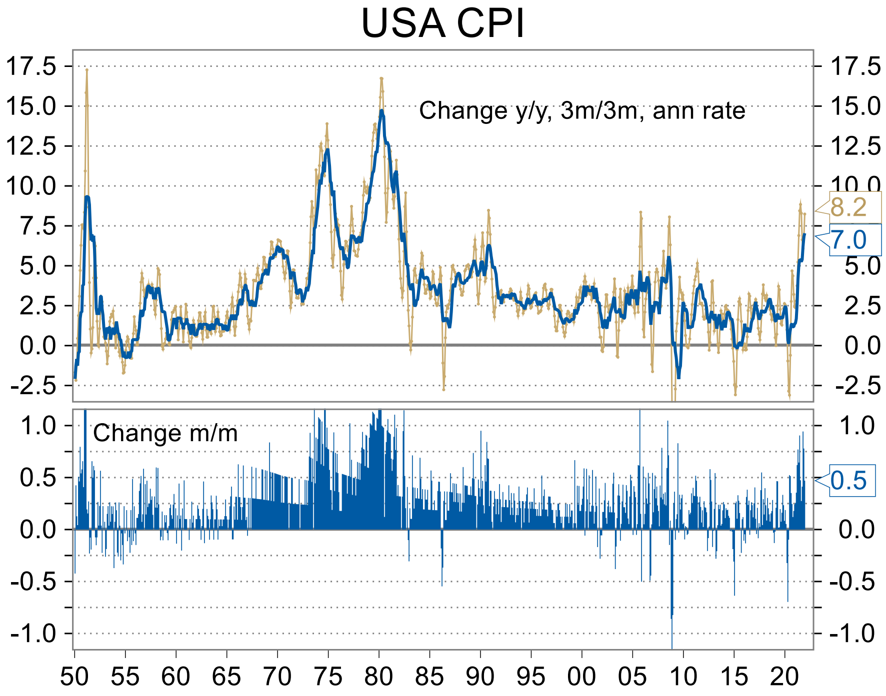

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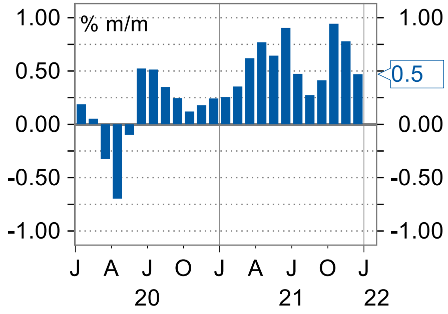
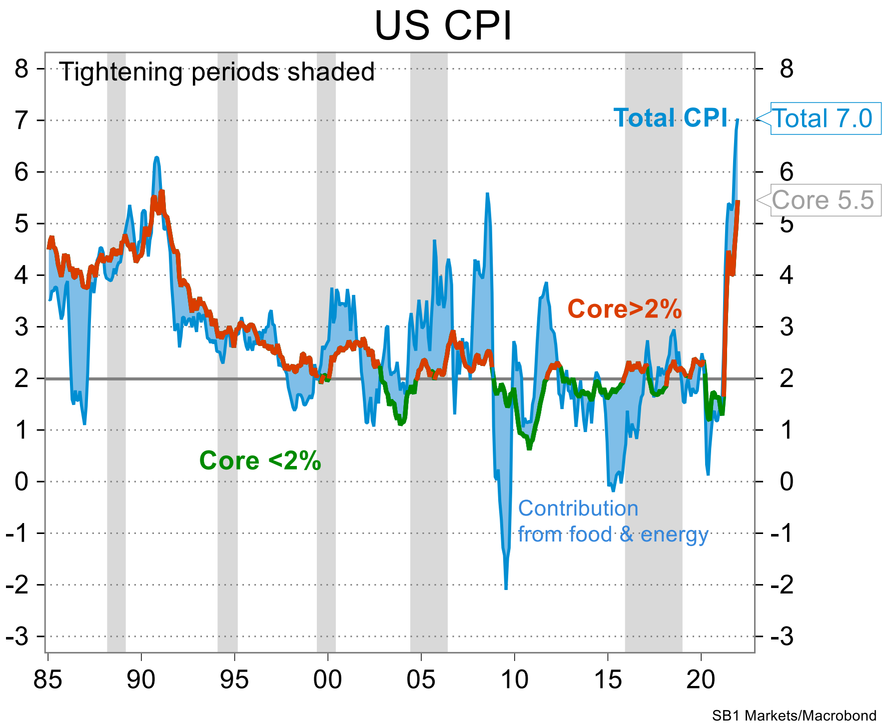
- **Headline CPI rose** 0.5% m/m in Dec, 0.1 pp more than expected, following the 0.8% gain in Nov. The annual rate accelerated 0.2 pp to 7.0% – but as expected, the highest since 1982. The 3m/3m rate is at 8.2%. In 2021 prices rose by 4.7%, somewhat above the growth in average wages the past 2 years
- **Energy prices** prices fell slightly in Dec but are still 29% up y/y, contributing 1.8 pp to the headline growth
- Both new and used **auto prices** climbed further, and explains 1.4 pp of the annual rate
- However, price inflation broadened further in Nov. Cleveland Fed's **trimmed median CPI** is accelerated 0.2 pp to 6.2% (6 m pace), another ATH (with data from 1983). Other 'breath' measures tell the same story
- **Surveys** signal a further increase in prices the coming months, at least high m/m increased
- The **Federal Reserve/Powell** has now signalled that the surge in inflation may not be transitory. The Bank will formalise the change of tack at this week's FOMC meeting. Tapering will be sharply accelerated, paving the way for a lift in the Fed funds rate before next summer. The policy change should have been taken several months ago!



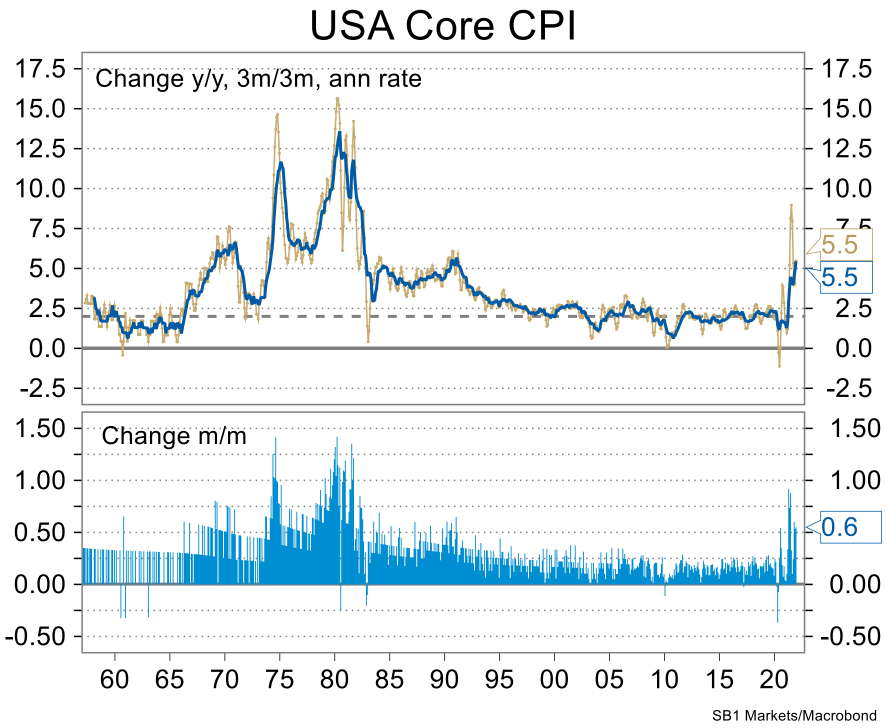
SB1 Markets/Macrobond

Core inflation up too, annual rate up 0.6 pp to 5.5%

Prices +0. 5% m/m in Nov, both 0,1% higher than expected. Prices inflation is broadening

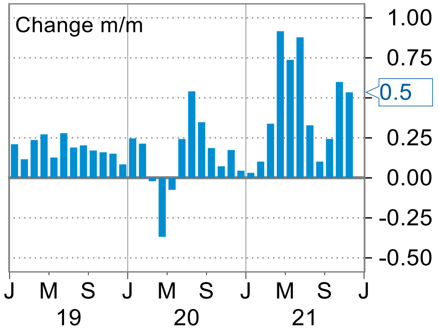


SB1 Markets/Macrobond



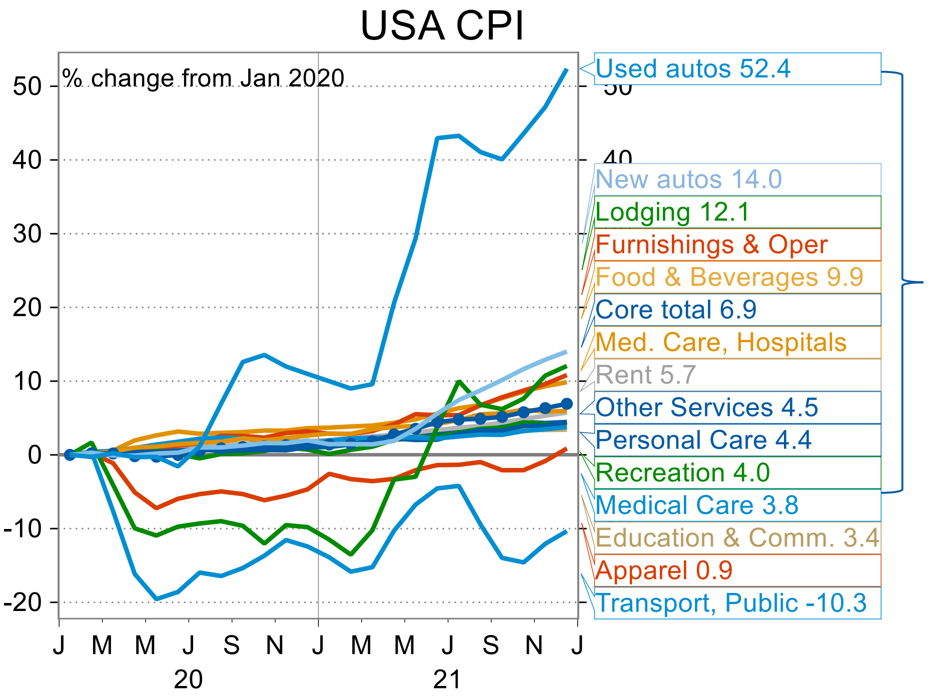
SB1 Markets/Macrobond

- **The 3rd wave: Core prices** rose rapidly during the summer of 2020, during last spring and now the 3rd time
    - » Both the monthly increases and the annual rate is the highest since 1990
- There are still some few 'base effects' left. Last year some prices fell, like apparel and lodging. As these prices are normalising, (or more than that in lodging), growth rates are pushed up transitory (yes, transitory!)



New & used auto prices further up, as were apparel, hotel & public transp. prices

Just recreation prices down m/m. Used autos, lodging the most up y/y



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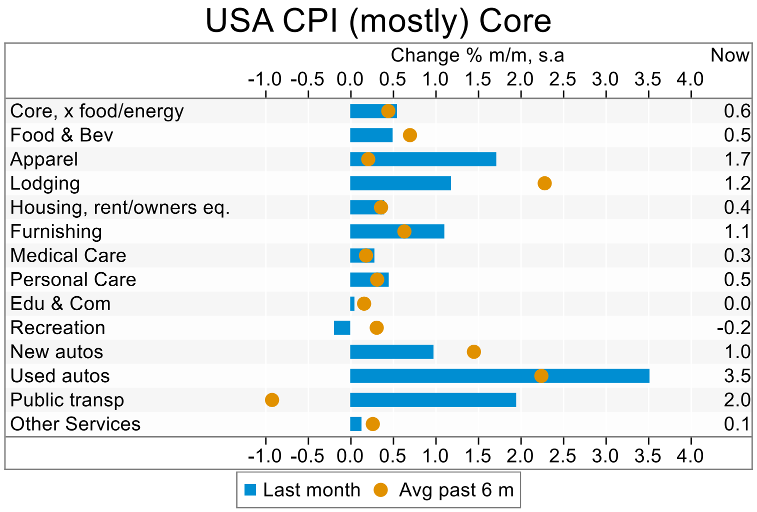

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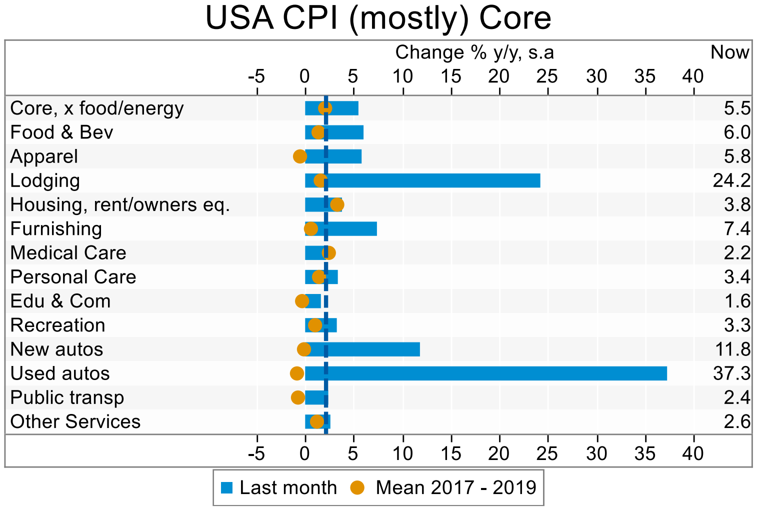


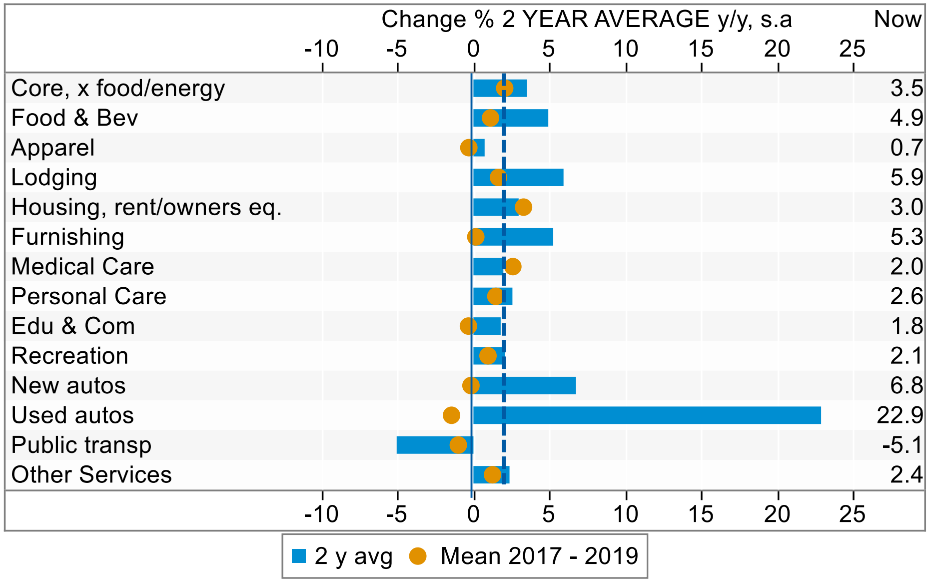
SB1 Markets/Macrobond

- Most sectors report growth above 2% from before the pandemic
  - » All sectors but education and communication are up more than 2% y/y
- One day: A huge downside for used auto prices, some for new autos & furnishings as well. But not in December

Inflation over the past 2 years: 10 sectors >2%, 3 up <2%

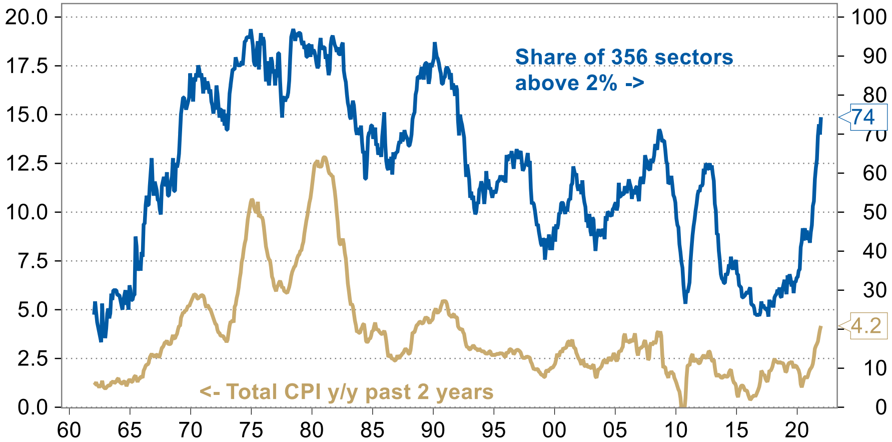
2 y avg core inflation 4.2%, up from a 2.1% average in 2017 – 2019 – and broadening, 70% up >2%

USA CPI (mostly) Core



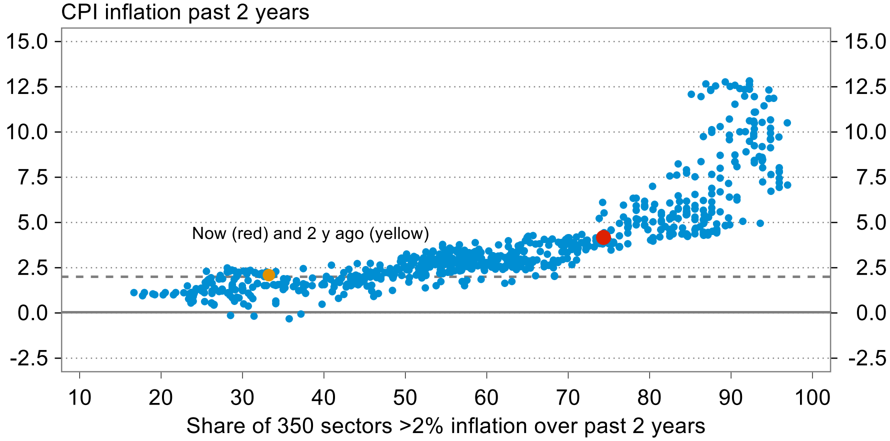
SB1 Markets/Macrobond

USA CPI inflation & share above 2%



SB1 Markets/Macrobond

USA CPI inflation & share above 2%

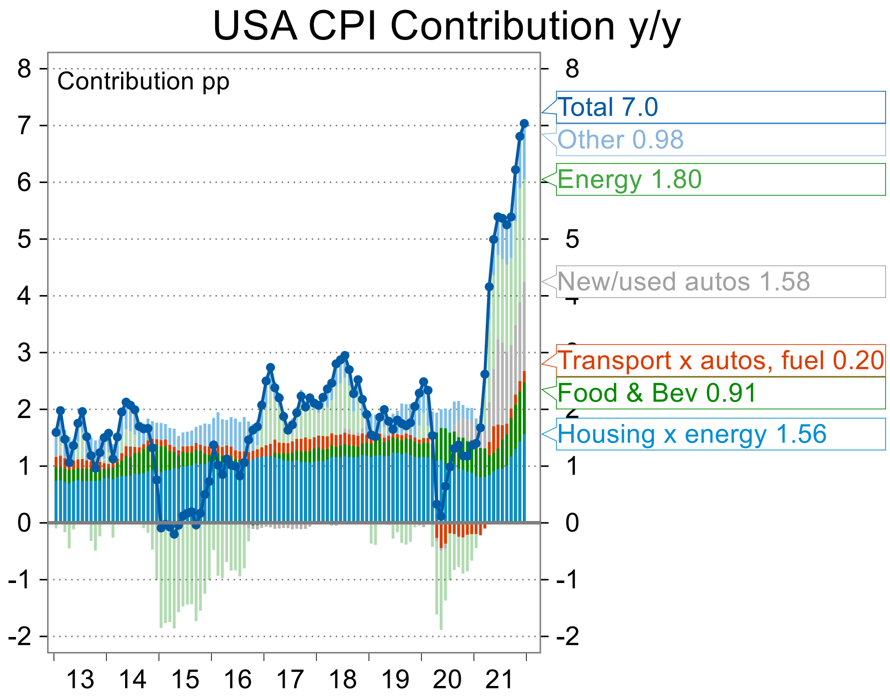


SB1 Markets/Macrobond

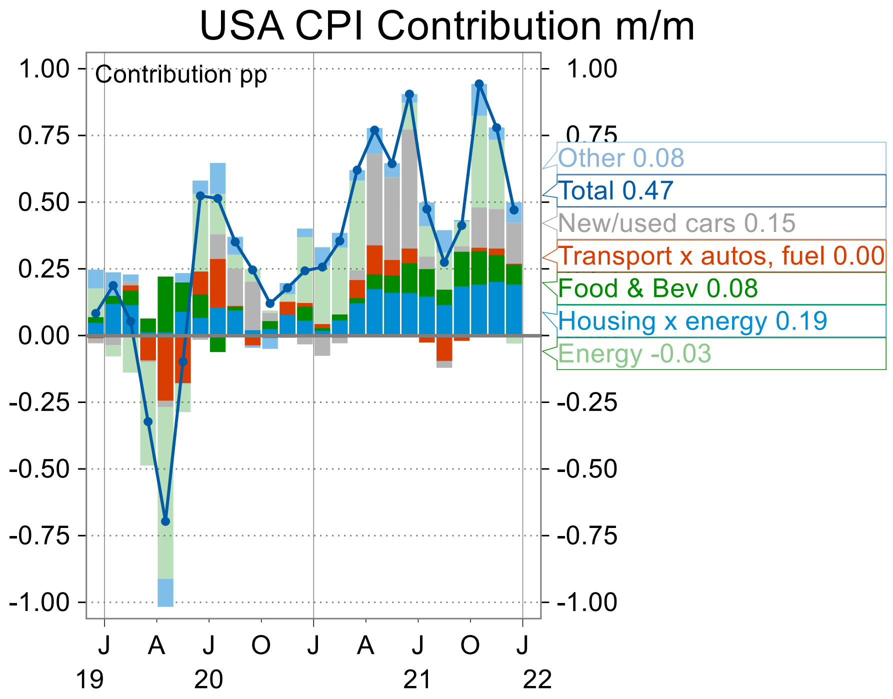
- Measured over the past 2 years vs the 2017-19 average, inflation has celerated in 11 sectors, and slowed in 2 sectors (housing and public transport
- Of 350 sub-sectors, 74% are up more than 2% over the 2 past years (from 70%), normally signalling an inflation rate at 4% - where we now are

Transport & energy explain 3.6 pp of the 7.0 % lift in total CPI

Inflation in other sectors are >4%, far above the inflation target



SB1 Markets/Macrobond



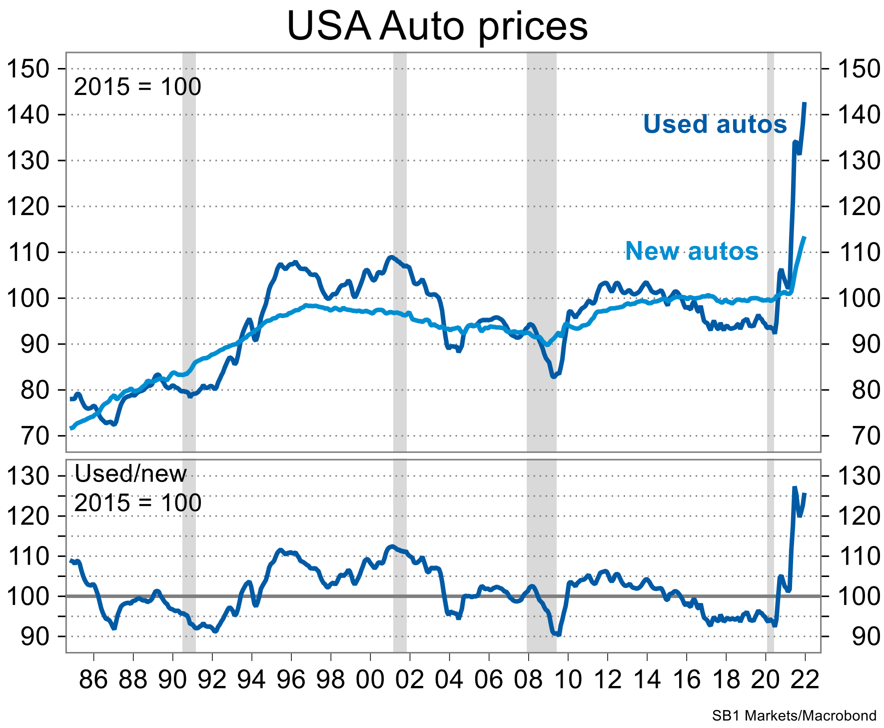
SB1 Markets/Macrobond

- **Energy** flattened in December but are up 29% y/y, lifting the total CPI by 1.8%
- As **used car prices** rose again in December, as did new auto prices – in sum a 0.15 pp contribution to the monthly 0.5% total gain
- However, **excluding** the 3.6 pp contribution the headline CPI from energy & transport, **“remaining” inflation** has accelerating rapidly
- **Housing x energy** (and x lodging) is contributing by 1.6 pp, the highest rate in many years. Rents are on the way up – and still rather exposed (check 2 pages fwd) but a substantial contribution to housing also comes from household equipment & furnishings, and operations

Lodging away from home (incl hotels) is a part of housing at the charts above

2nd hand car prices even further up – and new cars more expensive too

The downside is substantial as soon as new car production recovers



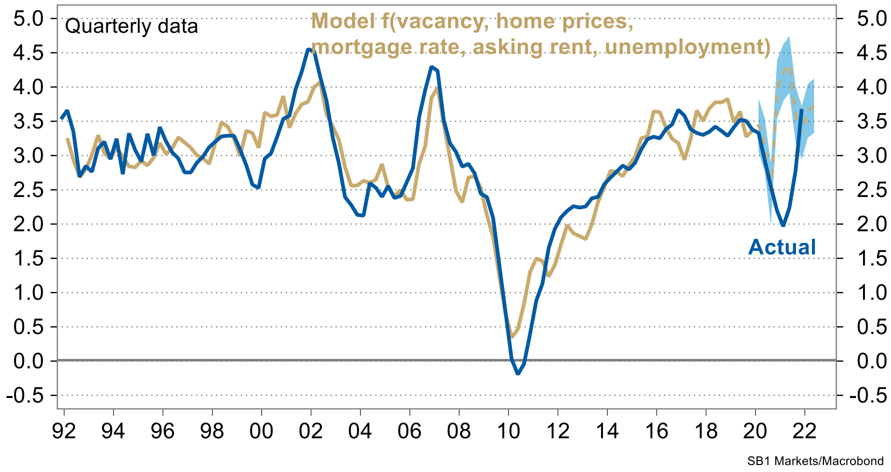
SB1 Markets/Macrobond

- Used car prices rose by 3.5% m/m in December, and new car prices gained 1% - and prices are up 37% and 12% y/y resp.
- Production of cars has recovered somewhat but sale of new cars is still very low
- However, at one stage at least used auto prices will 'collapse', down to a normal level – and there is a substantial downside for new cars as well

Rents are on the way up

A low vacancy rate, rental asking prices are up (according to most measures), house prices are up

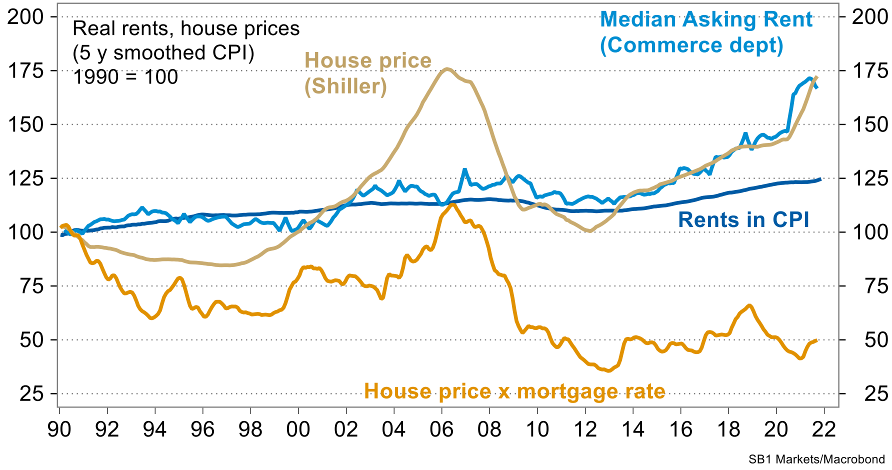
US CPI Rent model



SB1 Markets/Macrobond

- **The official (Commerce dept) rental asking price** has flattened recent months and rents fell m/m in Sept. The annual growth rate has fallen to 4% y/y from 17% - but the market rent level is still very high. Other rental surveys have reported smaller increases in rents vs the pre pandemic level but not a declined recently – but are accelerating further. **House prices** are up almost 20% y/y
- **The rental vacancy rate** fell in Q3, and is very low. **The homeowner vacancy rate** is at a record low level too
- **Rent inflation measured in the CPI** has accelerated to 3.7% from 2%, to above the pre-pandemic rate at some 3.5%
- **Our model**, even assuming a <u>market slowdown</u> in rental asking price inflation and in house price inflation but adding a modest increase in mortgage rates, signals a continued high rent inflation, as measured in the CPI

USA Rents & housing market indicators



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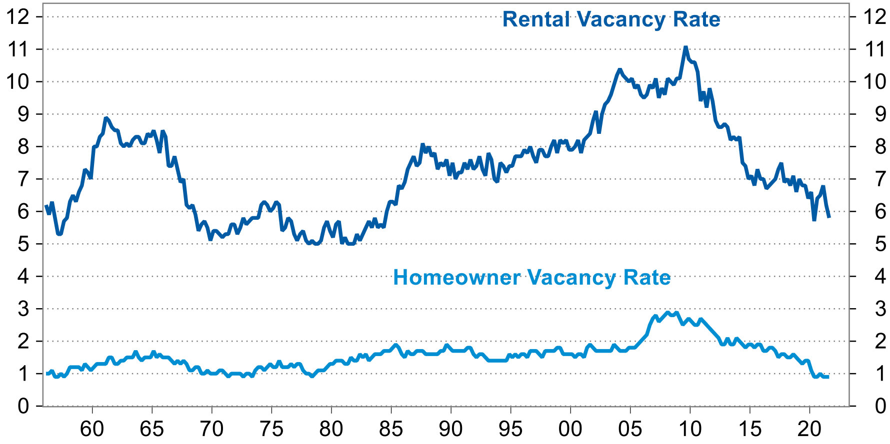
USA Housing vacancy rates



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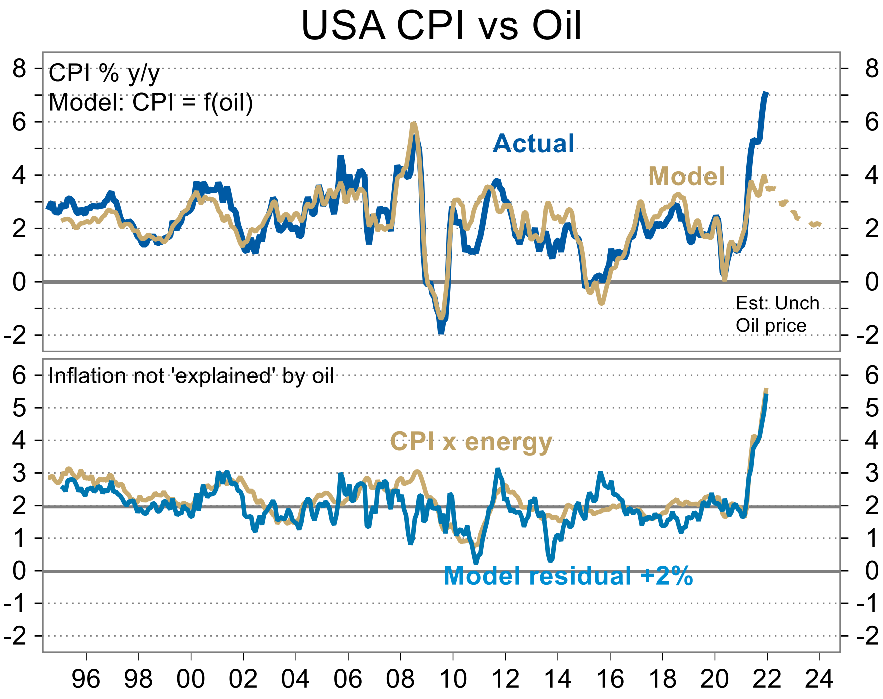
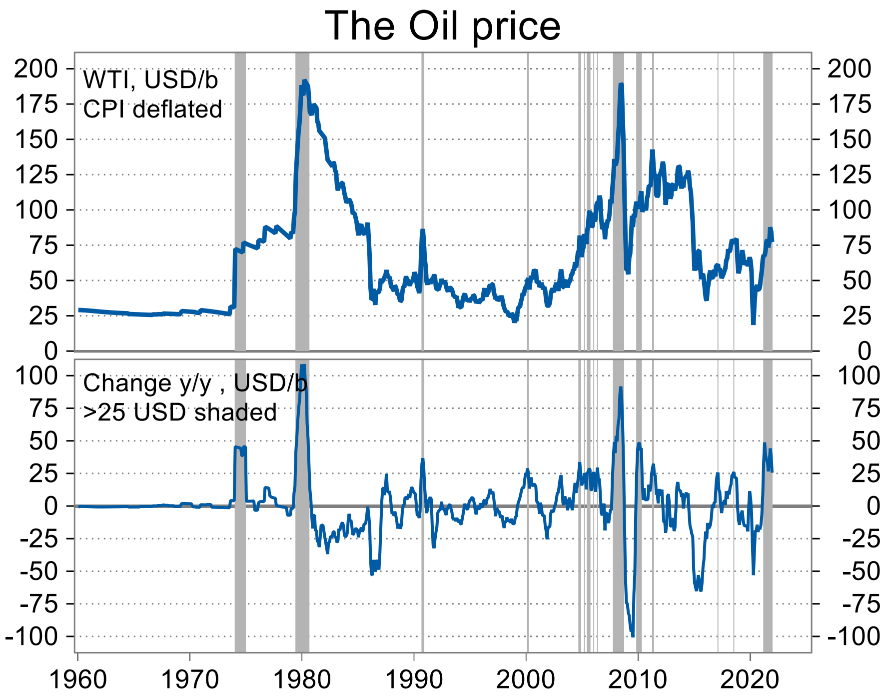
The oil price moves the CPI as usual – but now there is a lot of other prices too

CPI is up 3 pp more than explained by the oil price, unprecedented. Still, inflation close to peak?



USA CPI vs Oil

SB1 Markets/Macrobond



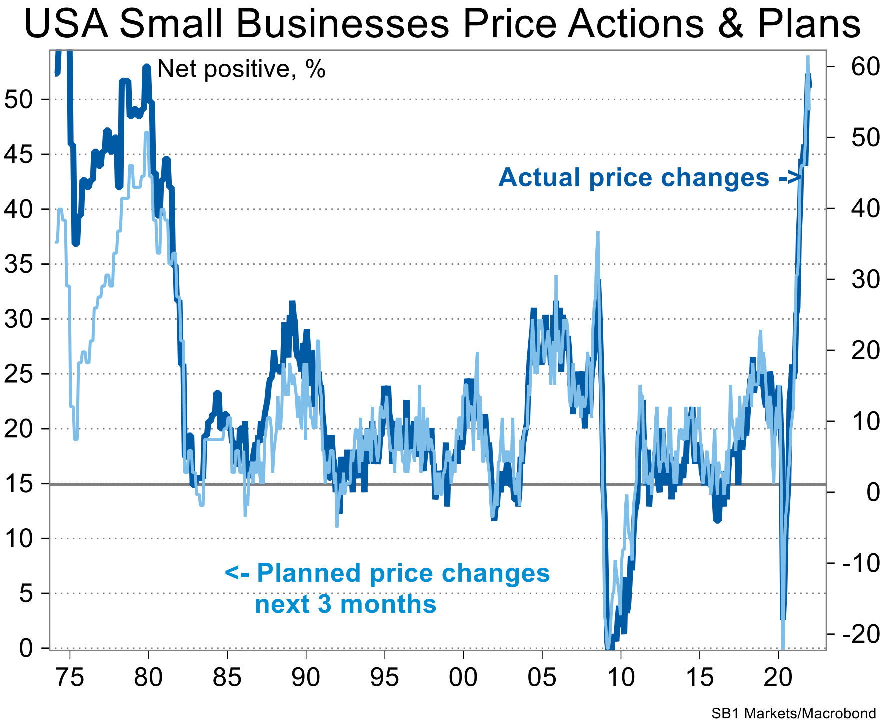
The Oil price

SB1 Markets/Macrobond

- **Oil price cycles** have explained some 80% of the changes in CPI growth the past 30 years
  - » In our model we incorporate all direct impacts from changes in the oil price – as well as the impact from other factors that influenced inflation which correlates to the oil price
  - » If the oil price stabilises at the current level, the impact on the CPI will gradually fade the coming quarters
- From time to time, there are **substantial residuals**, but not like we are witnessing now: Headline inflation is 3% above the model forecast, and the CPI x energy index (which is close to the core CPI) has climbed by 3 pp too. Why?
  - » Auto prices (new and used) and airline ticket prices have lifted the CPI by 1.6 pp. Thus, there are many other goods & services that contributes!

More SMEs plan to hike prices than ever before in Dec (except for Nov)

… with data from 1974. And actual inflation is far from uncorrelated to these price plans



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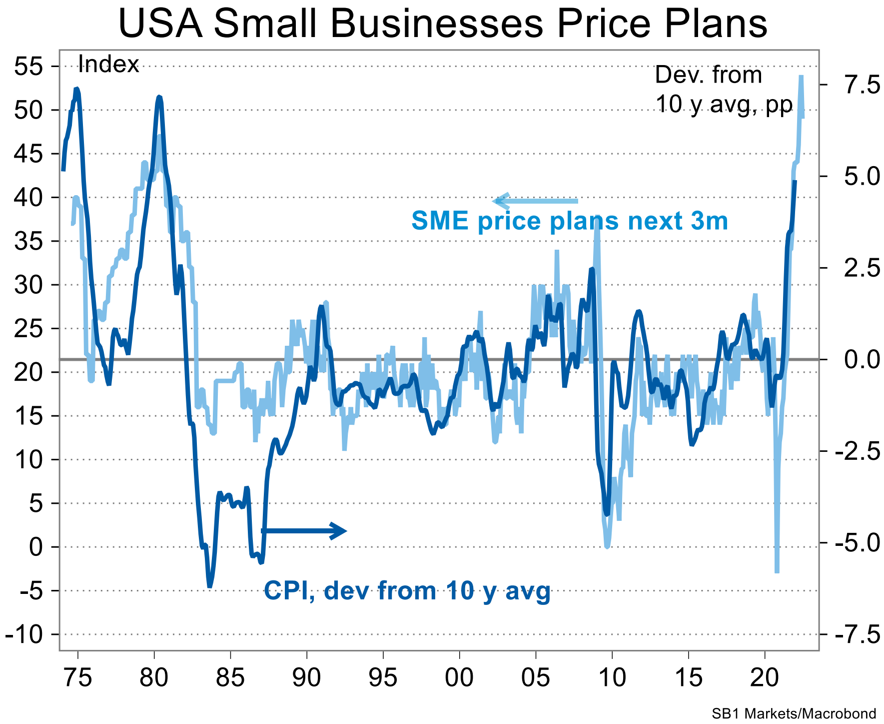

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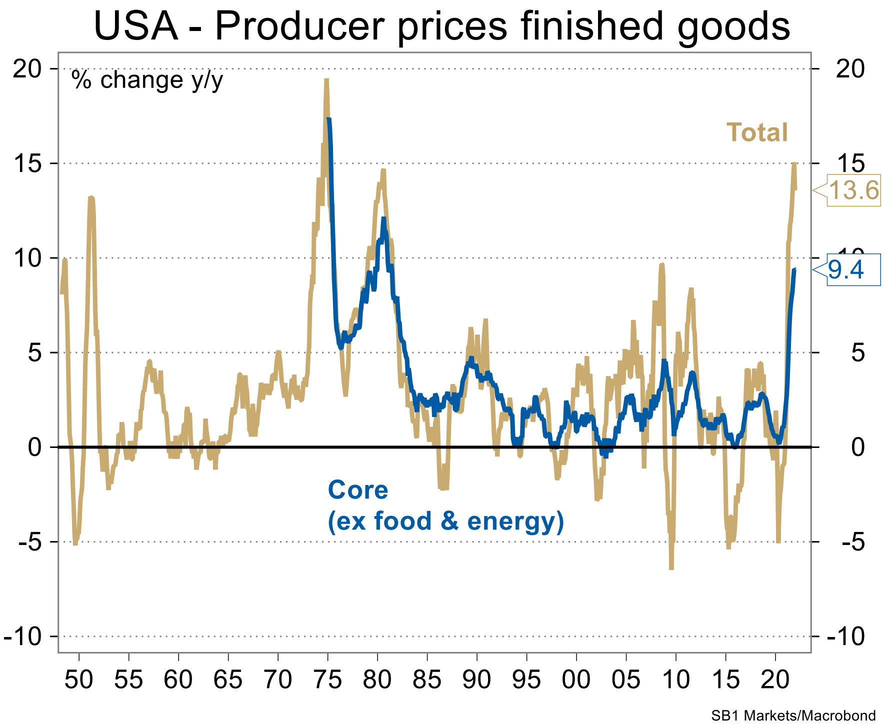
- More companies report they **have increased** their selling prices recent months than since 1980
- Even more spectacular, more companies than ever are **planning to hike** their prices the coming 3 months – even more than in 1979, the previous ATH
- Actual inflation is far from uncorrelated with these reports from the companies, at least they a correlated to the momentum in inflation, like measured at the chart to the right (deviation from 10 y average CPI inflation)
- **Other business surveys** confirm that something special is happening, more companies than in decades are reporting higher input costs or output prices

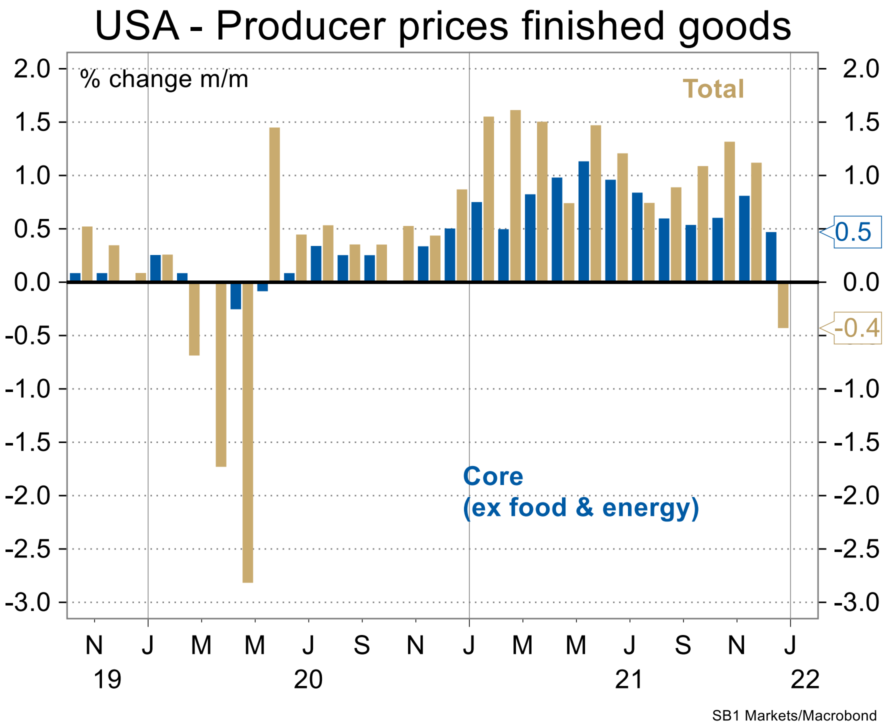
The PPI has peaked? Finished goods prices down 0.4% m/m

And more important, crude materials (ex energy) are on the way down



USA - Producer prices finished goods

SB1 Markets/Macrobond



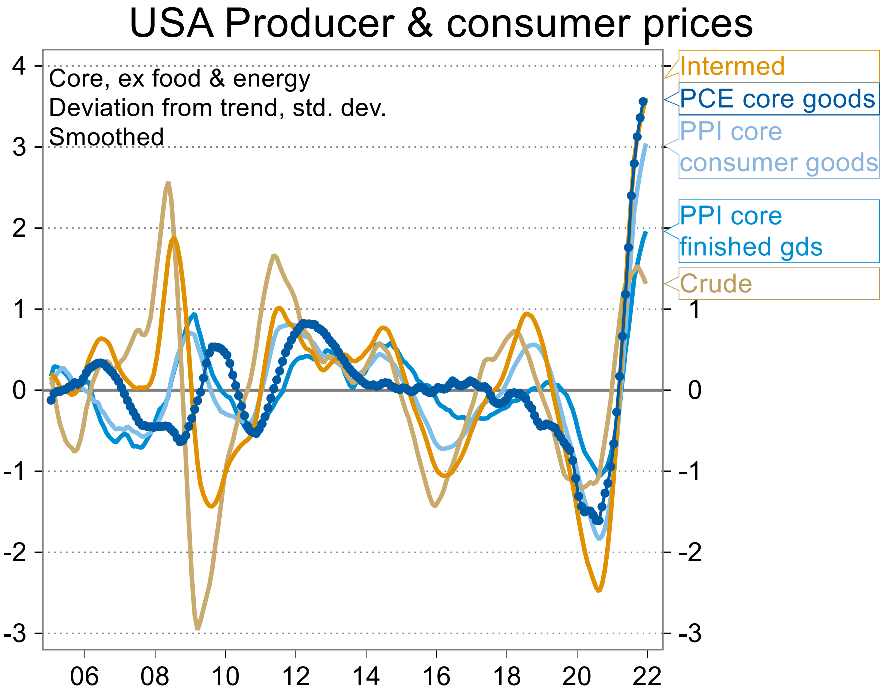
USA - Producer prices finished goods

SB1 Markets/Macrobond

- **The headline finished goods PPI** declined 0.4% m/m in Dec, as energy prices contributed finally contributed at the downside (-4%). The annual rate fell 13.6% from the highest print since Jan 1975
- **Core finished goods x food & energy** PPI rose by 0.5%. The annual growth rate was unch at 9.4%, highest level since 1982
- **Crude material prices** are retreating. In addition, **core CPI goods prices** have already climbed more than usual vs. PPI prices (due to 2nd hand auto prices), limiting the upside risk
- **The 'official' total final demand PPI**, including **services**, rose by 0.2%, 0.2 pp less than expected. The index is up 9.8% y/y, signalling a CPI growth close to 7%. Just where we are now!

