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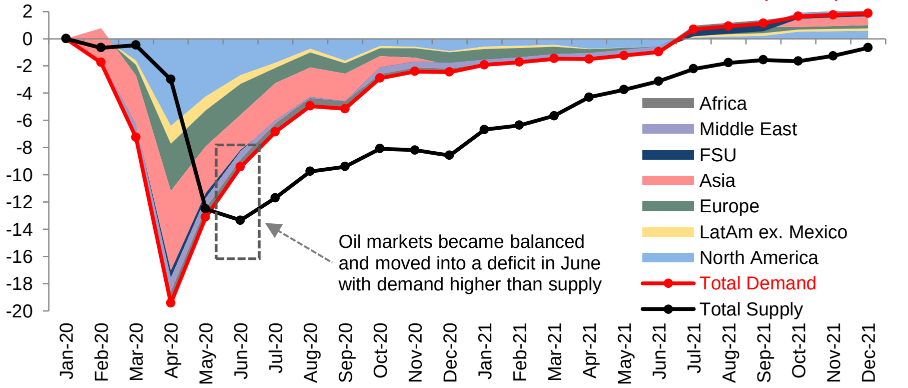
Examining high frequency indicators in gauging the oil demand recovery

- Unconventional high frequency indicators signal that global oil demand is recovering but the pace is beginning to slow. Our bottom-up mapping of country-by-country modelling calibration points to global oil demand performing better than we had expected at the start of the draconian lockdowns back in mid-March. Adjusting for biases and seasonality in daily Apple, Google and flight radar mobility indicators, provides visibility that the global oil demand contraction in the April nadir was -19.4m b/d y/y to 79.2m b/d (we had previously forecast a hit of -26.1m b/d y/y), easing further to -13.1m b/d, -9.4m b/d, -6.8m b/d in May, June and July, respectively. However, after a sharp 12.6m b/d improvement in demand levels between April to July, the pace of monthly oil demand gains is starting to slow. Looking ahead, we view the global oil demand recovery improving by only a further ~4m b/d from August to December.
- Global oil demand will not return back to pre-virus levels until Q3 2021, and we forecast a 2.5m b/d quantum as a permanent level of demand destruction. Despite an assumed pick-up in momentum over the summer, we forecast that global liquids demand will only expand to an average 97m b/d by year-end, as aviation demand in particular is slow to convalesce losses. As a result – absent the risk of iterative virus waves – we model 2020 annualised global oil demand ~8mb/d lower at 92m b/d. We believe global oil demand will breach the pre-virus run-rate of 100m b/d only in Q3 2021, averaging 98.6m b/d in 2021 (see here).
- Oil price implications. A push-and-pull between ongoing reopenings and a weaker US dollar on the one hand, against a multifaceted set of macro vulnerabilities on the other hand, is keeping prices range bound in the low USD40/b level, leading to a decrease in trading activity (near an eight year low). Thus, Brent has been stuck in a tight USD3/b range since early June, in line with our thesis of the transition from relief rally to cyclical tightening (see here and here). Oil markets must clear the large inventory overhang (~1bn barrels in excess stocks accumulated year-to-date). This process will take time and require patience. From this, we expect tepid demand growth and the clearance of the excess inventory overhang, to induce an upside cap in prices for the rest of 2020 – we forecast Brent ending Q3 and Q4 at USD36/b and USD46/b, respectively.

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



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

Examining high frequency indicators in gauging the oil demand recovery

Global oil markets remain in a supply deficit with risks to the supply-demand outlook

The rebound in global oil demand since the April nadir has been a central part of the market rebalancing. Our latest fundamental modelling estimates point to supply and demand improvements to have brought the global oil market into deficit by early June. With the market rebalancing firmly in motion, oil prices have transitioned from relief rally to cyclical tightening. However, the momentum is easing given both weaker demand progress (resurgence of virus in the US, lagging global jet fuel demand growth, slowdown in Chinese imports as well as headwinds to normalising activity in countries where the virus remains under control), and higher supply growth from OPEC+ and US oil production. This comes on top of the excess inventory overhang remains sizable which clouds the supply and demand outlooks.

