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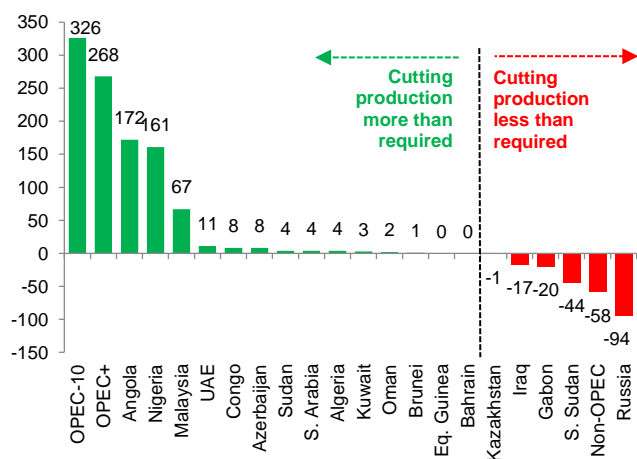
05 October 2021

OPEC+ delights oil bulls by sticking to script

- **Oil continues its relentless rally as OPEC+ sticks to only a gradual production ramp-up.** OPEC+ ministers took less than 30 minutes to ratify a 0.4m b/d supply hike for November during their latest monthly meeting on 3 October. While the group was simply sticking to its well-established strategy to incrementally rollback production cuts, oil bulls relished with spot oil prices leaping more than 3% on the announcement – Brent settled at USD81/b (three year highs) and WTI settled at USD78/b (7 year highs).
- **Markets are screaming for more oil.** With the vaccine-led recovery driving physical goods demand forward, the global system has become increasingly constrained in its ability to match the supply. This acute supply constraint has led to a relentless rally in oil – and broader commodities – over recent weeks, which comes amid an already elevated inflation picture as supply chains for manufactured products are strained and developed market central banks signal tighter monetary policy. In other words, this is an energy rally that very few economies want or can sustain. As such, expectations were that OPEC+ would deliver more than its telegraphed 0.4m b/d output hikes to alleviate apprehensions over demand destruction and potential political repercussions of not delivering more.
- **The prudent OPEC+ supply management strategy has been working.** OPEC+ supply management continues to remain immensely successful because of its sheer unexpectedness and suddenness in communication. Year-to-date, oil prices are up ~60% and excess inventories continue to be drawn down. Meanwhile OPEC+ production is rising and the US oil rig count at 428 still remains ~40% below pre-virus levels. This stands in sharp contrast to the strategy prior to 2020, when OPEC+ viewed itself as the central bank of the oil

OPEC+ OUTPUT QUOTAS ARE INCREASINGLY UNDERUTILISED, CONSTRAINED BY OUTPUT CAPACITY

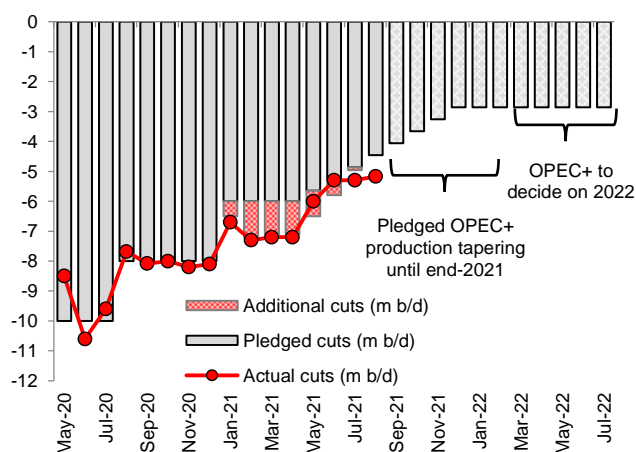
OPEC+ ACTUAL VS. TARGET OUTPUT CUTS, YEAR-TO-DATE (M B/D)



Source: Bloomberg, OPEC, MUFG Research

OPEC+ COMPLIANCE ON ITS LARGEST CUTS IN HISTORY HAS BEEN PRUDENT AND IMPRESSIVE

OPEC+ PLEDGED AND ACTUAL OUTPUT CUTS SINCE MAY 2020 (M B/D)