Crude materials have peaked. But the pressure from supply chains is still strong

… However, core consumer prices have been rising earlier and more than normal vs. PPI prices



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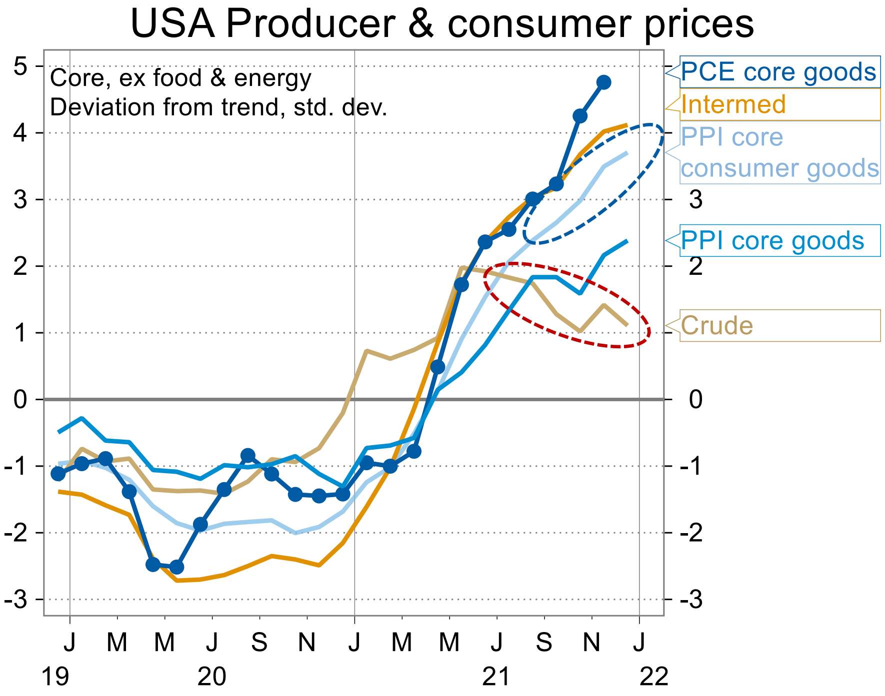

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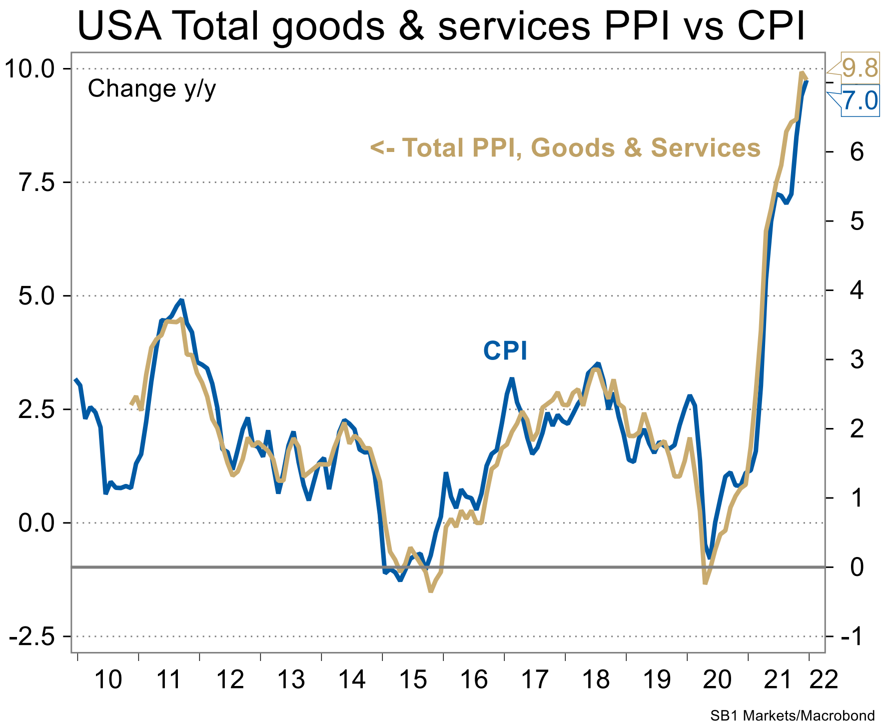
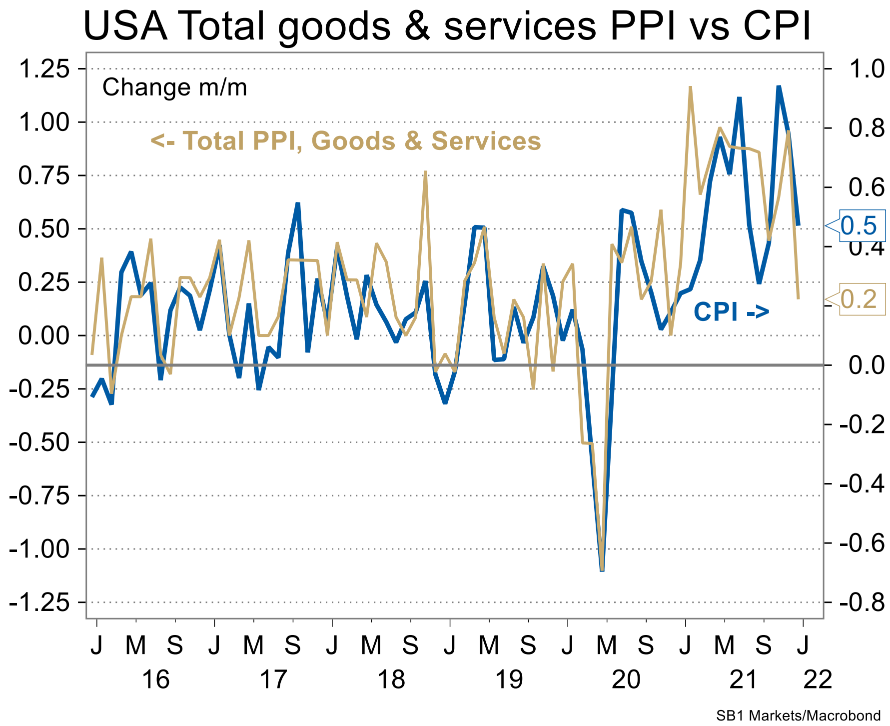
- **Crude goods prices** are leading intermediate goods prices by 4 months, and consumer prices by 12 months – and crude prices have clearly peaked (see the red ellipse on the chart to the right). However, **intermediate prices** have not yet yielded by much – and they will push finished goods prices up the coming months
- Some more comfort: **Prices at the consumer level** (blue ellipse on the chart to the right) have responded earlier and more than normally vs the PPI core consumer goods index. That is very likely due to the unprecedented (and very likely not permanent) hike in 2nd hand cars which are not a part of the PPI index. Thus the upside risk for the core goods component of the PCE may be limited the coming months

Bottom line: Total PPI (services included) confirms 7% CPI growth

The ‘new’ total PPI rose 0.6% m/m in Oct, 9.7% y/y


USA Total goods & services PPI vs CPI

SB1 Markets/Macrobond

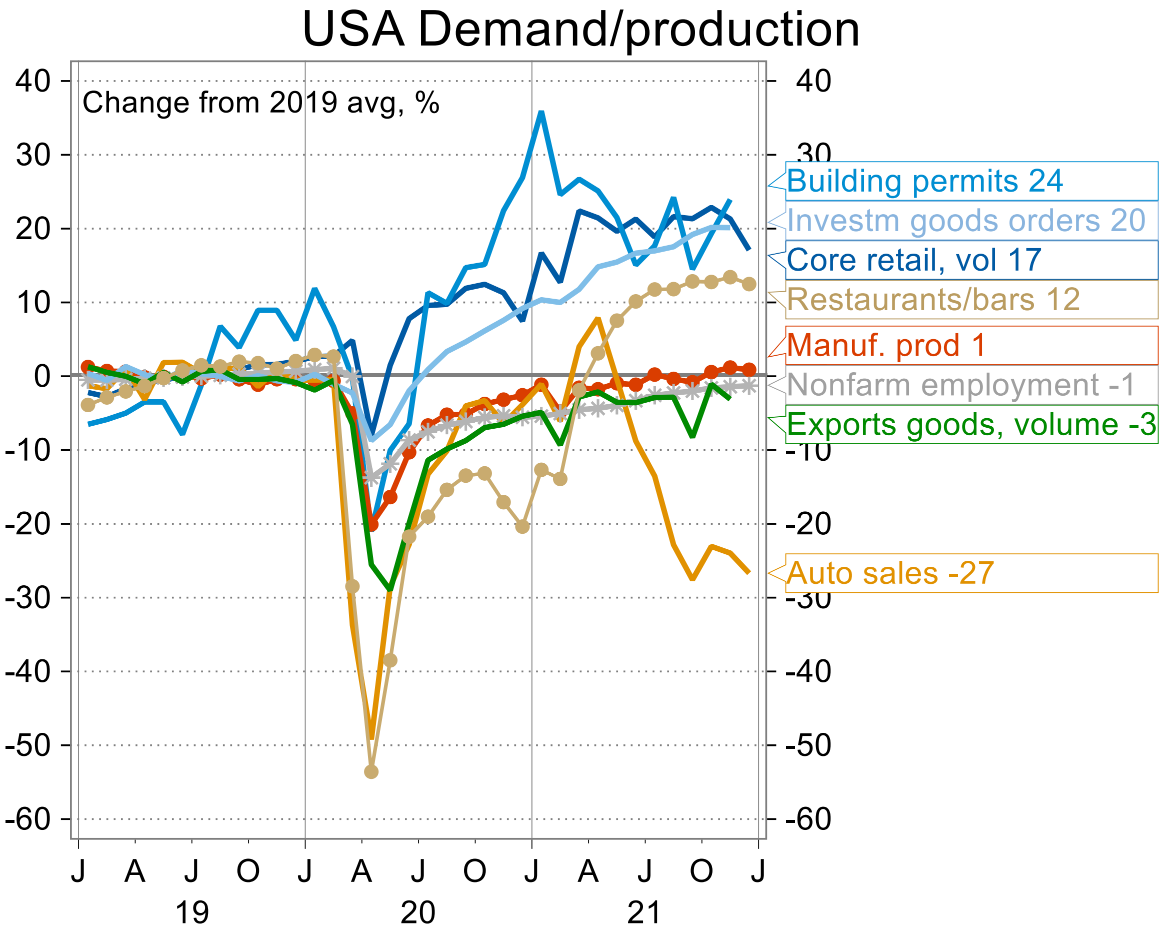

USA Total goods & services PPI vs CPI

SB1 Markets/Macrobond

- The correlation between the ‘new’ total PPI, which includes all sort of services in addition to goods vs the CPI is pretty close. The current close to 10% annual growth rate in the PPI signals some 7% y/y growth rate in the CPI index. Which seems to be a precise estimate ☺

Big picture: Growth is slowing as the economy as 'normalised'

The upside now: Auto production & exports

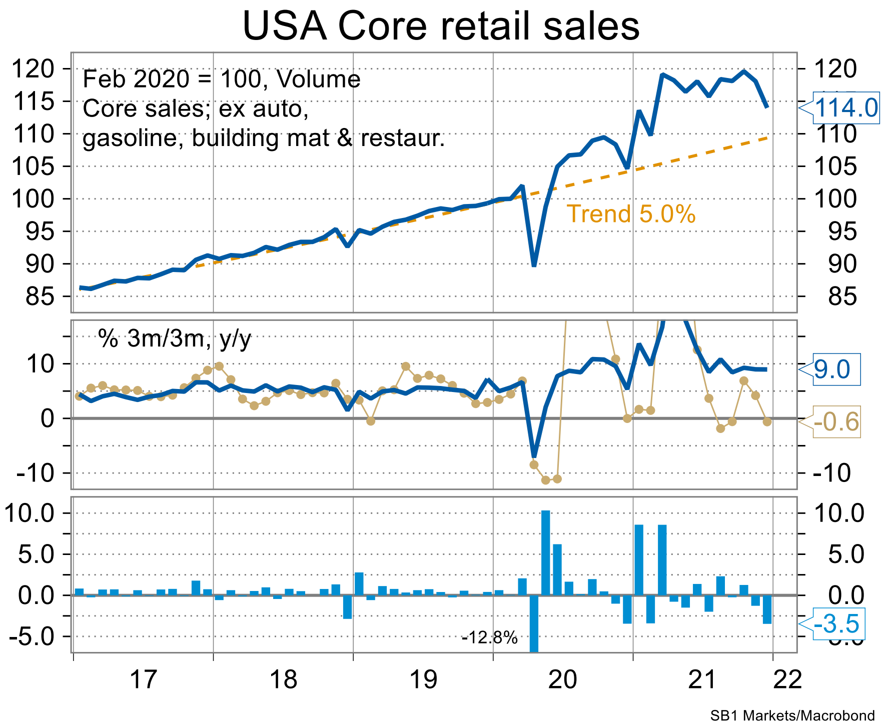


SB1 Markets/Macrobond

- Retail sales have peaked, but is still at a high level (and Dec was likely artificially weak)
- Restaurants have recovered, at least nominally (prices are sharply up)
- Home building has flattened, mostly due to supply constraints, demand is still strong
- Manufacturing production is 'too weak' but supply constraints, exports have kept production in check
  - » Auto sales and production are way below normal levels

Retail sales plunged in December – but is still probably 'too high'

Core volumes lower than we assumed in November, and down 3.5% in Dec. But probably not for 'real'



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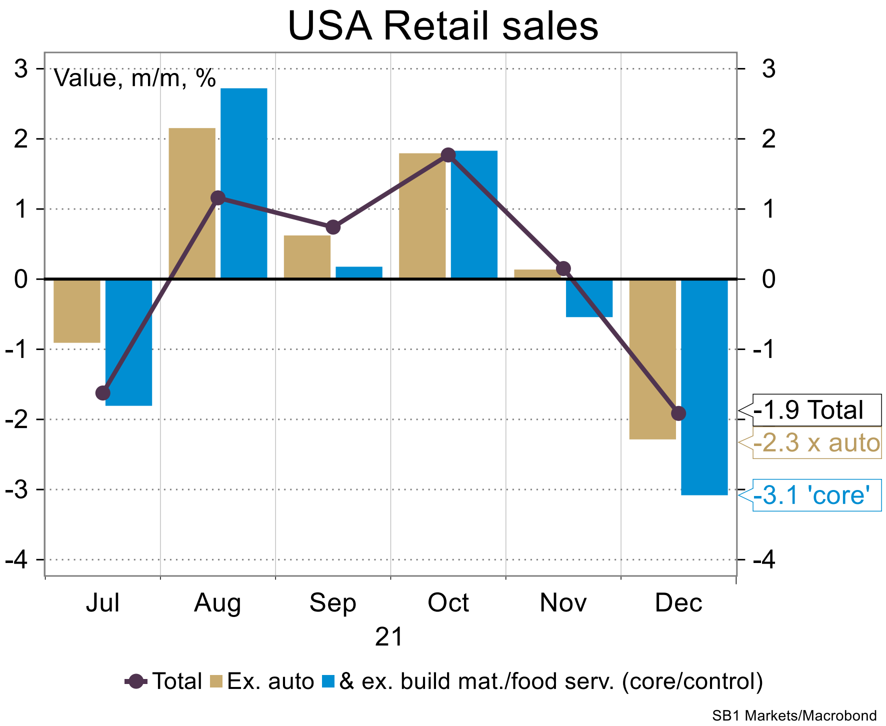

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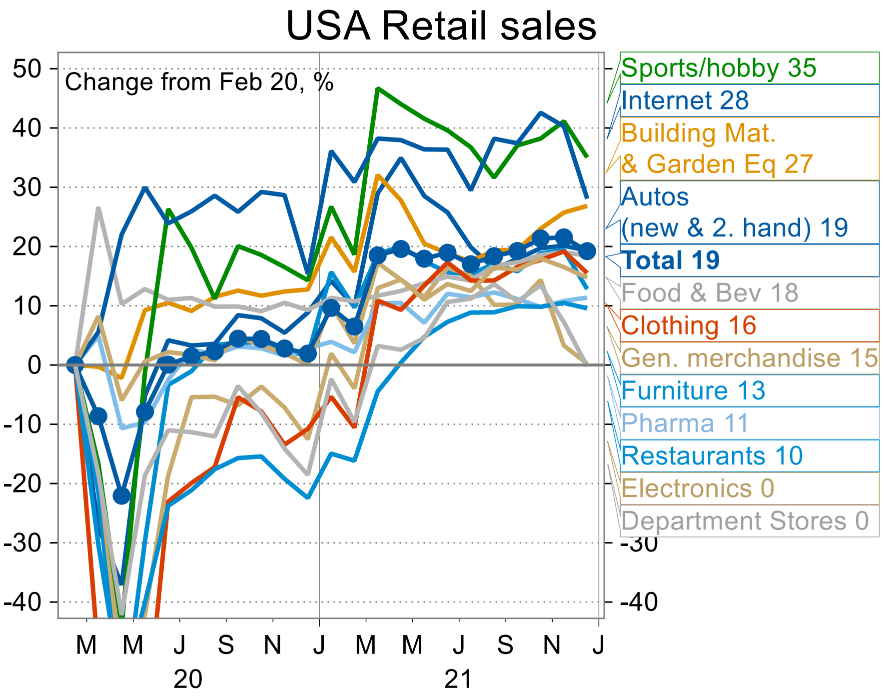
- **Total nominal sales** fell by 1.9% in Dec, expected down just 0.1%, an unusual miss. Ex. Auto was down 2.3% (exp. +0.2%!). Total sales are up 19% vs. the Feb 2020 level. 10 kind or stores down, just 3 (marginally) up. The main culprit was internet sales, down 8.7%, explaining 60% of the decline in total sales! However, net sales have fallen sharply 3 of the past 4 years, signalling a possible new seasonal sales pattern. Anyway, the virus not mainly to blame for the decline in sales, net sales sharply down, restaurants far less
- **Core sales of goods** (=control group, excludes autos, gasoline, building materials & restaurants) fell by 3.1% in Dec, expected up 0.2%. Nov was revised down 0.4 pp to -0.5%. In volume terms, we assume sales fell 3.5%. Still, sale volumes are 14% above the Feb-20 level, and almost 5% above the pre-pandemic 5% trend growth path
- **Consumption of goods** is very likely above a sustainable level, and we still expect sales to decline the coming months/quarters – even if parts of the adjustment already has taken place

Internet sales, clothing, restaurants, furniture, sports/hobby, and more down

A small uptick just in health, pharmacies and building materials.



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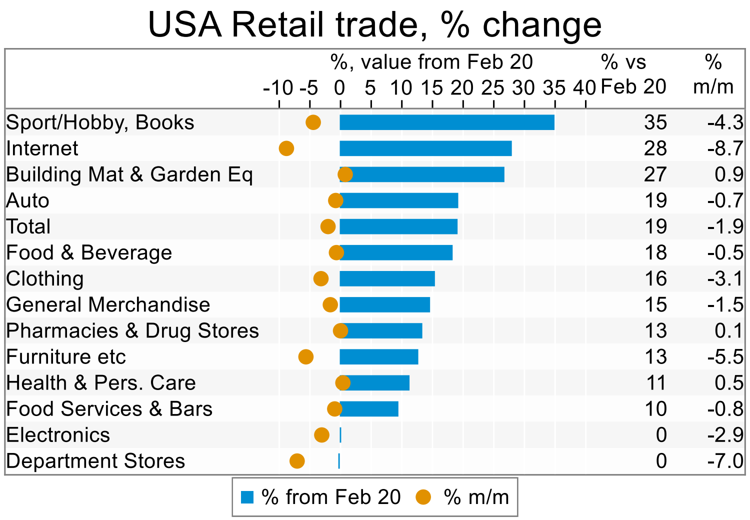

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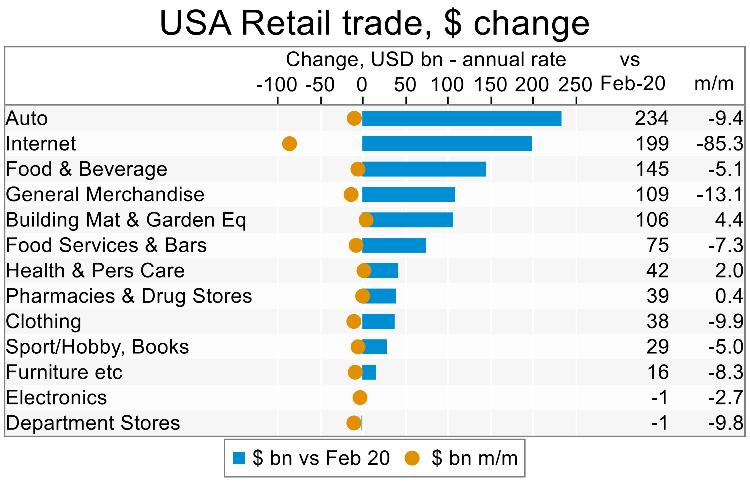

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Last month

- 10 out of 13 main sectors reported lower sales in Dec, just 3 more
- Department store sales fell 7%
- On the 8.7% drop in internet sales, check next page

Since pre corona: None are down, but electronics & department stores are flat. Others are up by up to 35% (sports) from 10% (restaurants)

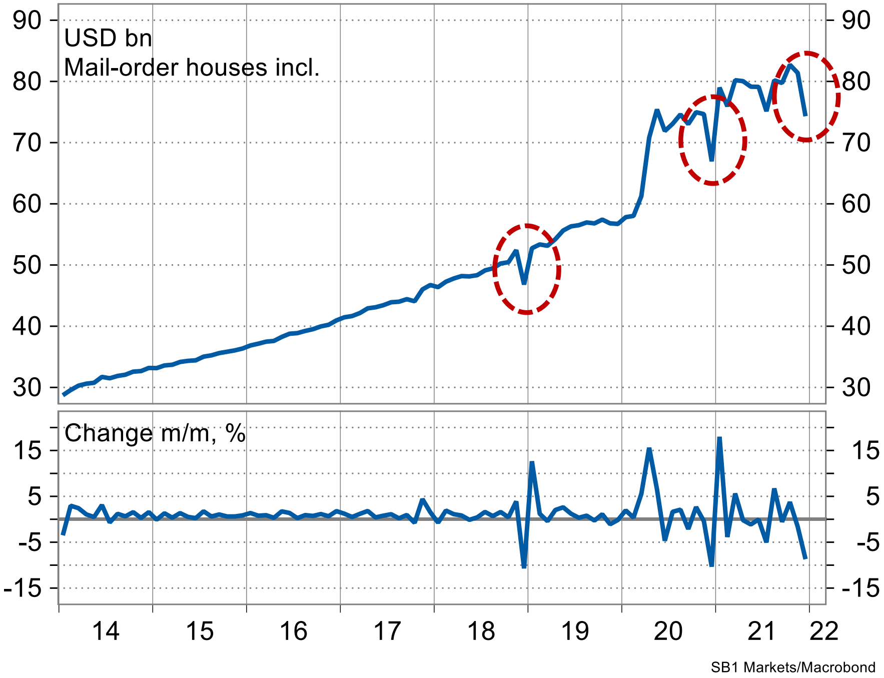
- **Net** sales are up 29%, even after deep setback in December

What a crisis, more demand desperately needed! Or go ask Fed's Powell, he got a brand new answer for you☺

A new seasonal pattern underway? Net sales sharply down 3 of past 4 years

Somewhat suspicious, most likely internet sales will return to a normal level again in January

USA Retail sales, internet



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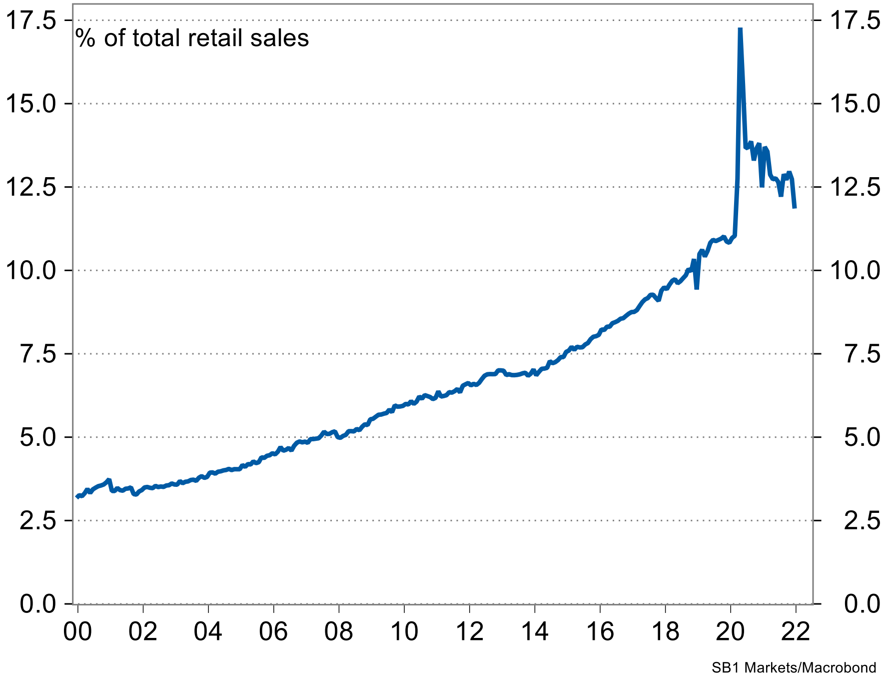
USA Internet sales, market share



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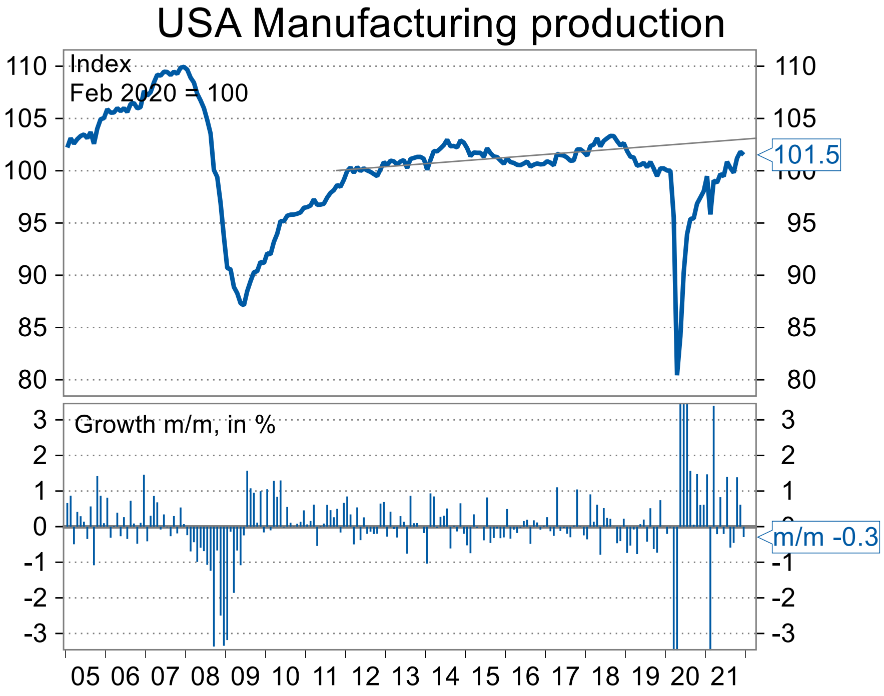
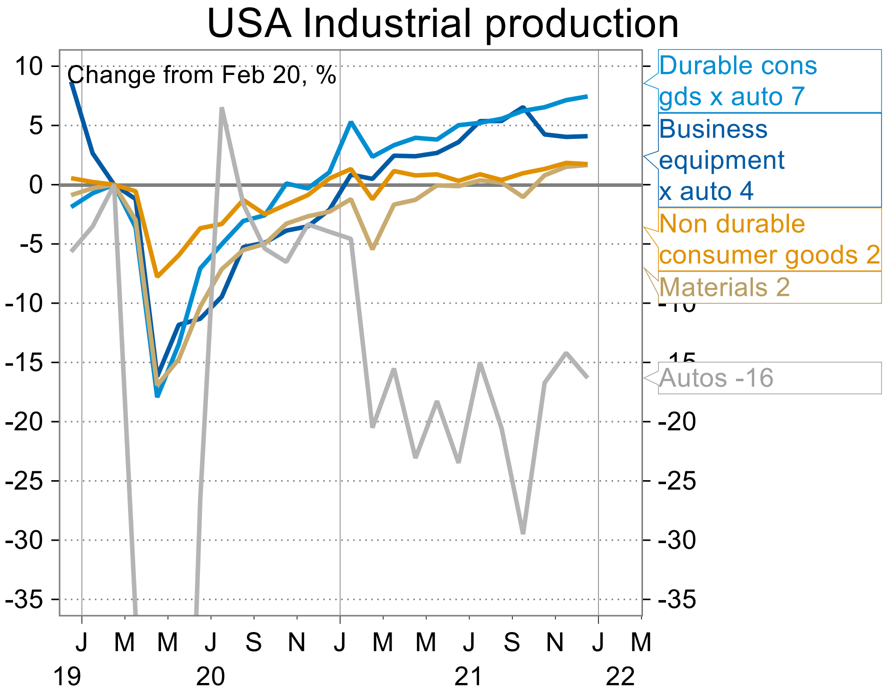
- Anyway, the internet sales market share (vs. total retail sales) has returned to the pre-pandemic trend growth – or in fact, it is slightly below

Manufacturing prod. down 0.3%, 0.8 pp below expectations, up 1.5% vs pre-pand

Auto production fell 2.5% but has at least stabilised – 16% down vs. Feb-20


USA Manufacturing production

SB1 Markets/Macrobond

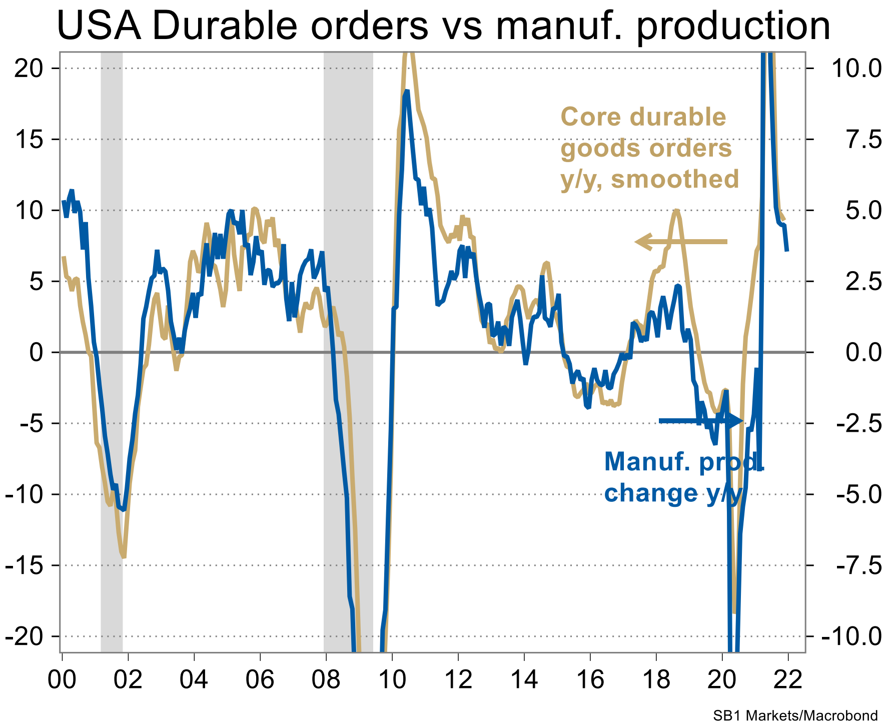

USA Industrial production

SB1 Markets/Macrobond

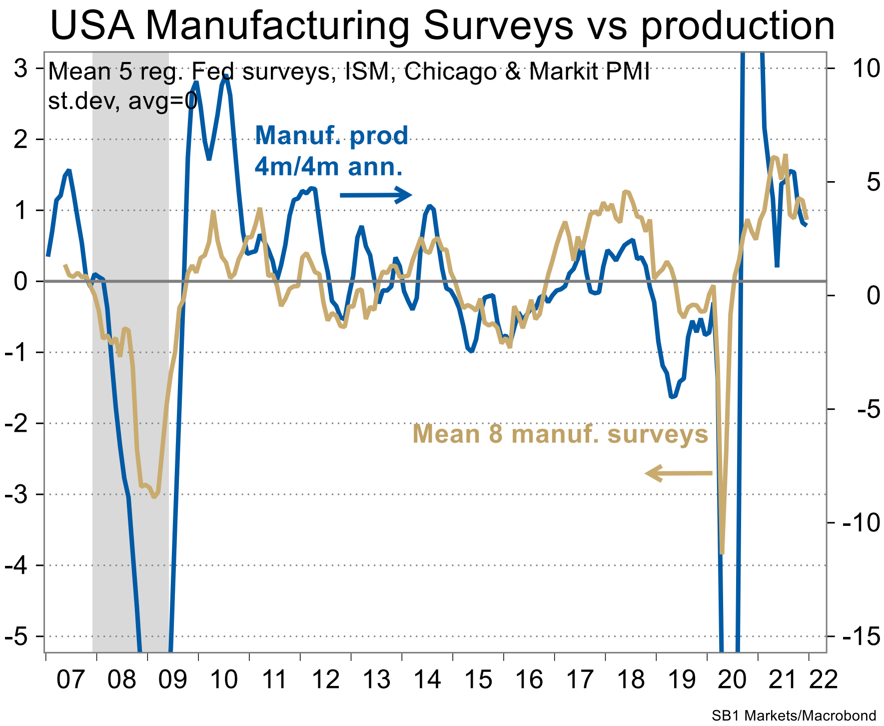
- **Manufacturing production** is still trending upwards – but is still just 1.5% above the level before the pandemic. Surveys signal continued growth
  - » The steep decline in auto production has been a drag on overall production in 2021
- **Total industrial production**, including utilities, mines/oil production rose 1.6% m/m expected up 0.9% as oil production recovered from the hurricane hit in September
- **PMI/ISM and all other surveys** signal a continued strong recovery
- **Capacity utilization** rose in October, and is above average. The ISM survey reports a record high utilization, check next page

Order inflow, surveys signal further growth in manufacturing production

… even if the momentum has calmed down somewhat recent months


USA Durable orders vs manuf. production

SB1 Markets/Macrobond

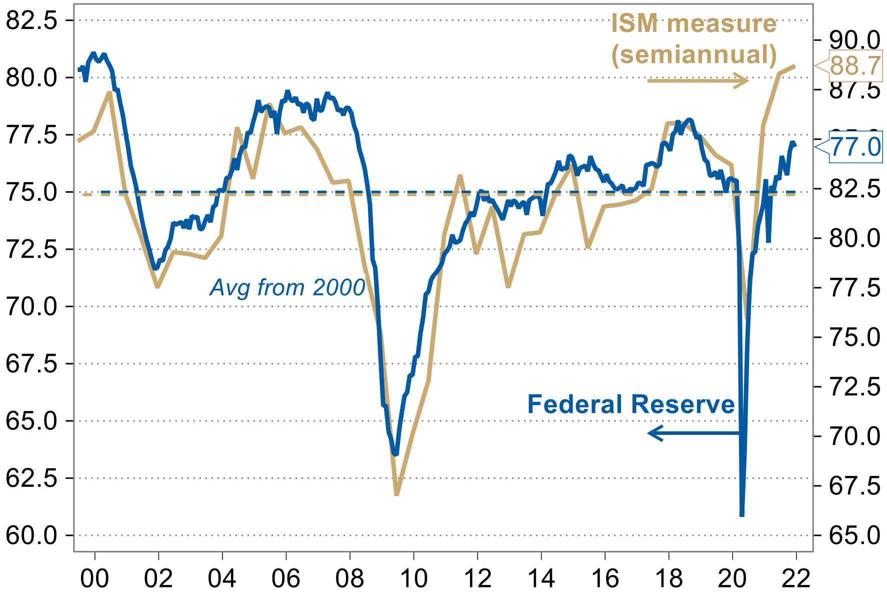

USA Manufacturing Surveys vs production

SB1 Markets/Macrobond

Is capacity utilisation just somewhat above a normal level, or record high?

Not an irrelevant question

USA Capacity utilisation
Manufacturing - two measures



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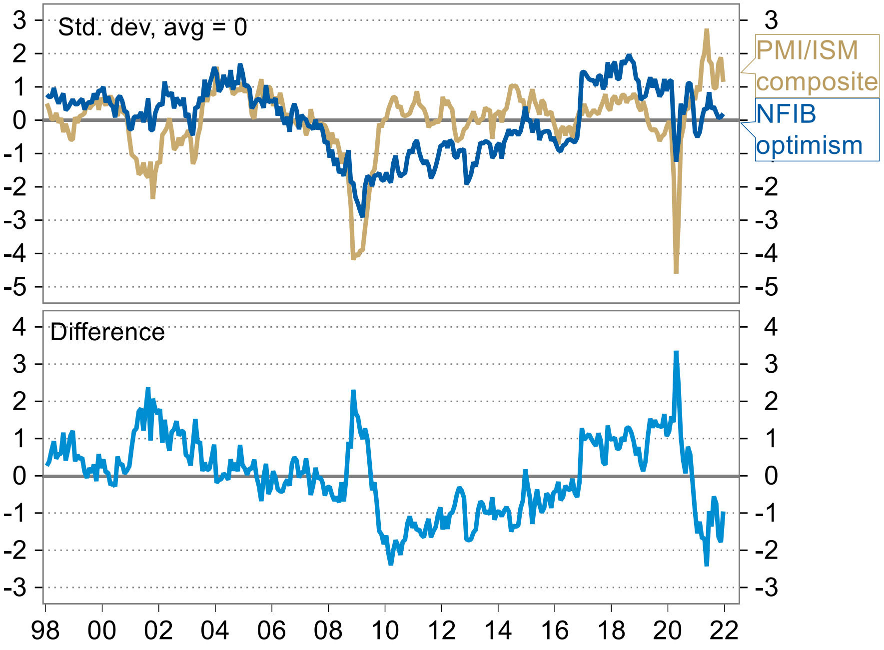
- **The Federal Reserve's** measure now yields a capacity utilisation at 77%, vs. the long term average at 75%
  - » 77 – 80 are booming times
- **ISM's semi-annual** survey reported a further increase H2/Dec, to another ATH at 88.9% vs the average at 82.5%
  - » These two measures have not been 100% correlated but the current discrepancy is large – and quite important when assessing the growth outlook
- The Fed's estimate is model based, while the ISM survey is based on companies assessment of their own capacity utilisation
- Given reports on labour shortages, material shortages, prices, the ISM survey seems to give the most reasonable result

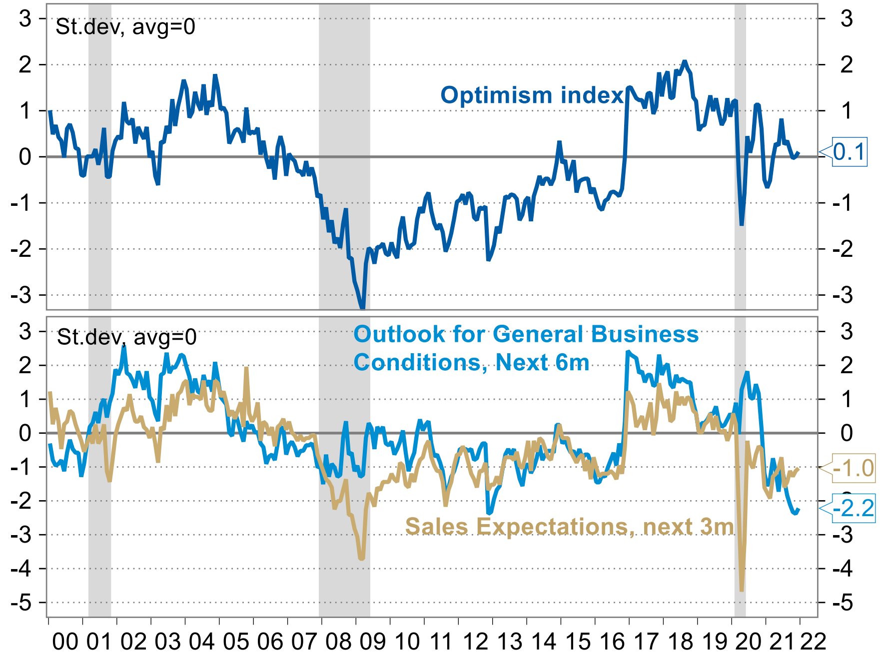
Small businesses optimism slightly up in December but outlook is extremely bad

Small businesses cannot find workers and are raising compensation, <u>selling prices, like never before</u>



USA NFIB Small businesses vs. PMI/ISM

SB1 Markets/Macrobond



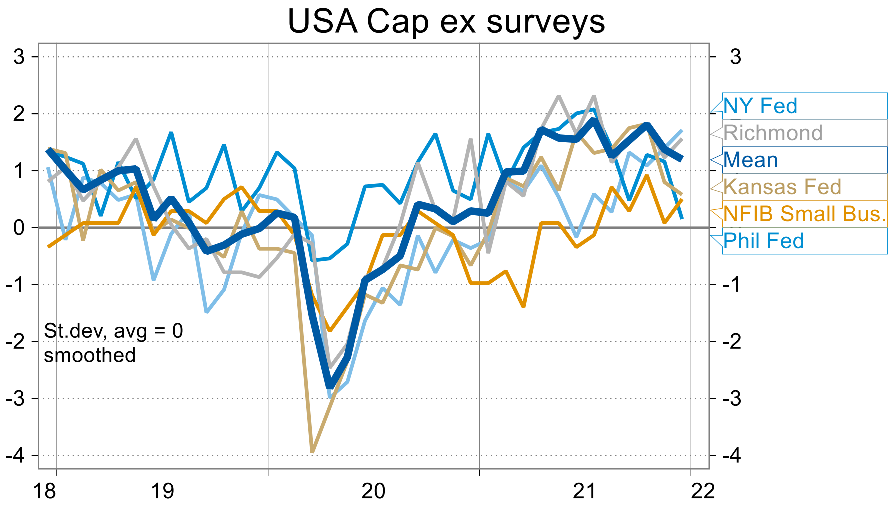
USA NFIB small business survey

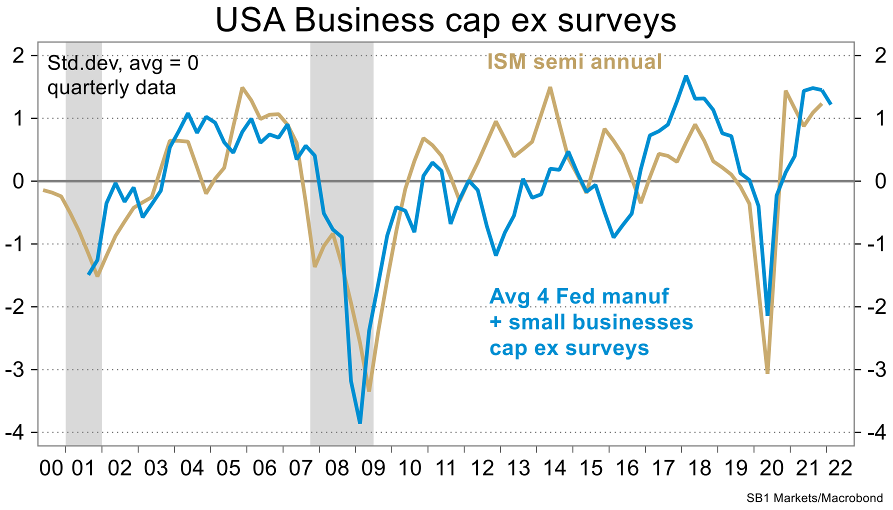
SB1 Markets/Macrobond

- The **NFIB optimism index** rose marginally to 98.5 in December, slightly more than expected. The index is close to average, and well below the PMI/ISMs, and most other surveys
- **The outlook for the next 6 months** rose tad but it remains incredible weak, at <u>2.2 st.dev below</u> par, close to all-time low, and well below the dark days of the Financial crisis. Lack of qualified labour, labour costs, inflation worries. 'Nobody' is complaining about current sales, though, **Investment plans** were revised down but is still above an average level!
- Old news (published 2 weeks ago): **Hiring plans** are still very high in Nov, just somewhat down from the ATH level in Aug. However, the SMEs are still not able to **fill their vacancies.** More companies report planned **compensation increases** than ever before
- The share of companies planning to lift prices rose further, to ATH (data from 1974). And they have usually done what they say they plan to do

Investment surveys also signal solid growth in business investments

Taken together, very aggressive investment plans – signaling 8 - 10% actual growth!





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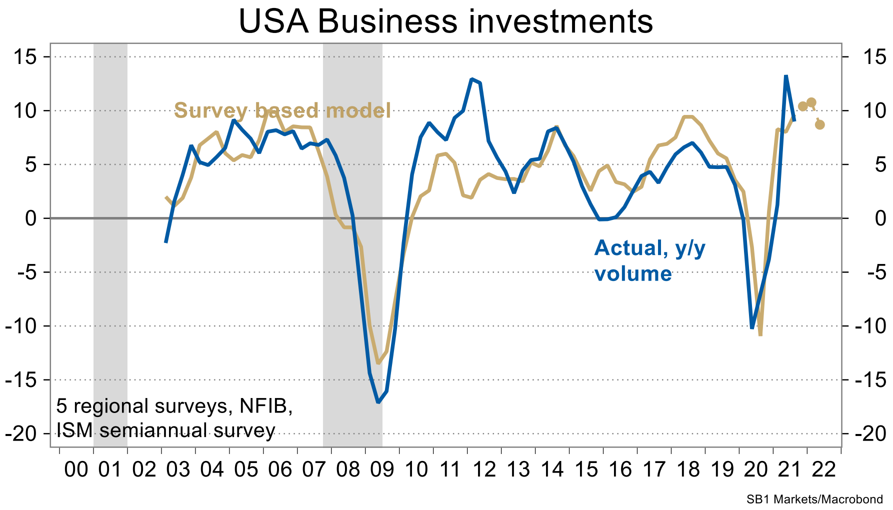
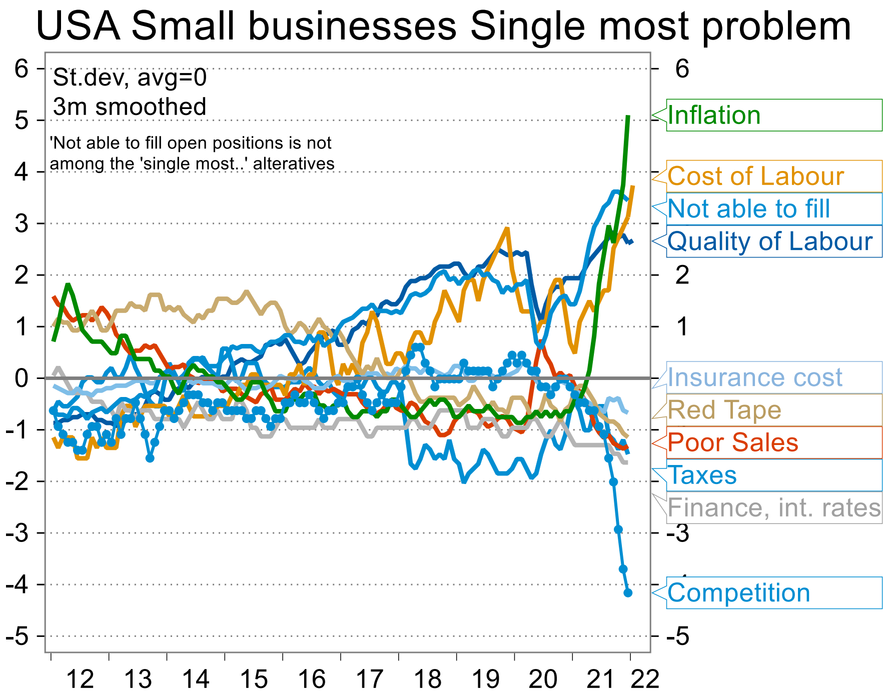


SB1 Markets/Macrobond

Record few companies complain about poor sales & competition from large companies

Record many complain about cost/quality of labour. And inflation, even if they are 'selling it'



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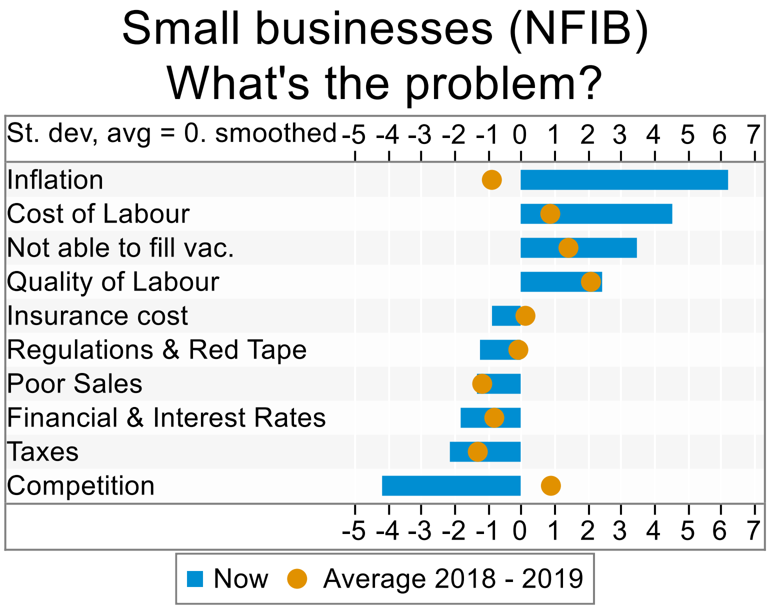
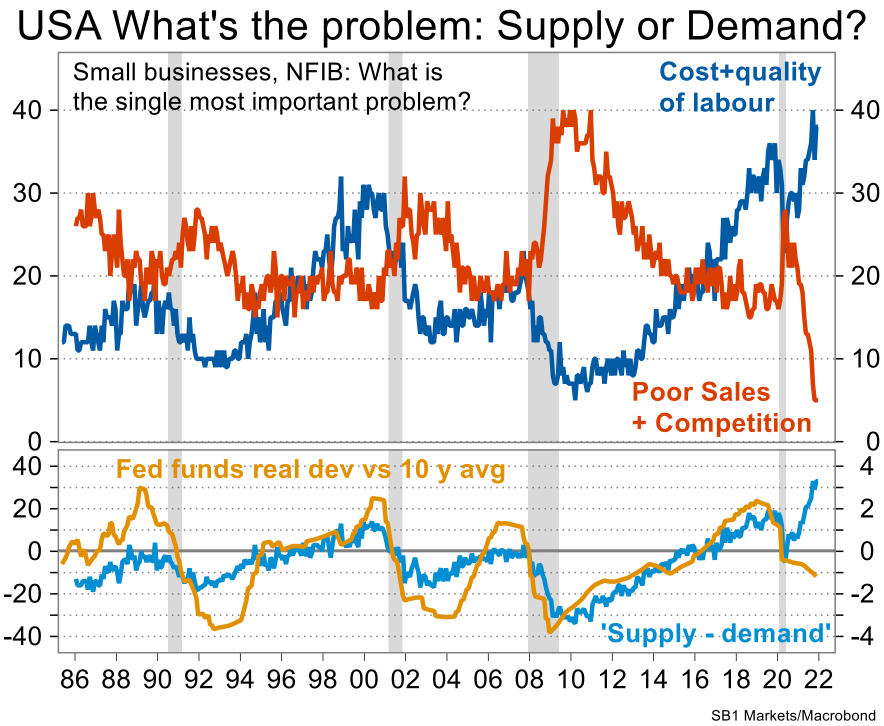


SB1 Markets/Macrobond

- Thus, companies report they are constrained from the **supply side**, not from the **demand side**
- In addition, inflation ia now quoted as the most important problem for the SMBs. However, the SMBs themselves are making the problem even larger – more companies than ever before plan to increase their selling prices
- These data are really incredible, at least vs the monetary policy stance that has ruled until now. *Check next page*

In the charts above, we have included the 'Not able to fill open positions' data from the survey, but this is (rather strangely) not an alternative in the single-most-problem question in the survey. We still show it at the chart

It's the supply side! A tad fewer companies plan to lift prices, but still an extreme print



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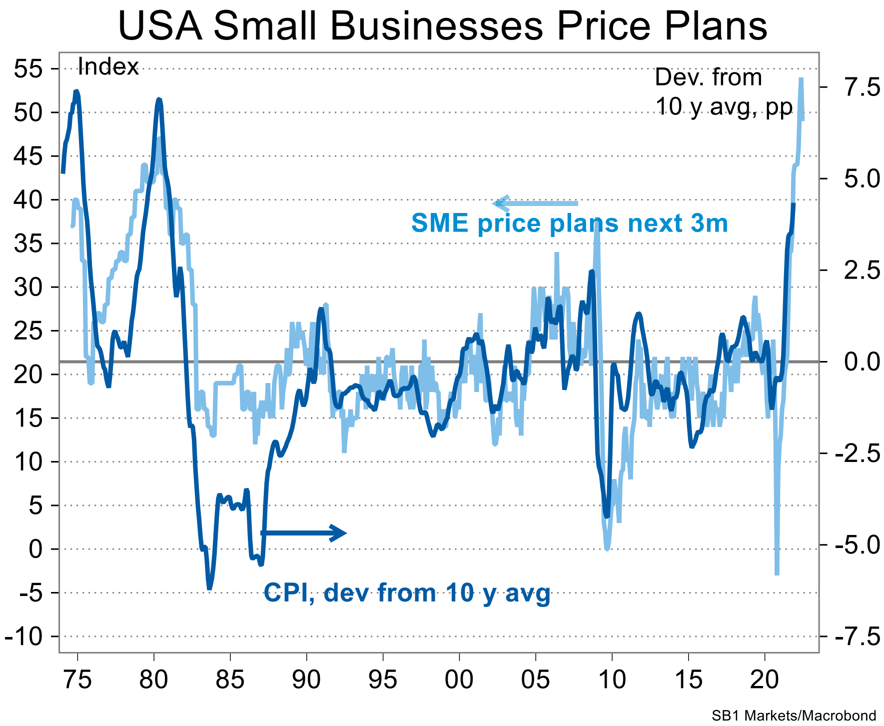

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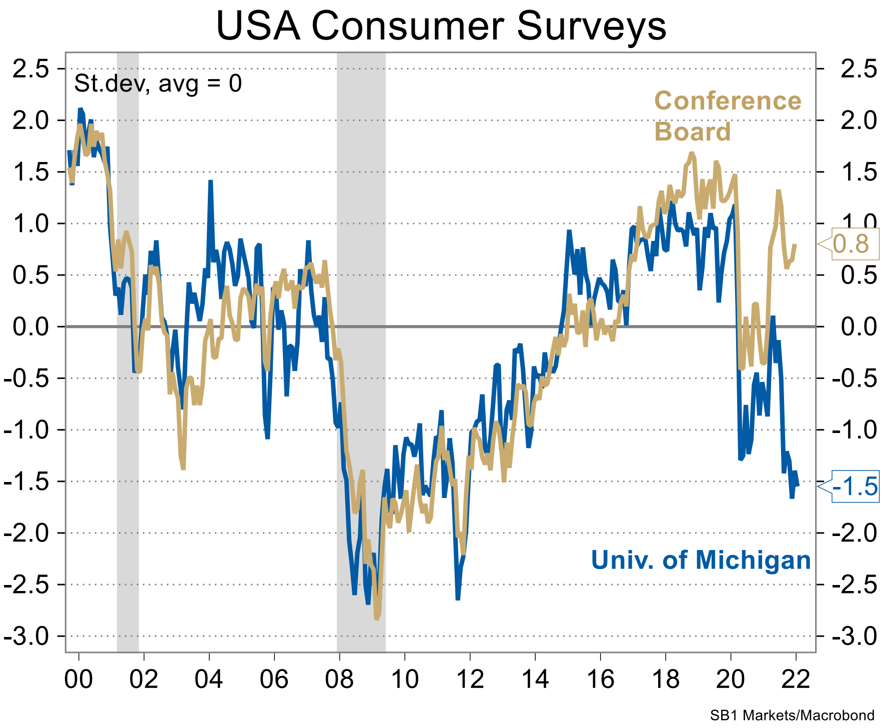
- The share of SMEs than plan to hike their **selling prices** fell 4 pp, but the shar, at 59% is an extreme print, just November higher, data from 1974
- In addition: 2 weeks ago a record share of companies reported they planned to **lift compensation** to workers
- This survey has been mentioned by Powell, as one of several data points that finally made him change his mind
- The real challenge is though that the gap between the normal policy response to demand/supply changes, and the current stance is monumental. With today's demand/supply imbalance (which has shot up into uncharted territory), Federal Reserve would normally have tightened substantially long time ago. Will it be possibly to get the labour and goods market in balance down without engineering a recession, by hiking rates much more than the FOMC so far signals?
  - » We have not seen that happen before. Perhaps Powell (the lawyer) knows something we others do not?
  - » BTW, the market believes it is possible too!