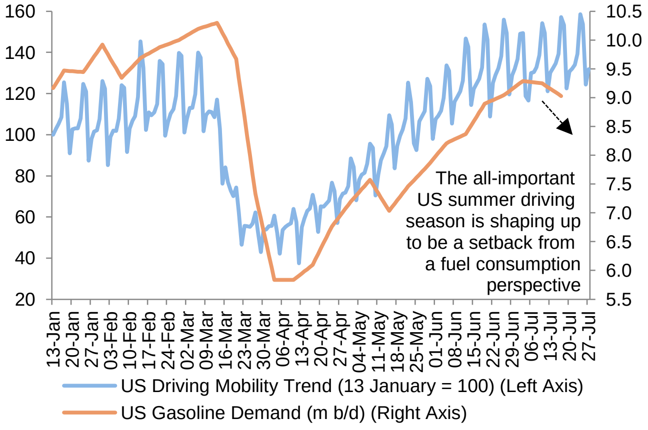
Global oil demand has been recovering faster than expected

High frequency data indicates that oil consumption is improving in most key major economies across the world, albeit unevenly. Our bottom-up mapping of country-by-country modelling calibration points to global oil demand performing better than we had expected at the start of the draconian lockdowns back in mid-March. Adjusting for biases and seasonality in daily Apple, Google and flight radar mobility indicators, provides visibility that the global oil demand contraction in the April nadir was -19.4m b/d y/y to 79.2m b/d (we had previously forecast a hit of -26.1m b/d y/y), easing further to -13.1m b/d, -9.4m b/d, -6.8m b/d in May, June and July, respectively. Robust improvements since April have thus more than halved the hit to global oil demand.

Pace of global oil demand growth is however slowing

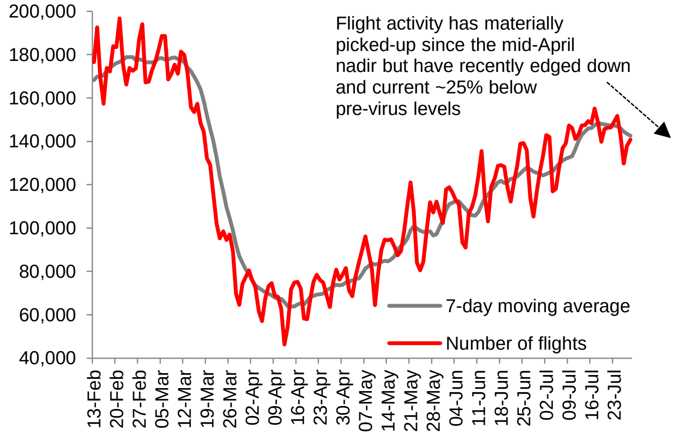
Having said that, the pace of the global oil demand recovery is starting to slow. Part of this is driven by renewed partial lockdowns in major countries such as the US, India and Australia. By product, the largest hit remains on jet, where we estimate that demand is still down 4.2m b/d y/y in July with gasoline and diesel demand estimated down 2.9 and 1.7m b/d respectively. Finally, while gasoline demand is up most since its trough, it is the fuel where demand improvements have slowed the most in July. Granted, gasoline demand has rebounded recently as mobility restrictions have been eased but journey frequency and distance travelled will most likely be lower for many months to come, given the spike in unemployment rates and various work from home measures staying in place. As such, going forward, after a sharp 12.6m b/d improvement in demand levels between April to July, the pace of monthly oil demand

APPLE MOBILITY FOR US DRIVING INDEX (100 = 13 JANUARY 2020) AND US GASOLINE DEMAND (M B/D)



Source: Apple Mobility Statistics, EIA, MUFG MENA Research

TOTAL NUMBER OF FLIGHTS GLOBALLY PER DAY



Source: Flightradar24, MUFG MENA Research gains is set to slow to an improvement of ~4m b/d from August to December, owing to lingering virus waves and the prospect of the reimposition of lockdowns globally, a slowdown in Chinese oil import demand, heightened US-Chinese animosities, lagging jet fuel growth and headwinds in normalising activity in countries where the virus remains under control.