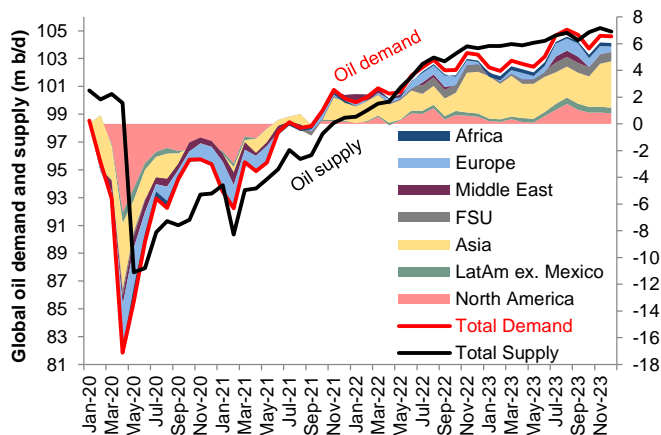
Source: Bloomberg, OPEC, MUFG Research

market, reassuring too much with predictable but never large enough cuts.

- OPEC+ optimisation is for backwardation – and it has been successful.** Beyond spot prices, the supply tightness in oil markets is being shown up in futures markets wherein prompt timespreads which are one of the best indicators of market tightness given they price fundamentals and not expectations – corroborate with this market tightening, remaining in firm backwardation – which are bullish structures where near-dated contracts trade at a premium to later-dated ones. This strikes at the heart of the OPEC+ optimisation strategy in achieving fiscal stability through higher revenues and market share. In essence, backwardation favours OPEC+ as it eliminates the financial incentive to store oil over time and discourages US shale producers from locking-in prices for future production (as low “deferred” prices through the backwardation structure can restrain higher cost producer’s ability to secure future cash flows and attract funding). Furthermore, backwardation maximises low cost producers’ (namely, OPEC+) revenues relative to higher cost producers (such as shale) that hedge, as they instead sell higher production levels at spot prices. Key to this view is our belief that backwardation can rationalise shale growth by reducing returns expectations and increasing leverage expectations, both of which drive funding costs higher and slow capital allocation.
- The next OPEC+ meeting on 4 November will coincide with COP26 and deliberations on the energy transition.** With the COP26 climate deliberations set to take place between 31 October to 12 November in Glasgow, the next OPEC+ meeting (scheduled to take place on 4 November) will take place during crucial deliberations on the energy transition. Demand for coal and natural gas has exceeded pre-pandemic highs with oil not far behind. With over three-quarters of global energy demand still met by fossil fuels and less than a fifth by renewables, according to the IEA, transition policies have come under scrutiny for the run up in energy prices. Indeed, transition policies which restrict oil production – or increase the costs of drilling and financing – will prove inflationary in the near-to-medium term given the still negligible share of demand stemming from renewables. From this, green initiatives near-term in fact support oil demand, long before they hurt oil demand. Thus from an oil price perspective, until we reach a point in the market wherein oil’s importance as a feedstock source of energy for the global economy becomes diminished to the extent that renewable sources of energy become increasingly utilised, we view the near to medium term impact of the energy transition as in fact oil price supportive. In other words, without curbing the demand-side of the oil equation, the energy transition will

OIL MARKET TO REMAIN IN DEFICIT AND PIVOT INTO SURPLUS FROM Q2 2022

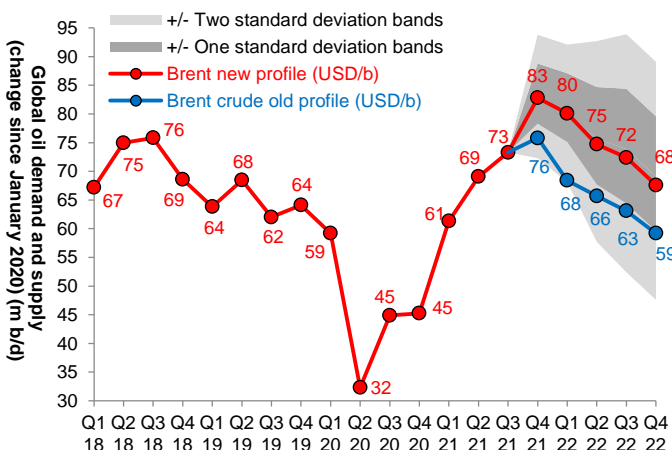
GLOBAL OIL DEMAND AND SUPPLY, CHANGE VS. JANUARY 2020 (M B/D)



Source: Bloomberg, EIA, IEA, OPEC, MUFG Research

MUFG’S OIL PROFILE SIGNALS A PEAK IN Q4 2021 WITH A BEARISH 2022 BIAS GIVEN THE LIKELY SURPLUS

AVERAGE BRENT (USD/B) WITH ONE AND TWO STANDARD DEV. BANDS



Source: Bloomberg, EIA, IEA, OPEC, MUFG Research

lead to higher oil prices.