Univ. of Mich. consumer sentiment down again in Jan, close to 10 y low

Inflation is a major concern, for good reasons. Still, sentiment is far below any fair ‘model estimate’



SB1 Markets/Macrobond

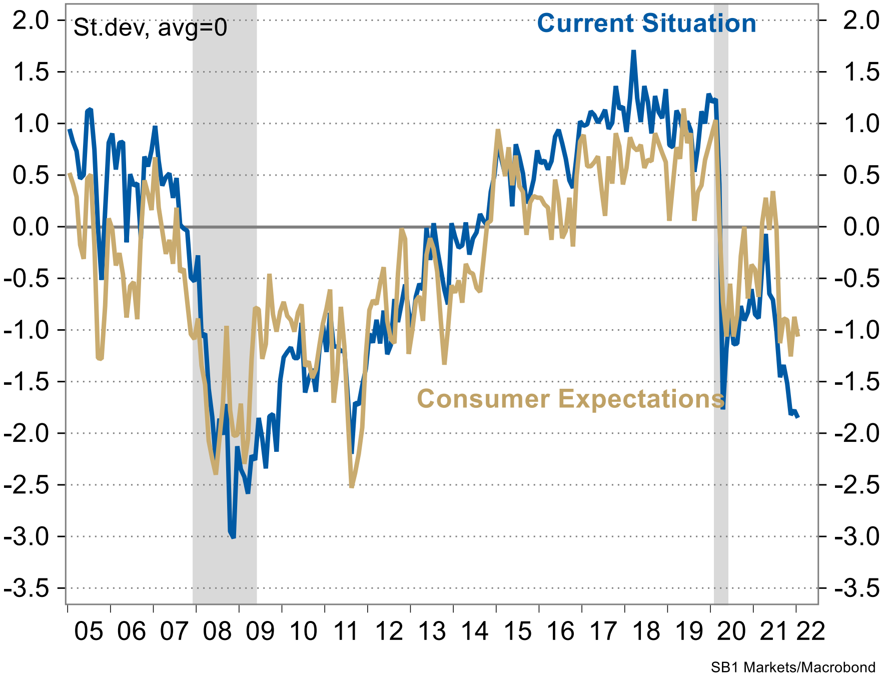
- **University of Michigan’s consumer sentiment index decreased 1.8 p to 68.8 in early January,** expected down to 70. The index is still 1.5 st. dev below average, slightly up from the 10 y low in Oct at -1.7 st.dev
  - » **Both expectations** and assessment of the **current situation** fell in Jan, expectations the most. Expectations are ‘just’ 1.1 st.dev below average, while the current situation is at -1.8, well below during the first Covid wave, where unemployment was record high during the first harsh lockdowns!
- **Other surveys** are in sum down too. Just the Conference Board’s consumer confidence survey remains above average
- We do not have the data but UM reports that inflation is a larger concern than unemployment - which is not strange given high inflation and close to record low unemployment
- Besides inflation, there are not many indicators that the economy is in a bad shape, and definitely not in a worse shape than say some months ago or during the 2nd Covid wave in Dec/Jan
  - » Employment, unemployment, consumption, housing, the stock market have all moved in the right direction – *check our model estimate 3 pages fwd*

  In addition
  - » Inflation and inflation expectations are both still climbing but can not explain the huge drop in sentiment (based on the normal correlations/impacts)
  - » … and the sentiment did not recover as the fight against the Delta was successful in Oct/Nov (the no. of hospitalised persons fell more than 60% from early September)
- Now, Covid angst may have resurfaced as the Omicron wave have hospitalised more infected due to (or just with) Covid than the previous waves
- The risk: The UM survey often has been an early bird in the cycle, and the survey may be ‘right’

Univ of M: The current situation is really bad. Really? Expectations weak too

Inflation expectations are still inching upwards, now on the 5 y horizon

USA UoM Consumer Sentiment



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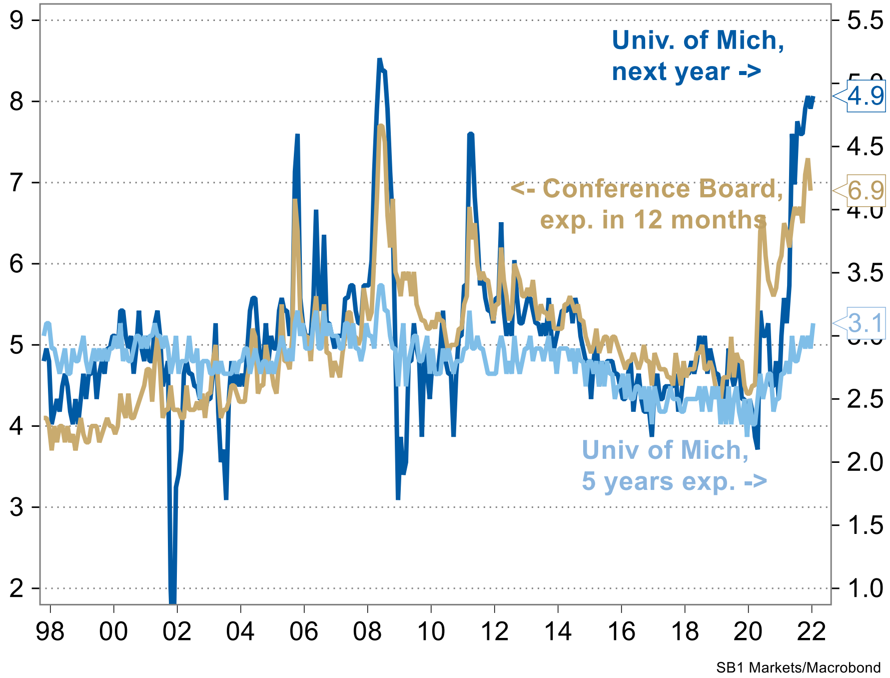
USA Inflation expectations

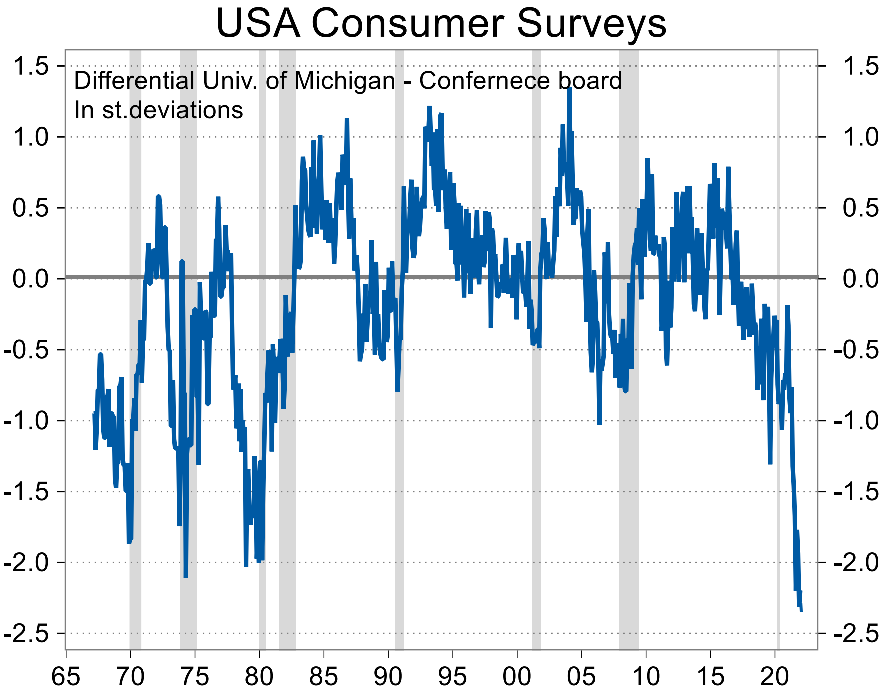


SB1 Markets/Macrobond

- The 12 m inflation f'cast rose one tenth to 4.9%, the highest level since 2008. The 5 y inflation expectation also added 0.1 pp to 3.1%, well above the average over the past 10 years – but not higher than several times during the 2005 – 2012 period

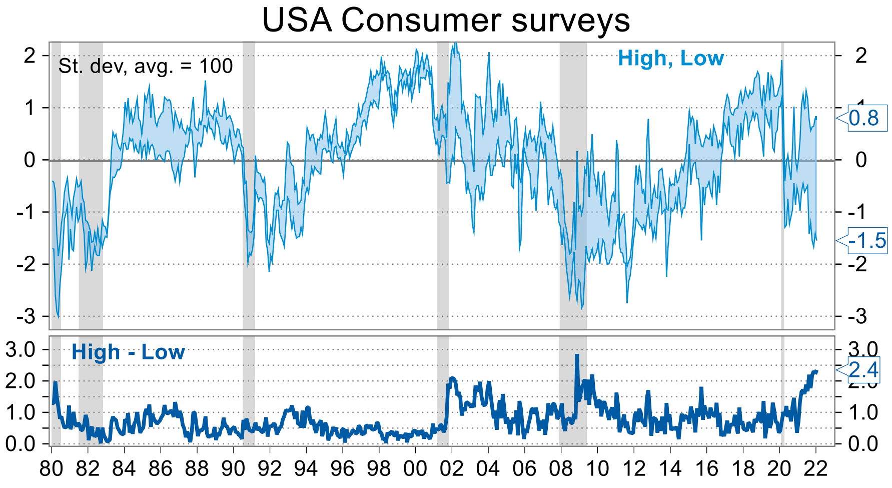
The gap between consumer surveys is unusual – but 3 out of 4 are downbeat

Just Conference Boards Consumer Confidence remains in positive territory



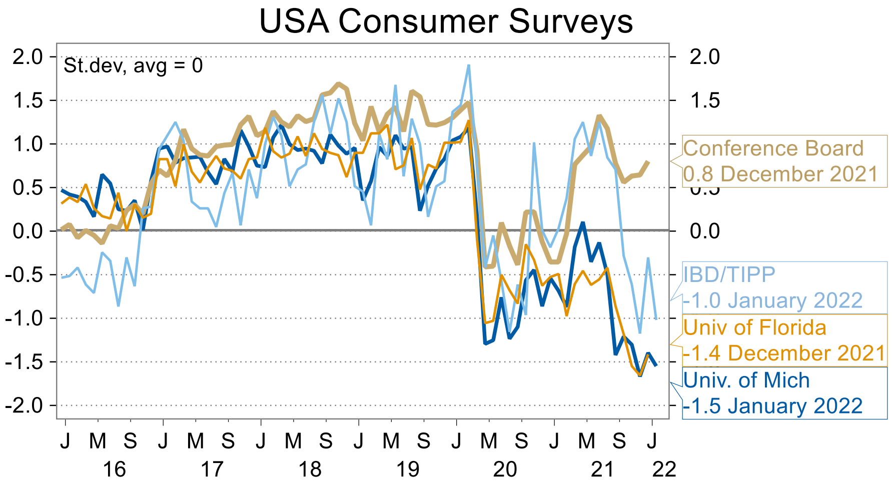
USA Consumer Surveys

SB1 Markets/Macrobond



USA Consumer surveys

SB1 Markets/Macrobond



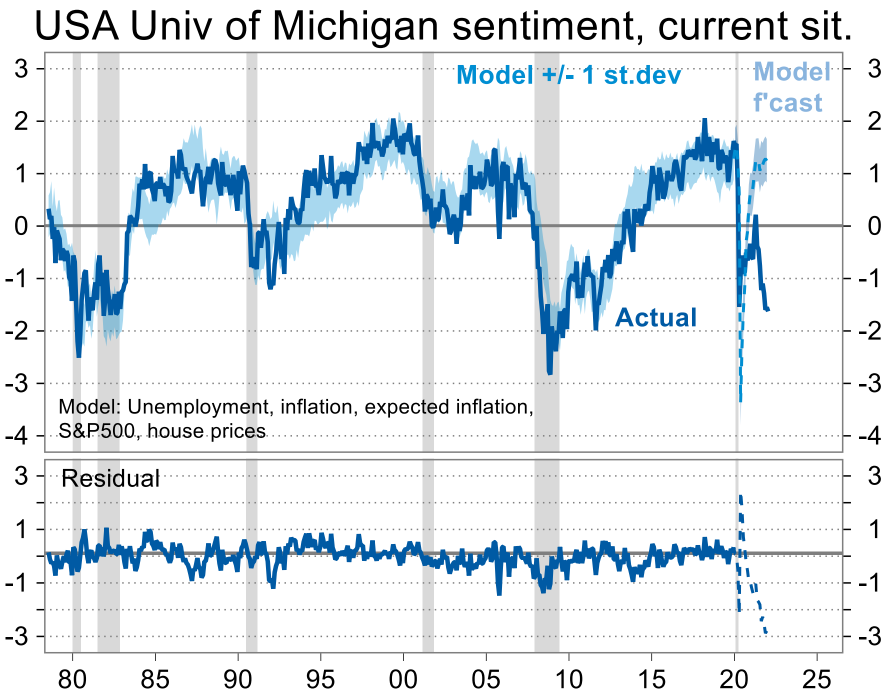
USA Consumer Surveys

SB1 Markets/Macrobond

- Quite often, the UM survey the canary in the mine vs. recessions, it yielded earlier than Conference Board's survey, and the current stance in not a good warning
- Still, there are not many other arguments for an imminent recession, and it will take time for the Federal Reserve to create on
- Both the IBD/TIPP, and the Univ. of Florida surveys are 1 – 1.5 st.dev below par

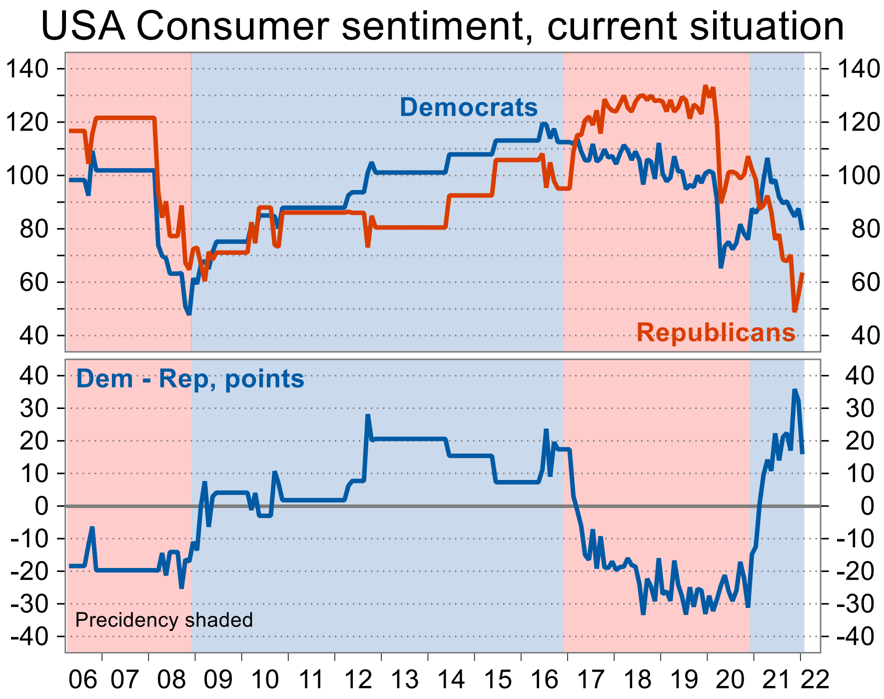
Households should have been quite happy by now, even if inflation is high

Outside the model: The pandemic the only reasonable explanation for the bad mood? Or politics??



USA Univ of Michigan sentiment, current sit.

SB1 Markets/Macrobond



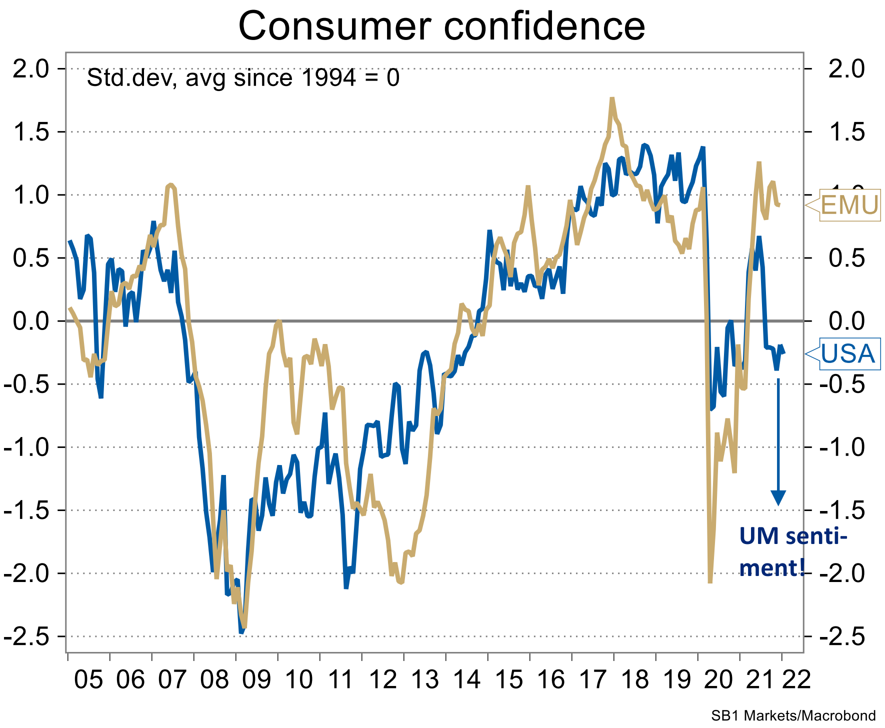
USA Consumer sentiment, current situation

SB1 Markets/Macrobond

- **Our simple model** explaining the current situation part of UM's sentiment survey has worked pretty well, explaining all important ups and downs by standard economic indicators
  - » Unemployment, inflation w/expectations, growth (ISM), the stock & housing markets, all contributing significantly with the 'right' signs. The deviation in the early phase of the pandemic is due to the unusual developments in markets/in the economy
- However, given the normal drivers, and even if inflation is high, the UM sentiment should have far above an average level now – even if both actual and expected inflation is far above normal – the other drives more than compensate for that
  - » Can it just be as simple as the **pandemic**?? However, the pandemic can not be deemed worse now, than say 6 or 12 months ago?
  - » **... Or politics??** The difference between voters is reduced the past two months but remains substantial. Republicans have become less pessimistic, because Biden & the Democrats are struggling?

… and why are the (Continental) Europeans so happy??

The gap between consumer confidence in Europe and the US UM survey is unprecedented, by far



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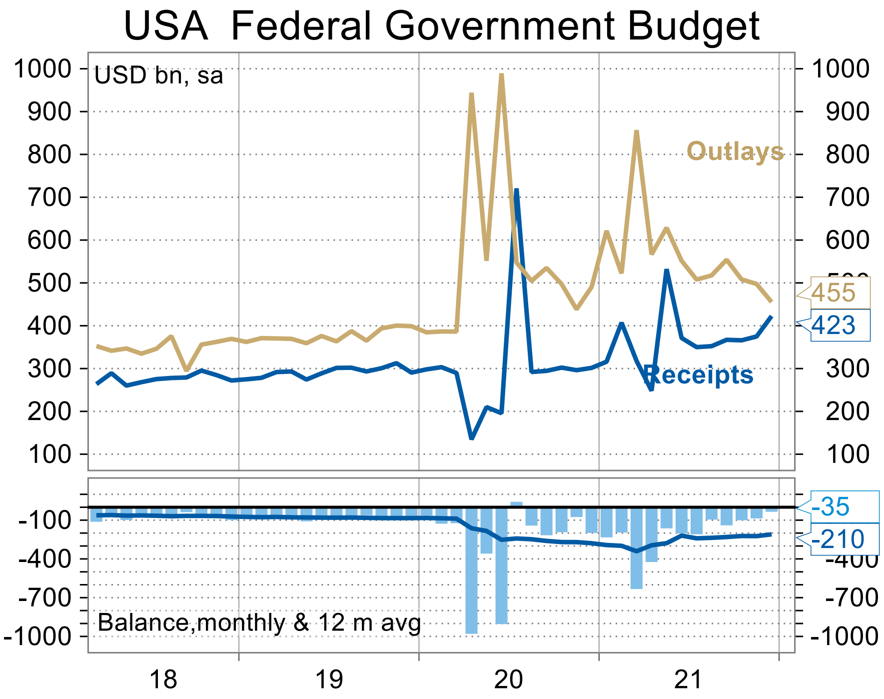
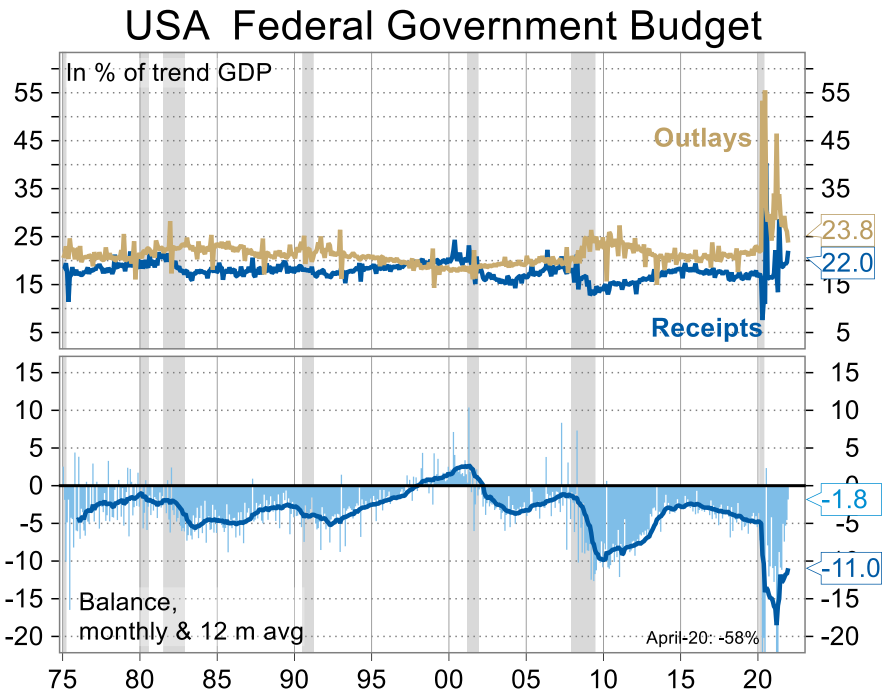
- **Inflation** is sharply up in the Euro zone too
- **Unemployment** is falling in the EMU but it is much higher than in the US
- **House prices** are up in the EMU, but less than in the US
- **Stock markets** are less upbeat in Europe than in the US
- Still, the **Americans** are in a much weaker mood than Europeans

The budget towards… balance??

The deficit equalled just 1.8% of GDP in December, vs the going 5% rate recent months


USA Federal Government Budget

SB1 Markets/Macrobond

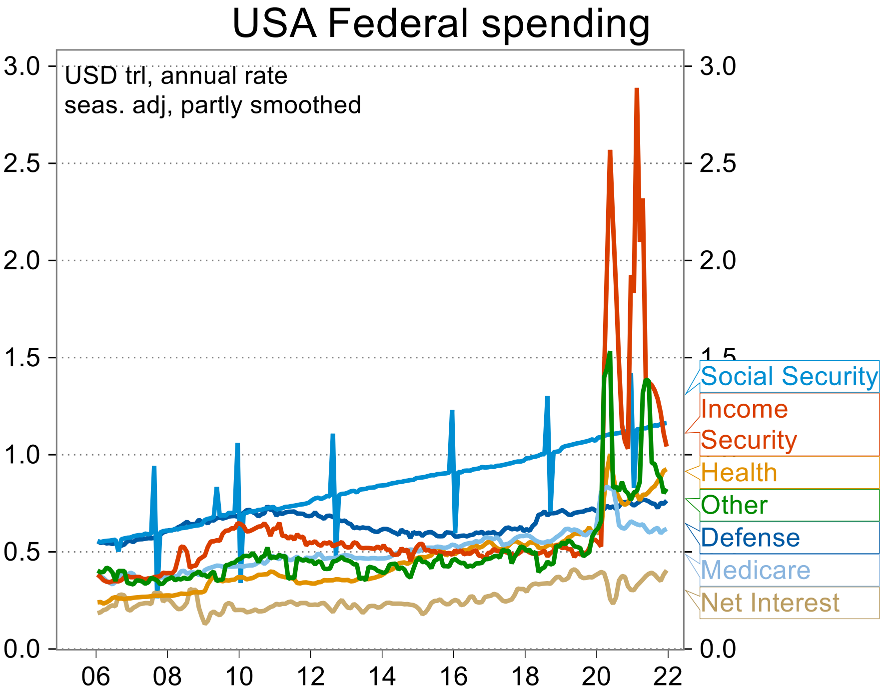

USA Federal Government Budget

SB1 Markets/Macrobond

- **Federal expenses** are gradually declining as pandemic programs are scaled down. Spending equalled 23.8 of GDP in Dec, still substantially up from a 21- 22% pre-pandemic level
- **Federal receipts** have recovered sharply since last summer, due to robust growth in GDP and employment. Revenues equalled 22% of GDP, which far above the pre-Covid level at some 17%
- The actual **deficit** was just USD 21 bn in Dec, expected -5 bn, so no surprise. The seas. adj deficit equalled USD 35 bn or just 1.8% of GDP. Over the past 12 months the Federal deficit has equalled 11% of GDP. Before corona, the federal deficit was at close to 5%. Including other parts of the public sector, the overall deficit was 6.5% in 2019 - in a booming economy with low unemployment!

Income security & ‘other’ spending (much to states) are normalising

However, health spending is accelerating again, due to the fight against the virus, we assume



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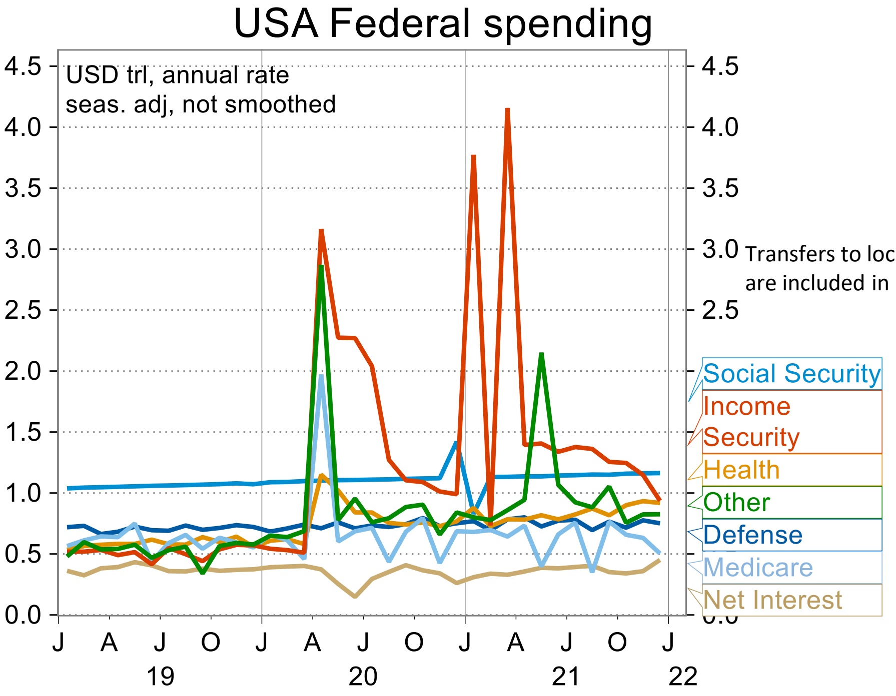


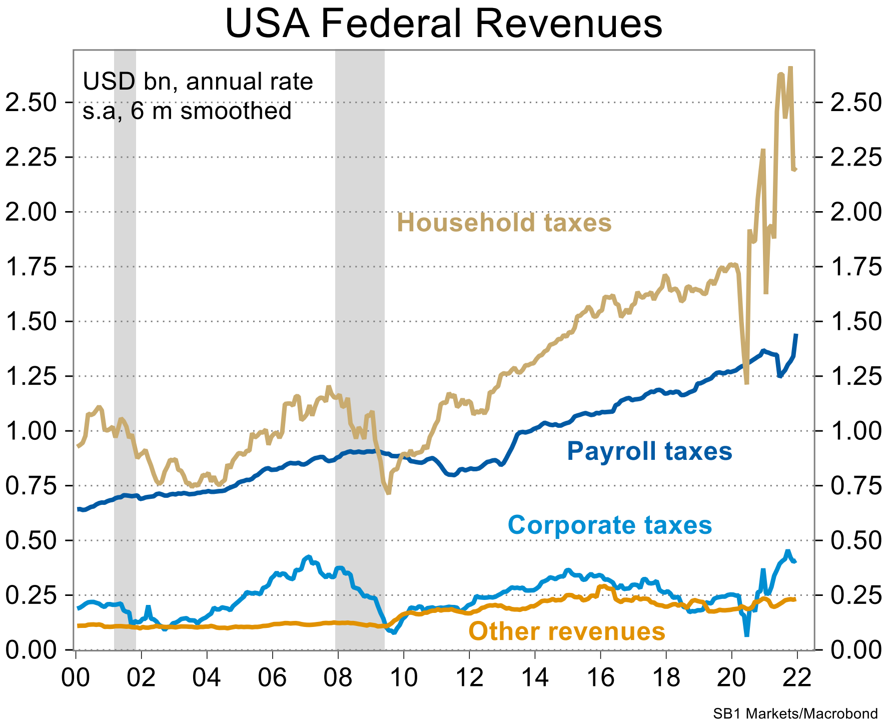
Transfers to local gov. are included in others

SB1 Markets/Macrobond

- Both Income security and ‘other spending’ are well above the pre-pandemic level. Health spending is up too
- We still deem most of this extra spending to be temporary and due to the stimulus packages, and other Covid related measures

Tax revenues have are significantly higher than before the pandemic

Especially taxes paid by household and corporates



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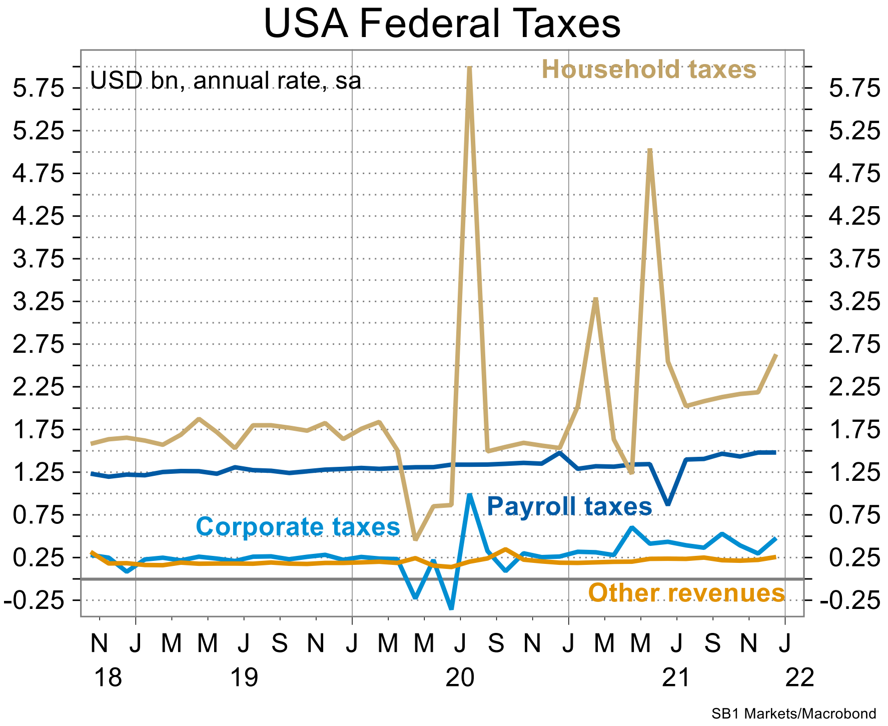

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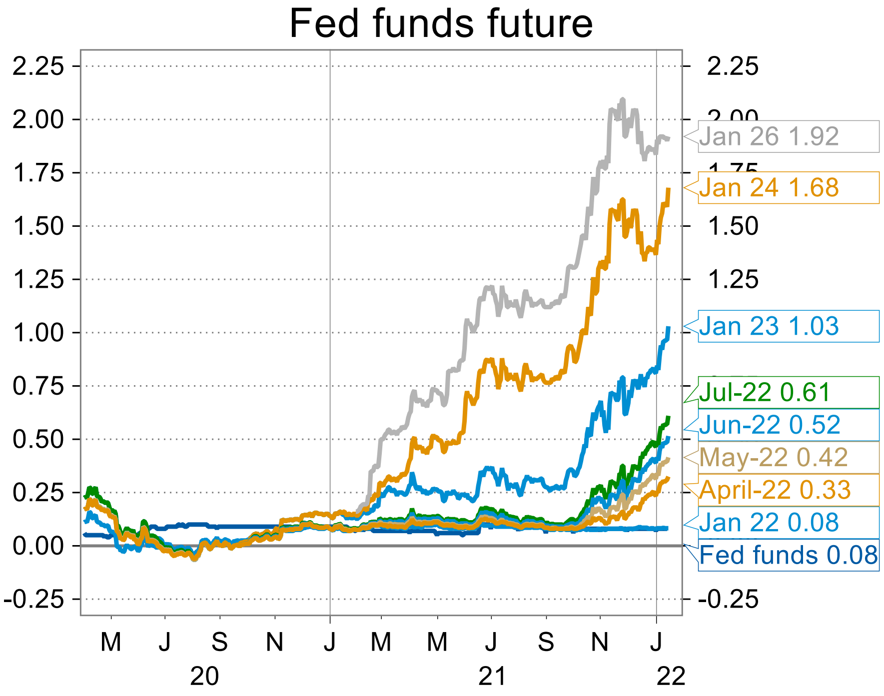
Beige book: Growth slowed slightly to a modest pace

… due to supply problems, lack of labour. Wage inflation is higher than normal everywhere

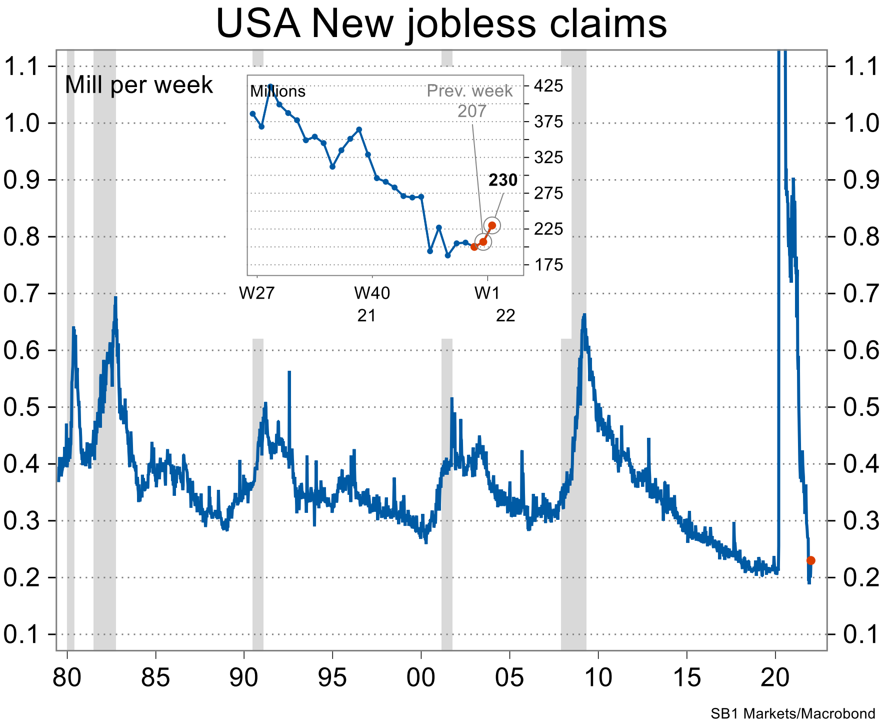


SB1 Markets/Macrobond

- The economy expanded at a **modest pace** (from modest to moderate pace in the last report) in the final weeks of 2021, according to the Fed's 12 district banks. Supply problems, and labour shortages were mentioned as reasons for growth being just modest
- **Consumer demand** kept up well ahead of the spread of the Omicron variant but thereafter leisure, restaurants reported a sudden pull back. **Manufacturing** continued to expand
- **Optimism** remained high, growth expectations has cooled somewhat due to
- Most sectors are reporting further growth in **employment** but growth is slowing due to persistent labour shortages.
- Thus, '***compensation growth** remained well above historical averages across industries, across worker demographics, and across geographies*'. As a response, employers are becoming more flexible vs. part time work and qualification requirements
- **Solid price growth** is still reported, but some reported that price increases has decelerated at bit
- **In sum:** The reports out of the 12 districts are slightly more subdued than the previous reports, but growth is still satisfactory. The fact that the problems are largely supply-driven confirms Federal Reserve's policy turnaround recent weeks/months

Jobless claims slightly up last week, still very low

A huge decline in continued claims, to below the pre-pandemic level



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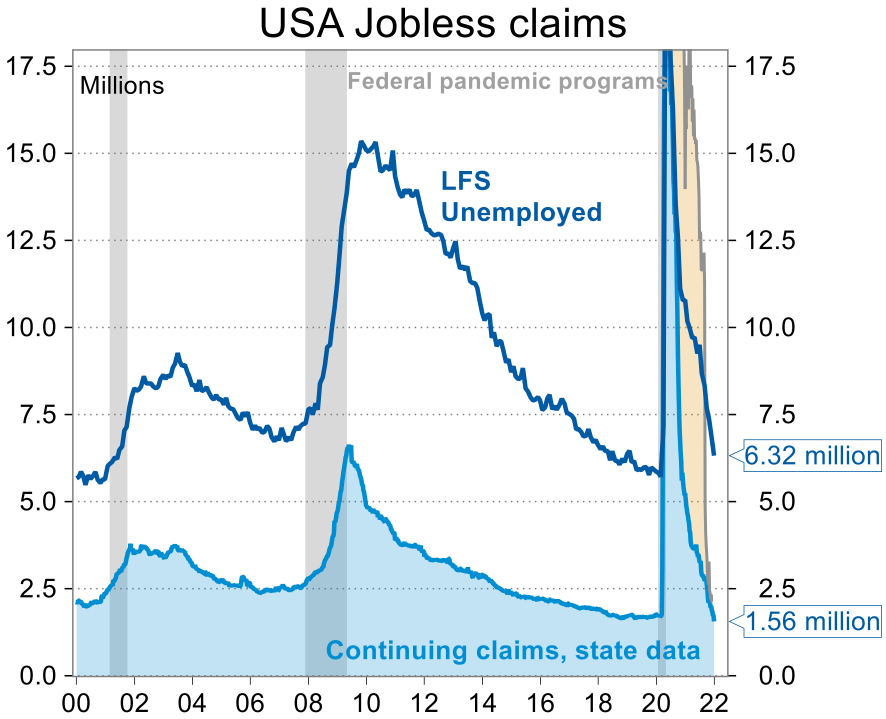
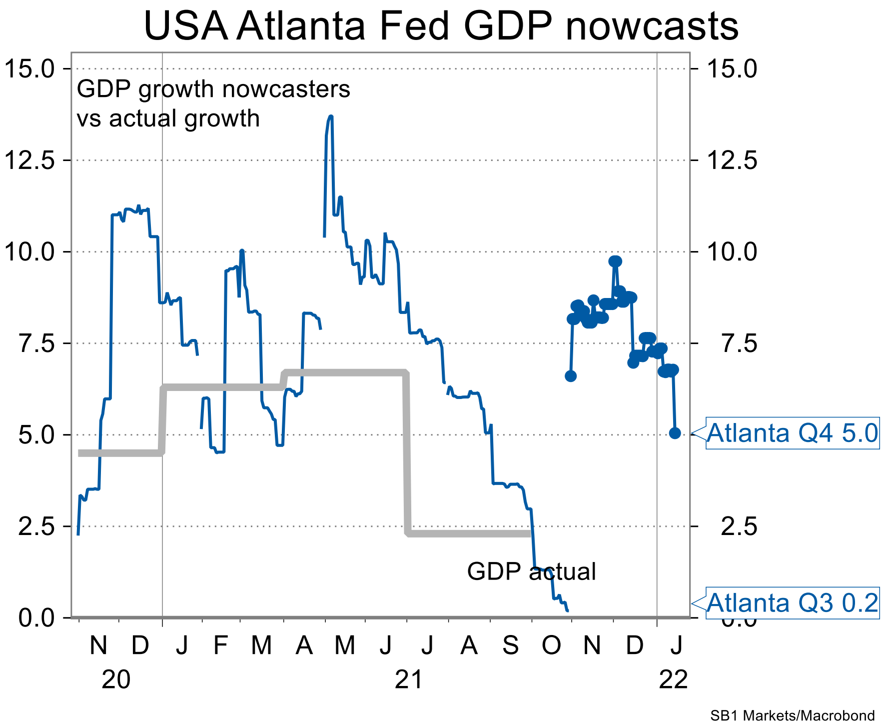


- **New jobless claims** rose to 230’ from 207’ in week 1. One week up is not a trend – and the level is anyway extremely low
- **Ordinary continuing claims** fell by 194’ in week 52, following a 280’ decline the previous 3 weeks! At 1.56 mill, the level is well below the level in February 2022

Atlanta Fed's nowcaster suggests close to 5% growth in Q4, down from 8+

The weak retail sales report, a the decline in manufacturing production lowered the GDP f'cast



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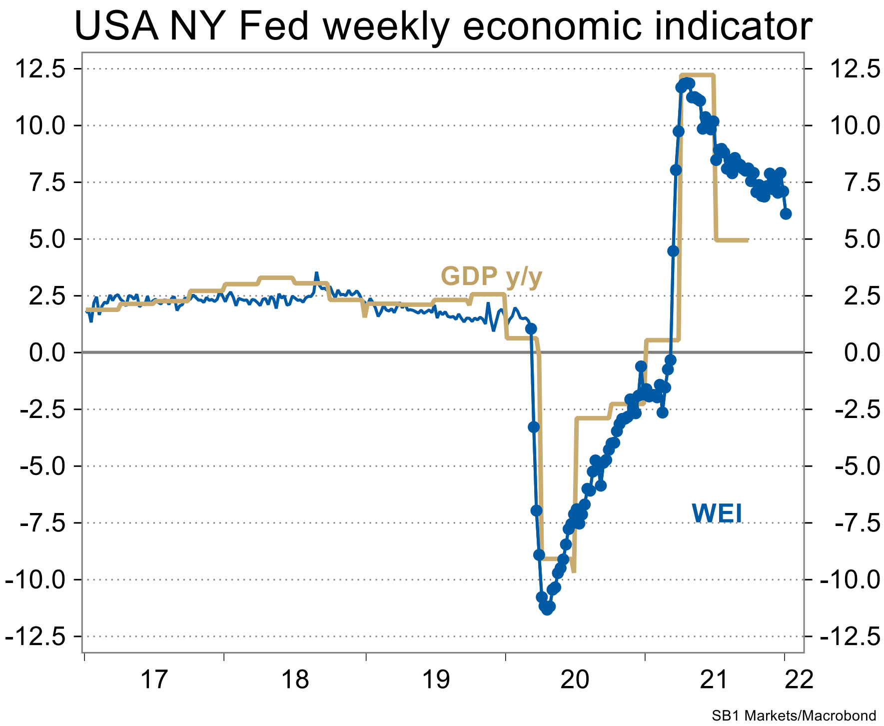

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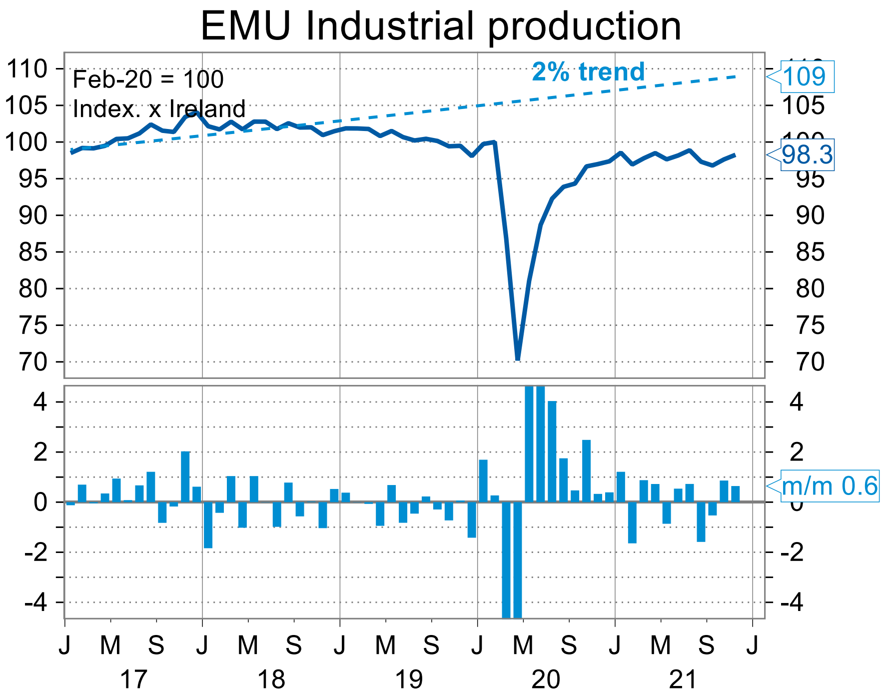
Industrial production up 0.6% in November – but trend just flat, 2% below Feb-20

Production rose in Spain and Italy, fell in France & Germany


EMU Industrial production

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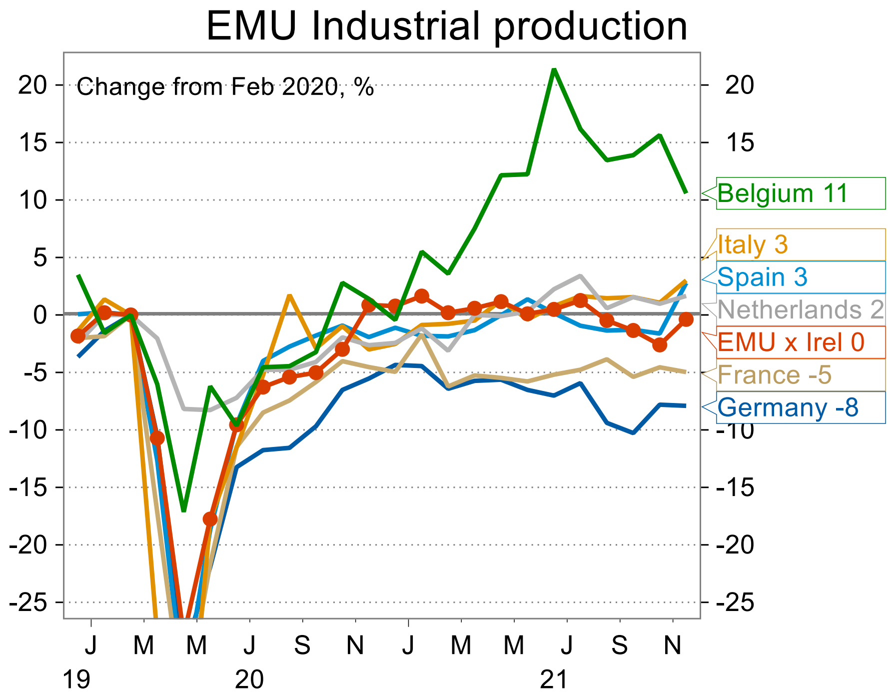
EMU Industrial production

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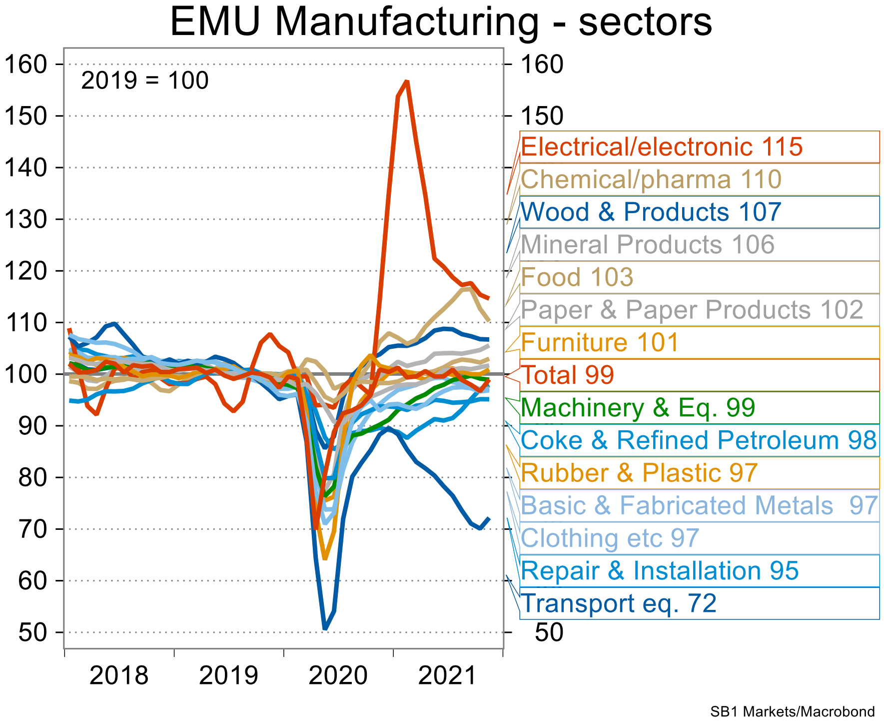
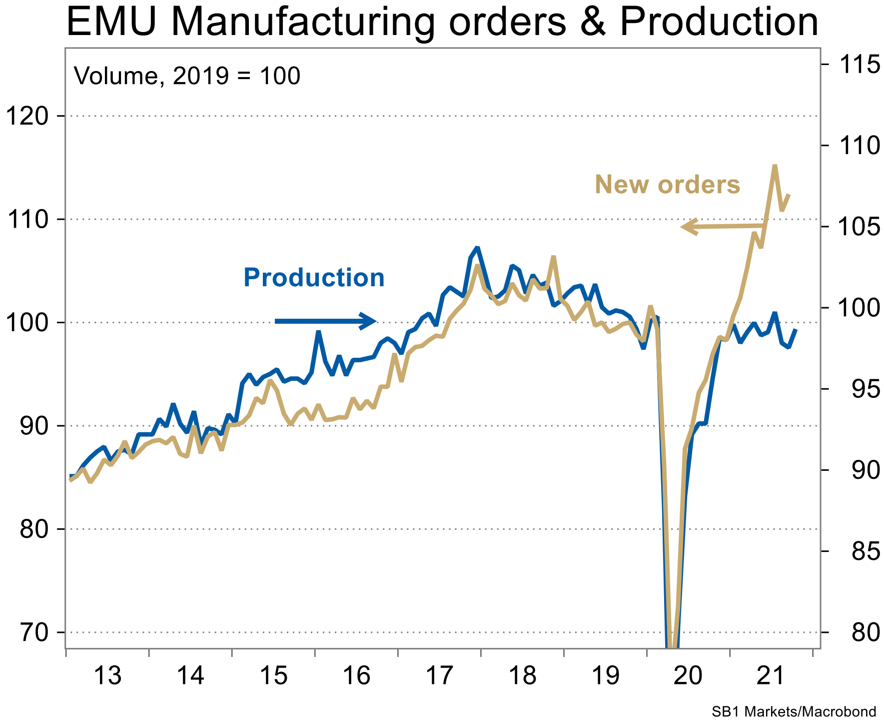
- **Total industrial production** in the EMU gained 2.3% in November, following a 1.3% drop in Oct, far weaker than the initial reported 1.1% increase, *according to the official Eurostat figures*
  - » **Ireland** was included again, and in Oct Irish production fell by 31% and then gained 36% in Nov, pushing the whole Euro zone stats around. The Irish figures are mostly due to tax/software adjustments, and irrelevant vs. real activity
  - » We exclude Ireland from the EMU total – and production rose by 0.9% in Oct and 0.6% in Nov
- **Production in the EMU** has trended flat so far in 2021, even if surveys and new orders have signaled more than decent growth. The sharp setback in auto production explains much of the overall ‘weakness’

Transport/auto production the main drag at the downside

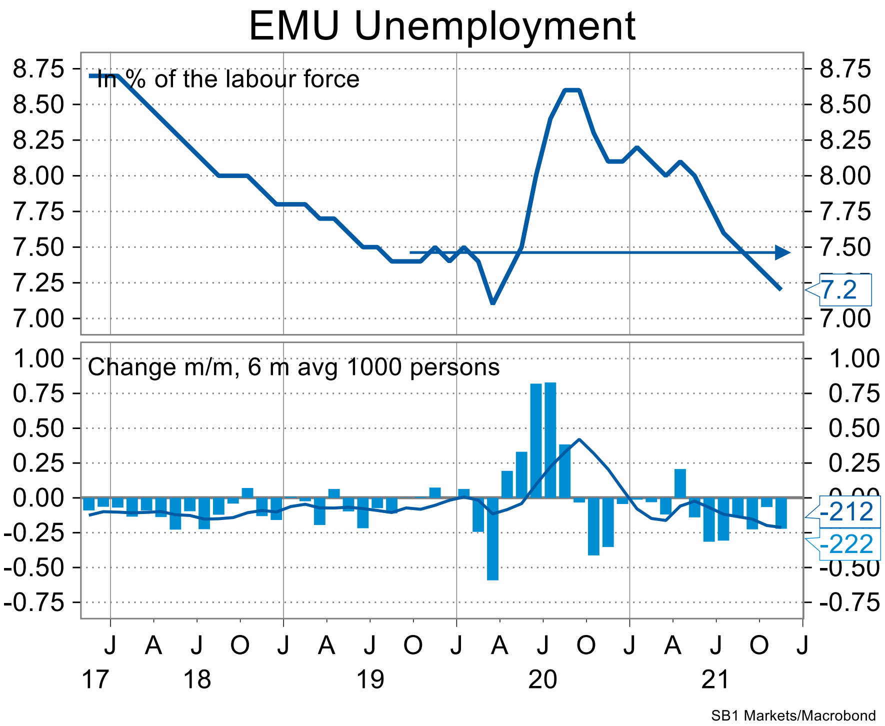
… order inflow signal potential for production growth