Higher OPEC+ production from August is not expected to hit global oil markets

For the time being, oil consumption is accelerating in countries emerging from lockdown. In the far east, in Europe and in the middle east, where summer temperatures typically drive increased domestic demand for power generation (cooling etc.). Indeed, Saudi energy minister, HH Prince Abdulaziz bin Salman, pointed to such seasonal oil demand effects being even more pronounced this year as GCC regional populations stay indoors amid continued travel restrictions. HH Prince Abdulaziz assured market watchers fearful of a deluge of new Saudi supply that "not a single additional barrel will be exported". Russian energy minister, Alexander Novak, echoed similar remarks, stating that he believed that most of the additional oil be consumed by domestic market rather than exported.

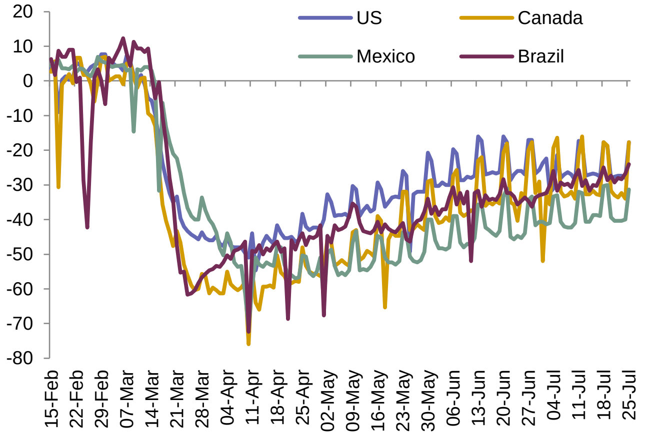
Global oil demand will not return back to pre-virus levels until Q3 2021, and we forecast a 2.5m b/d quantum as a permanent level of demand destruction

Despite an assumed pick-up in momentum over the summer, we forecast that global liquids demand will only expand to an average 97m b/d by year-end, as aviation demand in particular is slow to convalesce losses. As a result – and absent the risk of iterative virus waves – we model 2020 annualised global oil demand ~8mb/d lower at 92m b/d. We believe global oil demand will breach the pre-virus run-rate of 100m b/d only in Q3 2021, averaging 98.6m b/d in 2021 (see here). This is 2.5m b/d lower than our previous assessment, and we adopt this quantum as the permanent level of demand destruction, given we view the fall-out from COVID-19 will be long-lasting. As the world emerges from lockdowns, a combination of weaker economic growth and lingering impacts of COVID-19 mobility restrictions will still be a drag on the recovery in oil demand, especially jet fuel. Thus, we continue to forecast the damage persisting well into 2021, and our expectations were similarly echoed by the IEA in its latest monthly assessment this week, projecting that global oil demand will return to pre-COVID-19 levels only by 2022. In the medium-term, we expect structural shifts to consumer, corporate and industrial behaviour, to more than offset promising demographic trends and EM expansion, to slow oil demand growth.

Crude timespreads reveal a deteriorating outlook for global oil demand

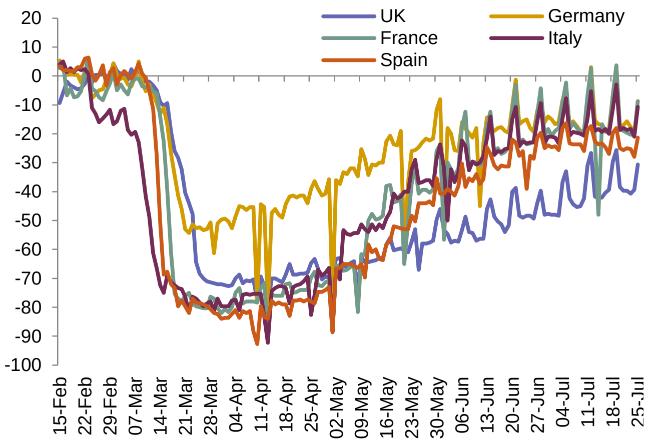
Crude timespreads reveal a deteriorating outlook for global oil fundamentals, as fresh outbreaks of Covid-19 across Asia hit demand for transport fuels. The six-month timespreads for Brent and Dubai have fallen by more than USD1/b since the start of July. Separately, WTI performed better, with its six-month forward spread