- **2022-23 is far from clear-cut for OPEC+.** OPEC+ should end 2022 with 3.8m b/d of curbs still in place. The question remains whether there is room for all of these curbs to be unwound in 2022:
 1. We view production increases could be paused in Q1 2022, to avoid oversupply in the seasonally weakest quarter of the year.
 2. US shale oil supply is recovering (albeit negligibly), and total US supply growth could reach 1m b/d in 2022. On top of this, sustained high prices are translating into an outlook for non-OPEC conventional supply somewhat better than we had previously envisaged.
 3. We view ~2m b/d of OPEC+ supply curbs will need to be kept in place through year-end – and most likely through 2023 – to prevent a return to oversupply. This figure could exceed 3m b/d if Iranian supply were to return to previous levels. So far, the evidence suggests that such restraint would be maintained.
 4. Without more Iranian supply, spare capacity could fall to little over 3m b/d by Q4 2022. Our modelling estimates suggest that this is not low enough to be critical, but it could be low enough to start to raise concerns over future supply constraints. Remaining capacity would be heavily concentrated in Saudi Arabia, Iraq, Kuwait and the UAE, meaning cohesion between these our may well be key to the price outlook.
- **We remain bullish oil until Q2 2022.** We recently catalogued that the setup for oil could not be more favourable throughout the autumn and winter months (see [here](#)). The vaccine-led recovery has driven physical goods demand to reach such high levels that the global system is becoming increasingly constrained in its ability to match the supply. Such supply constraints are biting at a time that the velocity of oil inventory declines is accelerating and the coming winter is creating asymmetric upside price risks. With pandemic inventory buffers exhausted, supply shortages that spur such high price shocks will be negated by demand elastic destruction as the only option to rebalance markets (that is, the cure for high prices is high prices – a self-correcting mechanism). It is at this point, in conjunction with the looming constructive supply impulses (weaker OPEC+ compliance, more Iranian barrels, an increase in US shale supply and a steady build-up of oil inventories) that we turn tactically bearish from Q2 2022.
- **Oil price forecasts.** Given our expectations that the prevailing market deficit – which has endured since June 2020 (see [here](#)) – will not pivot into oversupply until Q2 2022 (from our initial estimates of Q1 2022). This is driven by winter demand risks which is now squarely skewed to the upside as the global gas crunch will increase gas-to-oil substitution (see [here](#)), and thus lead to an even tighter for longer physical oil market pushing oil inventories to lower levels. This will generate further price appreciation. We now forecast Brent ending Q4 2021 and Q1 2022 at USD87/b and USD82/b, respectively – widening the strong backwardation embedded into the oil futures curves and generating positive carry for oil investors. Thereafter, with the market expected to return to a mild surplus, leads us to be tactically bearish with a leg lower to USD74/b, USD72/b, and USD66/b in Q2, Q3 and Q4 2022, respectively.

MUFG AVERAGE OIL PRICE FORECASTS (USD PER BARREL)

USD/b			Average quarterly forecasts					Average annual forecasts	
	Spot	Q3 2021	Q4 2021	Q1 2022	Q2 2022	Q3 2022	Q4 2022	2021	2022
Brent	81.3	73.3	82.8	80.1	74.7	72.4	67.6	71.6	73.7
NYMEX WTI	77.6	70.7	79.8	76.8	71.0	68.9	64.2	68.7	70.2
Brent ranges	---	---	68.6 – 95.9	64.4 – 92.3	56.3 – 85.6	54.0 – 82.5	49.2 – 78.9	---	---
WTI ranges	---	---	65.6 – 88.3	60.3 – 87.7	53.0 – 79.5	51.9 – 76.8	46.7 – 72.4	---	---

Source: MUFG Research

MUFG QUARTER-END OIL PRICE FORECASTS (USD PER BARREL)

USD/b			Quarter end forecasts					Average annual forecasts	
	Spot	Q3 2021	Q4 2021	Q1 2022	Q2 2022	Q3 2022	Q4 2022	2021	2022
Brent	81.3	78.4	85.2	82.4	74.3	71.9	65.6	71.6	73.7
NYMEX WTI	77.6	74.7	81.9	79.2	70.8	68.2	61.8	68.7	70.2
Brent ranges	---	---	71.6 – 98.5	67.8 – 95.3	56.2 – 85.4	53.5 – 81.3	47.8 – 76.5	---	---
WTI ranges	---	---	68.5 – 90.3	61.5 – 88.7	52.4 – 79.0	50.9 – 76.0	44.5 – 70.5	---	---

Source: MUFG Research

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