Unemployment fell further in November – to 7.2%, as expected

Unemployment is well below the pre-pandemic level



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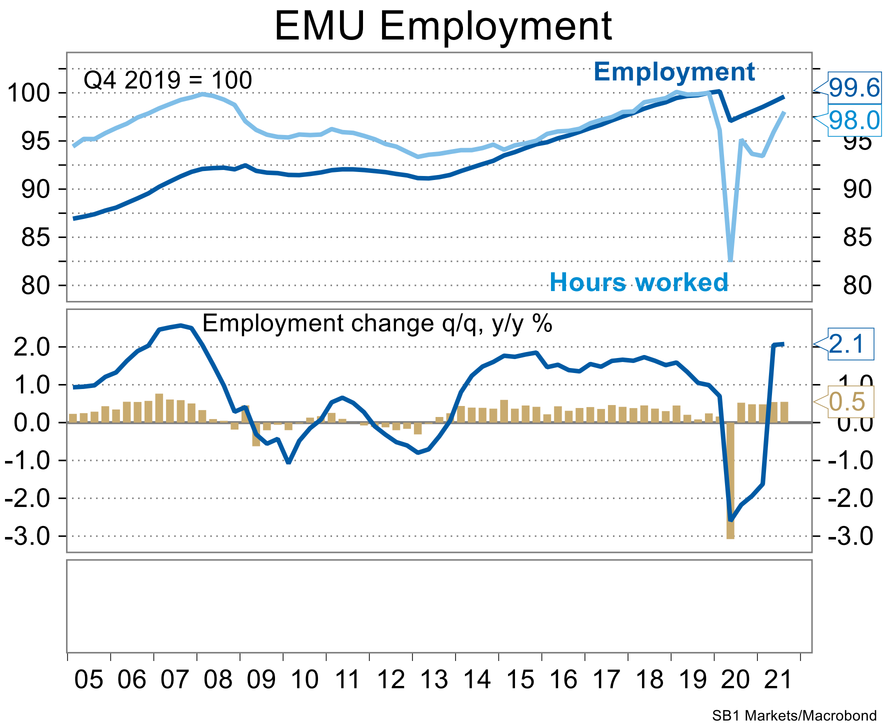

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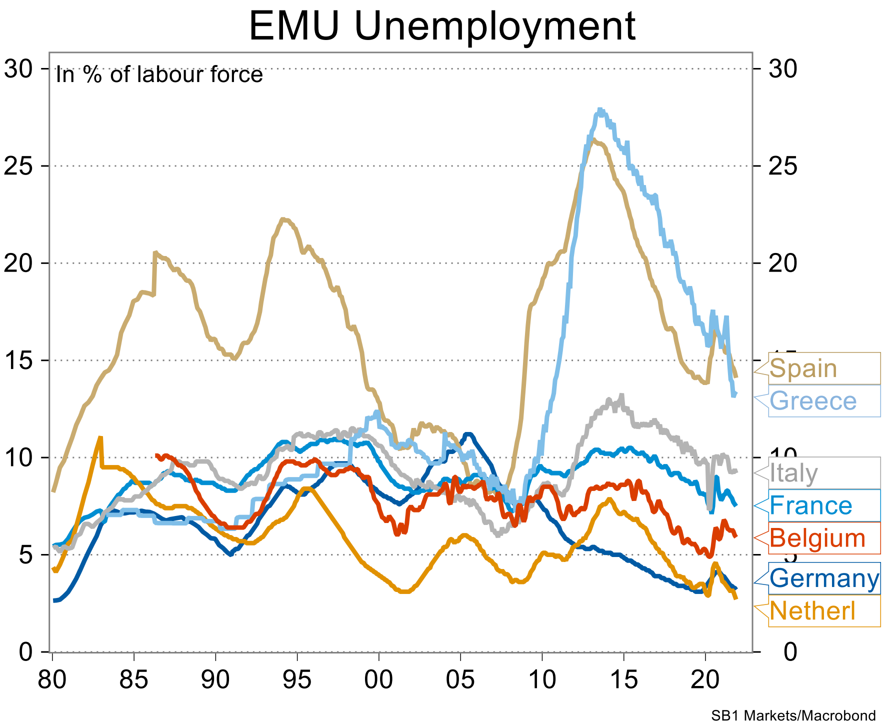
- **Unemployment** has been falling rapidly since the spring. In Nov, the unemployment rate fell 0.1 pp to 7.2%, as expected, and the level is well below the average in the months before the pandemic hit
- **Employment** rose by 0.5% in Q3, as in the previous 4 quarters but the level is still 0.4% below the pre-pandemic activity
  - » However, the best proxy for the real unemployment rate, at least vs. **demand for labour**, is the number of **hours worked**. In Q3, hours worked were down 2% vs the pre-pandemic level, as average working hours have fallen – but working hours grew rapidly in both Q2 and Q3
- The no. of **unfilled vacancies** rose sharply in Q3, to the highest level ever (chart 2 pages fwd)

Unemployment is falling all over the region



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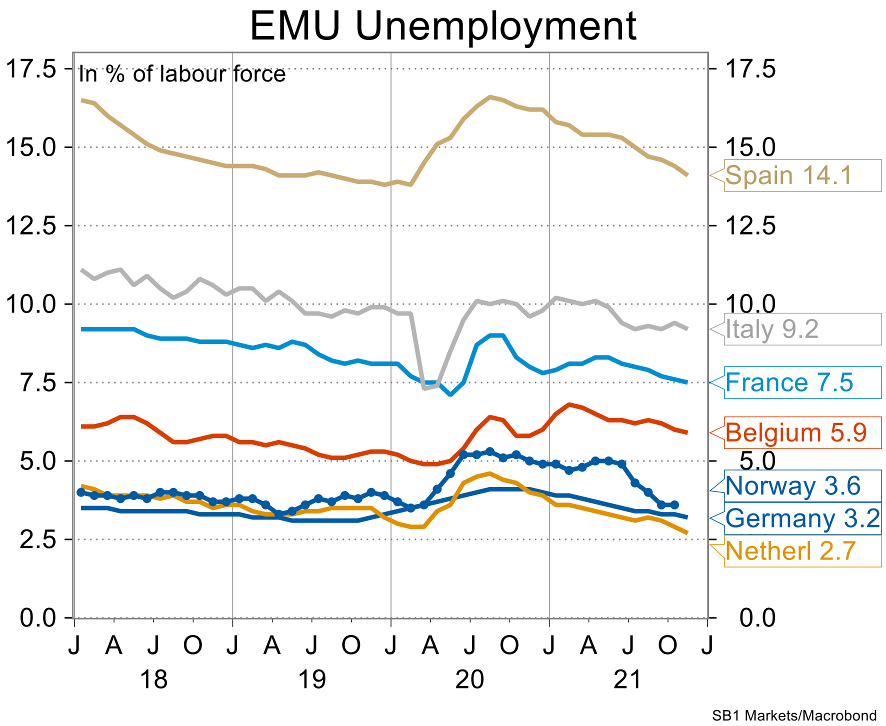

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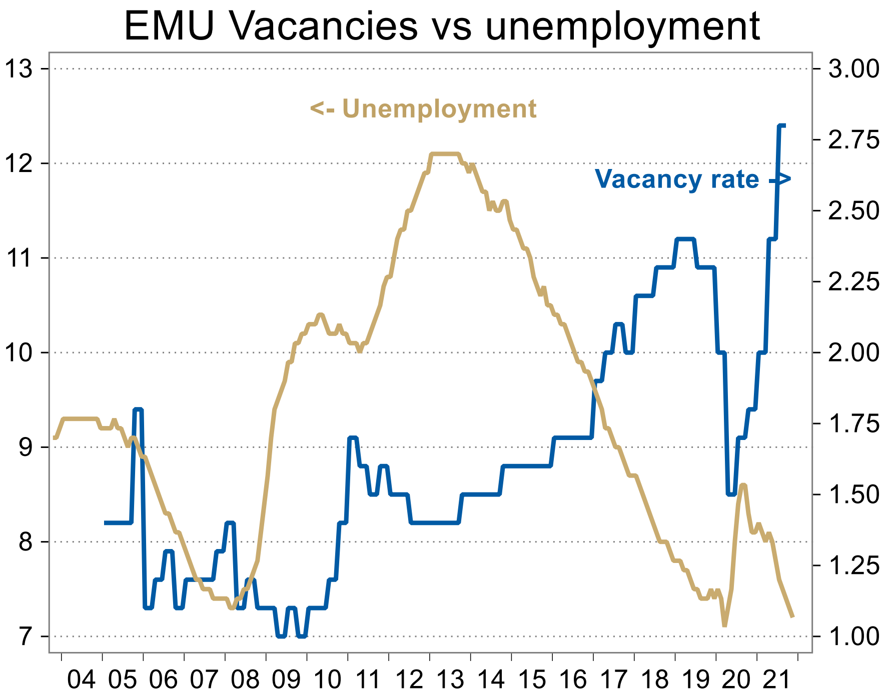
The vacancy rate exploded in Q3

An ATH for the Eurozone, and in most countries. Labour markets are no doubt tight



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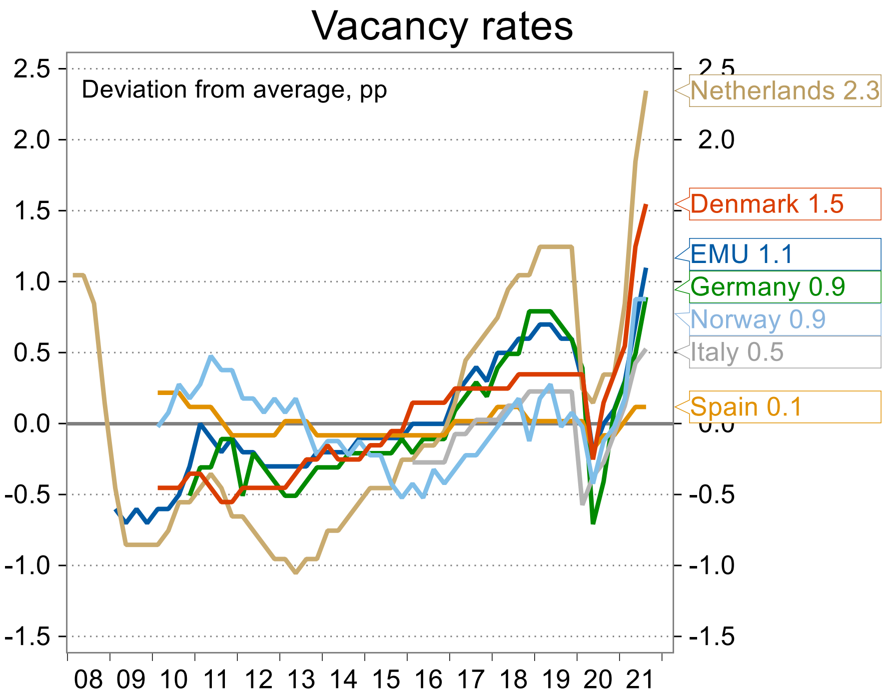

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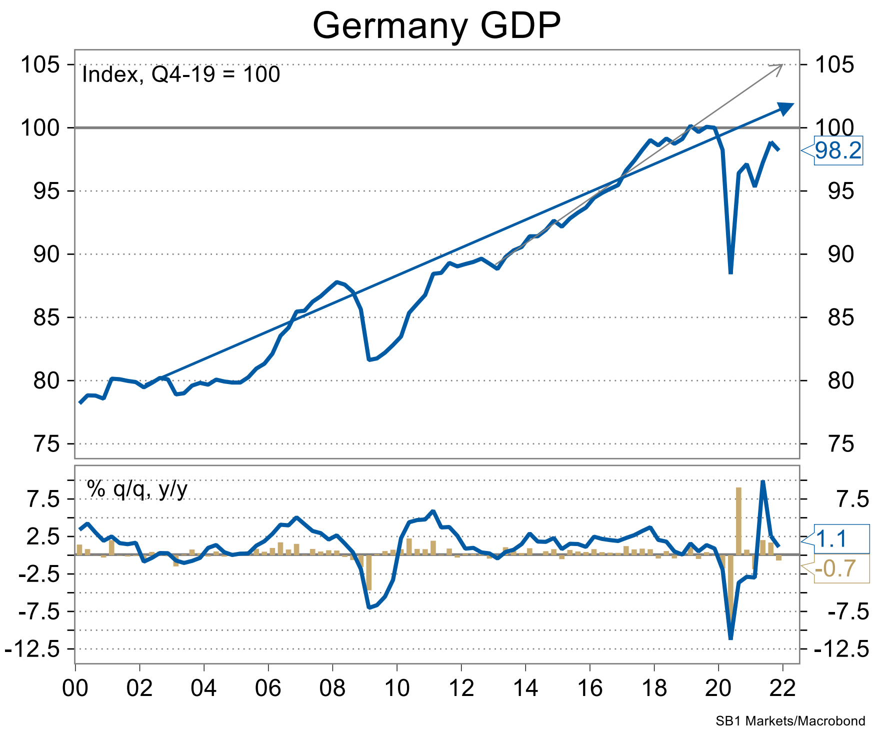
- Not all countries have reported Q3 vacancy data

German GDP hit by a virus attack in Q4

GDP down 0.5 – 1% according to Bundesbank, as Covid restrictions/supply problems hampered act.



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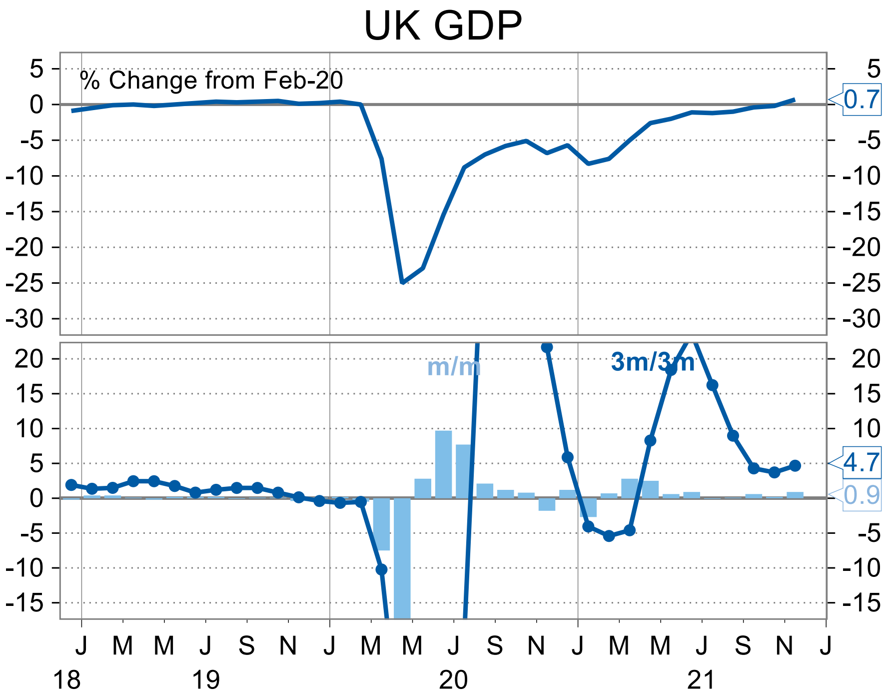
- GDP is still 1.8 below the Q4-19 level, and approx 7% below the medium term pre-pandemic growth path – which represents a substantial loss of production, and income
    - » However, vs a longer term growth path the likely loss is far smaller – the German economy was above the long term trend in 2016 – 19
- In 2021, GDP rose 2.7% vs. 2020

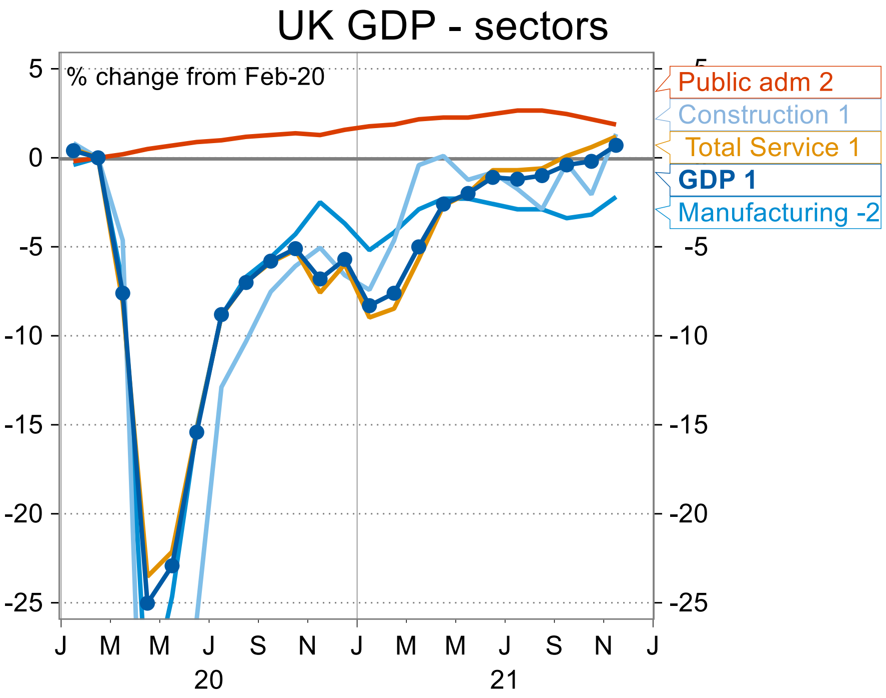
GDP up 0.9% in November, and finally above the pre-pandemic level!

GDP was exp. up by 0.4%, up from 0.1% in Oct. Barring a decline in public sector, growth everywhere



UK GDP

SB1 Markets/Macrobond

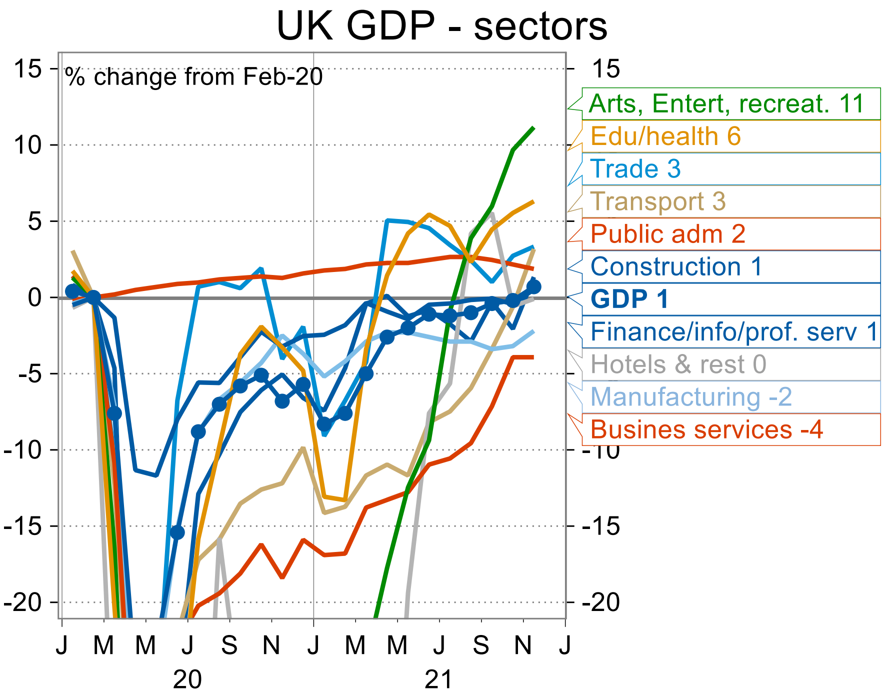


UK GDP - sectors

SB1 Markets/Macrobond

- **GDP growth** has been modest since June but finally the GDP level rose to above the Feb-20 level. The accumulated losses through the pandemic has been larger than almost all other rich countries, as GDP initially fell by 25% (vs. 10% in Norway)
- **Service production** added 0.8% in November, and **manufacturing production** 1.0%. Services in total is back to the pre pandemic level, manufacturing is still below. Construction activity rose sharply in Nov, and is above the p-p level too
- **Public demand** has been the main growth engine through the pandemic but is now slowing. **Household demand** is now recovering but are still well below the pre-pandemic level. **Business investments** may have bottomed but remains well below par. Exports are down, but so are imports, and net trade is close to neutral

Just business services & manufacturing are below the Feb-20 level



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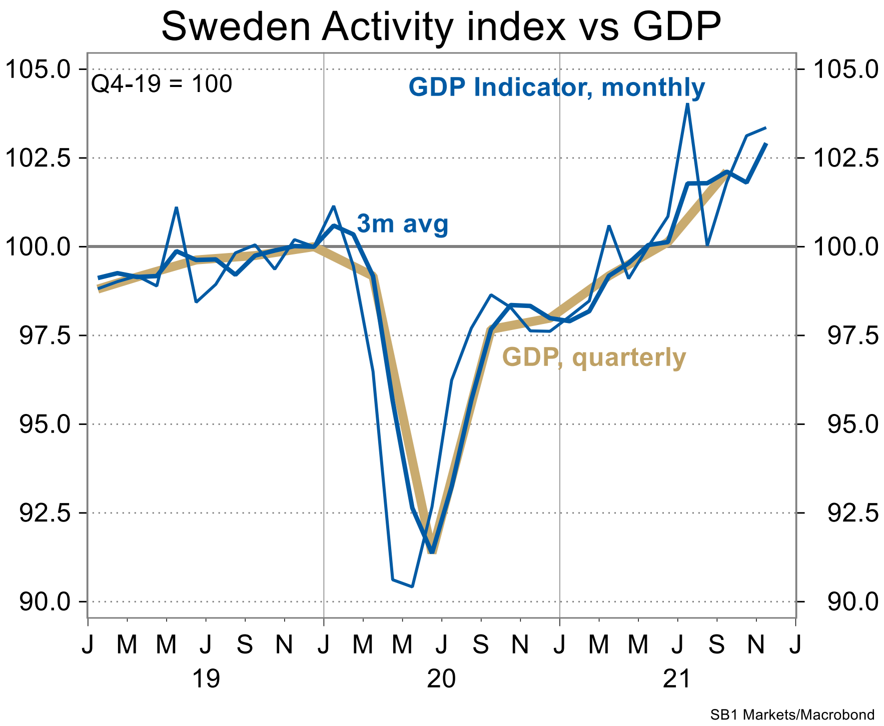
GDP on a strong recovery path, further up by 0.2% in Nov – up 3.4% vs Q4-19!

Both services and the manufacturing contributed to the lift in November



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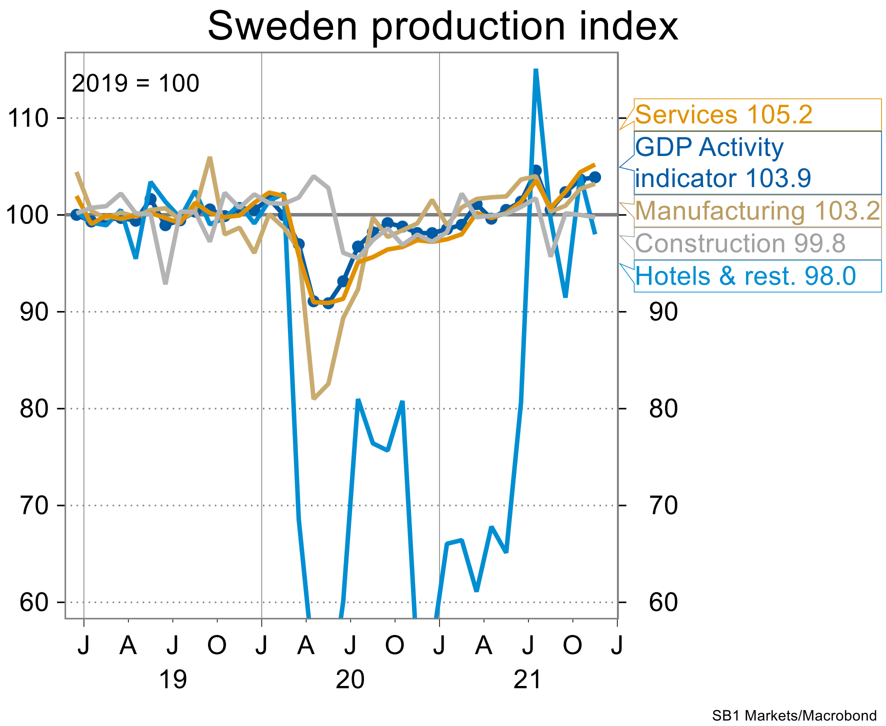

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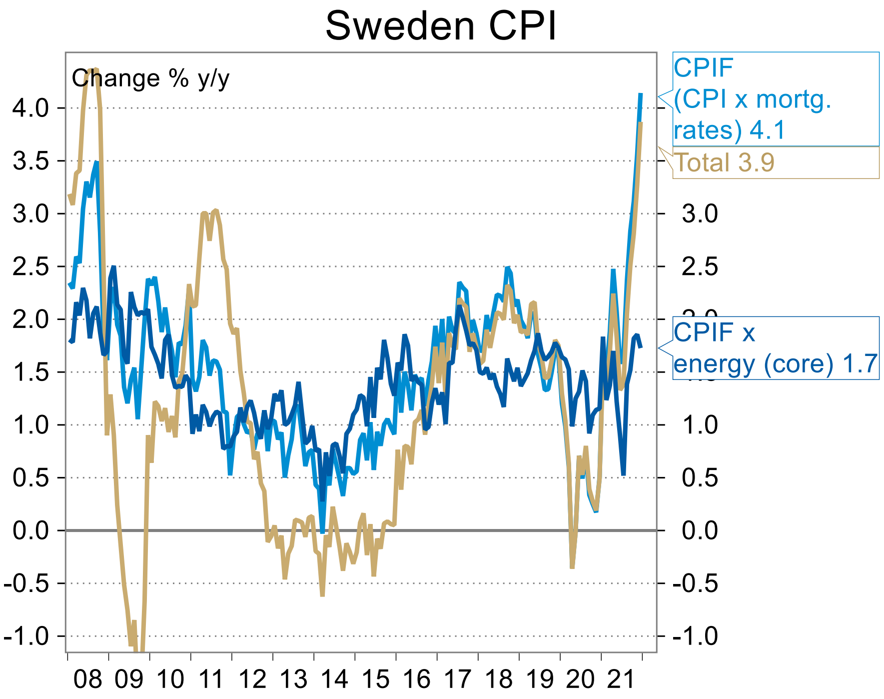
- **The outlook** remains excellent, according to Swedish companies. THE KI (NIER) survey is still close to ATH, and the PMI is the best in the world.
- In Nov, hotels and restaurants reported a decline in activity – but from above the p-p level to 2% below
- We still wonder if the Riksbank's extremely expansionary monetary policy stance is appropriate

Headline inflation up 0.6 pp to 3.9% but core down to just 1.7%, still below target

Energy prices are soaring in Sweden to, if not as badly as in many other countries



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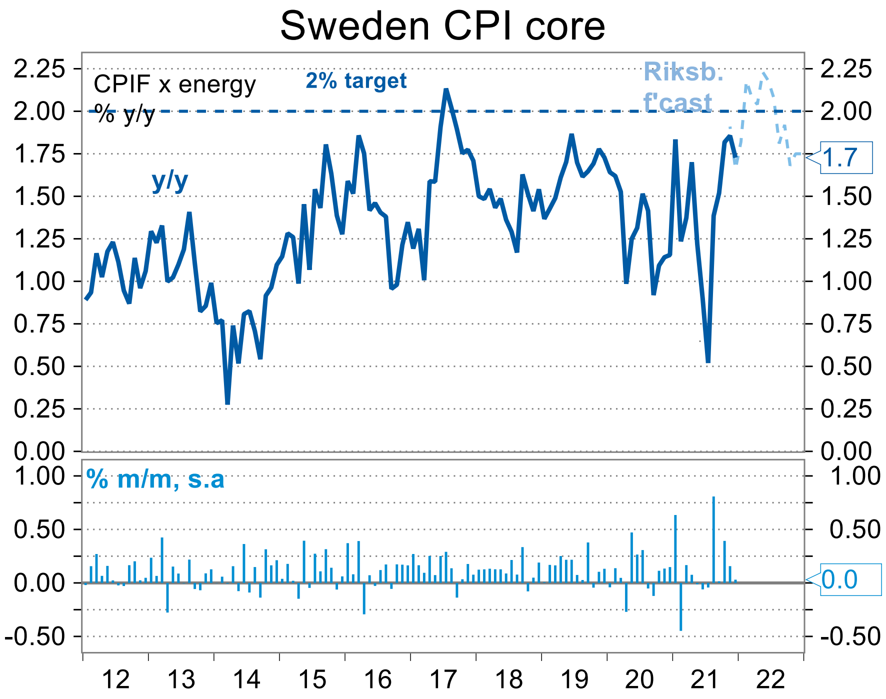

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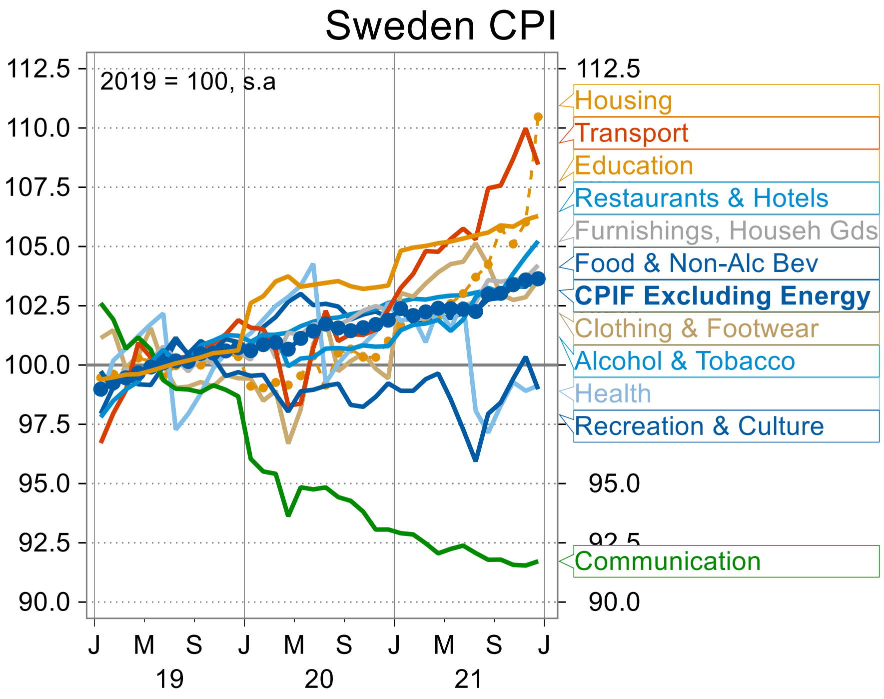
- **Headline inflation** accelerated 0.6 pp to 3.9% y/y in Dec, in line with the consensus forecast
  - » **The CPI-F**, the constant interest rate inflation (CPI x mortgage rates) was up 0.5 pp to 4.1%, 0.1 pp less than expected
- **CPI-F x energy, the 'real core'** was flat m/m, and the annual rate fell by 0.2 pp to 1.%, 0.2 pp below expectations but in line with the Riksbank's f'cast

Inflation in Sweden: it’s energy, and nothing but energy

And it will not last for that long!



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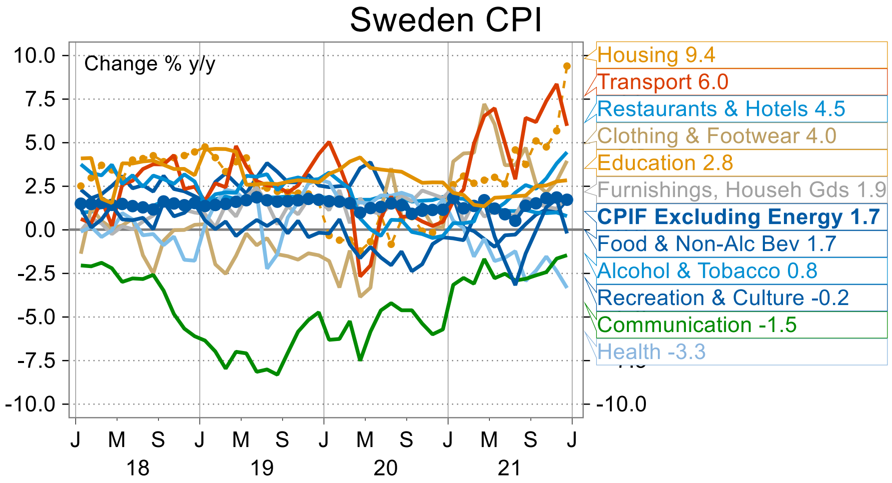

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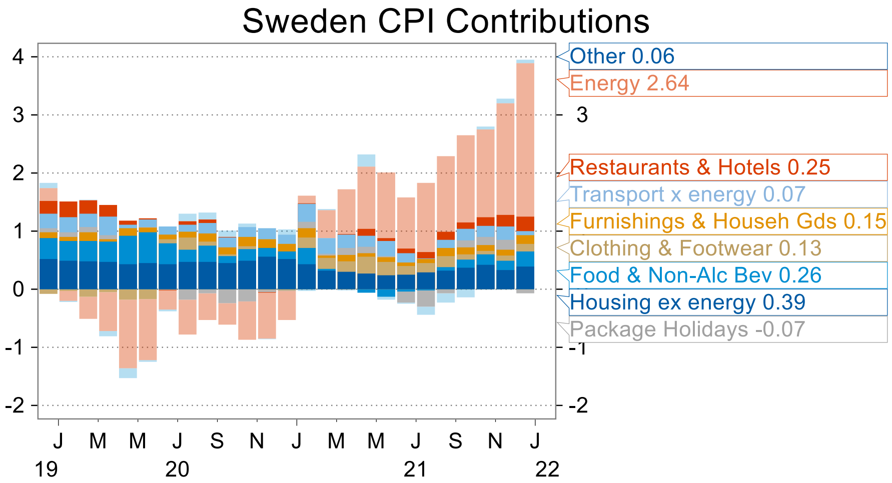

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Highlights

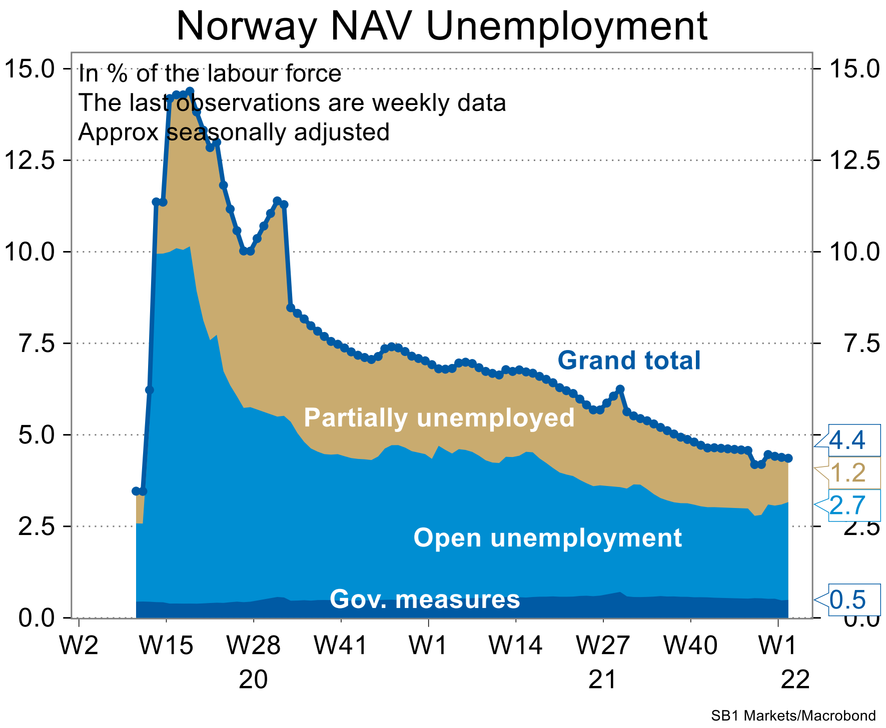
The world around us

The Norwegian economy

Market charts & comments

NAV total unemployment is still drifting down, in spite of Omicron restrictions

… which were substantially eased last week



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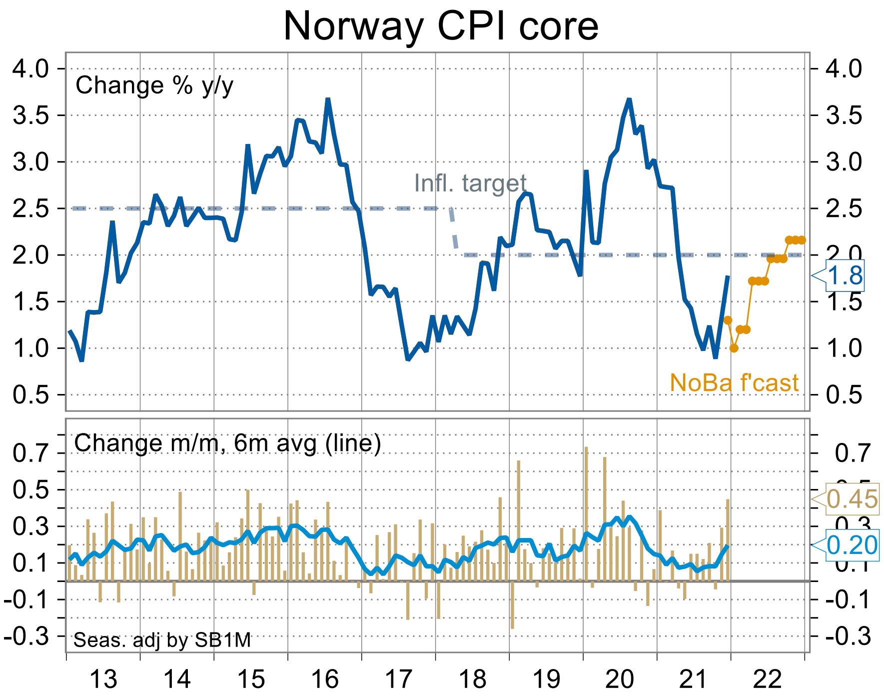
- The no. of **full time unemployed** is marginally up but including the part time, **total unemployment** is heading down
- And now restrictions are eased vs restaurants, that were hit by the mesures decided in mid December

A core CPI shock in December, and there were several ‘sinners’

Electricity prices capped by government subsidies as expected but headline inflation up to 5.3%



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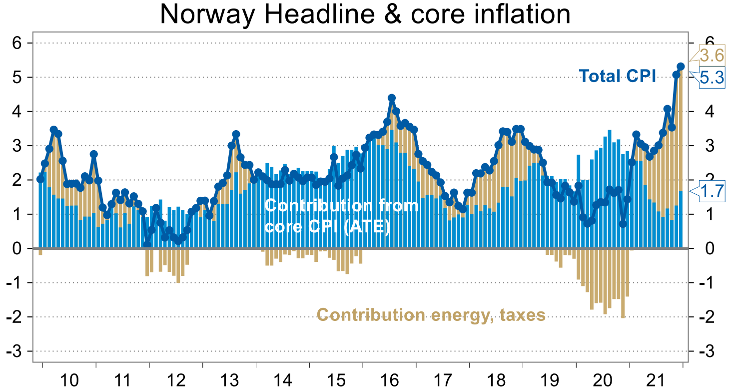
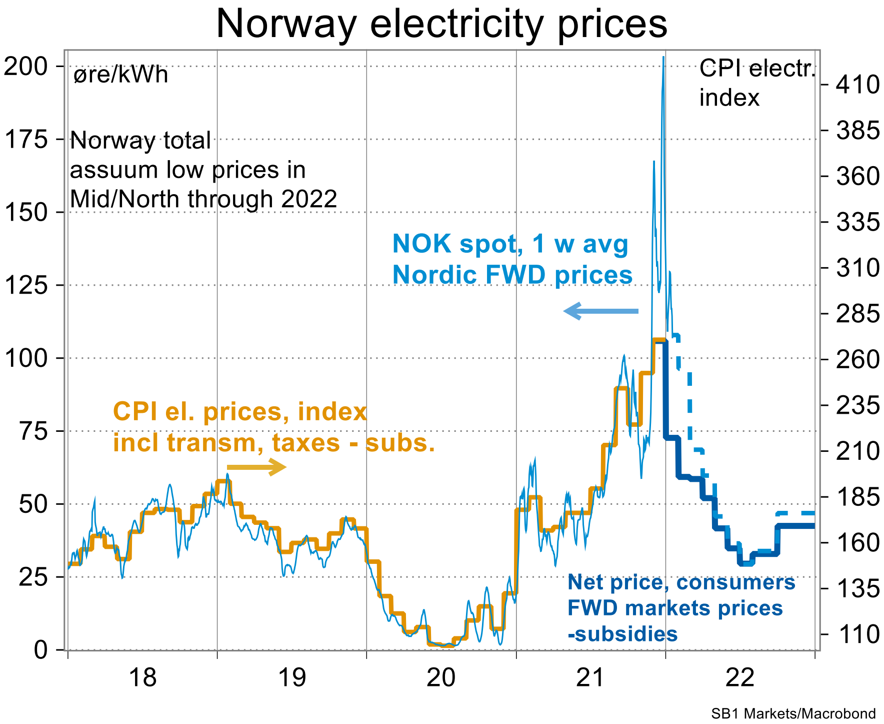


- **Total inflation** accelerated to 5.3% in December from 5.1% in Nov (and 3.5% in Oct), up to the highest level since 2008, and far above our 4.7% estimate
  - » **Electricity prices** rose 7%, in line with our estimate. The annual rate fell by 20 pp to 103%
  - » **Gasoline prices** rose 1% m/m, are up 20% y/y
  - » Energy price (and taxes) contributed to 3.6 pp og the 5.3% headline rate
- **CPI-ATE** (ex. energy and taxes) inflation accelerated to by 0.5 pp to 1.8% in Dec, far above our (and NoBa’s) 1.3% f’cast
  - » Prices rose 0.45% m/m (seas adj), after a 0.3% lift in November.
  - » Food, airline tickets & furnishing/hardware contributed to most of the hike m/m
  - » Core inflation is running above 2% in just 4 sectors, and is below 2% in 9 sectors
  - » Prices on imported goods rose 0.6% in December, domestically produced goods & services were up 0.4%
- **The outlook**
  - » **The electricity bill** will decline some 20% in January, both due to a decline in spot prices, and the increases subsidy (the Government covers 80% of el. prices above 70 øre/kWh, from 55% in December), taking inflation sharply down
  - » **Core inflation** surprised at the upside in December, especially for food, furnishing/hardware and airfare tickets. Strong growth at home and some impact from higher inflation abroad will contribute at the upside (even if the impact of the latter is not impressive, historically). We expect wage inflation to gain speed as well
  - » Total inflation will fall sharply the coming months, and the 2022 average may be as low as 2.6&
- **So what?**
  - » If electricity prices normalises through H1 in line with the future prices, inflation will come sharply down to the core rate by April. The cost during th surge will be limited, less than 1¼ % of the annual disposable income
  - » Consumption may be somewhat influenced, but not by much
  - » The lift in the core inflation rate may lift NoBa’s f’casts somewhat but we think at least parts of the lift is transitory. However, the risk on the upside may be increasing, here as some other places

A huge drop in the electricity bill in Jan – and market expects more of the same

Market prices are down, and substantial contribution from the enhanced subsidy scheme



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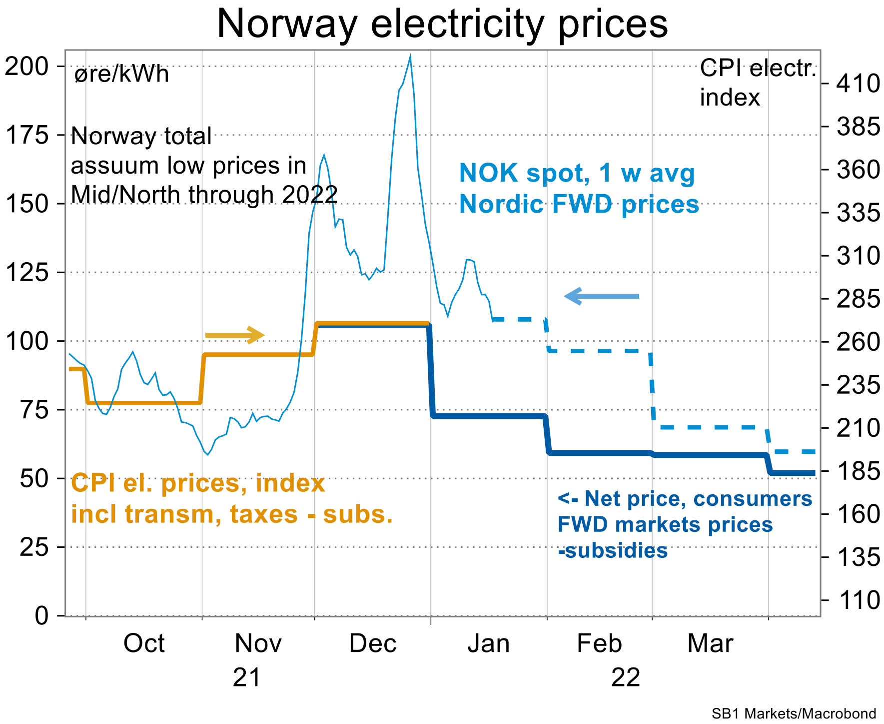

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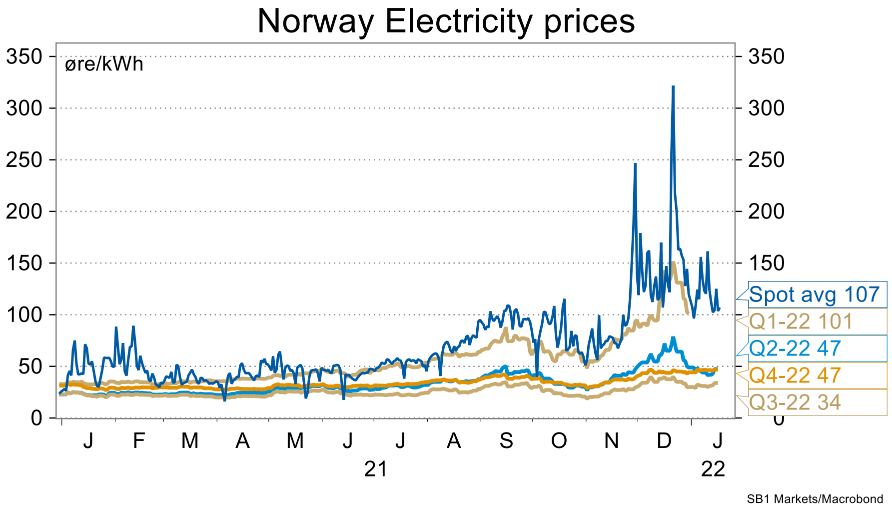
- The average net price may drop to below 75 øre/kWh in January (we have treated the 3.5 øre/kWh as a part of the subsidy regime)
- We are assuming prices in Mid/Northern Norway to remain low (25 – 30 øre/kWh) through the year

IF the future market is right (you never know), the bill will soon be back to normal

The bill down almost 20% in Jan? Last Jan prices rose by 33%. Annual infl. down to 20% from 103%



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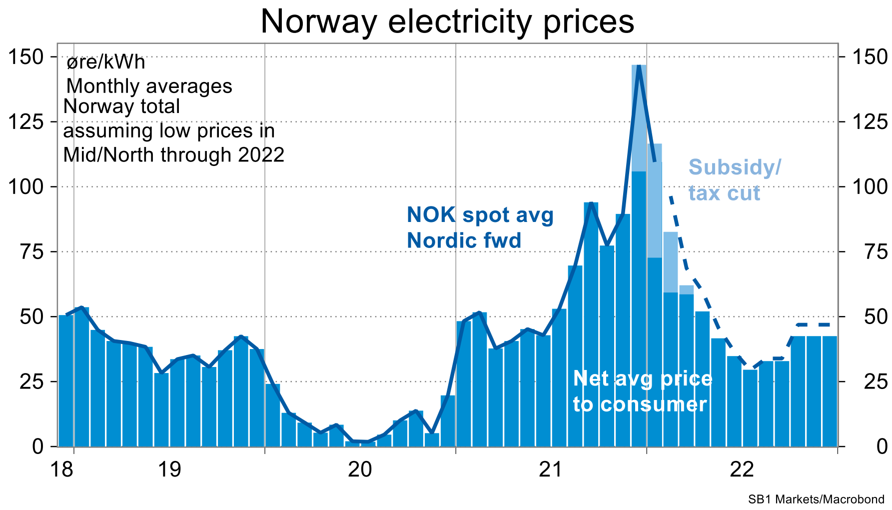

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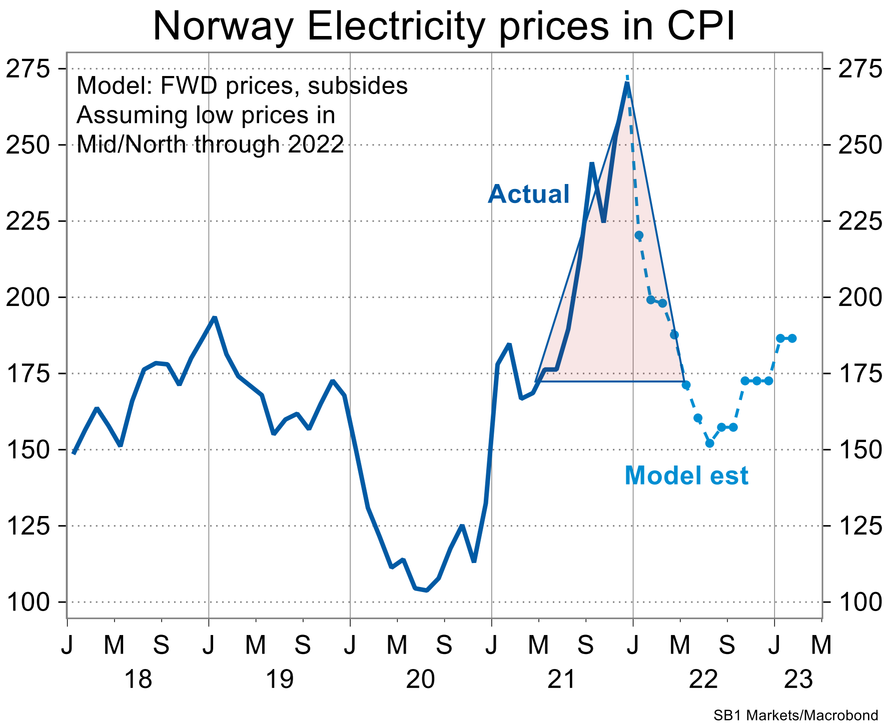

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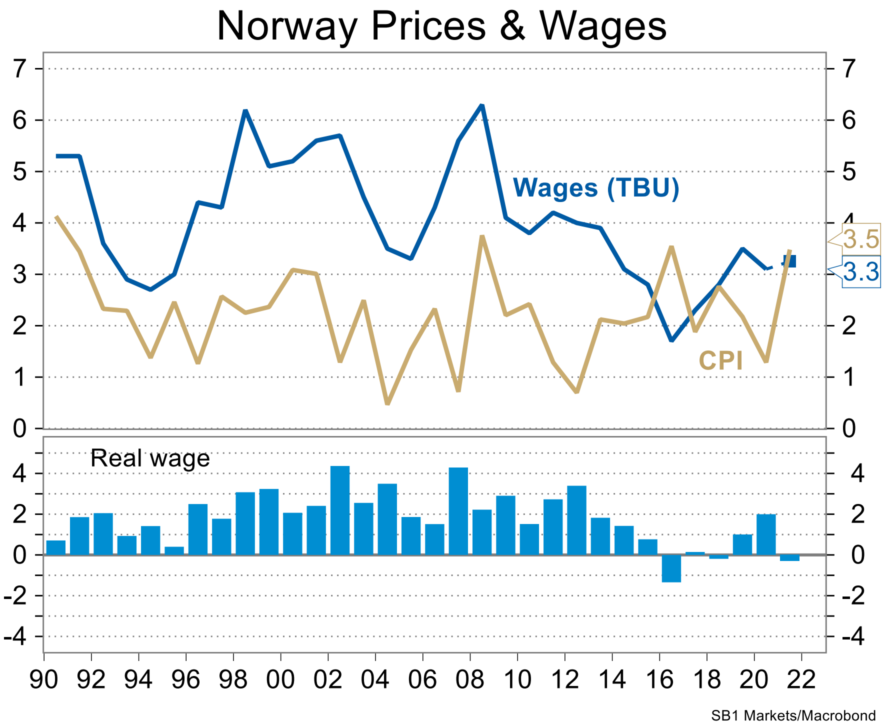
- The 'turnaround' in electricity prices (and our estimates for other components) will lower headline inflation to some 3.5% from 5.3%
  - » And before the summer, electricity prices are down y/y, without subsidies??
- The 'unprecedented surge' in electricity prices, represented by the area of the triangular above, equals some 35% of a normal annual electricity bill, or less than 1¼ % of the annual disposable income

What a shock: Real wages down some 0.2% in 2021, after a 2% gain in 2020

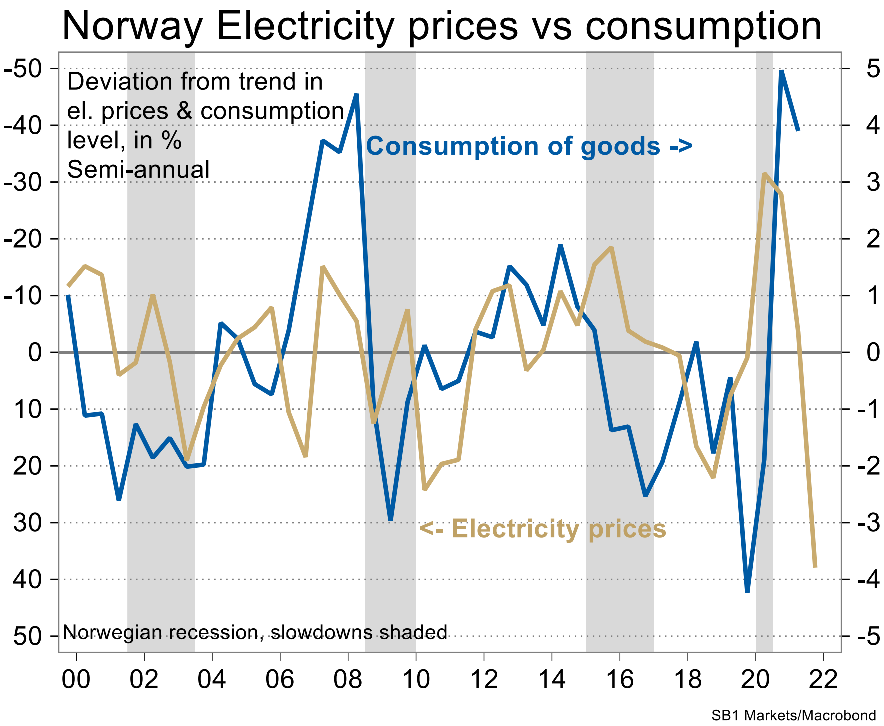
In average, CPI rose by 3.5 % last year. Wages probably added approx 3.25%



- Very likely, real wages fell in 2021, we assume by 0.1 – 0.3%
  - In 2020, real wages gained 2%, and in 2019 by 1%, following 3 unusual weak years, in sum down by 1.2%
- There are still a huge uncertainty vs. electricty prices in 2022. The future market, cut in the electricty tax and the government subsidy program through Q1, implies a sharp decline in the annual growth rate through H1

Electricty prices are negatively correlated with consumption, but not closely

Variations in the total price level is more important



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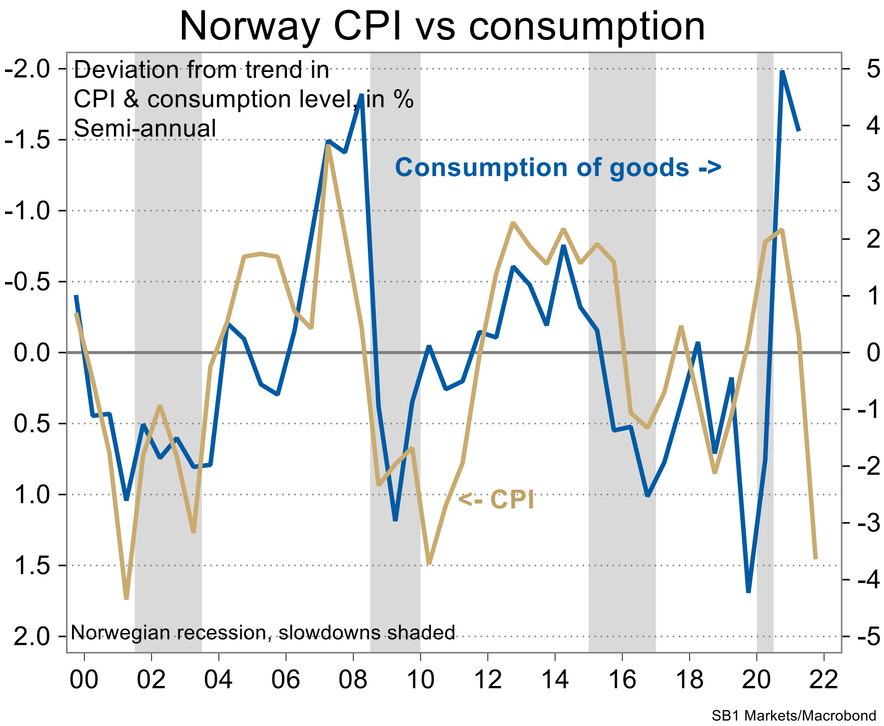

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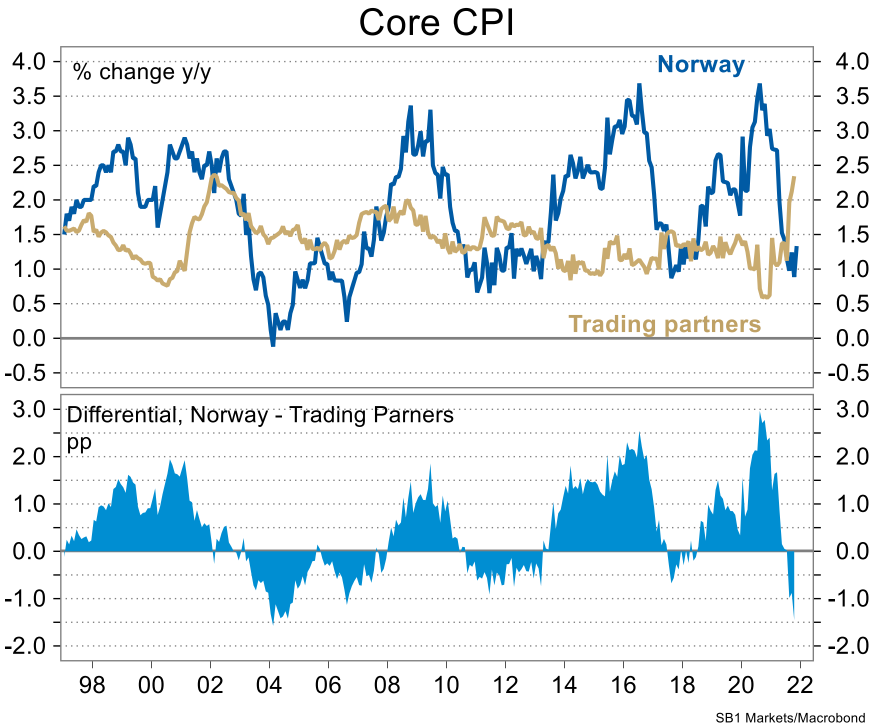
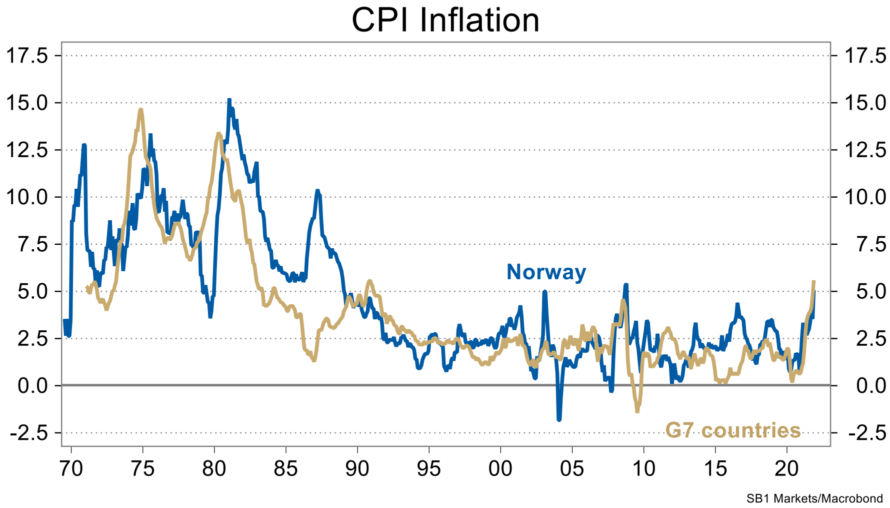
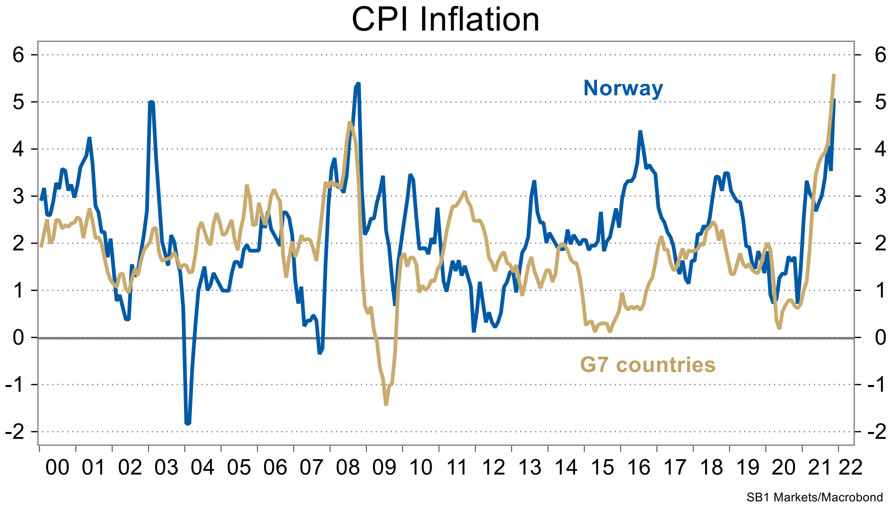
- Will overall consumption be hurt by the hike in electricity prices? Real income has fallen recent months, and from time to time consumption probably have been impacted. However, the correlation is not precise
- The **correlation vs. total CPI** is much closer, check the chart to the right
- The current increase in the overall CPI level, now driven mostly by electricity prices, <u>will probably have some impact on consumption</u>. However, the household sector has accumulated substantial savings through the pandemic as it was not possible to spend on some services at home, or to spend abroad
  - » In addition, if electricity prices returns to normal levels the coming quarters, the impact will anyway be short lived

Norway vs ROW: Long term CPI ‘regimes’ have been correlated

But limited short term correlations, in the ‘low inflation regime’







- Norwegian core CPI vs. trading partners’ core is close to uncorrelated past 20 years. The headline CPIs have been somewhat better correlated, due to co-movements in energy prices
- During the ‘70s early ‘80s Norwegian headline inflation was correlated to the global (G7) CPI cycle (and mostly lagging)

Most core elements surprised at the upside

Electricity prices up, but not by much (as we assumed), and annual inflation down. More to come!

		Change m/m, seas. adj			Change y/y			Contribution, pp		
Dec-21 CPI ATE	Weight %	Out- come	SB1M f'cast	Dev. pp	Prev. month	Out- come	SB1M f'cast	m/m	y/y	Dev. vs f'cast
Food, non alc bev	13.0	1.0	0.1	0.9	-1.5	0.4	-1.1	0.13	0.05	0.12
Alcohol, tobacco	4.3	0.3	0.2	0.2	1.6	1.6	1.2	0.01	0.07	0.01
Clothing, footwear	4.9	0.0	0.1	-0.1	-0.8	-1.2	-1.3	0.00	-0.06	-0.00
Housing x. energy	20.5	0.1	0.2	-0.0	1.6	1.5	1.5	0.02	0.30	-0.01
Furnishing	6.8	1.0	0.2	0.8	1.8	2.8	1.4	0.07	0.19	0.06
Health	3.2	0.3	0.2	0.1	2.9	3.2	3.0	0.01	0.10	0.00
Transp. ex. gas, airl. tick	12.0	0.2	0.2	0.1	0.4	0.6	0.2	0.03	0.07	0.01
Airline tickets	1.0	6.8	0.2	6.6	12.7	21.4	14.5	0.07	0.22	0.07
Communication	2.5	-0.0	0.1	-0.1	0.5	0.3	0.5	-0.00	0.01	-0.00
Recreation, culture	11.2	0.2	0.2	0.0	1.9	1.8	1.9	0.02	0.21	0.00
Education	0.5	-	-	-	1.7	1.7	1.7		0.01	0.00
Restaurants, hotels	5.9	-0.1	-0.1	0.0	5.7	5.0	5.0	-0.00	0.29	0.00
Other	8.7	0.2	0.2	-0.0	2.3	2.3	2.3	0.02	0.20	-0.00
CPI-ATE	94	**0.4**	**0.1**	0.3	**1.3**	**1.8**	**1.3**			0.24
Norges Bank est.			**0.2**		**1.3**		***1.3***			
Imported	34	0.6	0.1	0.5	0.9	1.1	0.5	0.20	0.38	0.17
Domestic	60	0.3	0.1	0.1	1.3	1.8	1.3	0.17	1.08	0.08
Energy, housing	3.6	6.1	6.0	0.1	122.4	103.1	100.9	0.22	3.69	0.01
Energy, transport	2.0	1.1	-2.0	3.1	30.6	21.3	17.5	0.02	0.43	0.06
CPI Total	100	**0.8**	**0.3**	0.5	**5.1**	**5.3**	**4.7**	0.85	5.31	0.55
Change m/m based on seasonally adjusted data (calc by SB1M)										
Sum of parts does not necessarily add up to totals										
Norges Bank m/m s.a. estimate is implied, calc by SB1M										

- **Food** prices rose 1% m/m, and are up 0.4% y/y, far above our est. Most sub comp. contributed
- **Clothing** prices unch m/m, down 1.2% y/y
- **Furniture/hardware/equipm** prices up 1% m/m, up 2.8% y/y – trend still not aggressive
- **Transport ex. gas/airfare tickets** up 0.2% m/m and are up just 0.6% y/y! Auto prices are not up!
- **Airline ticket** prices further up in Dec, back to a 'normal path' – from far below
- **Recreation** prices up 0.2%% m/m, and up just 1.9% y/y
- **Restaurant/hotel** down 0.1% m/m, up 2.3% y/y

- **CPI-ATE** up 0.4% m/m, 1.8% y/y, 0.5 pp above our & NoBa f'cast. Consensus at 1.4%

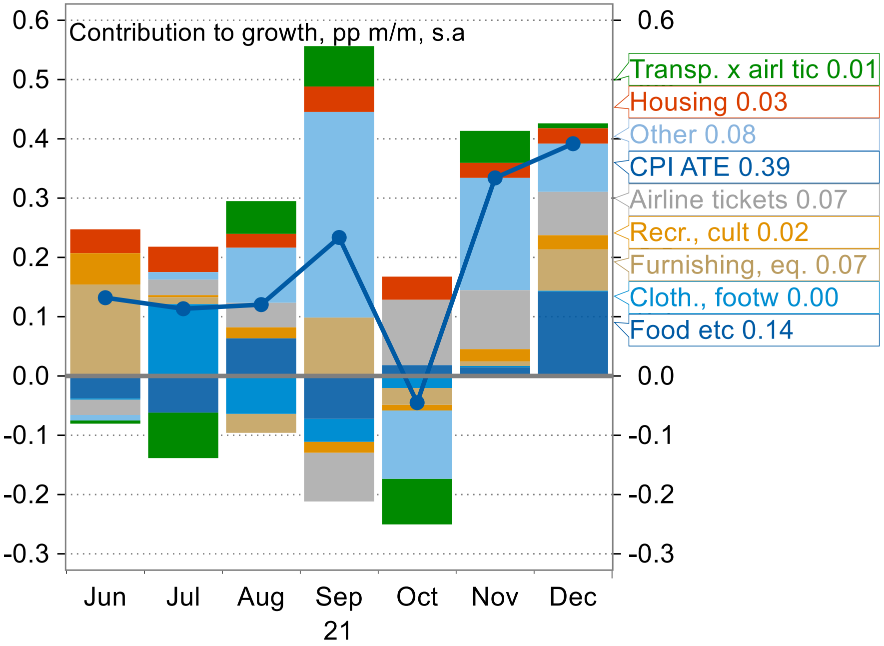
- Prices on **imported goods** rose 0.6% (imported food, furniture etc.)
- Prices on **domestically produced** goods & services were up 0.3%, mostly due to airfare tickets. The annual rate up to
- **Electricity** prices rose as we assumed – the annual rate fell – more next page
- … **headline inflation** up to 5.3%

Monthly changes are seasonally adjusted by SB1 Markets. The weighted sum of the components does not necessarily sum exactly up to the total, and deviations m/m and y/y do not necessarily add up. Norges Bank m/m s.a. estimate is implied, calculated by us. Sources: SSB, Norges Bank, SB1 Markets calculations

Airline tickets, restaurants/hotels, transport contributed at the upside in Nov

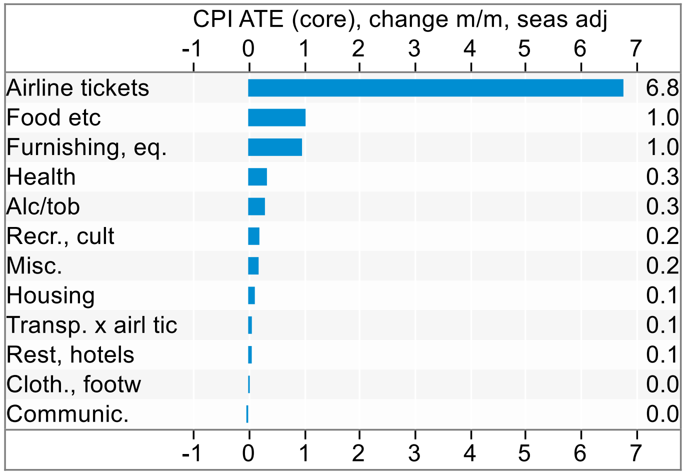
Airline tickets contributed with 0.1 pp (of the 0.3 core total

Norway Core CPI



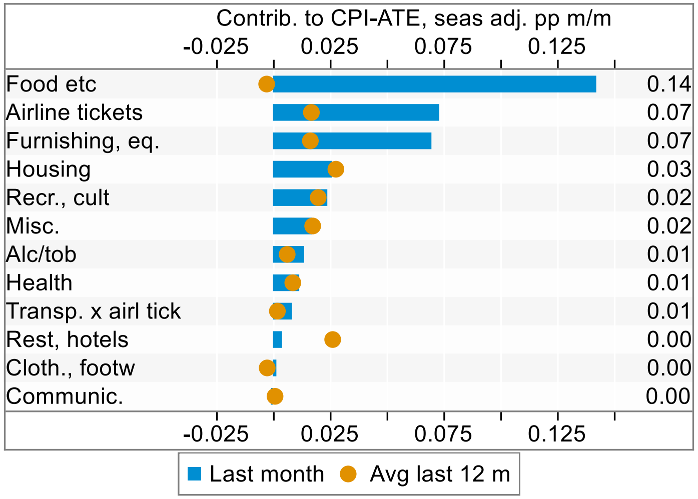
SB1 Markets/Macrobond

Norway CPI, change last month



SB1 Markets/Macrobond

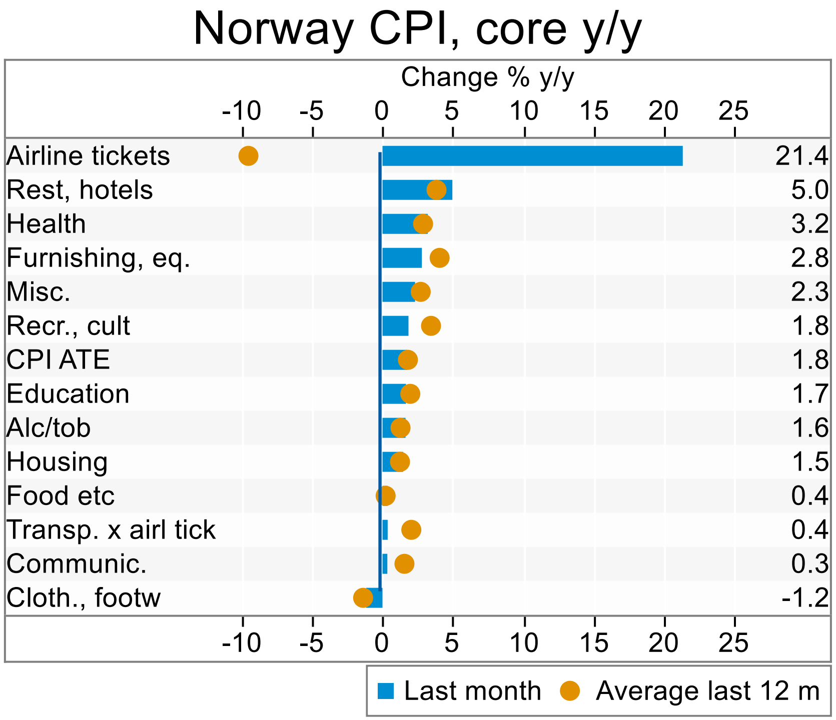
Norway CPI, core contrib. m/m



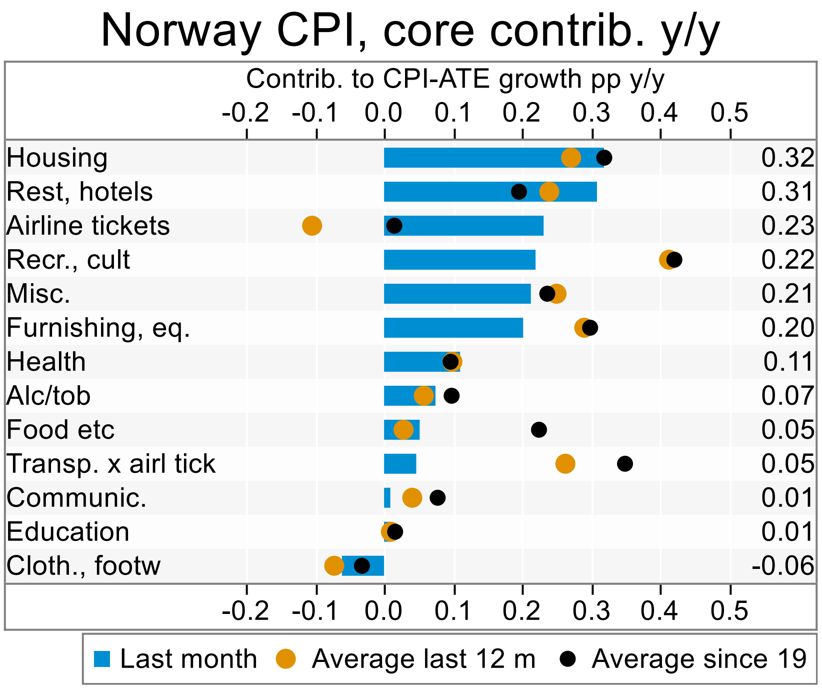
SB1 Markets/Macrobond

5 sectors report core inflation above 2%, 8 are still below!

Housing ,restaurants/hotels, airline tickets & recreation/culture have done the heavy lifting past 12 m



SB1 Markets/Macrobond

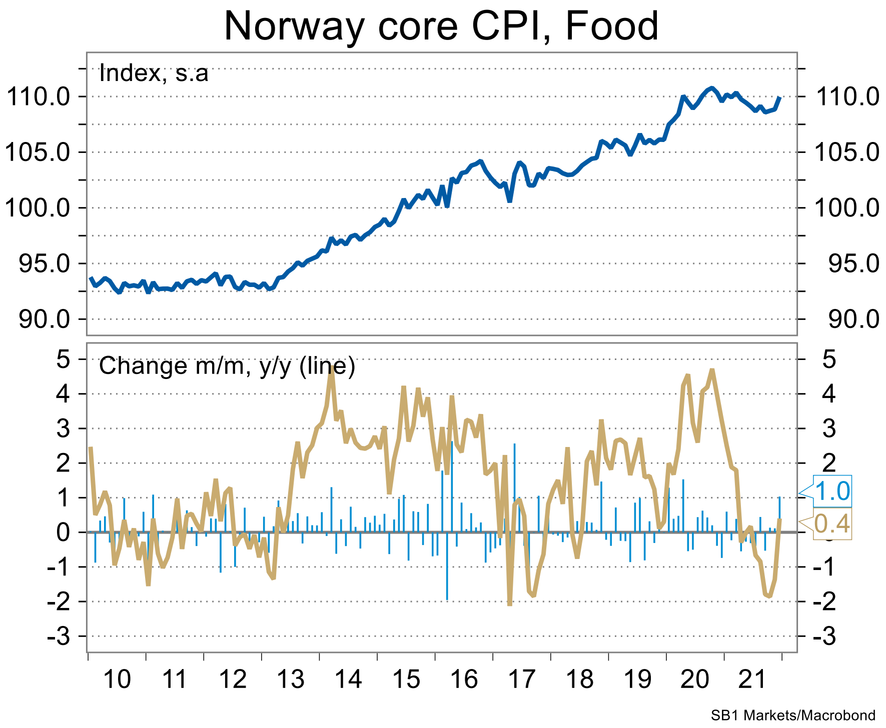


SB1 Markets/Macrobond

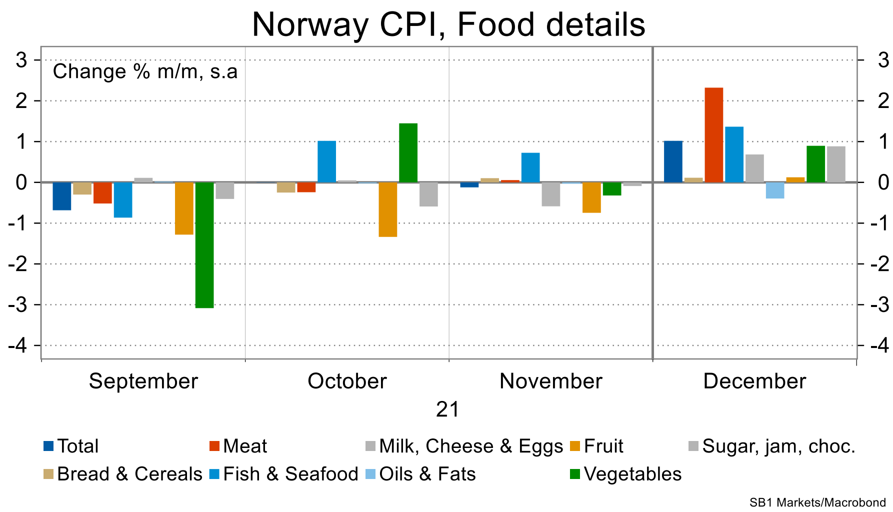
- Just airfare tickes and hotels/restaurant have contrbuted more to annual CPI vs the average since 2019, because prices were very low in Dec 2020

Food prices suddenly up 1.0% m/m, still up just 0.3% y/y

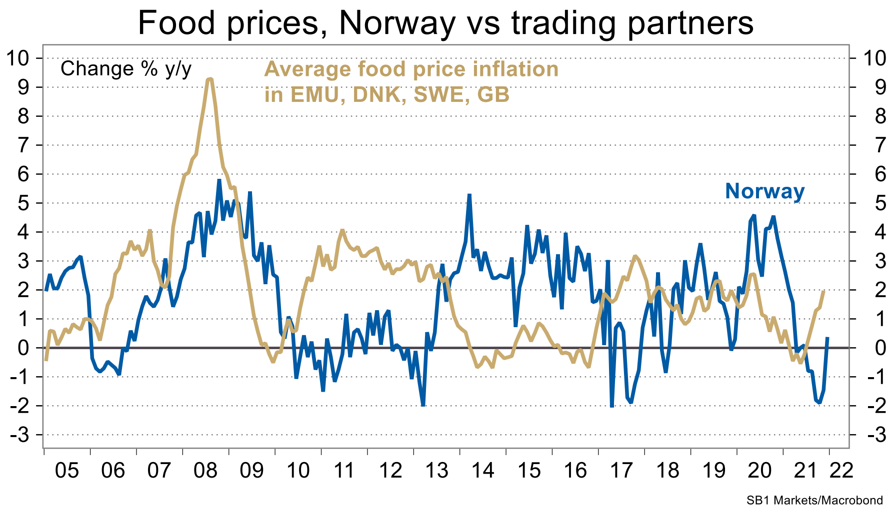
Most prices rose in December, meat and fish/seafood the most (1.3 – 2.2%)


Norway core CPI, Food

SB1 Markets/Macrobond


Norway CPI, Food details

SB1 Markets/Macrobond

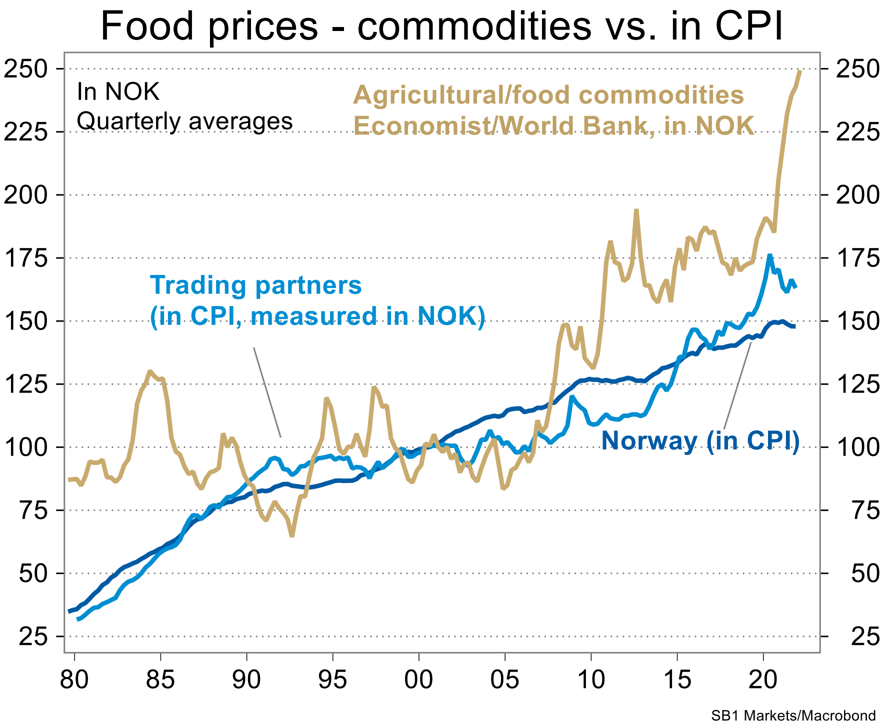

Food prices, Norway vs trading partners

SB1 Markets/Macrobond

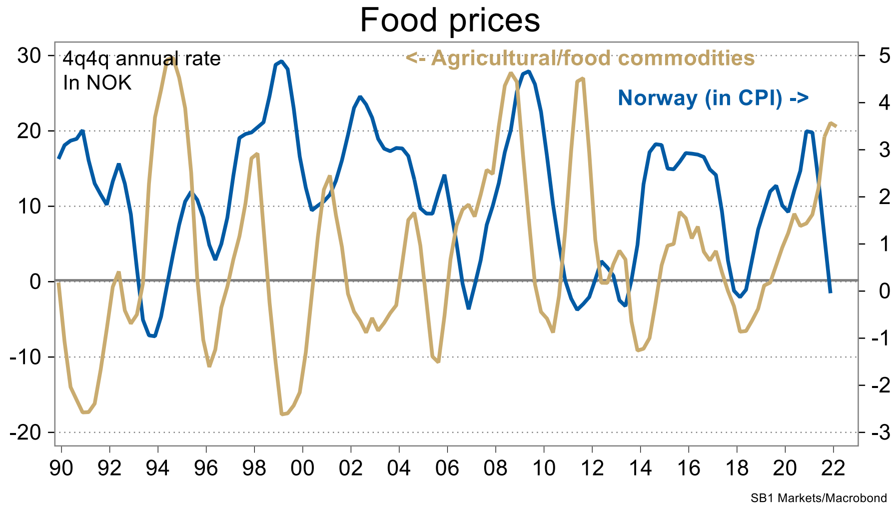
- **Norwegian food prices** have been trending down since October 2020, until last December
- **Food prices** have been kept in check among our European peers too, at least until some months ago, despite the lift in global food commodity prices (check next page too)
- **Norwegian CP food prices** are not correlated with food prices among our European neighbours. The NOK exchange rate explains quite a lot, which is picked up in our analysis on imported goods inflation

Food commodity prices: Very limited correlation to trading partners food prices

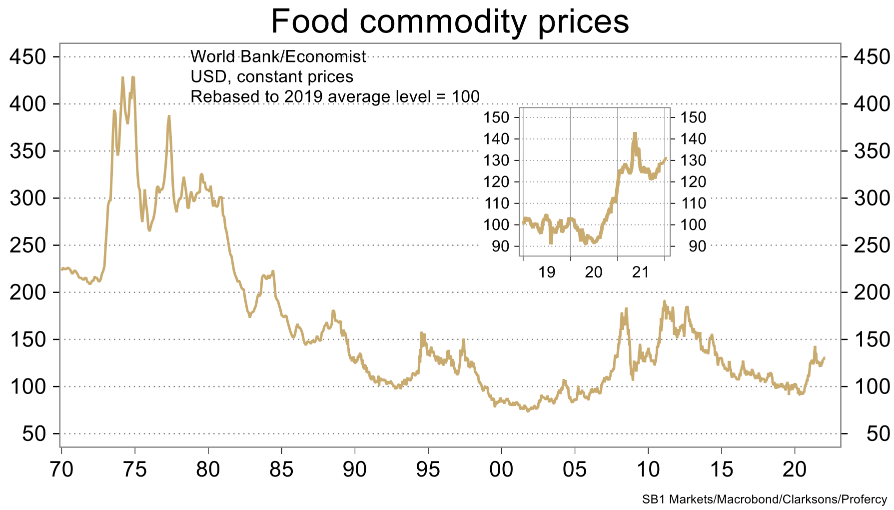
… And no stable correlation at all to Norwegian food prices (in the CPI)


Food prices - commodities vs. in CPI

SB1 Markets/Macrobond


Food prices

SB1 Markets/Macrobond

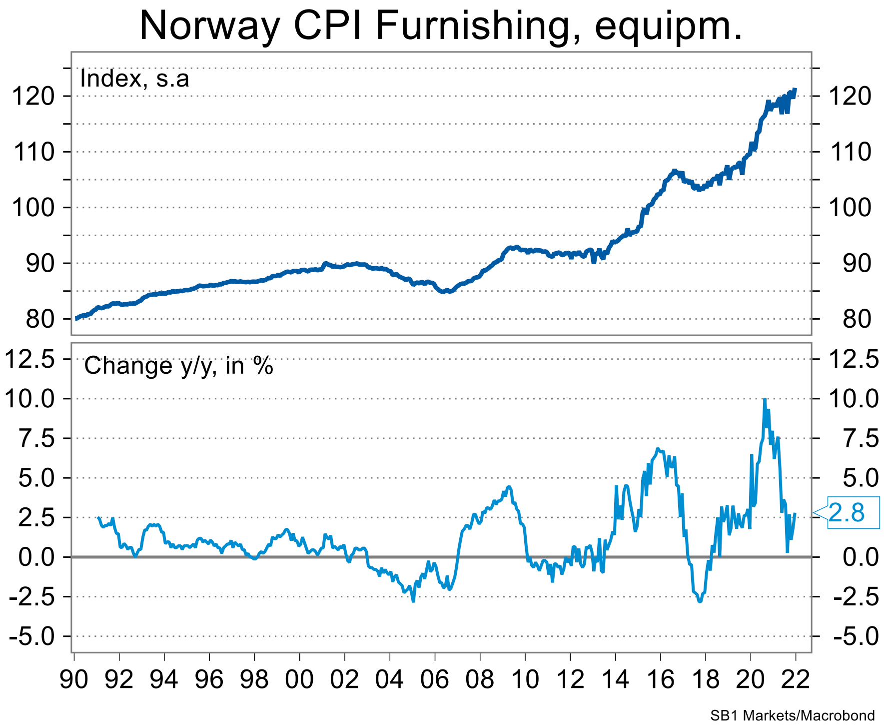

Food commodity prices

SB1 Markets/Macrobond/Clarksons/Proferocy

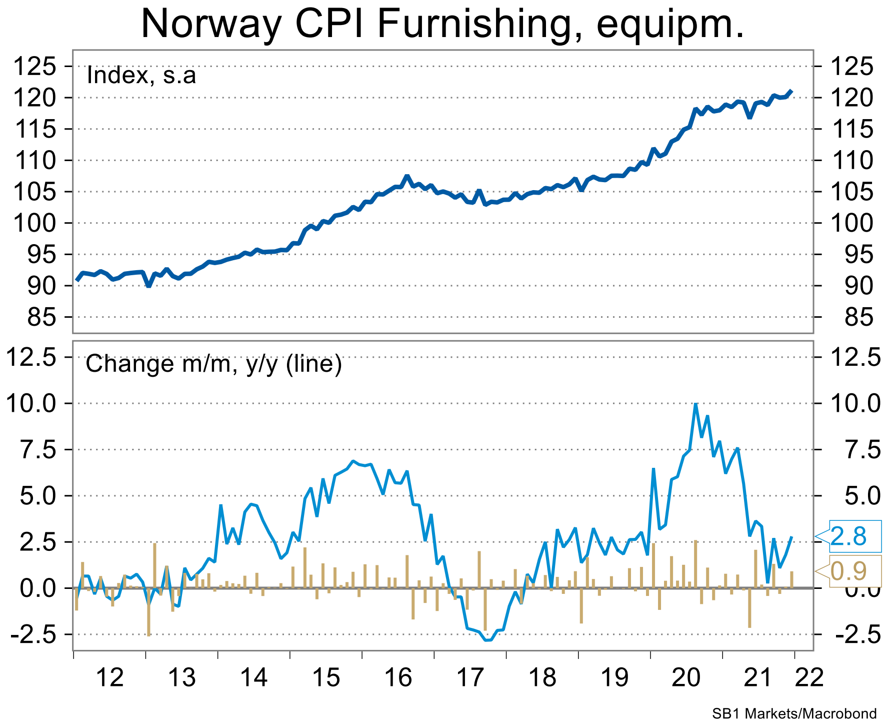
- Try to find a close correlation on the chart above to the right – there are some, over short periods but no consistency at all
- Agricultural/food commodity prices are sharply up from mid 2020 but far from dramatic vs. previous hikes, and the level is not high, in real terms, check the chart to the right. Prices are lower today than last spring

Furnishing prices up in Dec but the trend has not been aggressive since Aug-20

The NOK ‘collapse’ lifted prices sharply in 2020 – since then a ‘permanent’ higher price level



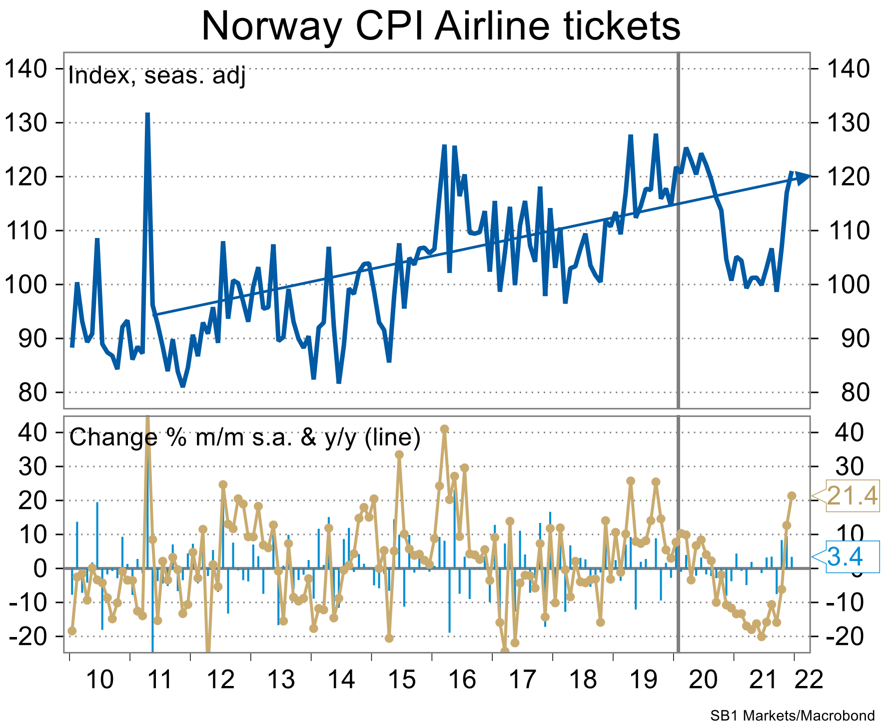
SB1 Markets/Macrobond



SB1 Markets/Macrobond

A good month for the airline industry, at least vs ticket prices (while traffic fell)

Ticket prices are back to normal? Well, they are very volatile – but the price level now look 'fair'

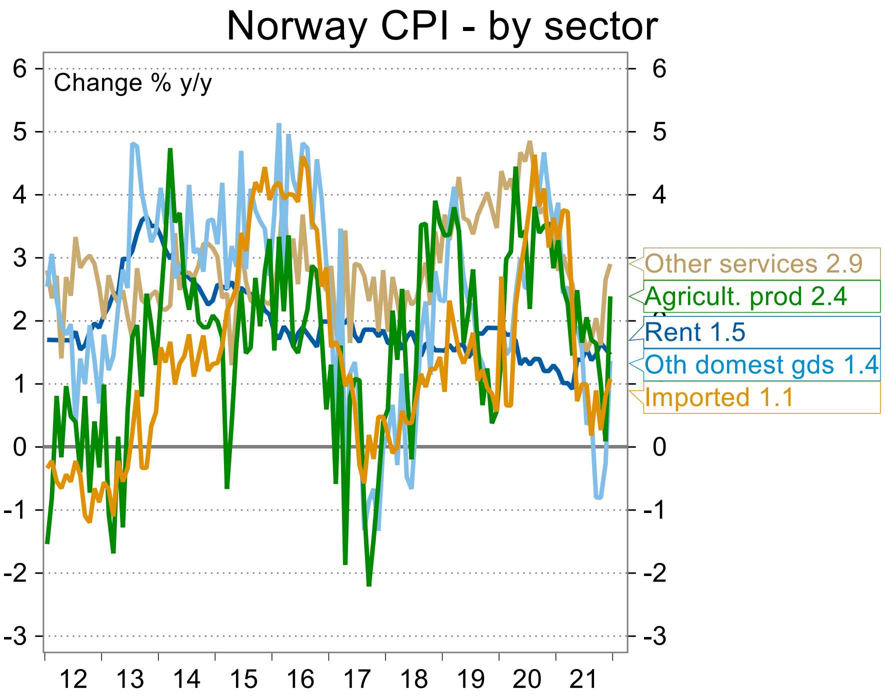


SB1 Markets/Macrobond

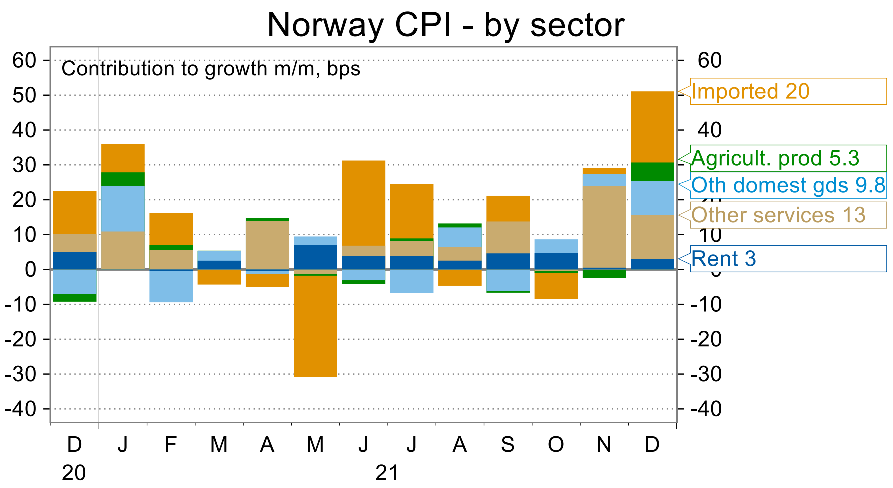
- **Airfare ticket prices** rose 3% in December following the 8% lift in October, and 10% in November. Prices are up 21% vs Dec last year, lifting the core CPI by 0.23 pp.
- The **contribution** will probably remain high through most of 2022, but in December next year, it is very likely much smaller ☺

Imported prices contributed the most in December – but all others in plus too!

The contribution from rents is still low, while services on the way up



SB1 Markets/Macrobond



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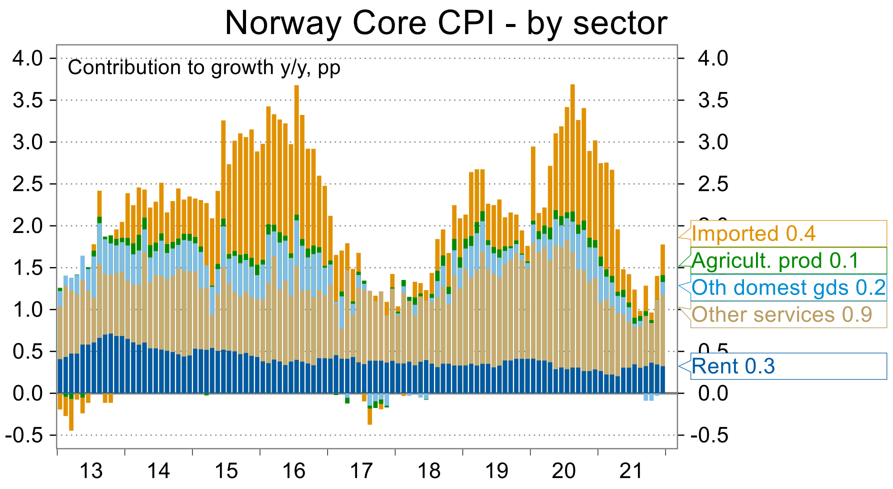


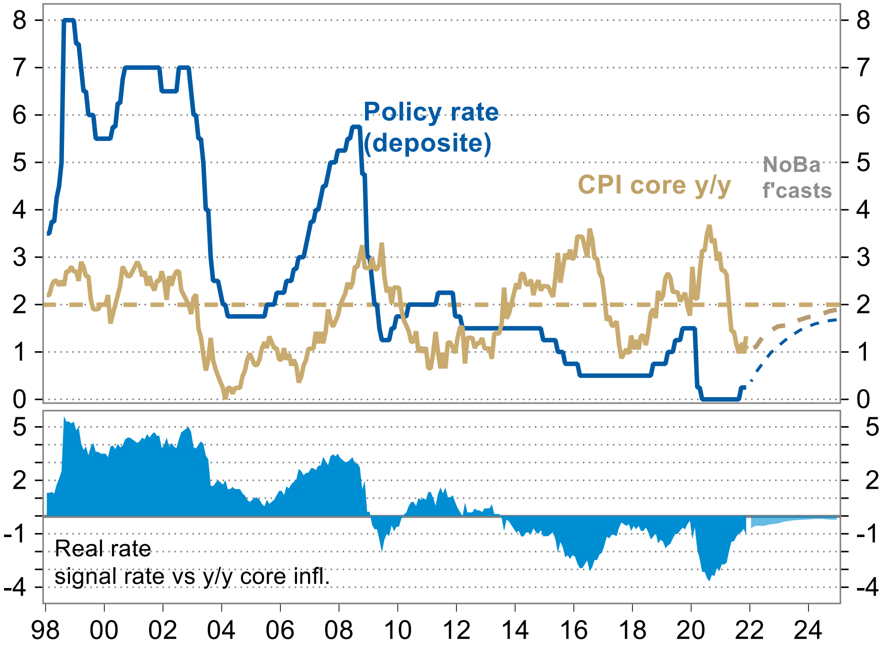
SB1 Markets/Macrobond

- **Domestic services inflation ex rents** slowed sharply during the corona crisis, and not just only due to cheaper airline tickets, other non-labour-intensive services have contributed as well
    - » Now, price inflation is gaining some speed again, and services are up 2.9% y/y
- **Rent inflation** has accelerated to 1.5% from 1% in early 2021 but is still lower the 1.7% – 2% rate before corona
- **Other goods** than agricultural & imported products are up 1.4% y/y, and contributed substantially m/m in Dec

Norges Bank has not been an inflation nutter (since 2010, at least)

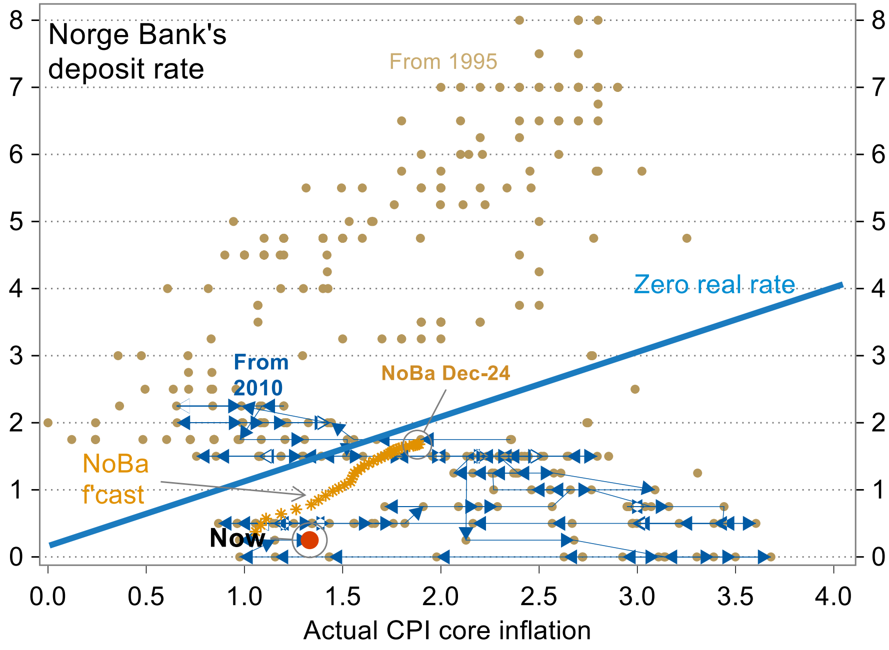
Actual inflation has not been correlated to interest rates

Norges Bank vs. CPI



SB1 Markets/Macrobond

Norges Bank vs CPI



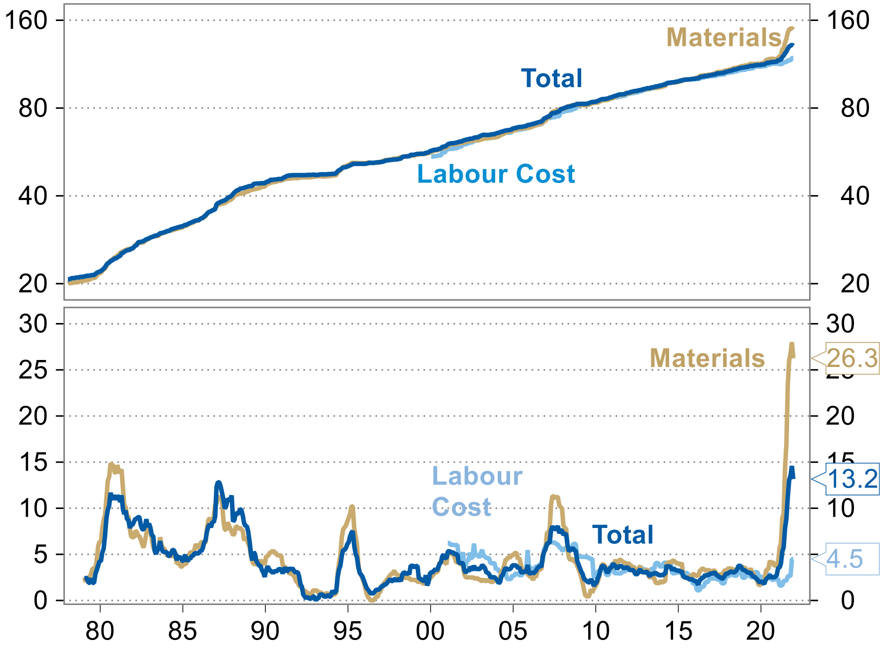
SB1 Markets/Macrobond

- In September, the Bank assumed the signal rate will be hiked gradually to approx 1.75%, while core inflation is expected to drift slowly up from the present level towards the 2% target in 2024

Cost pressure in the construction sector has probably peaked

However, materials are still up 26% - and wage inflation may be accelerating somewhat

Norway Residential Construction Cost Index



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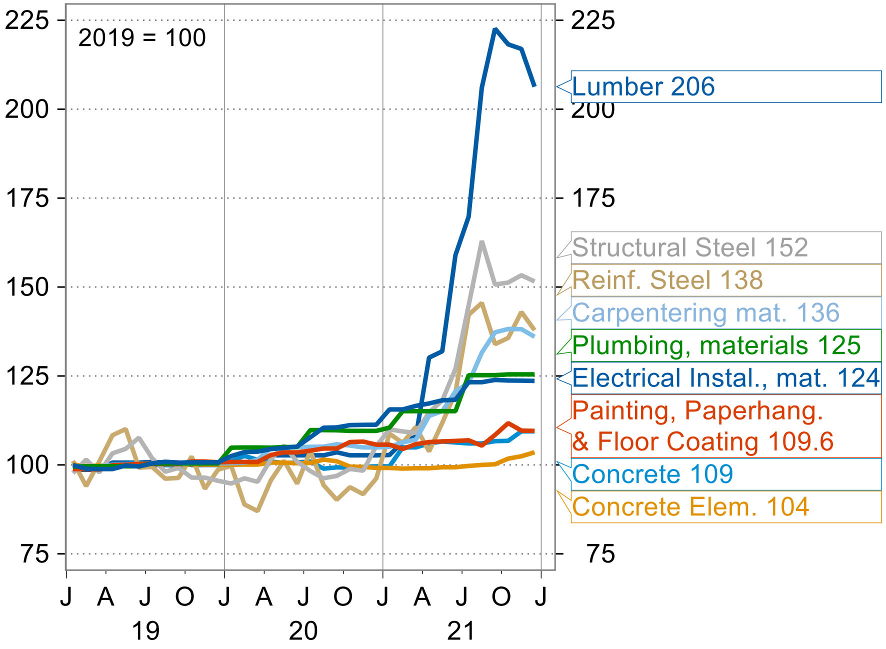
Norway, Residential constr, material costs



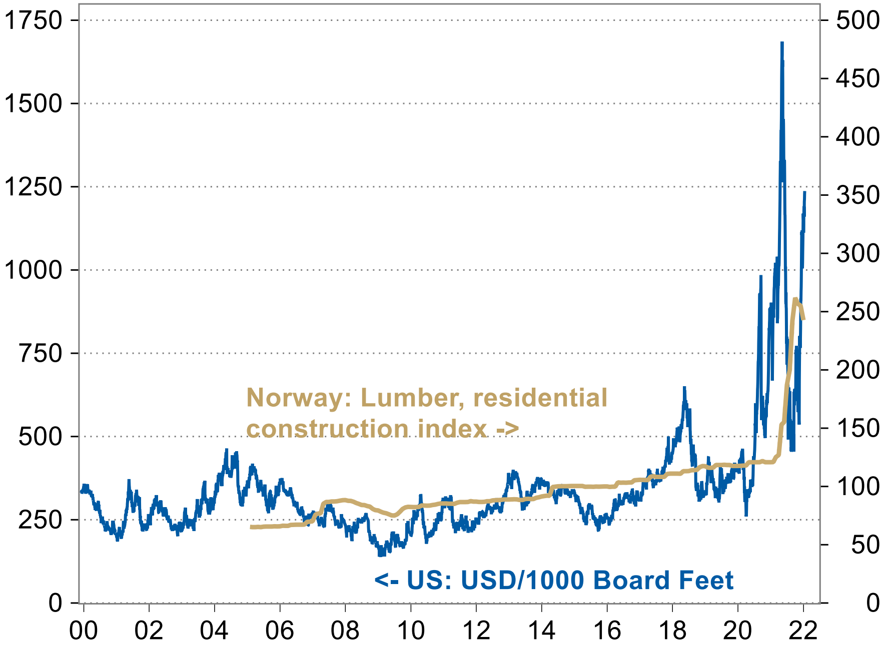
SB1 Markets/Macrobond

- Material prices flattened m/m in November, and the annual inflation rate fell to 26.3% from 28% (which was ATH, the previous record was 15% back in 1980)
  - » Lumber prices have more than doubled – but the past three months, prices have fallen marginally. Other material prices have also fallen – og at least stabilised
- Labour cost inflation accelerated to 4.5% y/y in November from 2.6% in October, to the highest level since 2009 – and remained at the same level in December
- Including labour costs, the total building cost index is up by 13.2%, down from the ATH at 14.6% last month

New warning: In the US, a 2nd lumber wave!

Lumber (2’’x4’’) prices have shot up again, to USD 1200/100 board feet, from USD 500

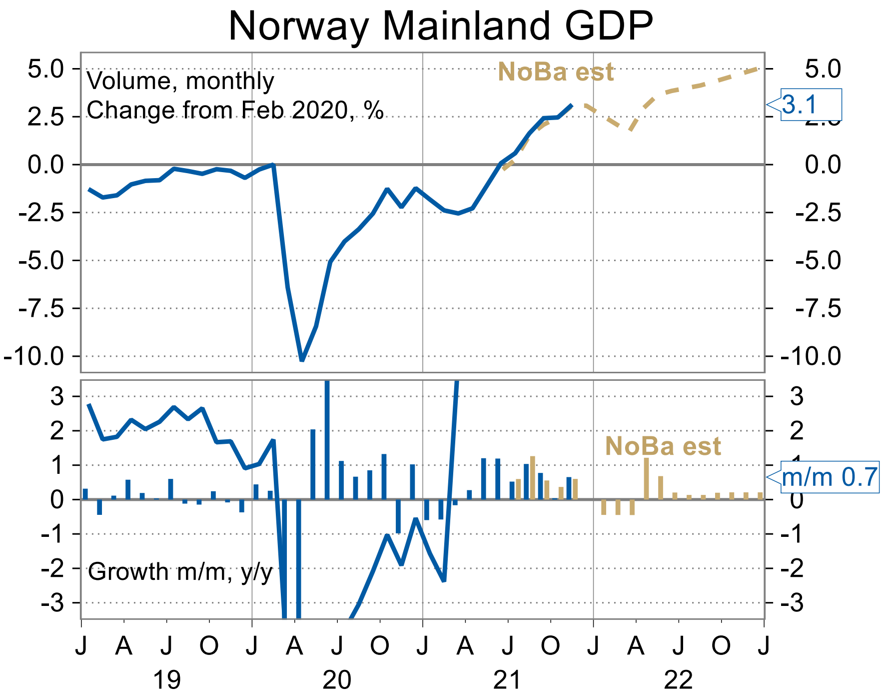
Lumber prices



SB1 Markets/Macrobond

Mainland GDP further up in November, broad based

Now, a mild and short downturn – and then a further recovery (if more labour is available, that is)



Norway Mainland GDP

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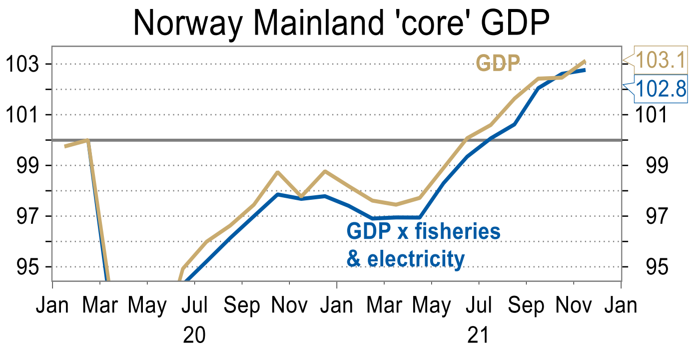


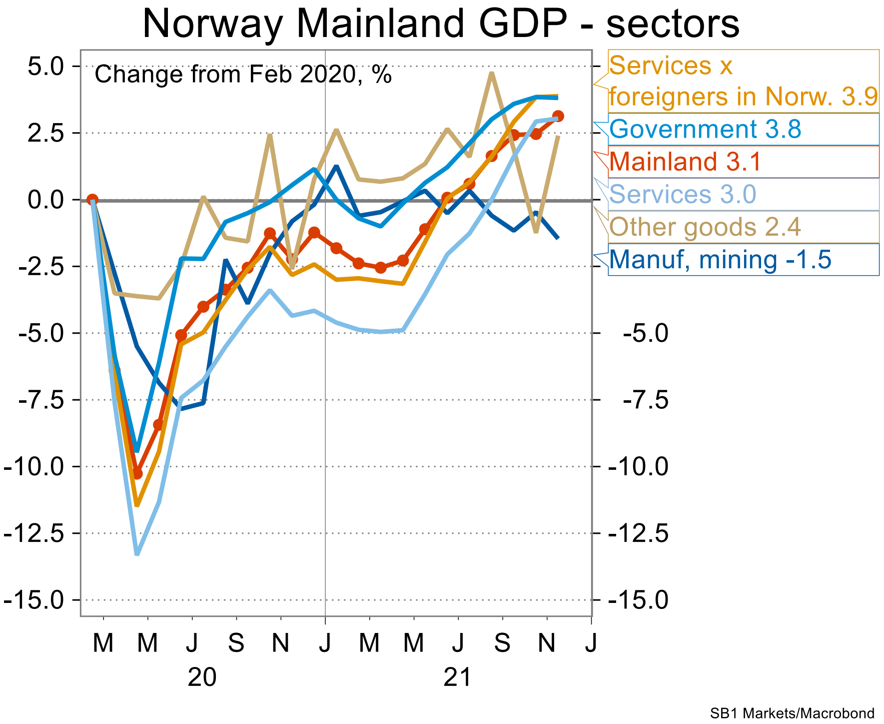
Norway Mainland 'core' GDP

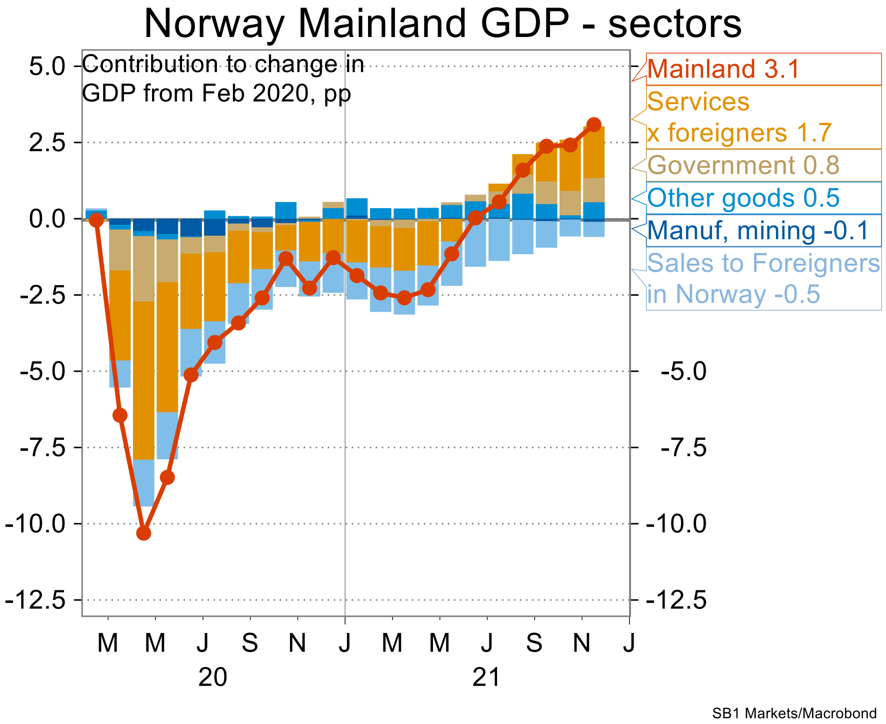
SB1 Markets/Macrobond

- **'Mainland' GDP** rose 0.7% in November, just above expectations (NoBa 0.6%, consensus 0.5% following the October pause. GDP is now 3.1% above the pre-pandemic level
  - » **Production:** Private services flattened following a strong recovery the previous months. The trend in
  - » **Demand:** Norwegians' spending at home was up flat, as spending abroad rose by 40%. Goods down, services up. Oil investments rose sharply, while Mainland business investments remain weak. Exports rose, imports fell. Inventories were drawn down
- **Mainland GDP is up 2.4% vs the Feb-20 level**
  - » **Production:** Services are back in black, Hotels & restaurants are in plus, while business services and transport is still below the Feb-20 level. Manufacturing is flat, construction is down 1.6%
  - » **Demand:** Norwegians' spending at home is up 7% from Feb-20, goods 10% (and now heading down), services up 1.5% - but still rapidly on the way up. Spending abroad is still down 56 %, and total household spending is up 1.8%. Oil investments are in plus, ML business investments are still below par
- **We expect a 1.3% Mainland GDP growth in Q4 (5.2% annualised pace), given a small decline in activity in December (-0.1%)**
- **The recovery has been strong. Now, virus restrictions will dampen activity in parts of the service once more. We expect a mild slowdown in Dec/Jan, and the a new start – more shallow and shorter than NoBa assumed in December**

Production: Other goods down the drain with the decline in fisheries

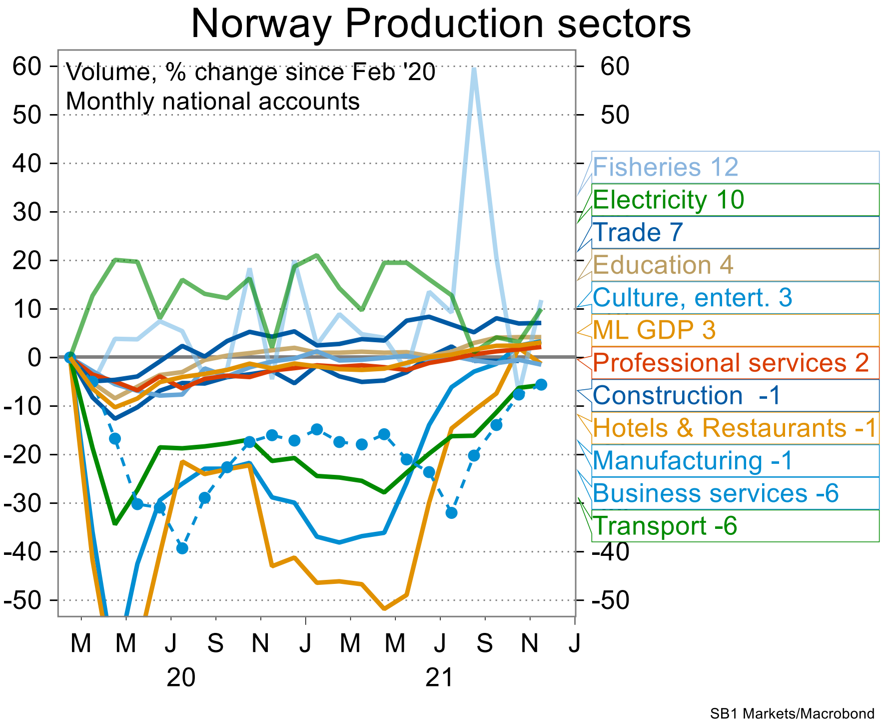
The recovery has been strong from the local through in March





Prod. details: Business services, transport still significantly down vs. Feb-20

Most sectors are trending upwards. Hotels/restaurants down – and more to come in Dec/Jan



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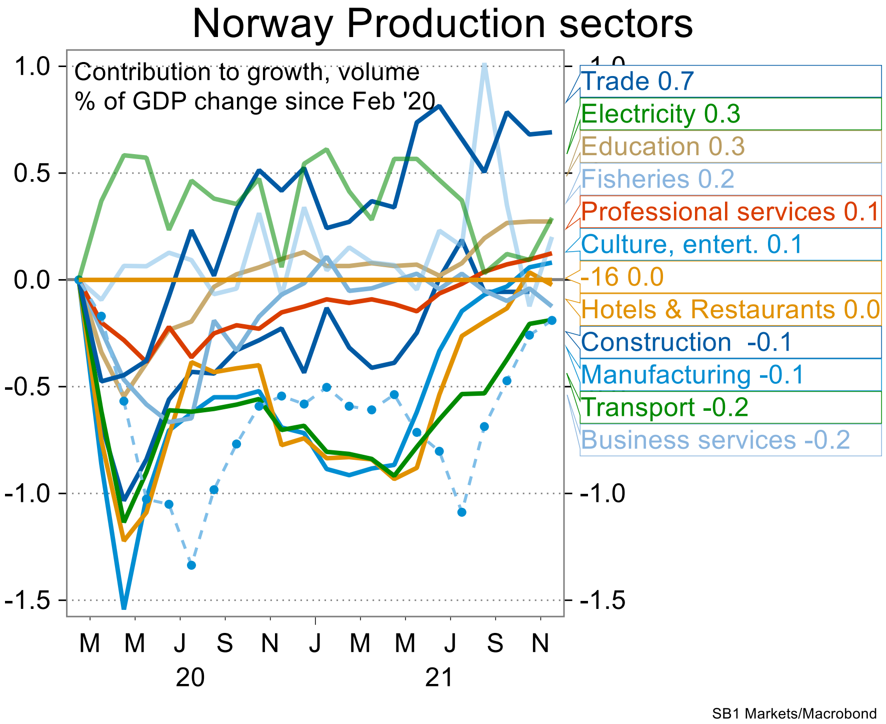

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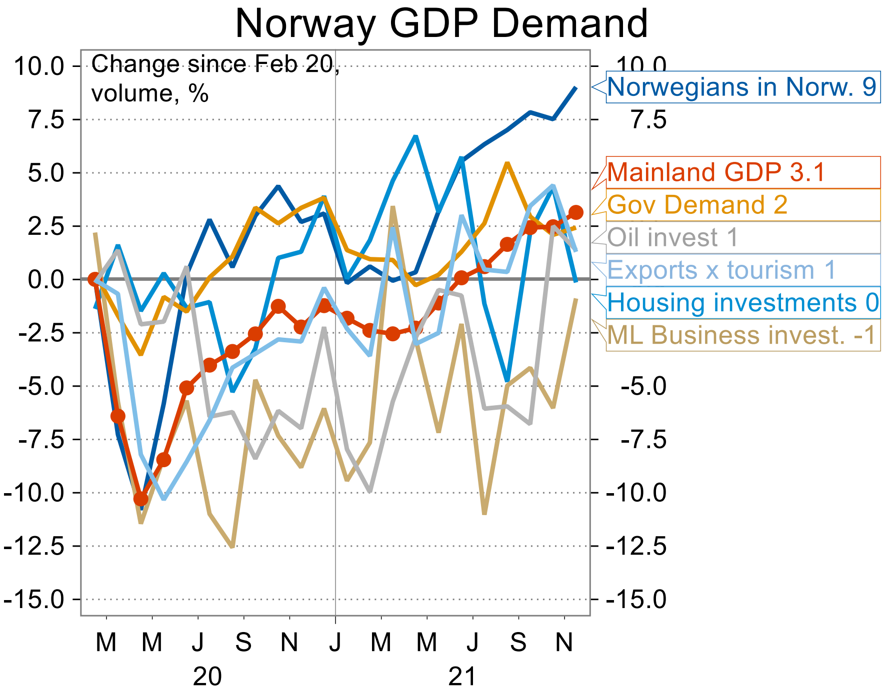
Business services: Temp services, travel agencies, call centres, congresses, cleaning, canteens, property services, leasing

Demand: Norwegians are spending more at home

Oil investments have recovered, as are now Mainland business investments



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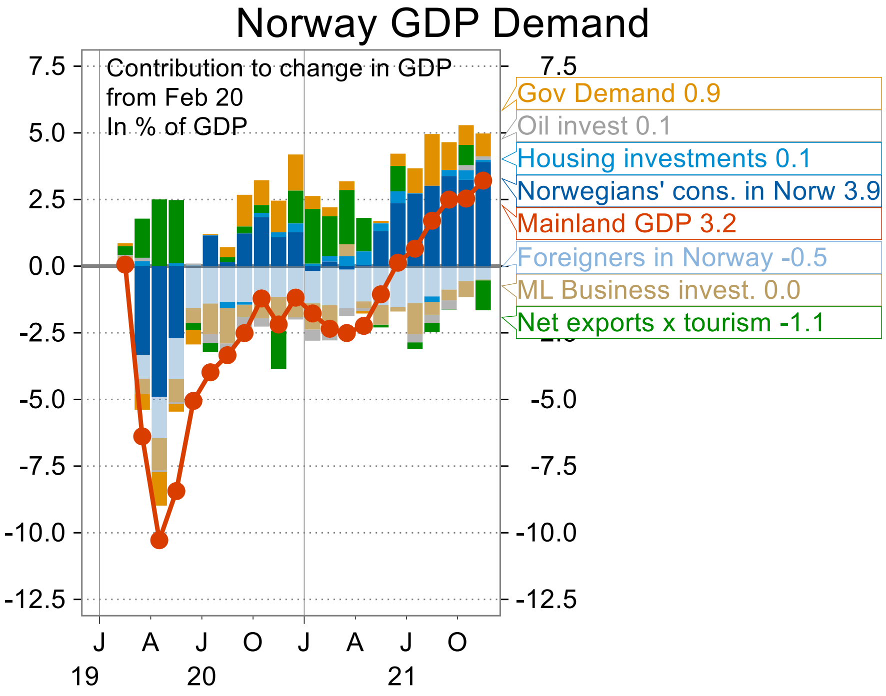
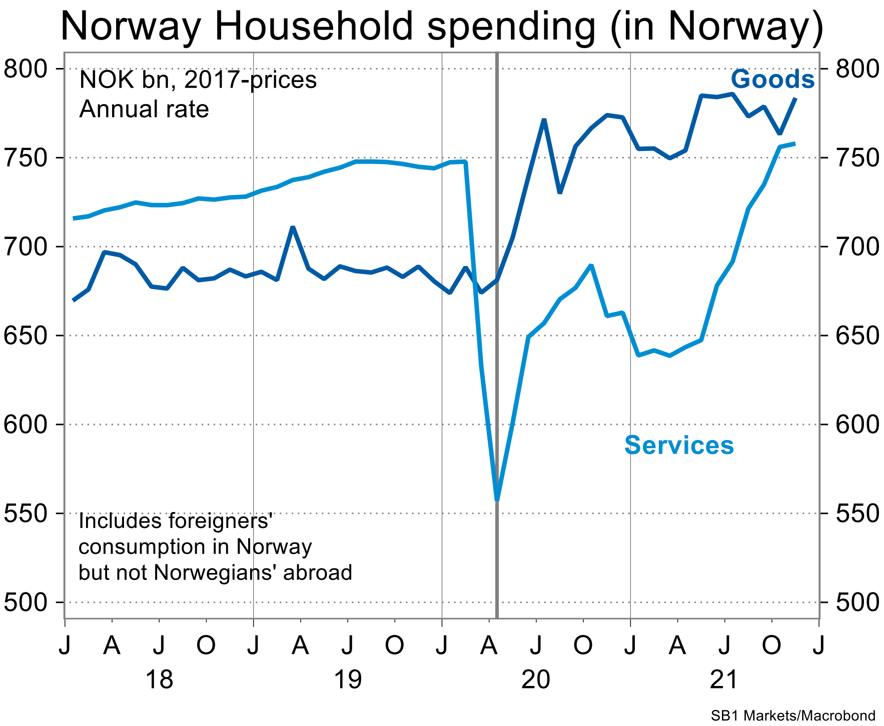


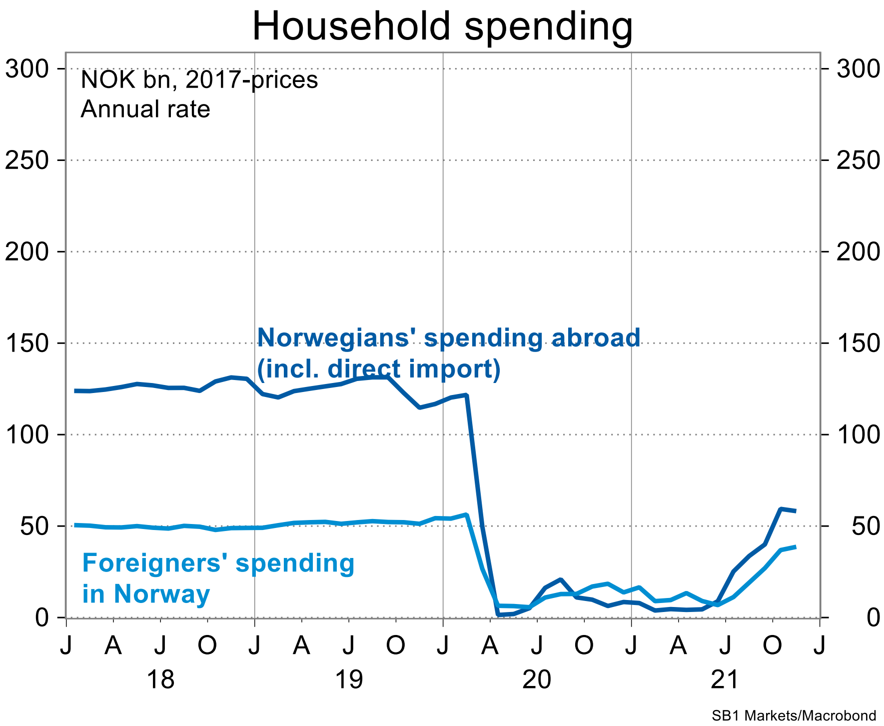
SB1 Markets/Macrobond

Services consumption in Norway finally above the Feb-20 level

A setback likely during the last (?) fight against the virus, thereafter at substantial upside



SB1 Markets/Macrobond



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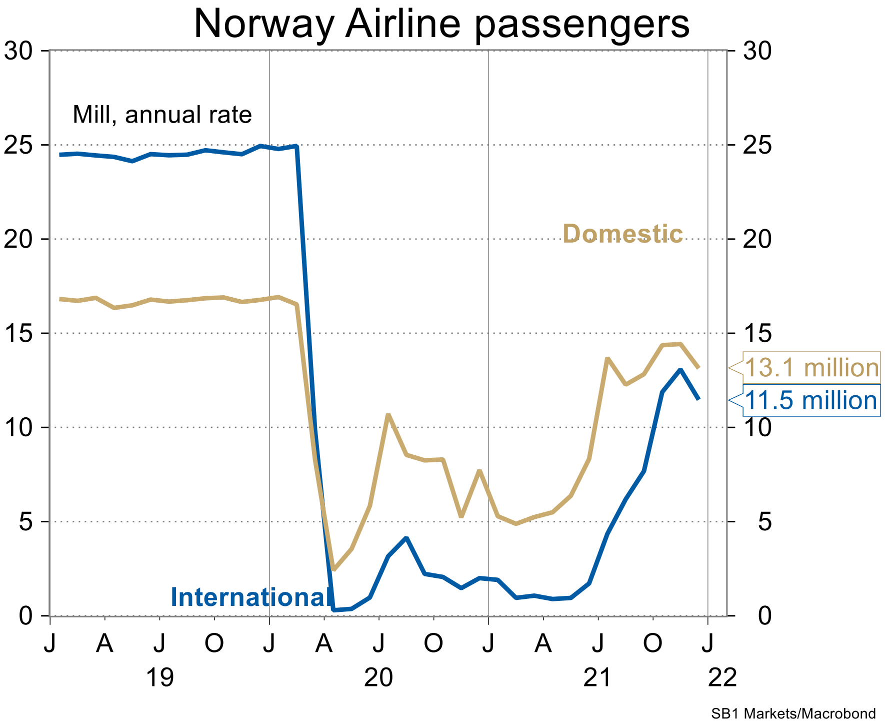
- Spending abroad is still muted, especially for Norwegians – foreign consumption in Norway has recovered far better!

Airline traffic down in December, as travel became more complicated again

Both domesic and international traffic fell some 10% m/m – and are down 21% and 53% vs. '19 resp.



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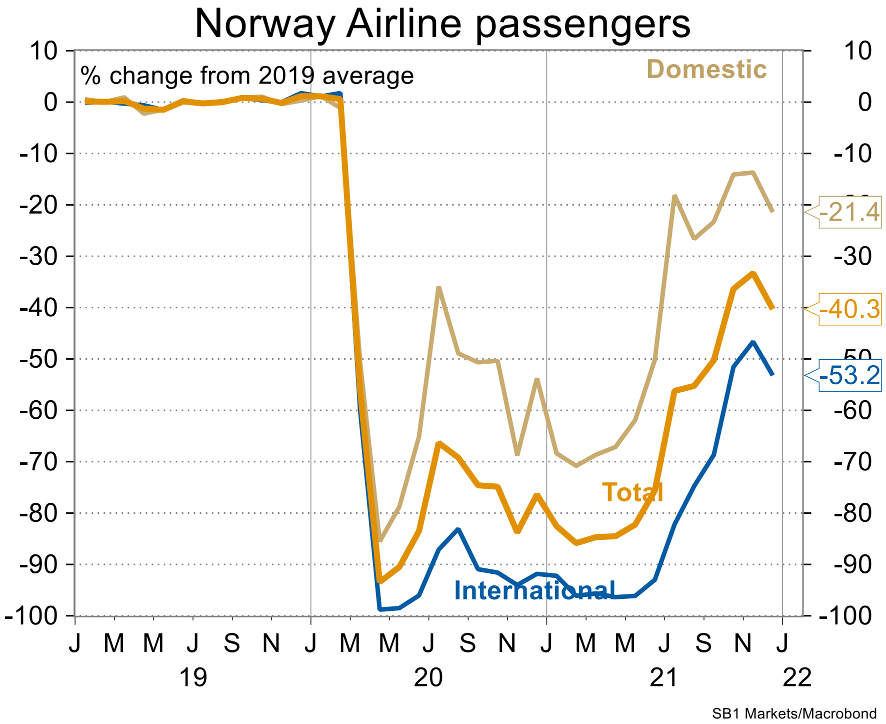

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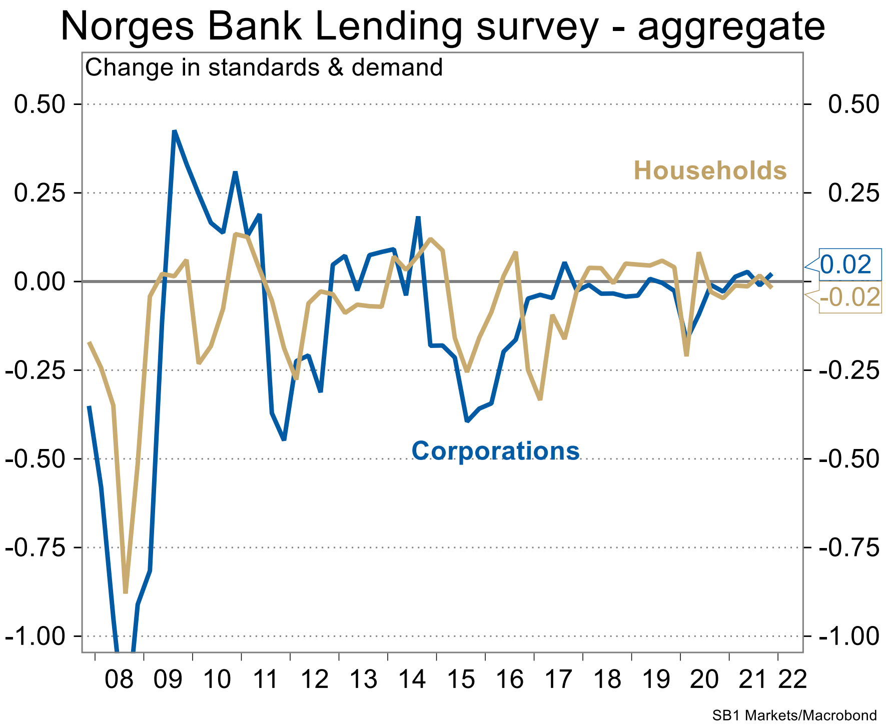
- Total traffic is down 40% vs. the average 2019 level

Bank lending survey indicates no changes in credit standards or demand

NoBa's Q4 survey signal close to normal demand for loans, and no expectations of future changes



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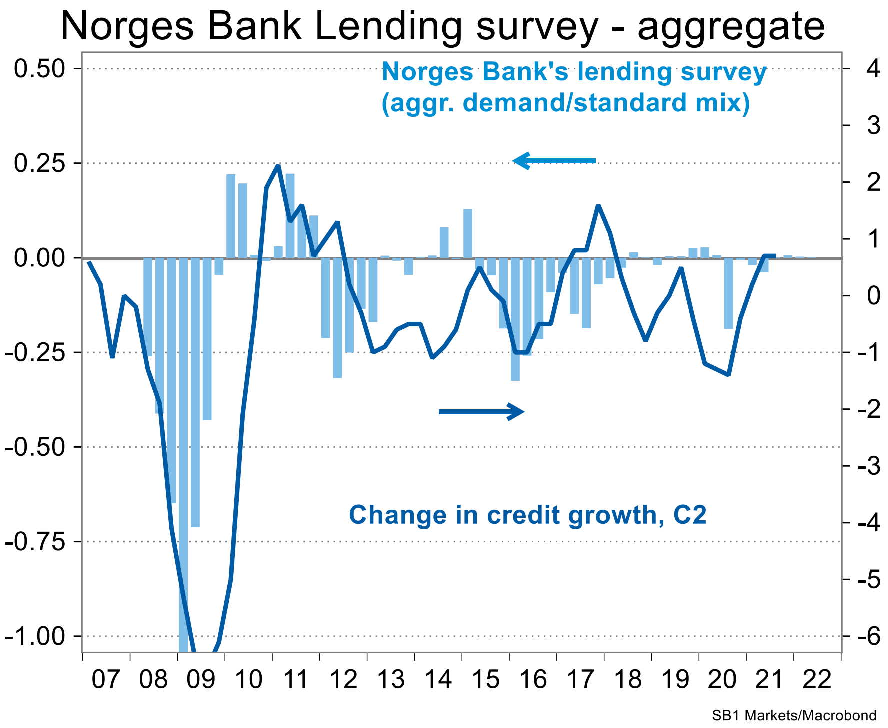

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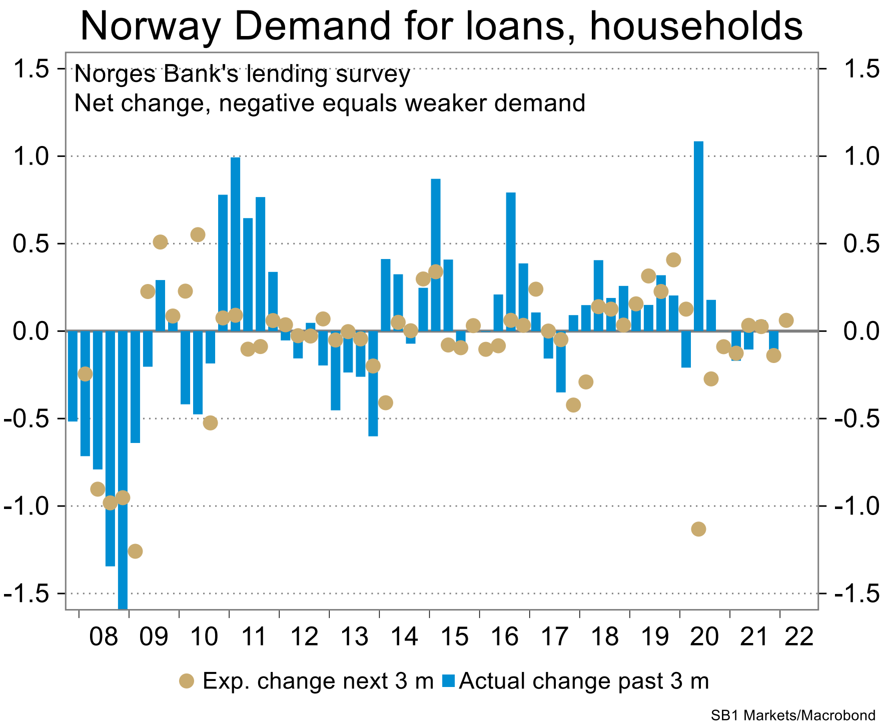
- There was virtually no change in demand nor lending standards for corporate credit, and banks do not expect any changes in Q4 either. However, margins has narrowed somewhat
  - » Also, banks are not expecting any changes to demand or lending standards in Q3
- Lending margins to households fell in Q4 as it takes some weeks to adjust mortgage rates – and the NIBOR continued upwards through the quarter

Data in this section are seasonally adjusted

Demand from households a tad weaker in Q4, expected unch in Q1

Banks expected a minor weakening in Q4, which materialised



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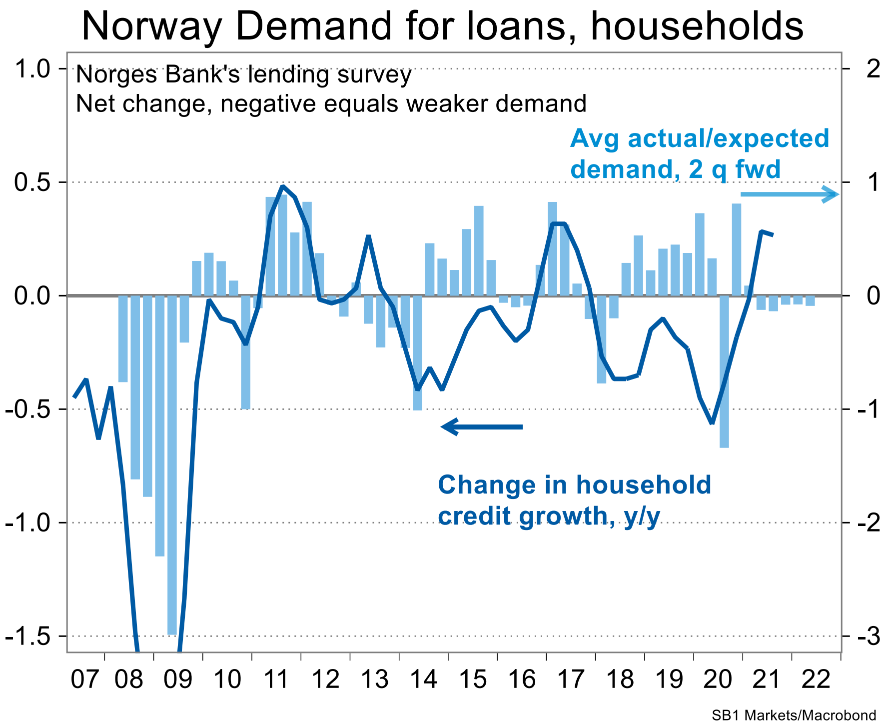

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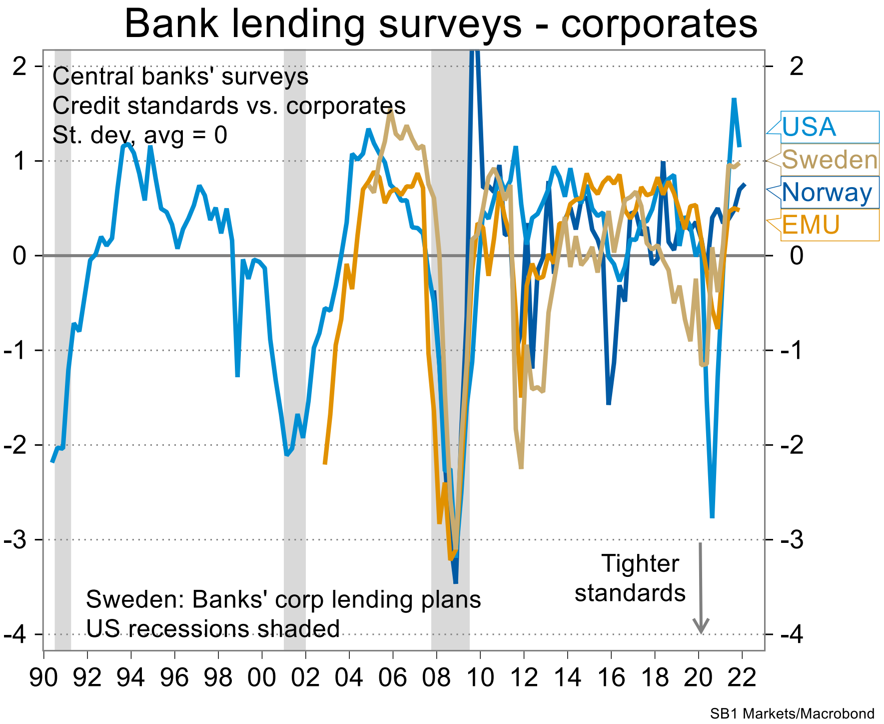
- There is not any tight correlation between banks' expectations for household demand for credit or their assessment of actual growth and the realised growth in households credit, as measured by the C2 credit indicator)
  - » Still, the lending survey probably tells the sentiment among bankers pretty well

Global view: Risk on, banks in large parts of the world are loosening policies

At least barring vs. households in the Euro zone



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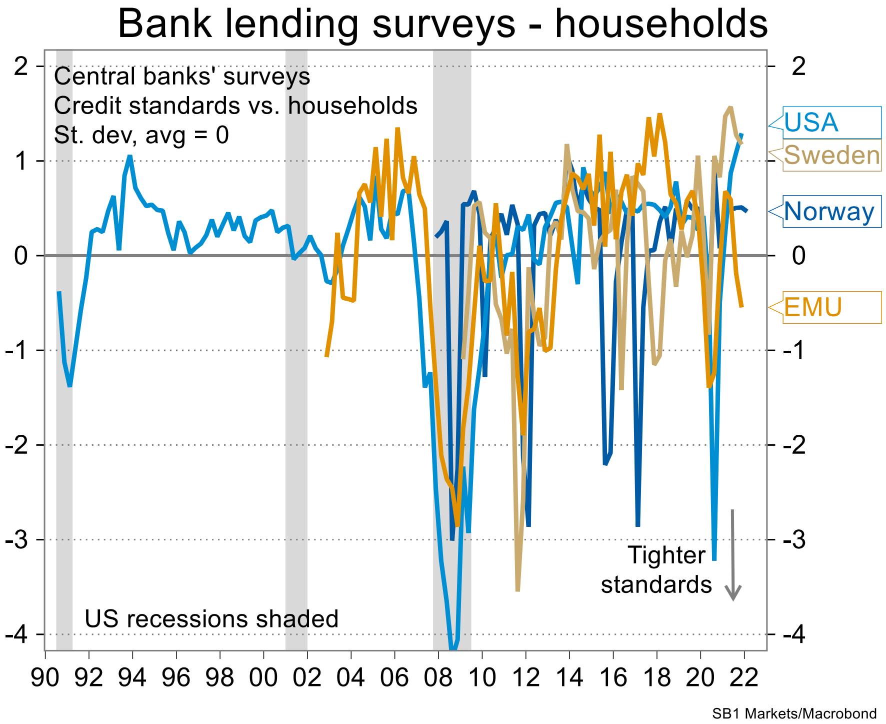


SB1 Markets/Macrobond

Highlights

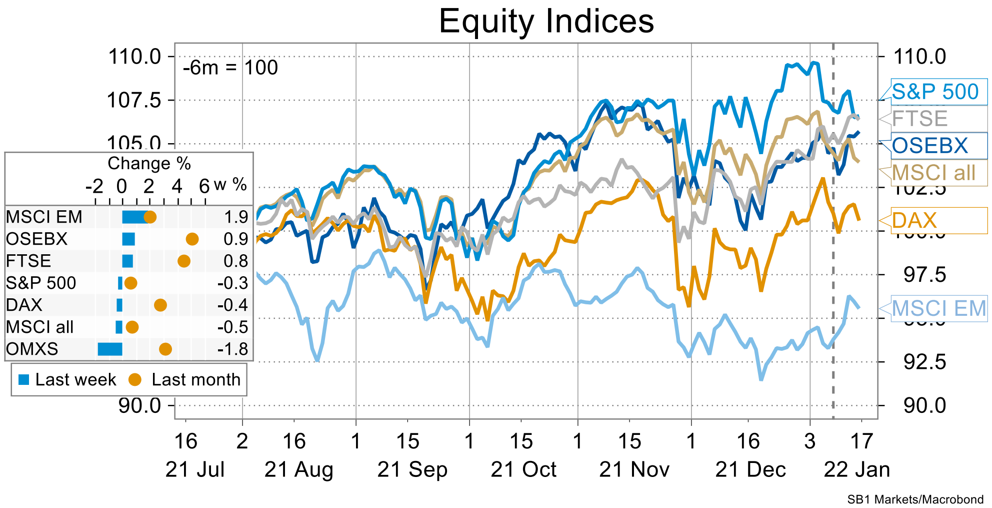
The world around us

The Norwegian economy

Market charts & comments

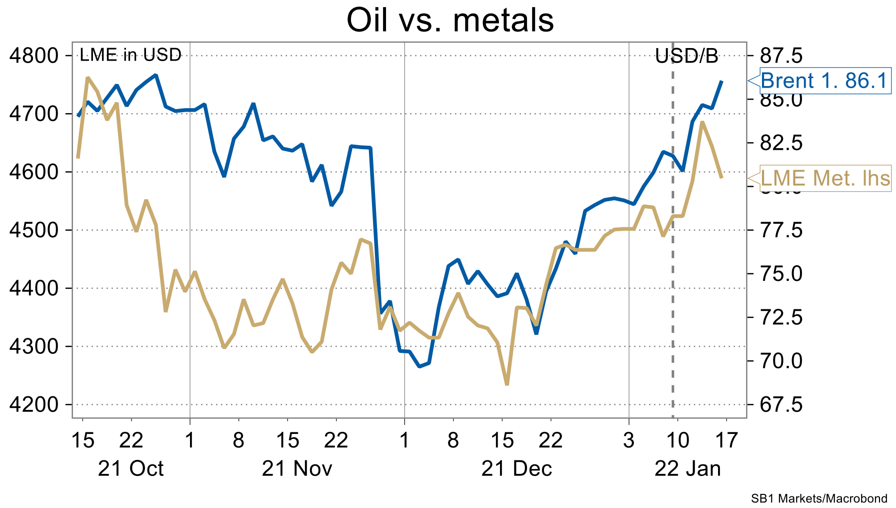
Mixed equity markets, bond yield flat/marginally up. Oil, metals further up

Omicron exit trade?



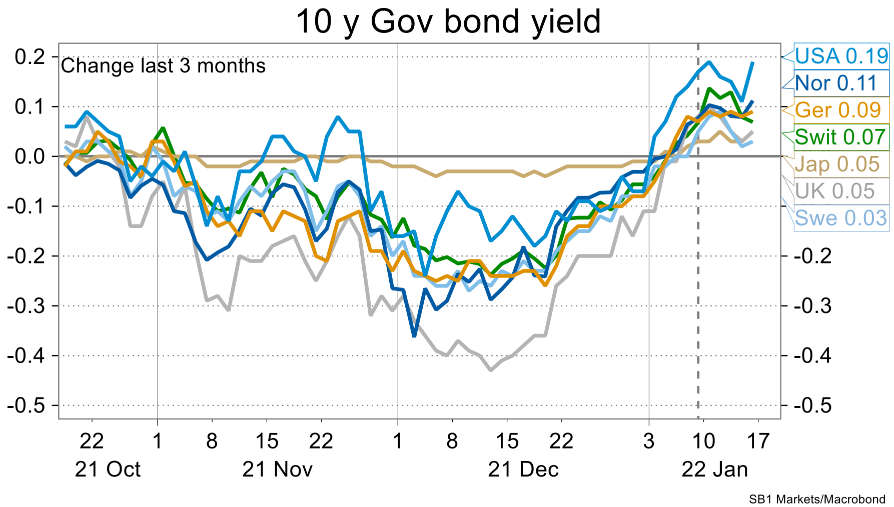
Equity Indices

SB1 Markets/Macrobond



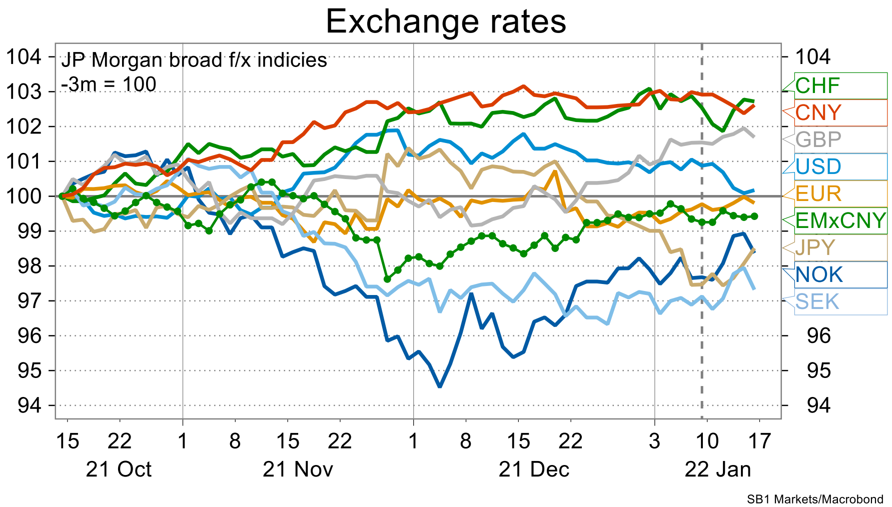
Oil vs. metals

SB1 Markets/Macrobond



10 y Gov bond yield

SB1 Markets/Macrobond



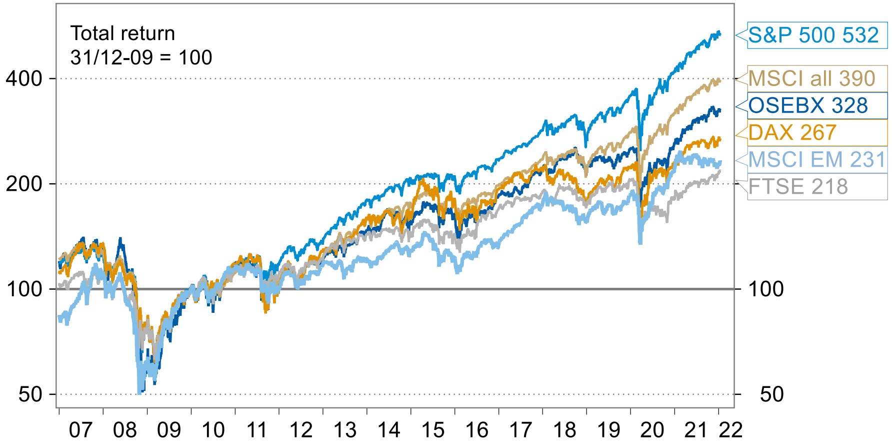
Exchange rates

SB1 Markets/Macrobond

The big picture: The bull market is intact, if not in EM

Bond yields sharply up but still not high

Equity Indices



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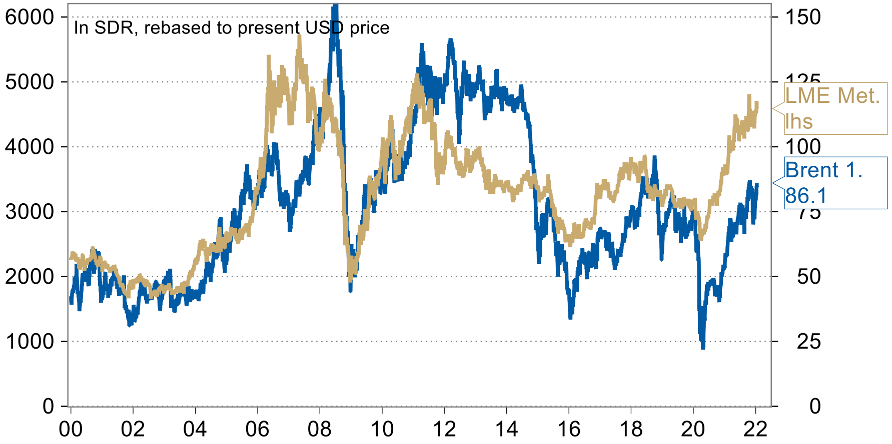
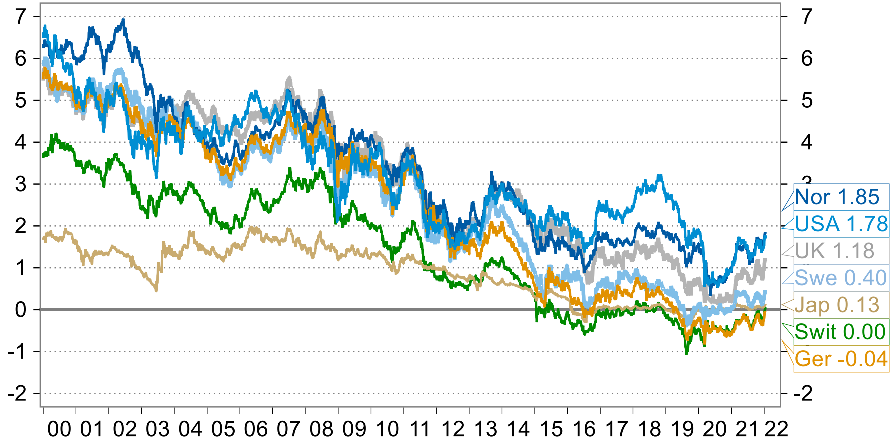
Oil vs. metals



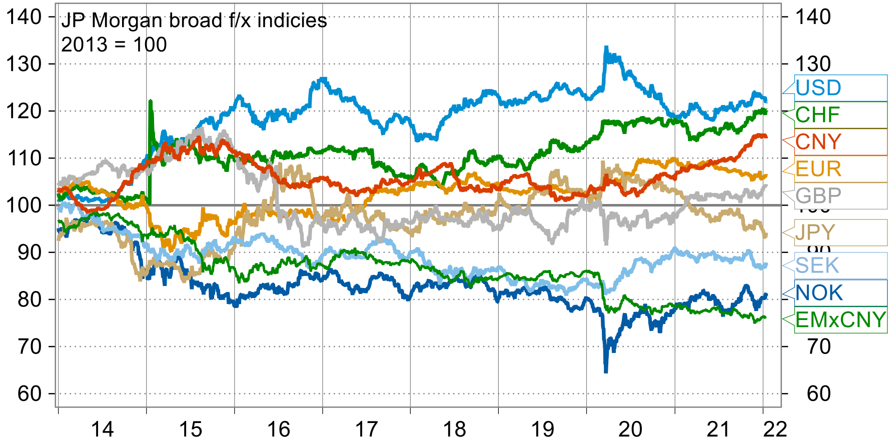
SB1 Markets/Macrobond

10 y Gov bond yields



SB1 Markets/Macrobond

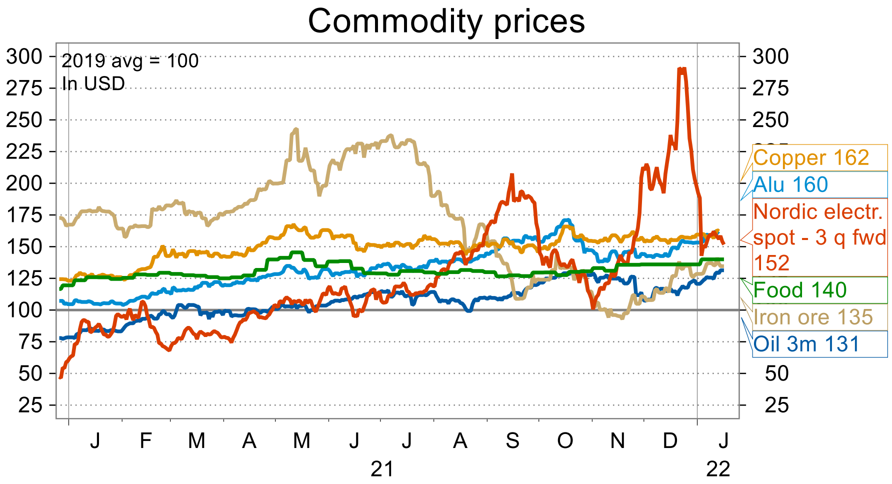
Exchange rates



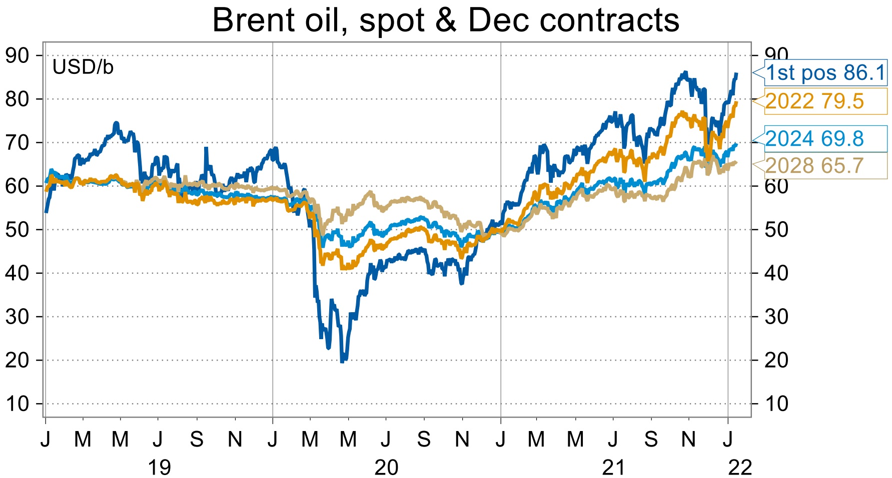
SB1 Markets/Macrobond

Metals up, the oil curve up, electricity prices have flattened.

The oil up all over the curve but the forward curve is still down up to 20% vs. spot prices


Commodity prices

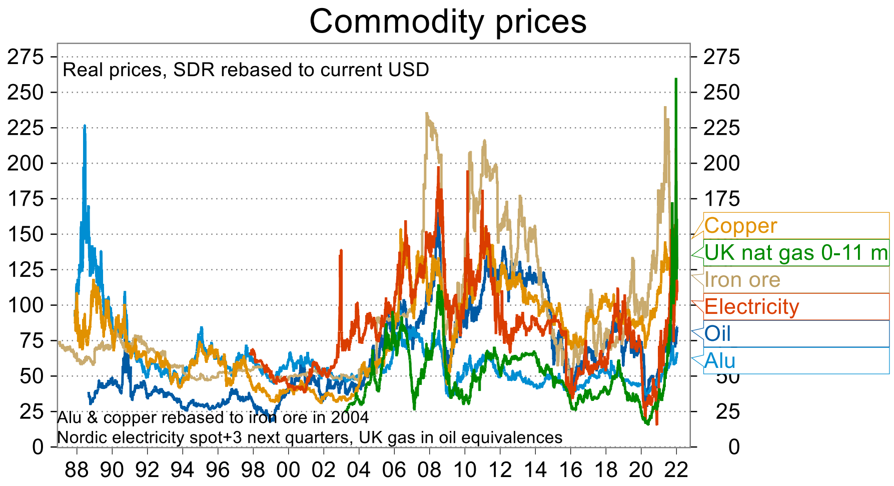
SB1 Markets/Macrobond


Brent oil, spot & Dec contracts

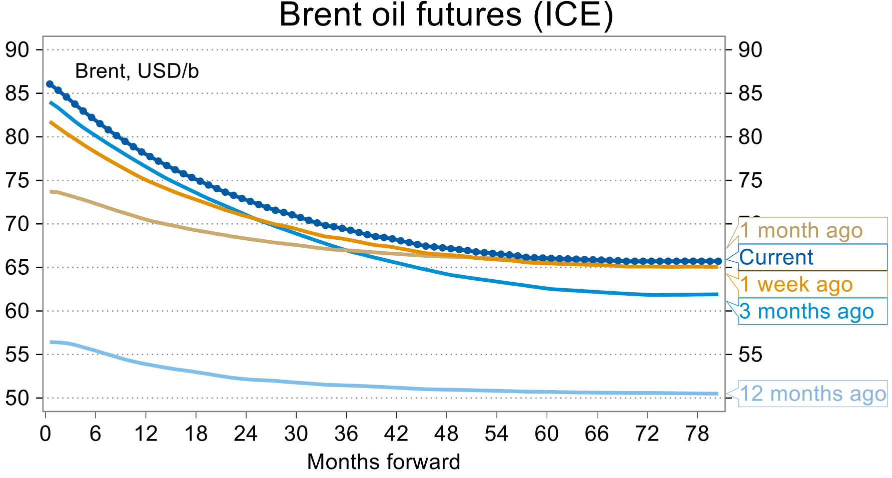
SB1 Markets/Macrobond

Longer dated oil contracts are heading down

The short end of the curve sharply up recent weeks


Commodity prices

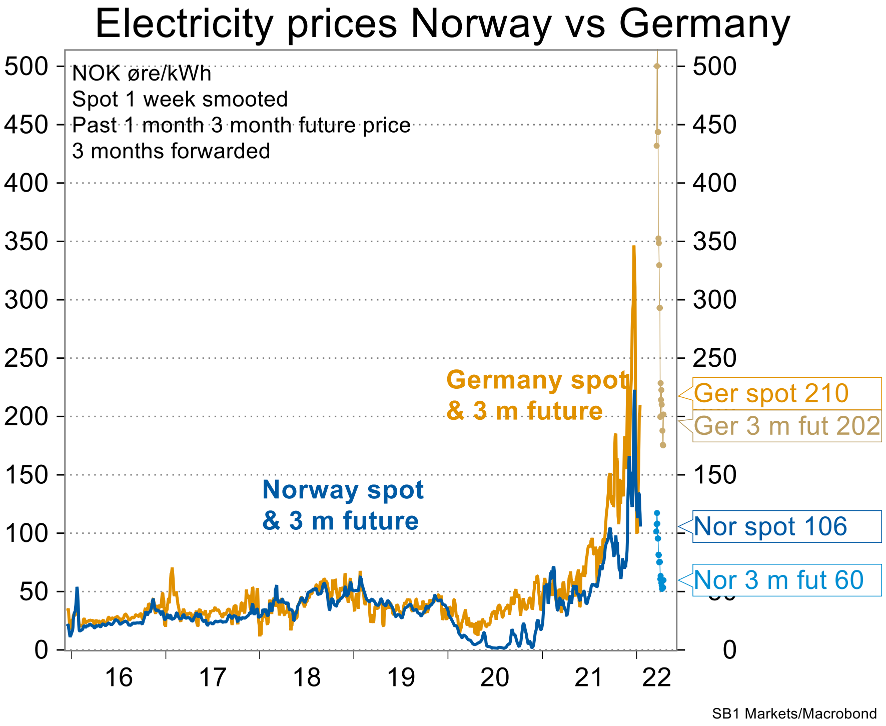
SB1 Markets/Macrobond


Brent oil futures (ICE)

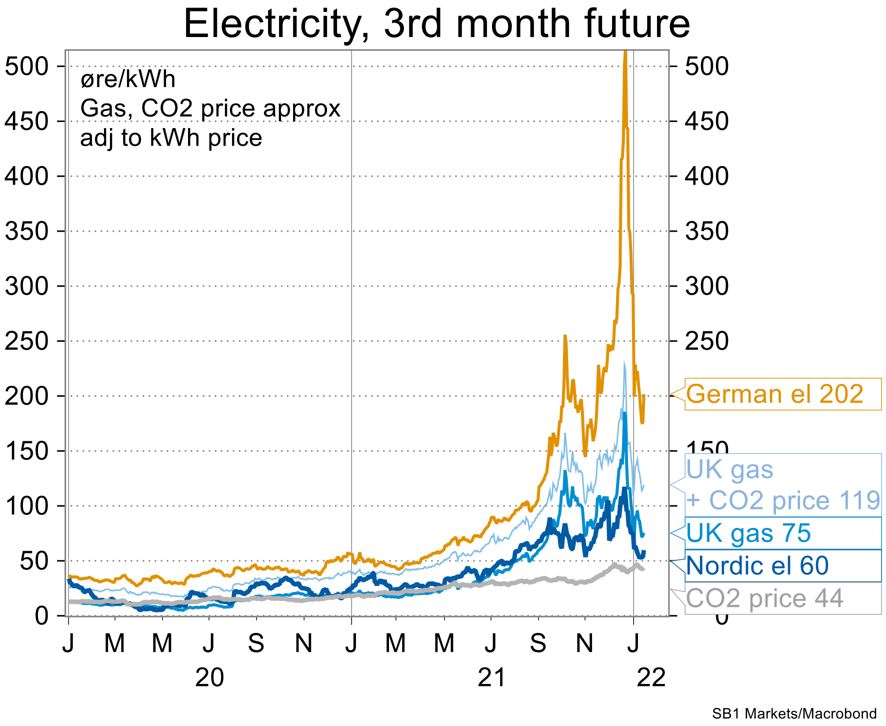
SB1 Markets/Macrobond

European energy markets are still volatile, and prices are high

… but still well down from the peaks


Electricity prices Norway vs Germany

SB1 Markets/Macrobond

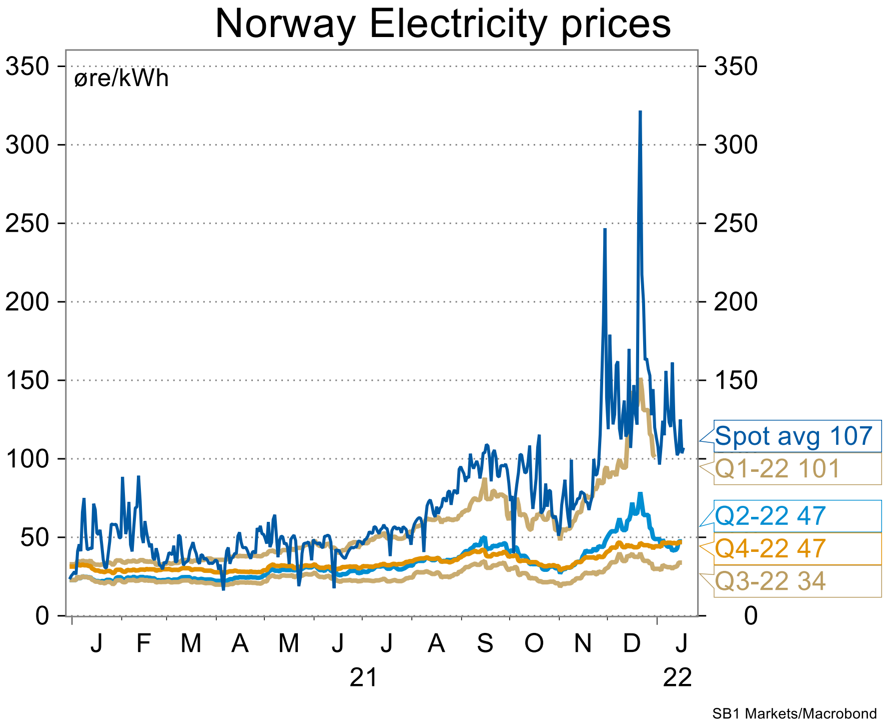

Electricity, 3rd month future

SB1 Markets/Macrobond

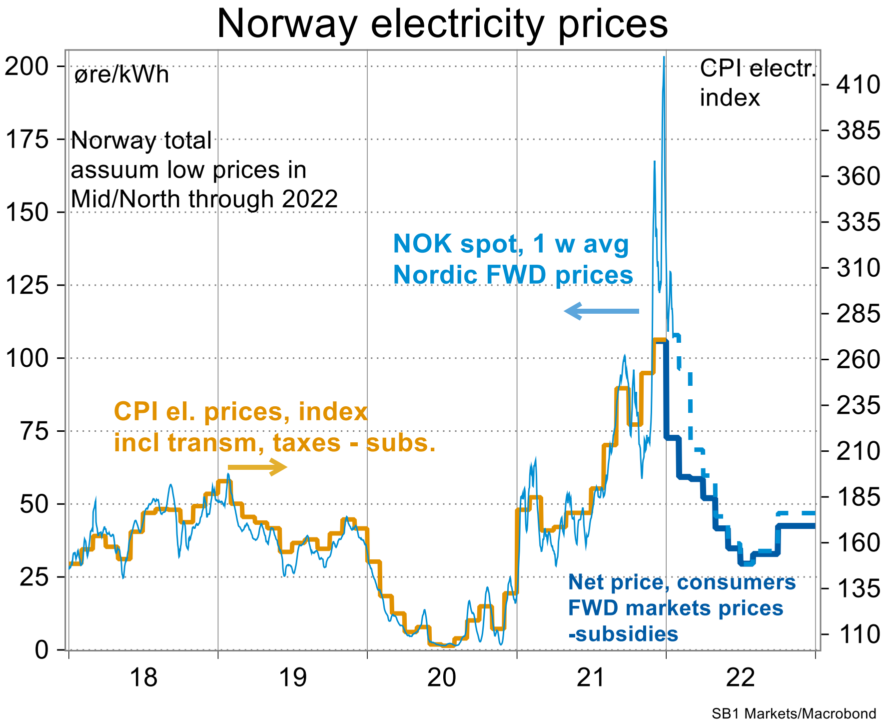
- Some few days, spot prices in Europe have to below Nordic prices (we are importing electricity)
- Future European prices have fallen sharply recently but remains far above normal levels – and far above Nordic prices

Norwegian electricity prices have come down, and future prices are falling as well

But given recent volatility: the outcome is quite uncertain



SB1 Markets/Macrobond



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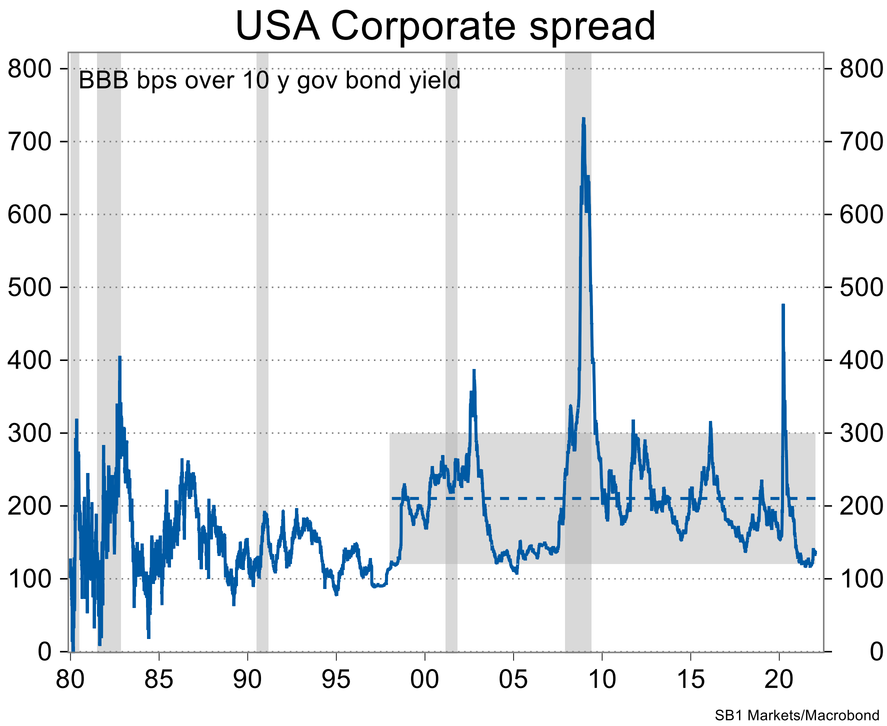
Credit spreads abroad slightly up

Norwegian spreads have narrowed the recent 3 weeks



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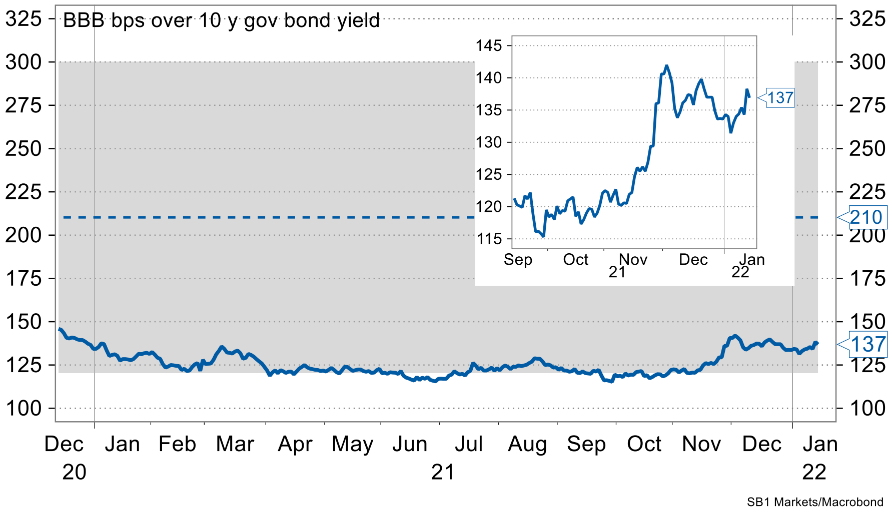
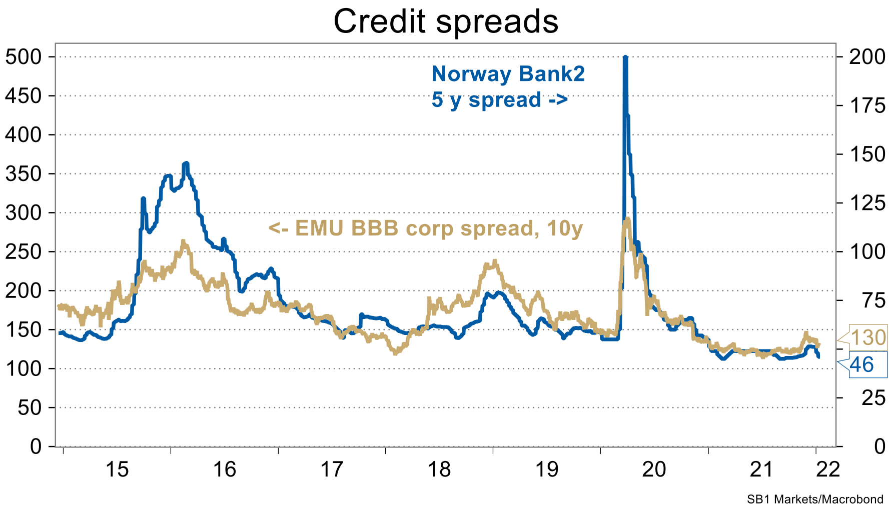
The NOK Bank2, 5y spread narrowed 2 bps to 48 bps



SB1 Markets/Macrobond

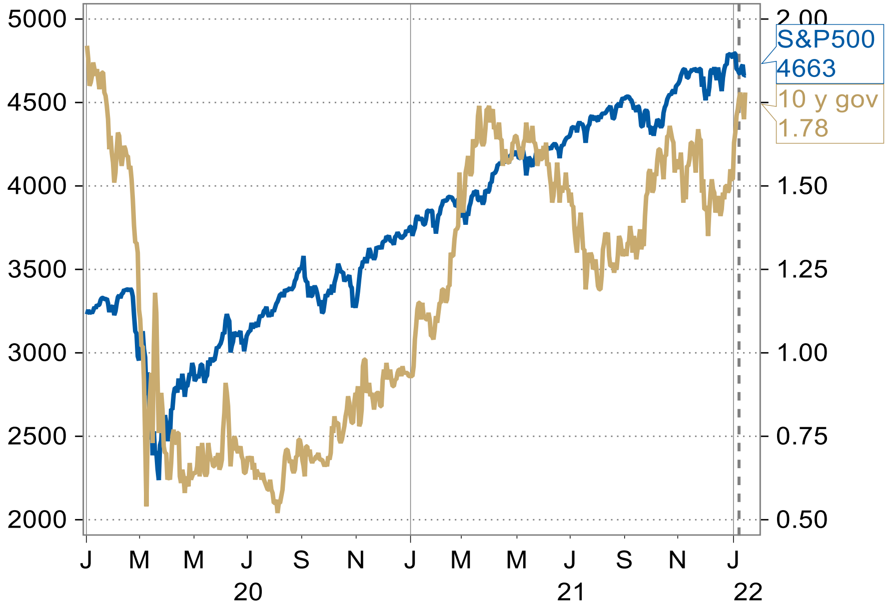


SB1 Markets/Macrobond

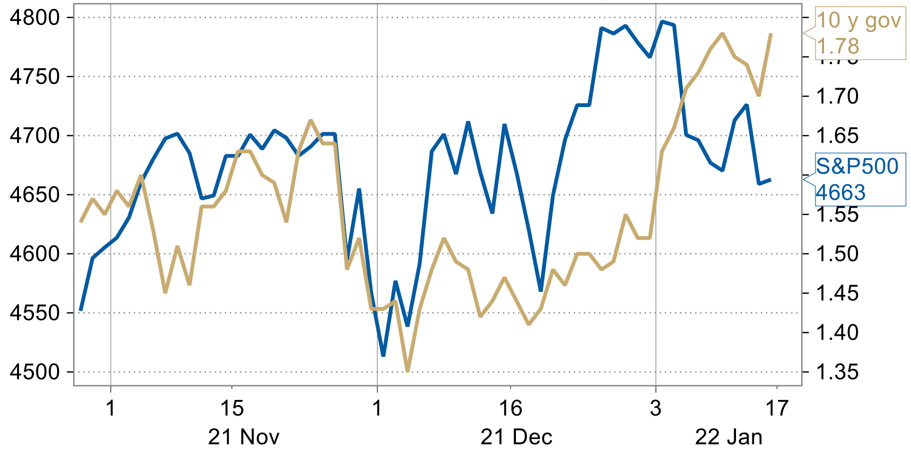
The 10y treasury bond rate up 2 bps, S&P 500 down 0.3%

Yields up the the highest level since the pandemic started

USA S&P 500 vs. bond yields

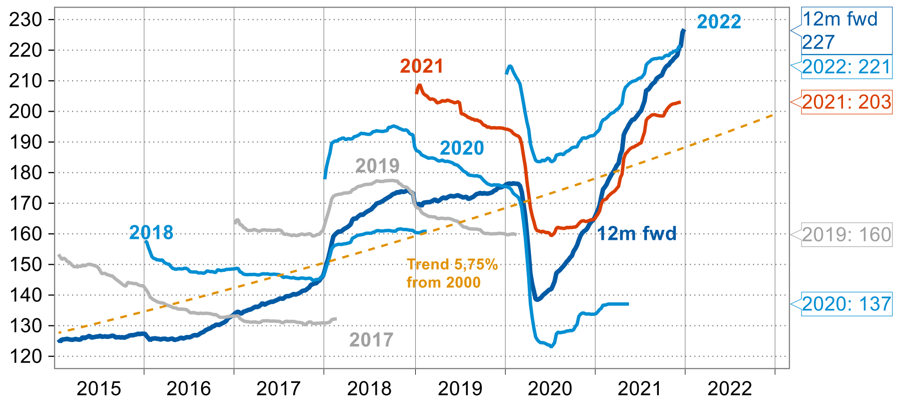


USA S&P 500 vs. bond yields



SB1 Markets/Macrobond

Annual S&P 500 EPS consensus (Factset)



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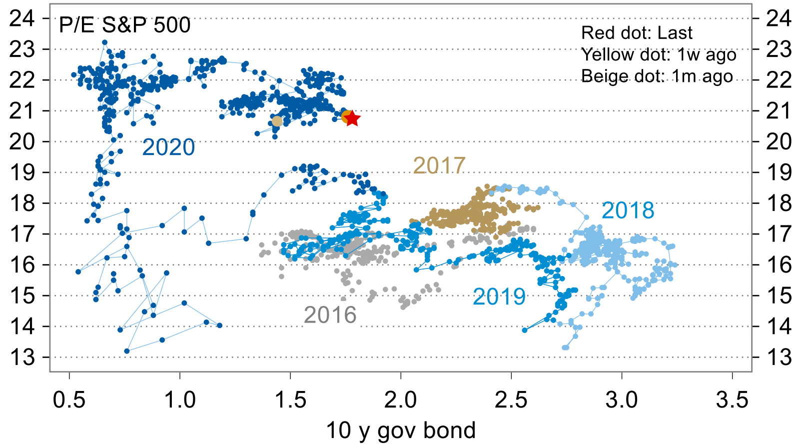
S&P 500 vs US 10 y gov bond

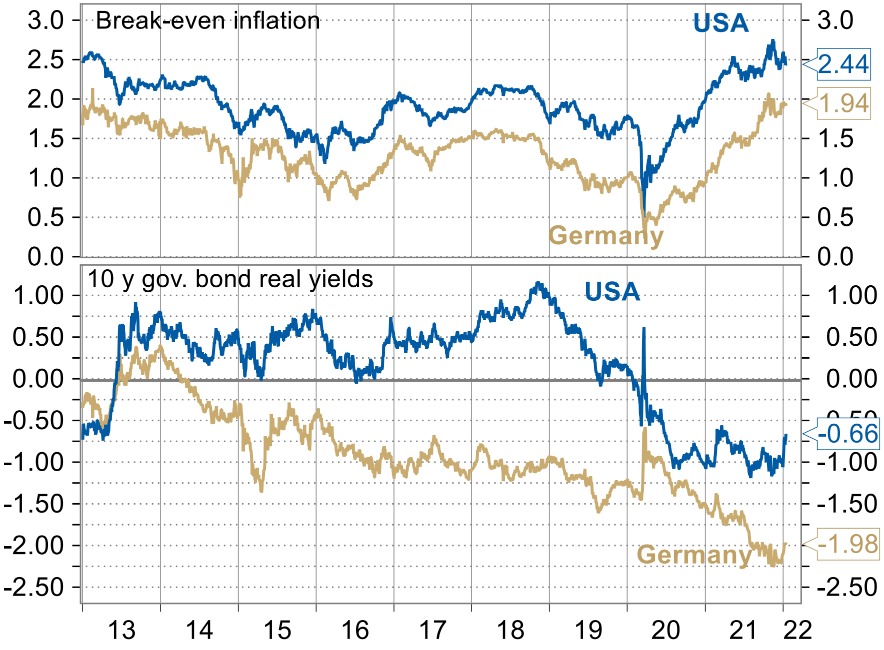


SB1 Markets/Macrobond

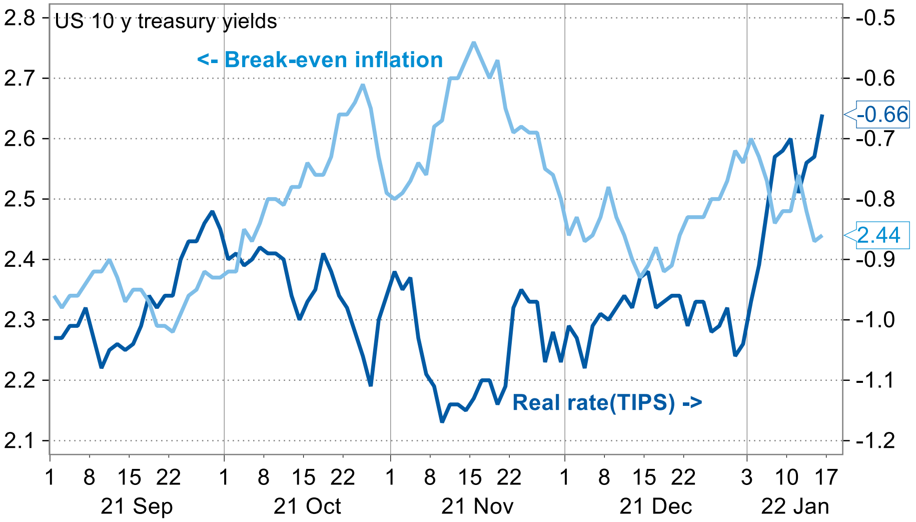
Finally, a visible lift in US real rates, up another 6 bps last week – to -0.66%

Inflation expectations down 4 bps, on a more hawkish Fed. The 10y Bund to -0.04%. Soon in plus?

Real yields, break-even inflation



SB1 Markets/Macrobond



US & Germany 10 y Gov bond yield

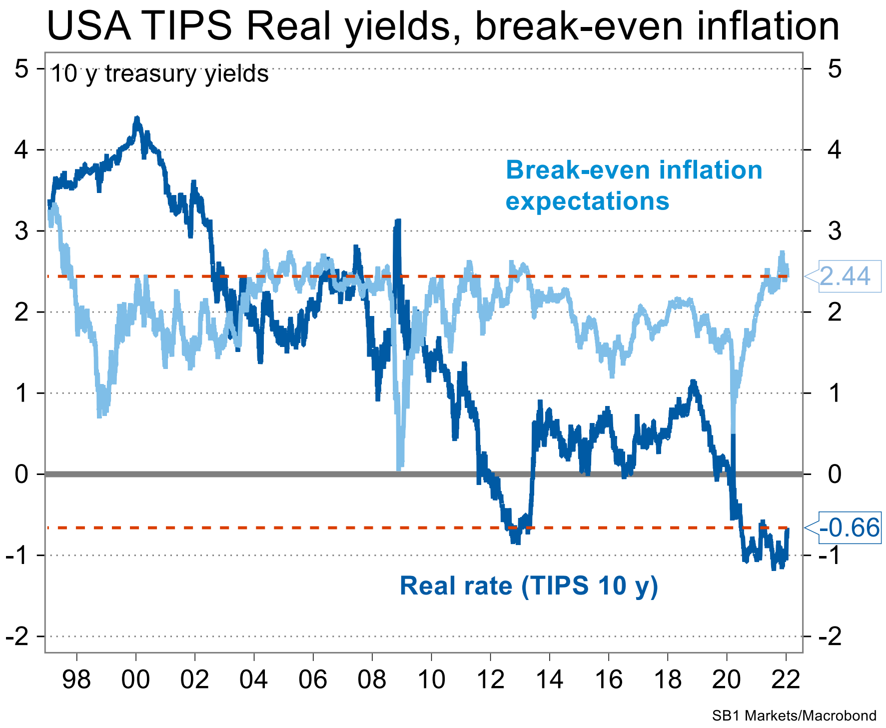
	Yield	Change 1w	Change 1m	Min since April-20
USA nominal treasury	1.78	0.02	0.34	0.52
.. break-even inflation	2.44	-0.04	0.07	1.06
.. TIPS real rate	-0.66	0.06	0.27	-1.19
Germany nominal bund	-0.04	0.02	0.33	-0.65
.. break-even inflation	1.94	0.00	0.10	0.40
.. real rate	-1.98	0.02	0.23	-2.26

SB1 Markets/Macrobond

- **The 10 y TIPS real rate** has climbed 53 bps from the ATL last year
- **Long term inflation expectations**, 5y 5y fwd break-evens down to 2.09% , measured vs. the CPI, is close to Fed's 2% PCE-deflator target – as Fed is becoming much more aggressive vs. inflation
- **The German 10y inflation expectation** is close to 2%, which must be high enough. The real rate is -1.98%, up 28 bps from the bottom, still terrible low

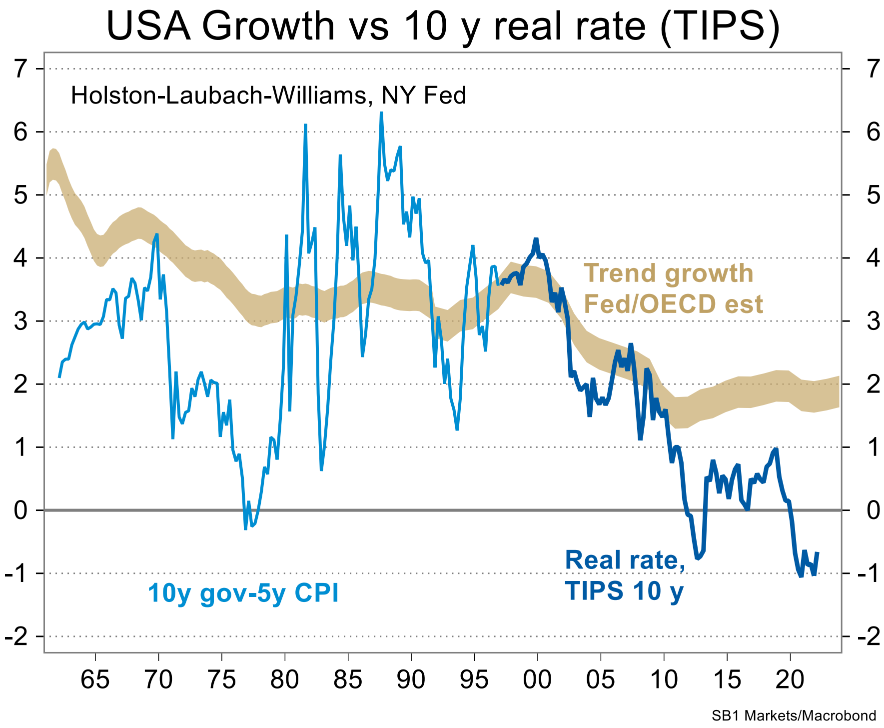
Some special data points: Inflation expectations record high, real rates record low

… while growth expectations are not that bad at all. Something will have to yield?



USA TIPS Real yields, break-even inflation

SB1 Markets/Macrobond

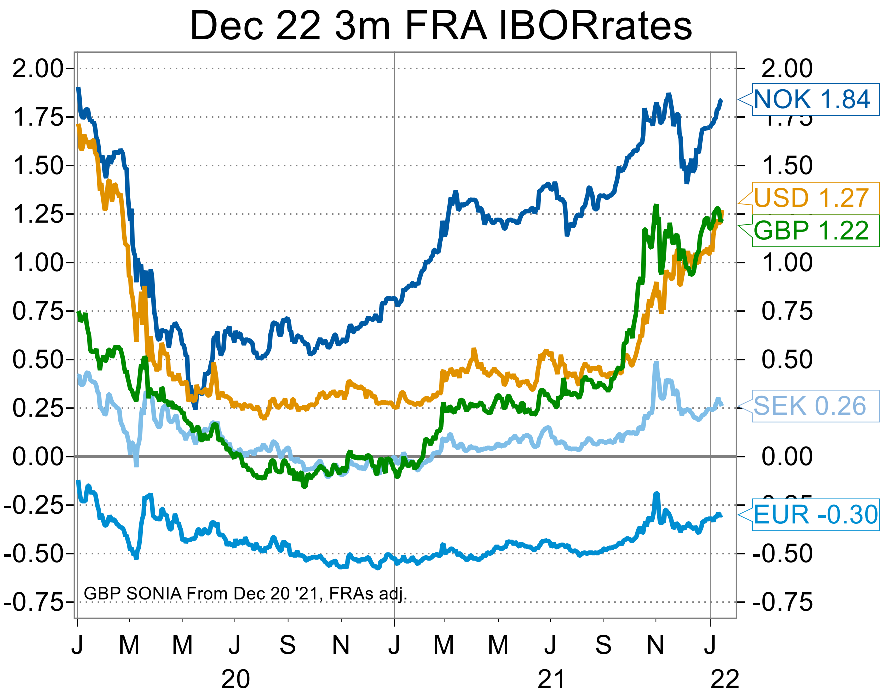


USA Growth vs 10 y real rate (TIPS)

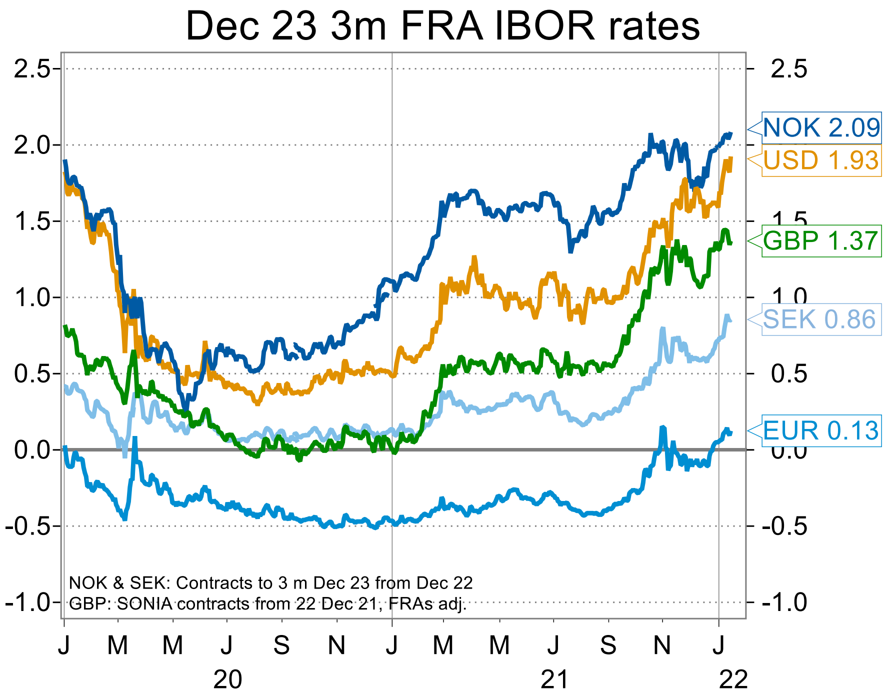
SB1 Markets/Macrobond

- And now something is happening: The 10 y real TIPS rate on the way up, now 55 bps from the ATH last year

FRAs: Another steep week – upwards



SB1 Markets/Macrobond

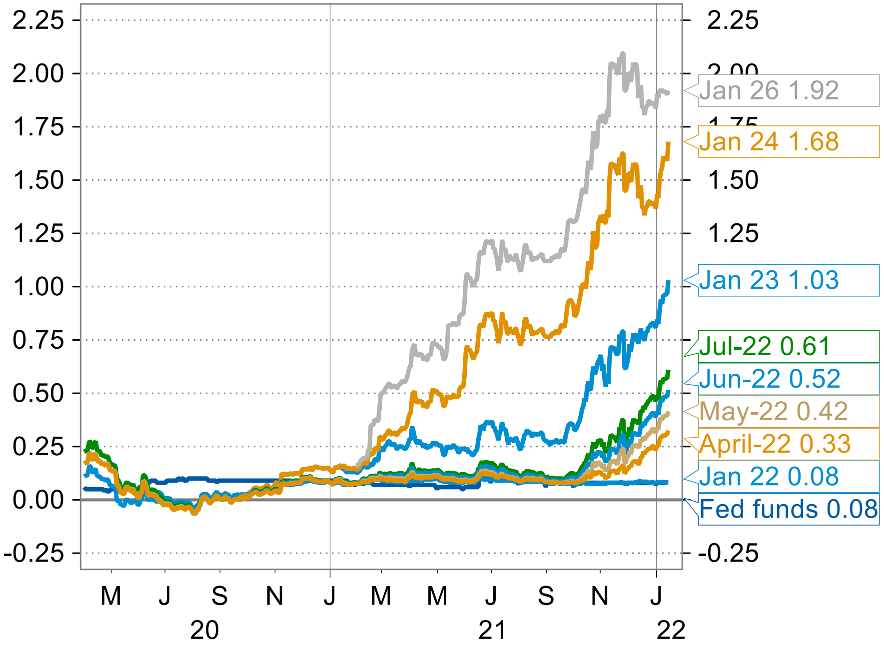


SB1 Markets/Macrobond

A March hike has become very likely

4 or 5 hikes is deemed more likely than 3 or less. A March hike a done deal

Fed funds future



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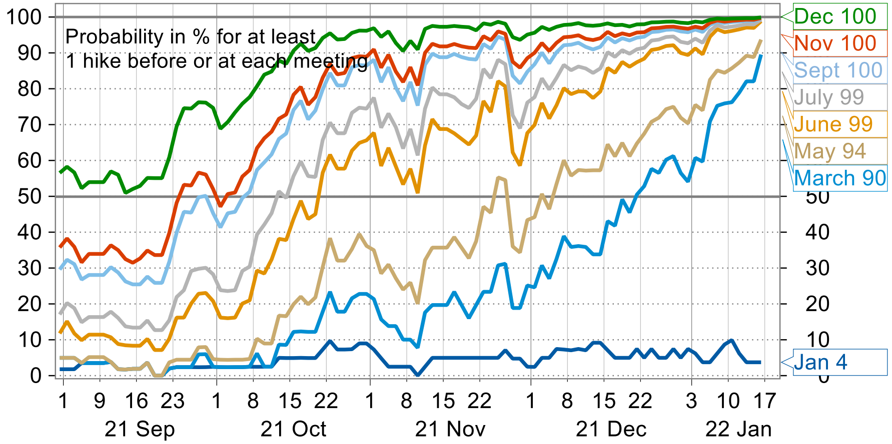
- 3 – 4 hikes are discounted this year

USA Fed fund - probability for the first hike in 2022



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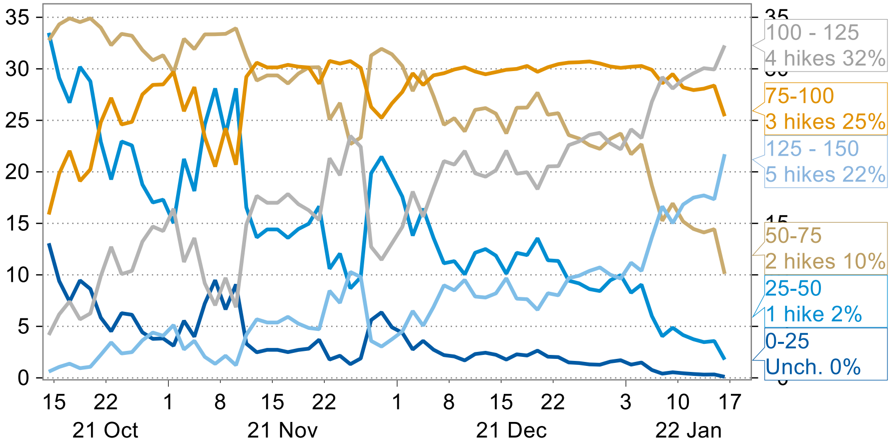
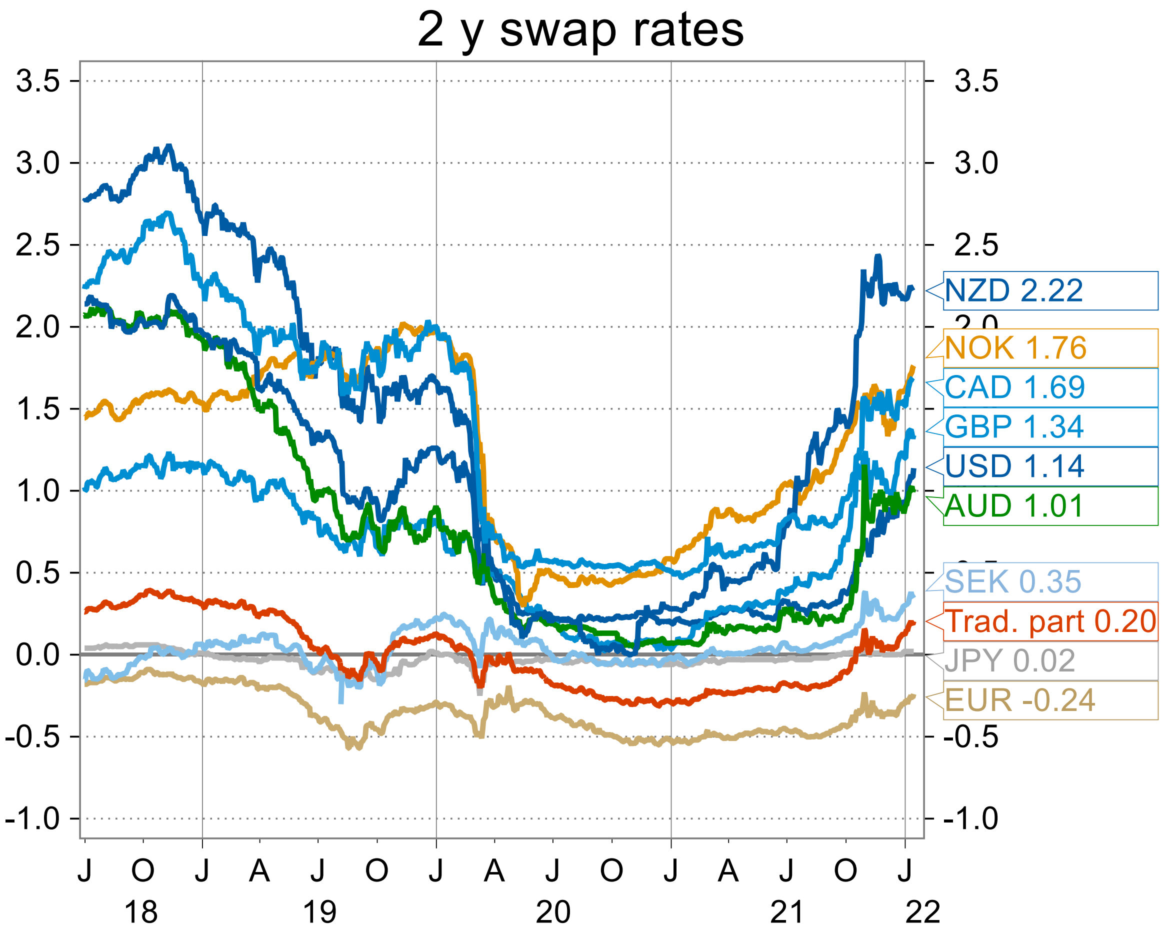
Fed funds future, Dec 2022 probabilites



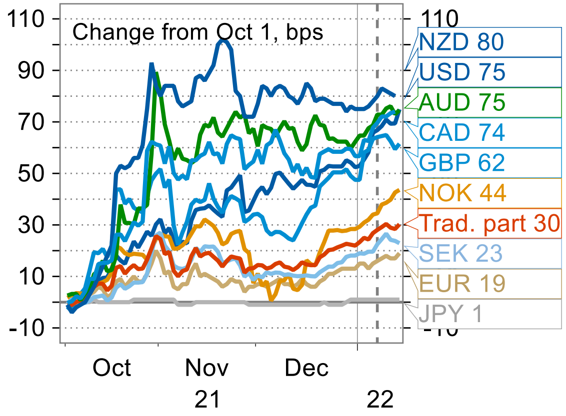
SB1 Markets/Macrobond

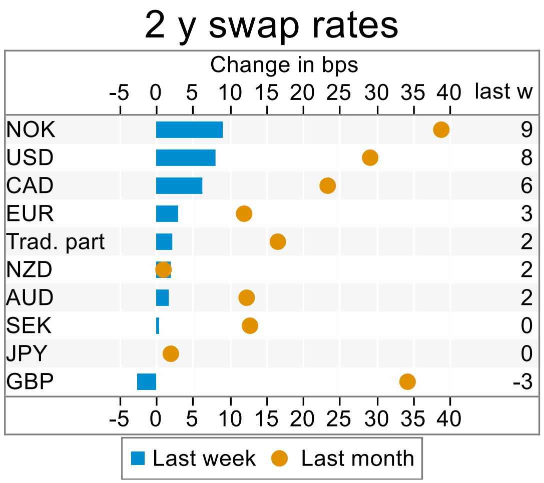
Short term rates up most places, the most in NOK and USD

Hawkish Fed-speak (from FOMC members). 4 or more hikes in 2022?



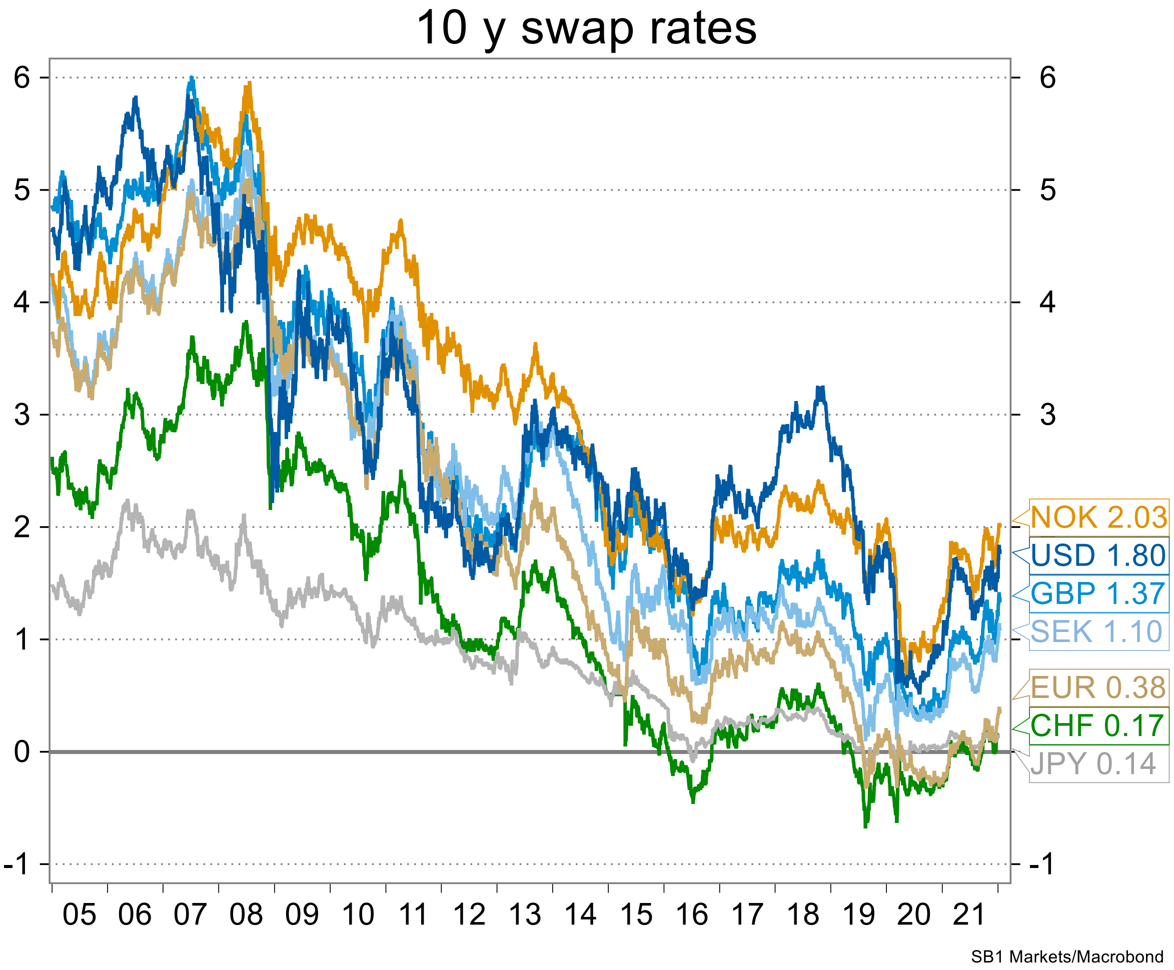
SB1 Markets/Macrobond





SB1 Markets/Macrobond

Following the 30 – 40 bps lift in long term rates recent weeks, a pause last week



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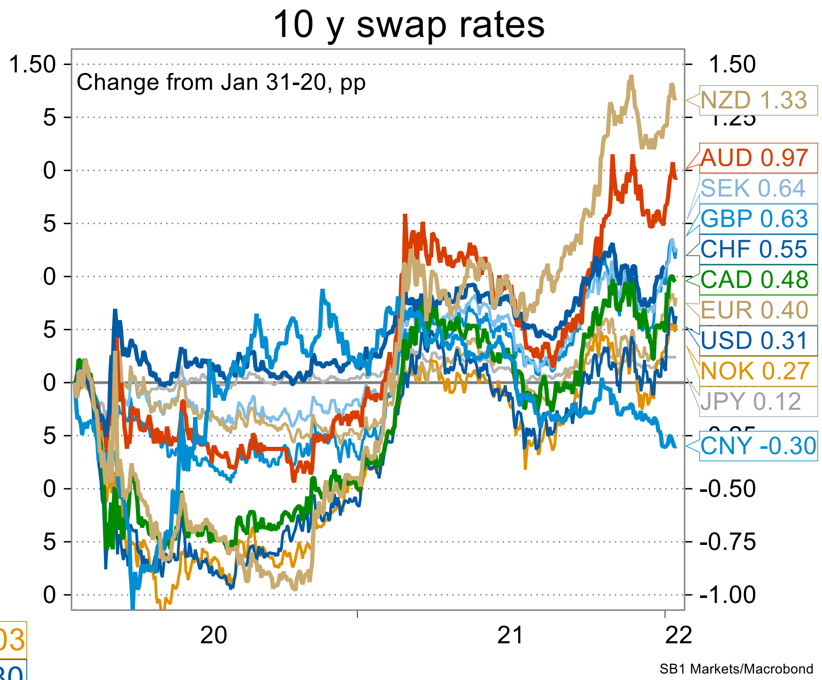

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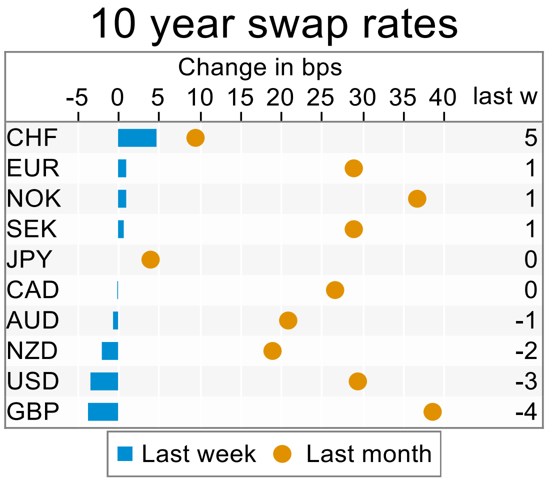
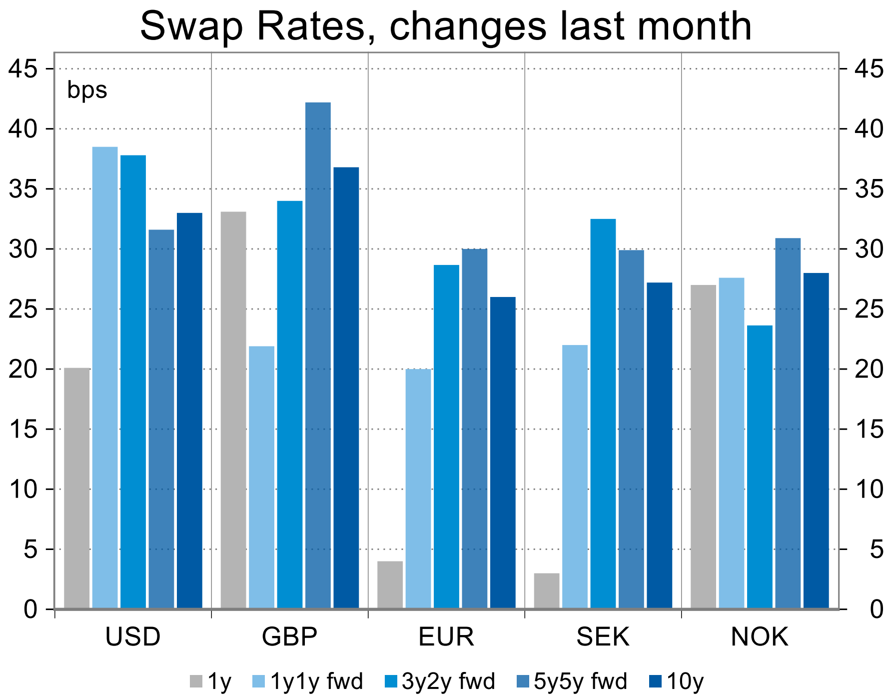


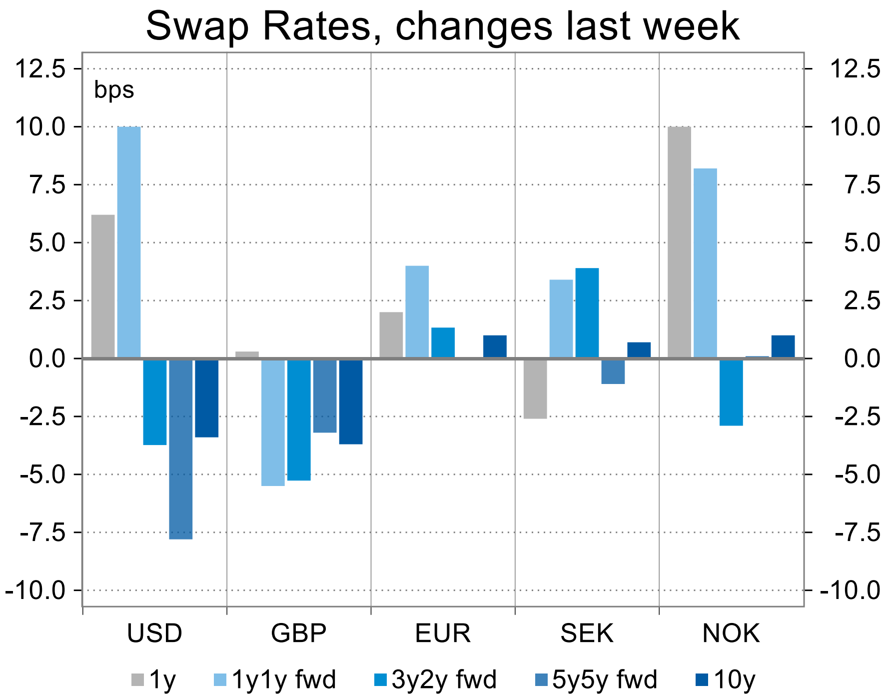
SB1 Markets/Macrobond

The short end of the curve sharply up in the US and Norway

A pause at the long end of the curve everywhere



SB1 Markets/Macrobond

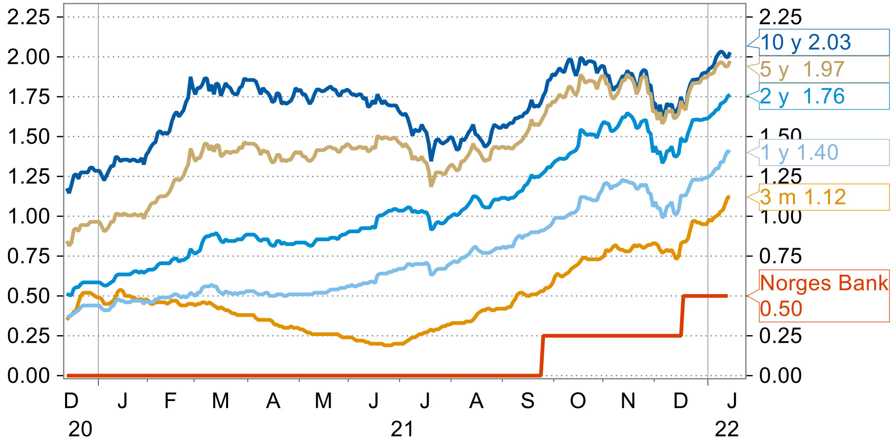


SB1 Markets/Macrobond

The short end of the curve sharply up, longer dated swaps unch

The implied forward curve peaks at 1.5 – 2 year

NIBOR, NOK swap rates



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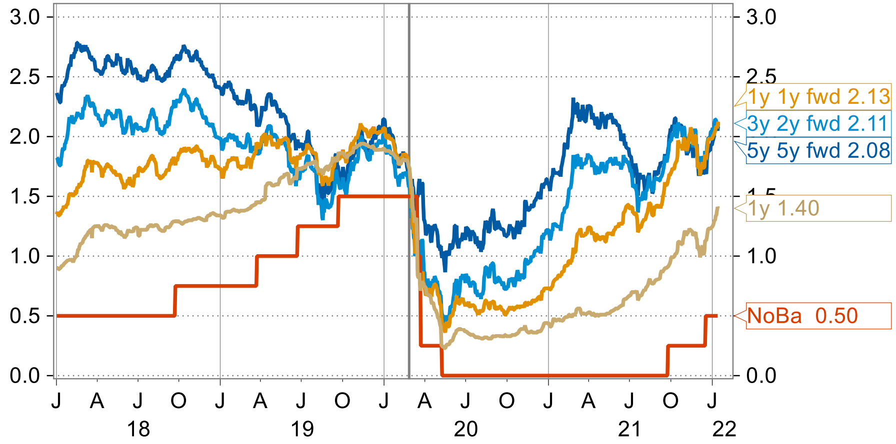
NOK Swap rates



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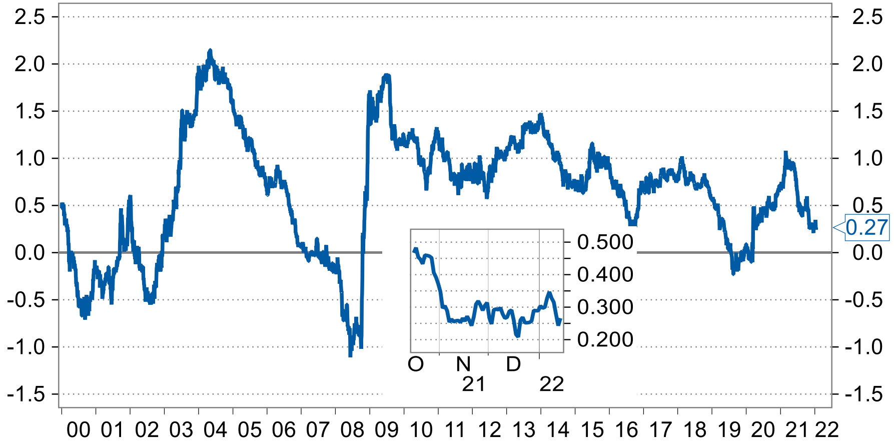
Norway - yield spread, 10y - 2y swap



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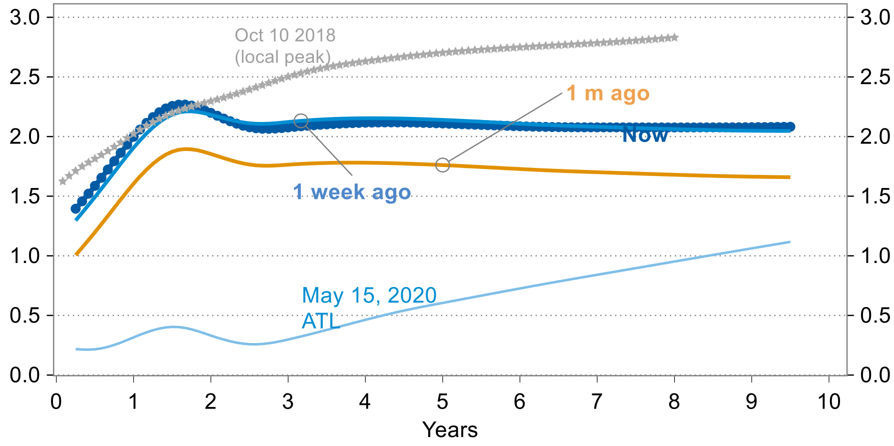
NOK Implied swap forwards



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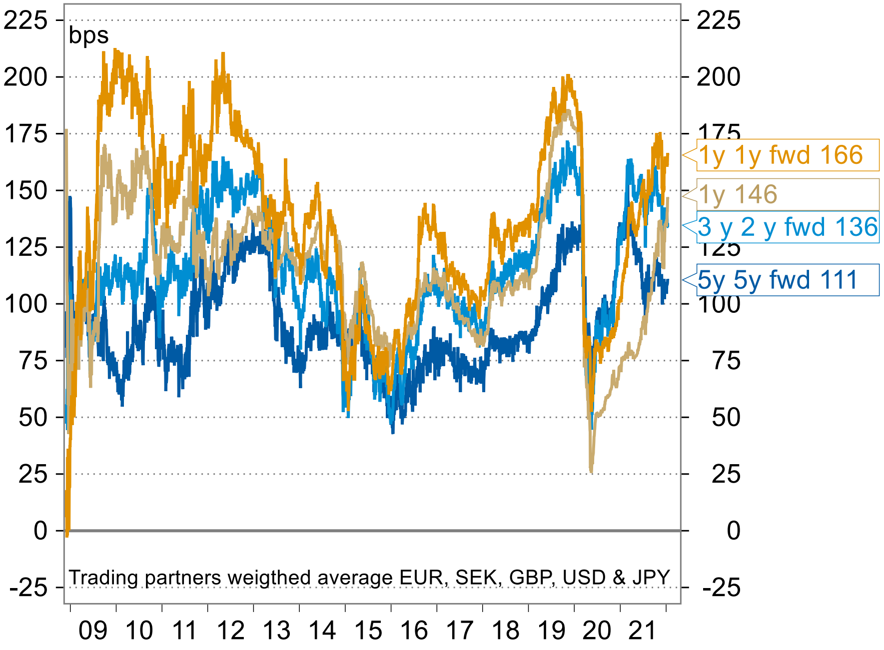
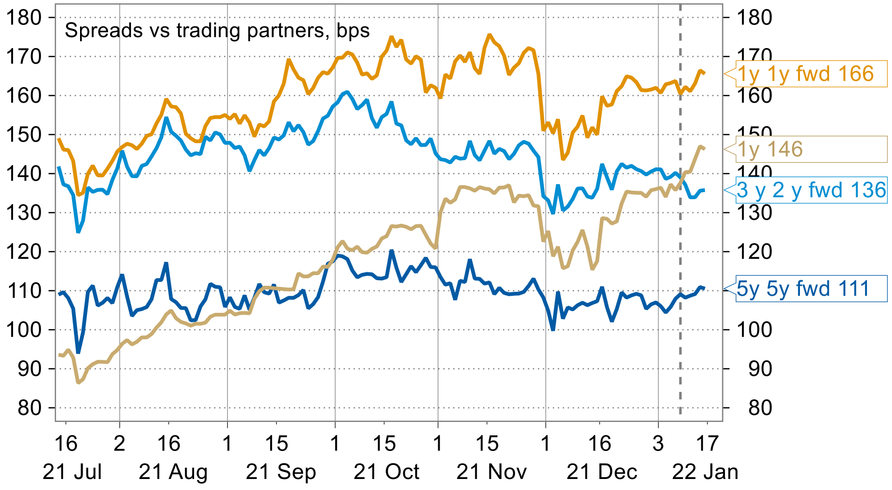
Mixed spread changes last week – down at the 3y 2y fwd segment, up elsewhere

Spread are at the high side – but we do not have a short term narrowing case

Norway vs trading partners, impl swap spreads

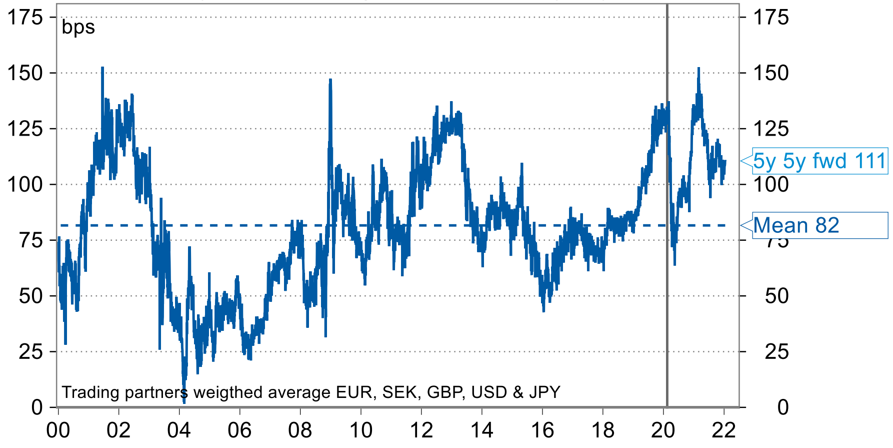


SB1 Markets/Macrobond



SB1 Markets/Macrobond

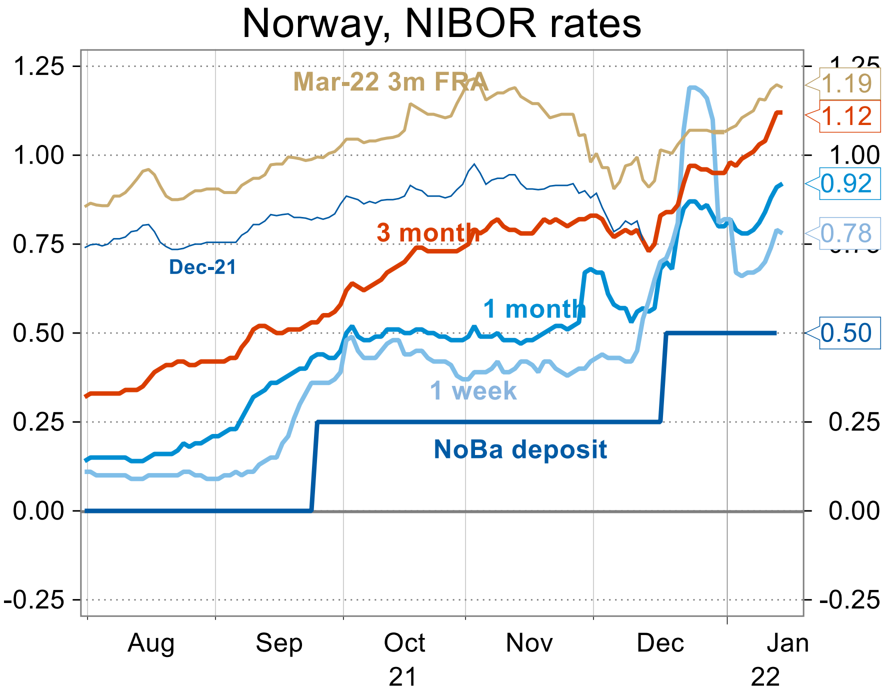
Norway vs trading partners, 5y 5y fwd spread



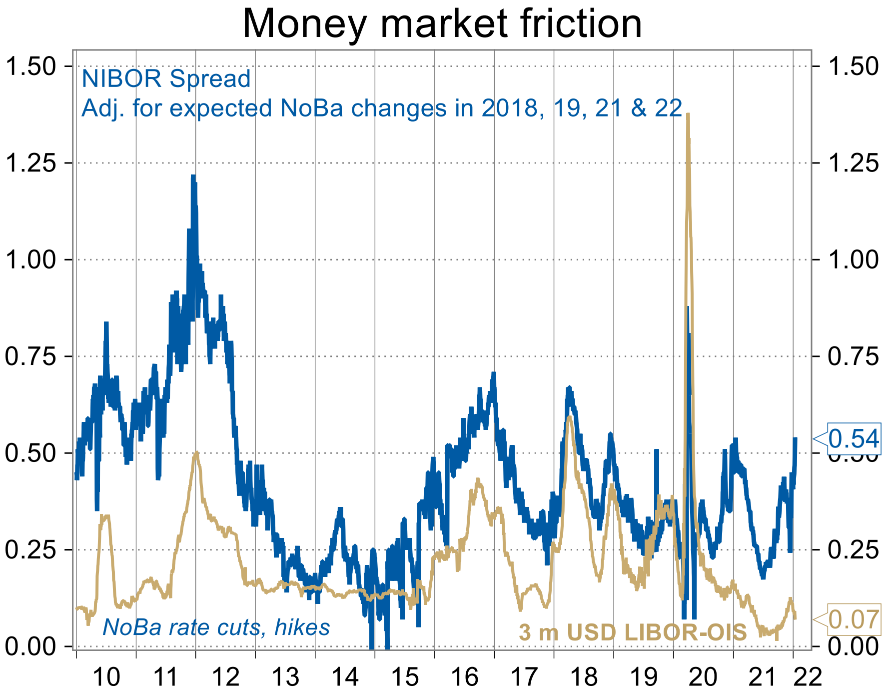
SB1 Markets/Macrobond

The 3m NIBOR up another 11 bps to 1.12%!

The NIBOR spread at 54 bps, if we take a NoBa March hike for granted


Norway, NIBOR rates

SB1 Markets/Macrobond

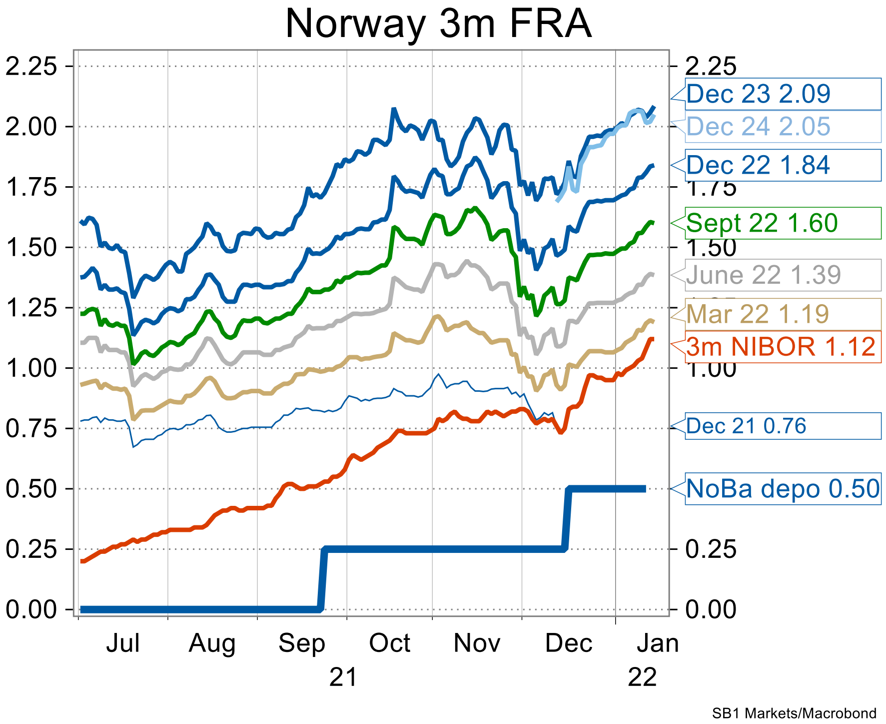

Money market friction

SB1 Markets/Macrobond

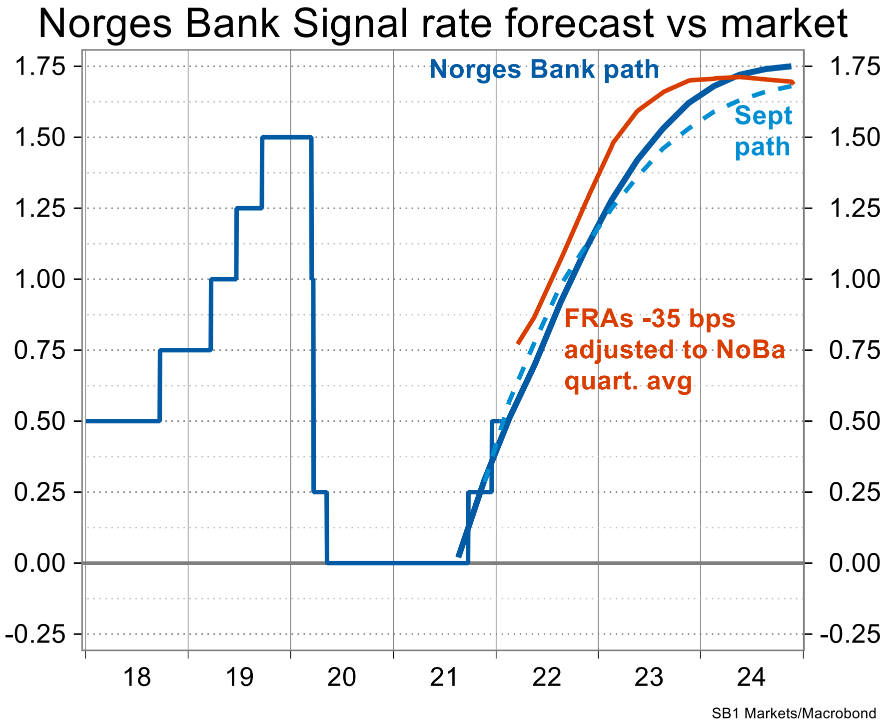
- The **3 m NIBOR** gained 11 bps 1.12% last week, following the 28 bps lift from after NoBa's Dec hike
  - » Shorter dated NIBOR rose too last week.
- **A 54 bps NIBOR spread is far above a normal level** – the highest in 3 years. The wide spread cannot be explained by trouble in the USD money market. Neither is credit risk vs. Norwegian banks a possible explanation today.
- **The only reasonable explanation is tight liquidity in the money market**, possibly due to payment of oil taxes. However, Norges Bank has standard measures available for supplying liquidity to the market, like offering more F-loans. We expect the bank will act if the spread does not narrow. The bank assumed a 35 bps spread in the MPR, a fair estimate
  - » The **USD LIBOR-OIS spread** rose to 13 bps from 4 bps from October to end of December. Now it is back to 7 bps

FRAs further up, by up to 10 bps – to well above NoBa's Dec path

The FRA-rates are approaching their November peaks



SB1 Markets/Macrobond



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- Market FRAs are now discounting a steeper interest rate path than NoBa presented in December – or the expected NIBOR spread widened substantially
- If NoBa hikes March 24, the average NoBa rate will be 0.73% in the March FRA period
- Thus, the **March-22 3 m** contract at 1.19% implies 100% probability with a 46 bps NIBOR spread – or less than 100% of the expected spread is higher
- NoBa's path implied a 75% probability for a March hike

USD down, the 'supersyclicals' up

The EURUSD up 0.8%. The EURNOK down 0.06 to 10.00 last week

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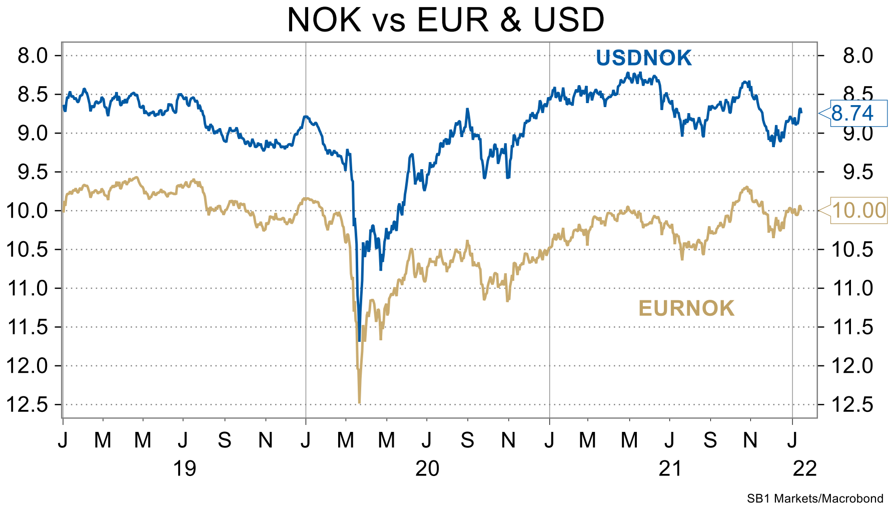
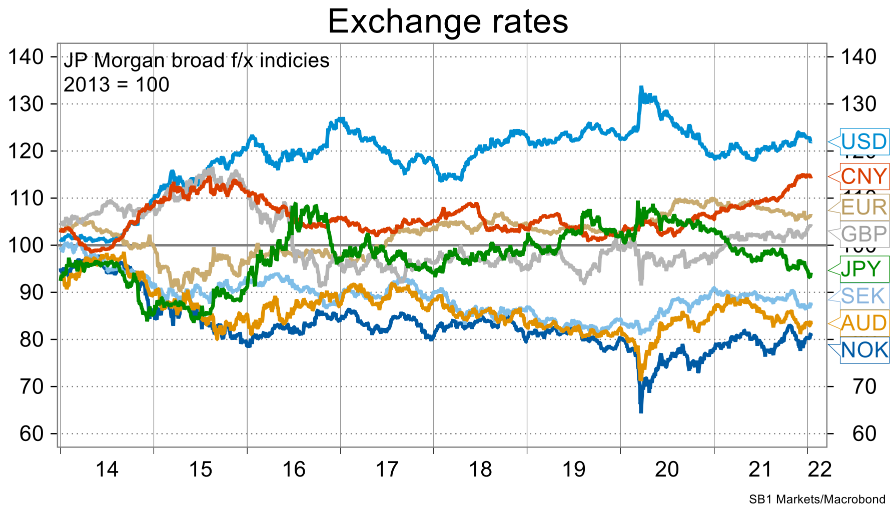


SB1 Markets/Macrobond



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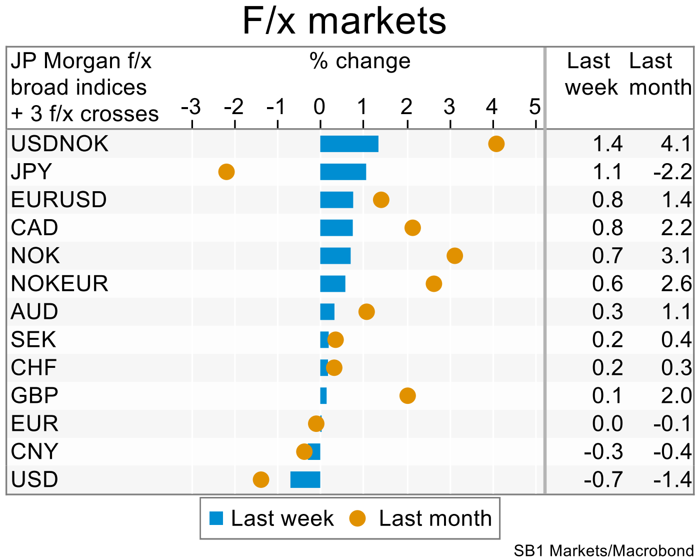

JP Morgan f/x broad indices + 3 f/x crosses	Last week	Last month
USDNOK	1.4	4.1
JPY	1.1	-2.2
EURUSD	0.8	1.4
CAD	0.8	2.2
NOK	0.7	3.1
NOKEUR	0.6	2.6
AUD	0.3	1.1
SEK	0.2	0.4
CHF	0.2	0.3
GBP	0.1	2.0
EUR	0.0	-0.1
CNY	-0.3	-0.4
USD	-0.7	-1.4

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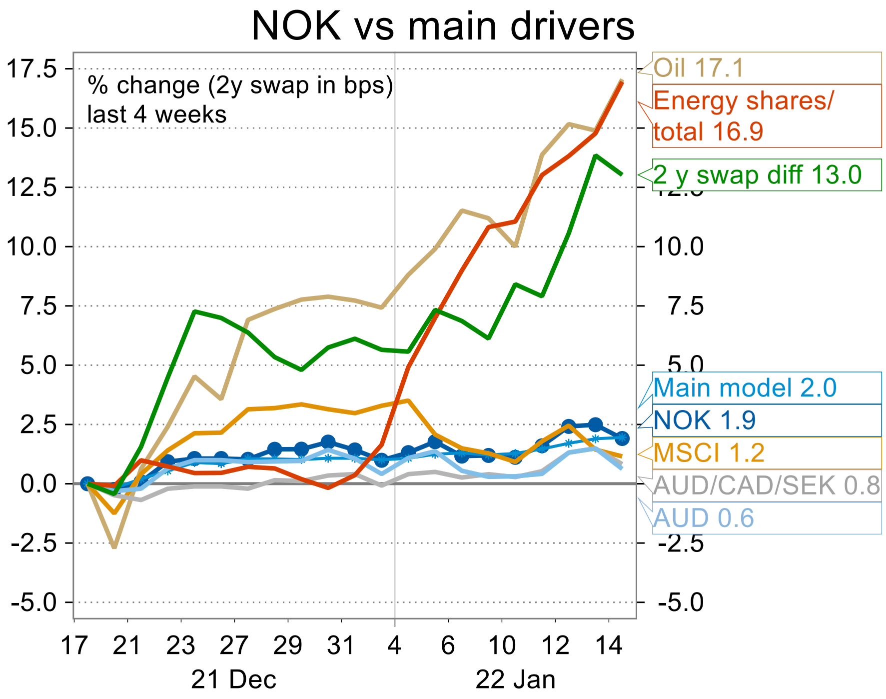
NOK up 0.7% last week, in line with the model estimate

Almost all the usual suspects contributed at the upside last week



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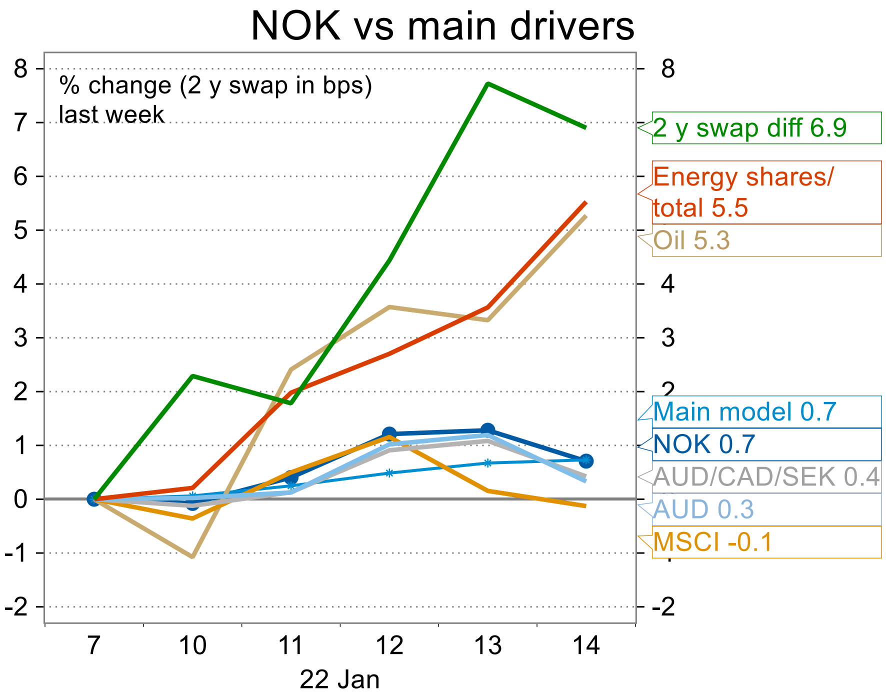

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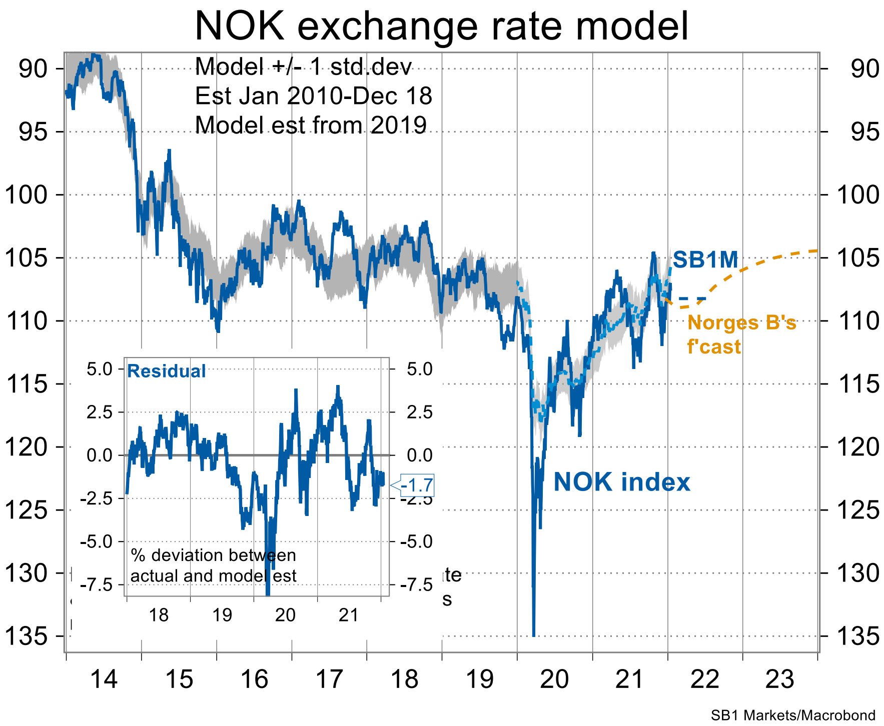
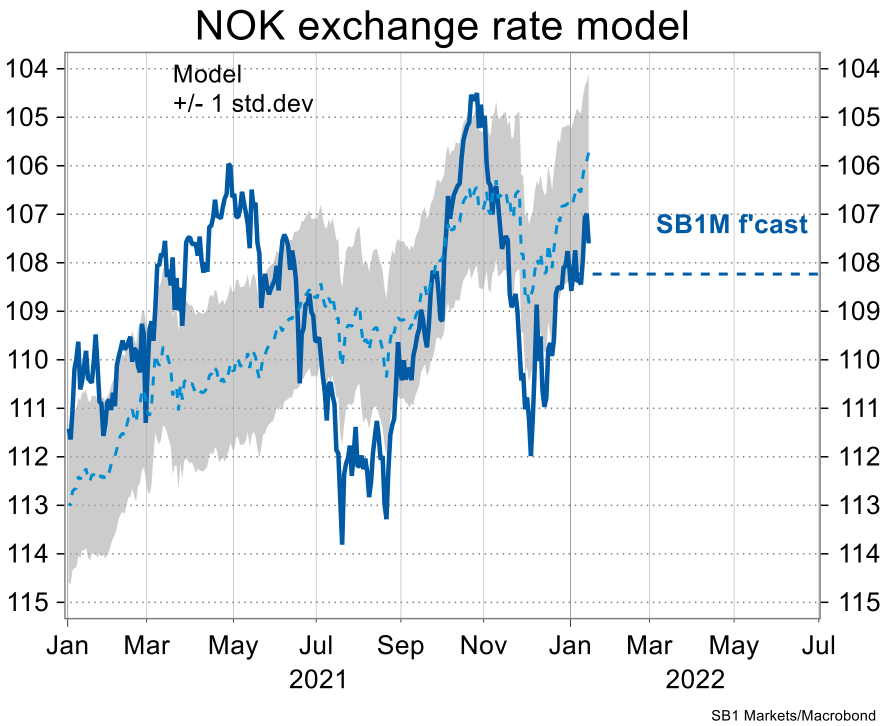
The status vs. the normal drivers:

- ***The NOK appreciated 0.7%. The level less then 2% below the model est (unch)***
- The NOK is 5% weaker than our AUD/CAD/SEK-model, our 'super-cycle peers', predicts (unch). The AUD up 0.3% last week
- NOK is (6%) stronger than a model which includes global energy companies equity prices (vs the global stock market), but less than last week (9%)

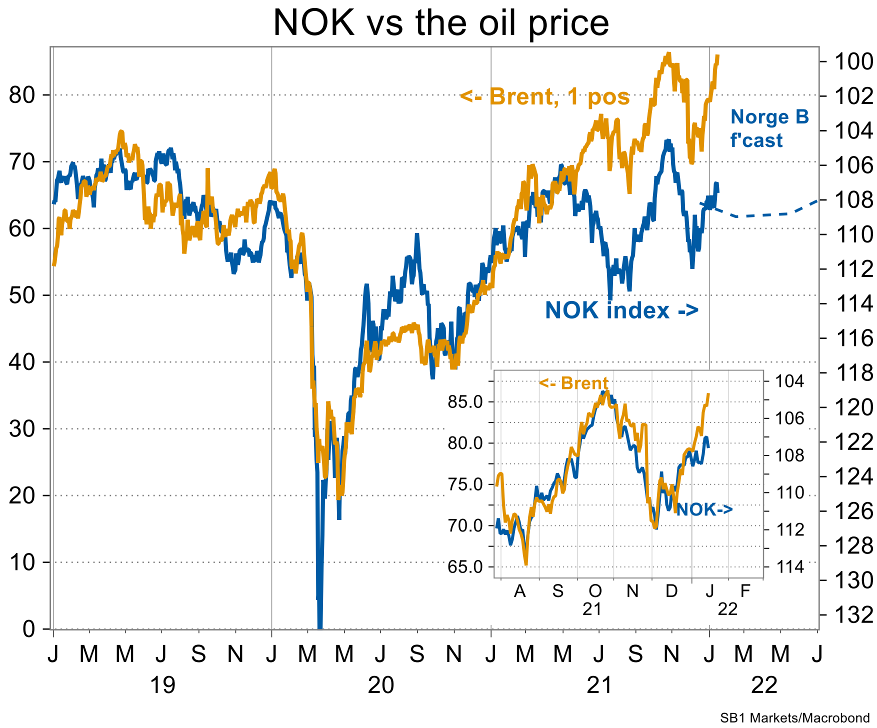
At this and the following pages we have swapped Norges Bank's I44 index for JP Morgan's broad NOK index and rebased it to the current index value for the I44. The I44 has an earlier closing time than the 'official' closing time for f/x crosses. There are no substantial difference between these two indices over time

NOK lags our model again, by 2%, up from 1% the previous week



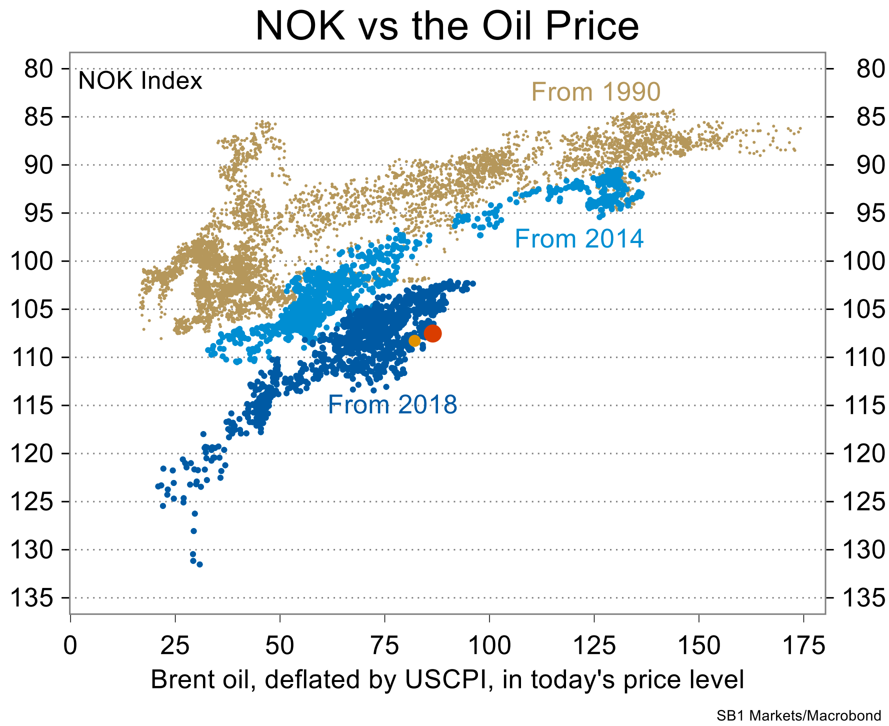


Oil up, and ‘more’ than NOK



NOK vs the oil price

SB1 Markets/Macrobond

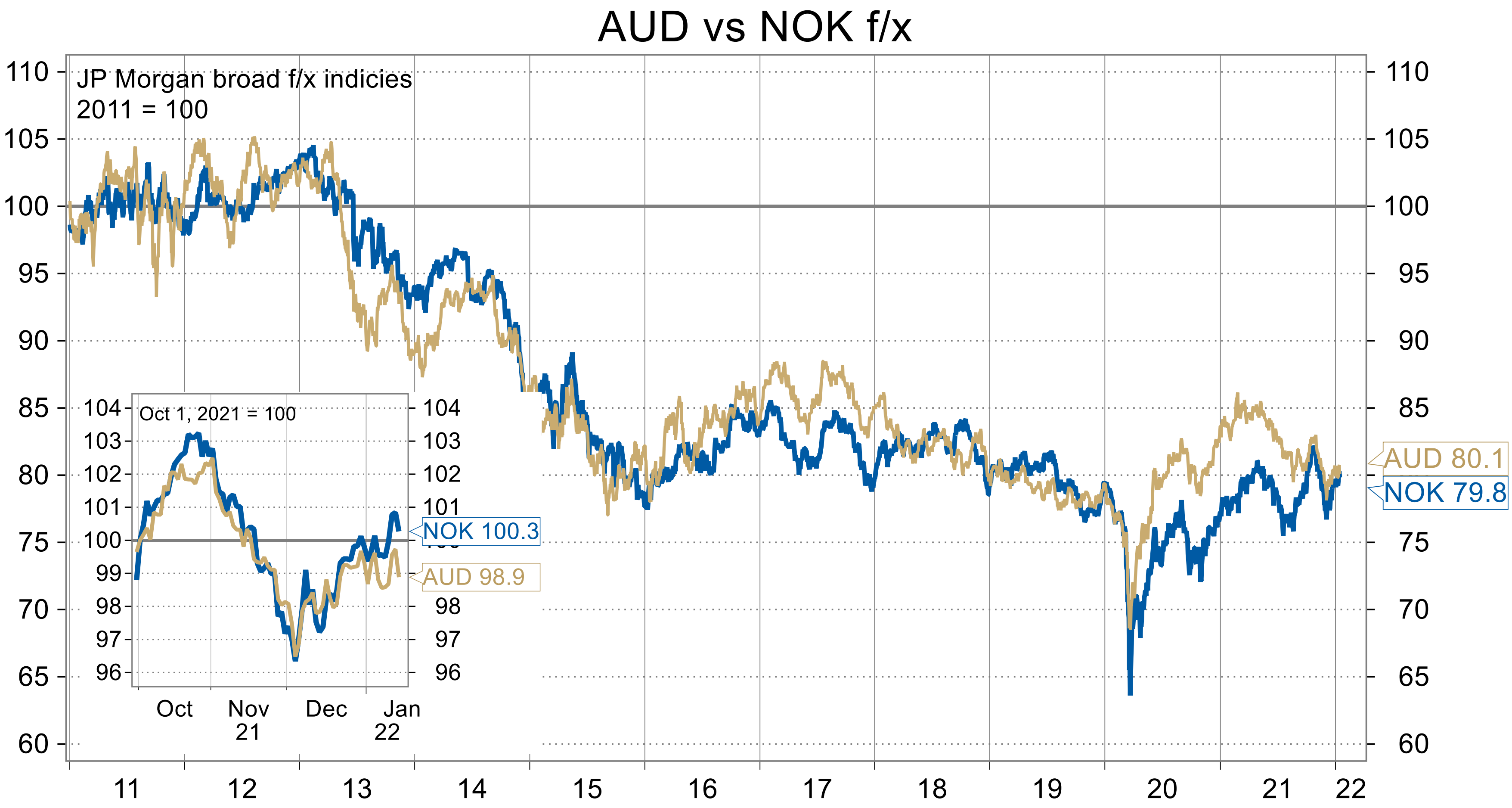


NOK vs the Oil Price

SB1 Markets/Macrobond

- NOK is still correlating quite closely to the oil price but at a lower level than before 2018 – and now the NOK is weak even vs the past 3 years’ relationship
- A USD 10 drop in the oil price weakens the NOK by some 4%, as a partial effect.
Within a broader model, the impact is smaller

NOK slightly stronger than the AUD so far in 2022



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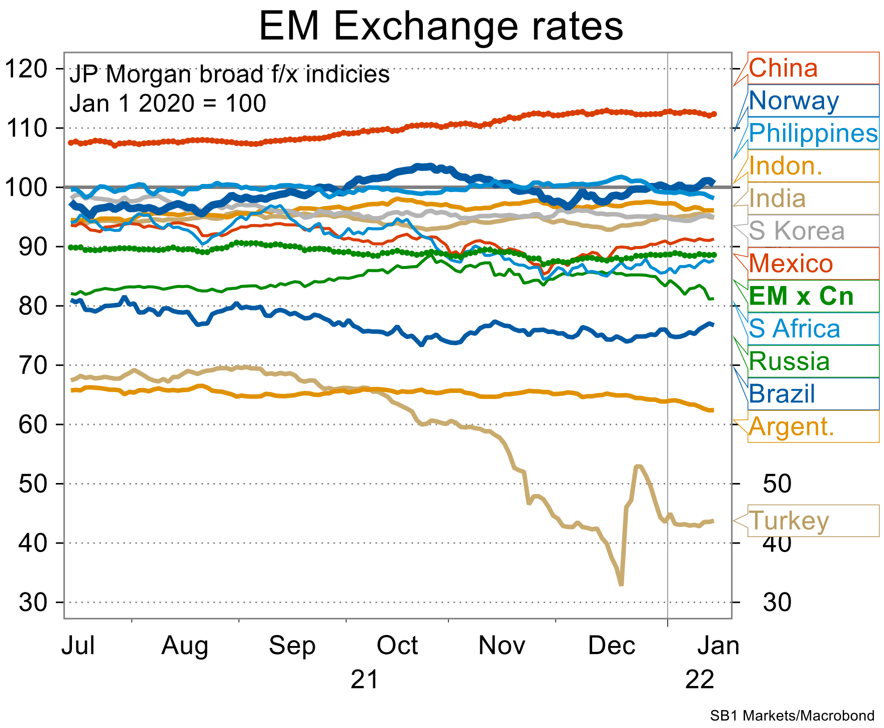
The two f/x indices are back to the 2011 parity (vs each other, from which they never since have deviated much)

The Russian rouble is heading down, even if energy prices are high

… there must be something else going on, down 5% last month.



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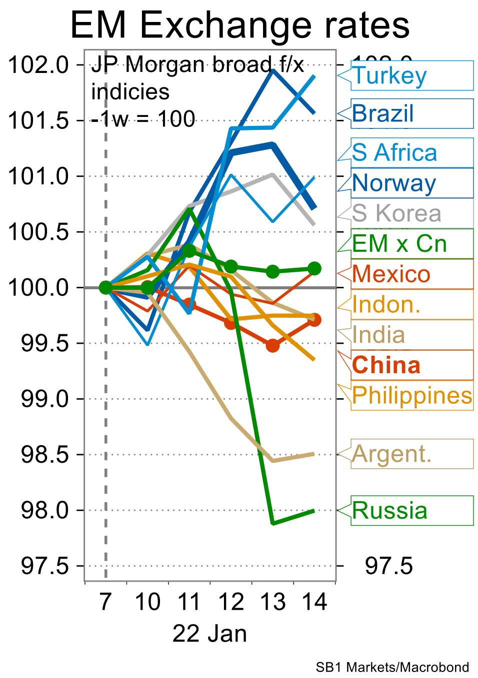

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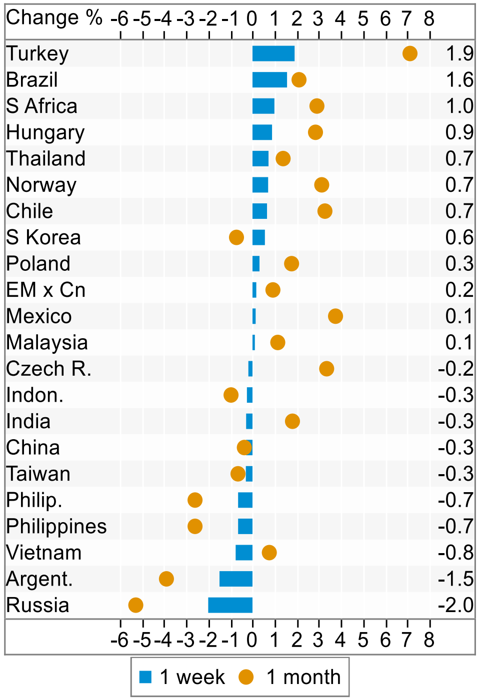

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- In average, EM x China up last week – with support form Turkey (yes, it happens), and Brazil at the top
- Argentina again at a slippery slope

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