GOOGLE MOBILITY TRENDS FOR AMERCIAS*



*Source: Google, MUFG MENA Research; * shows the rolling seven day average mobility trend in workplaces, transit hubs as well as retail and recreational sites (baseline day is the median value from the five week period 3 January – 6 February 2020)*

GOOGLE MOBILITY TRENDS FOR EUROPE*



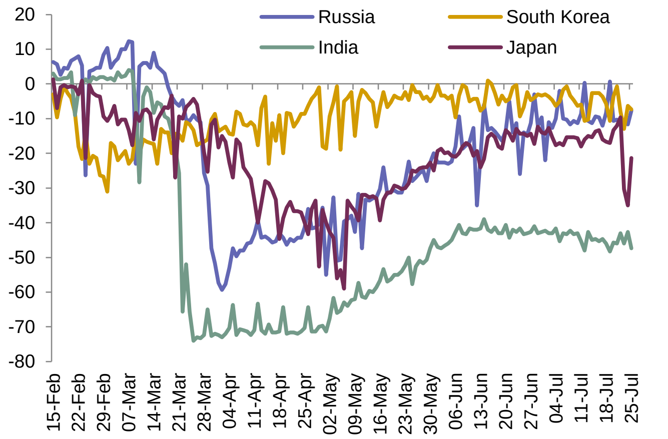
*Source: Google, MUFG MENA Research; * shows the rolling seven day average mobility trend in workplaces, transit hubs as well as retail and recreational sites (baseline day is the median value from the five week period 3 January – 6 February 2020)*

(September 2020 vs. March 2021) falling by only USD0.5/b, largely due to US refiners ramping up run rates. Compounding the uncertain demand outlook is an expected increase in global supply in H2 2020, as OPEC+ loosens its supply cuts and non-OPEC producers (mainly in North America, which in total equates to around 4.5m b/d of crude off the table year-to-date) ramp up output. Weakening fundamentals point to downside risks for oil prices, despite crude being supported by a weakening US dollar.

Oil price implications

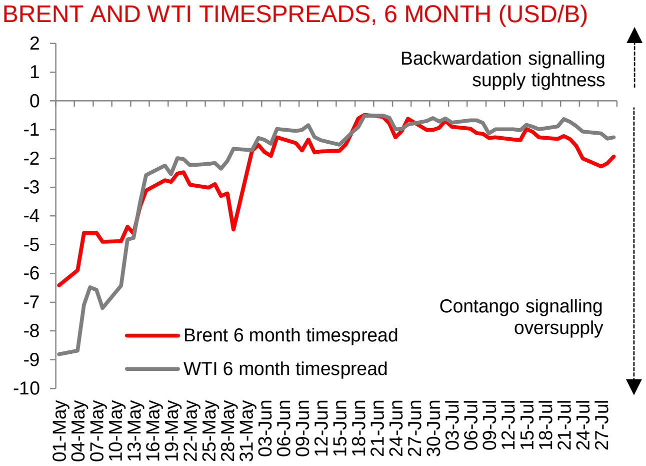
A push-and-pull between ongoing reopenings and a weaker US dollar on the one hand, against a multifaceted set of macro vulnerabilities on the other hand, is keeping oil prices range bound in the low USD40/b level, leading to a decrease in trading activity which has hit a near eight year low. Brent has been stuck in a tight USD3/b range since early June, in line with our thesis of the transition from relief rally to cyclical tightening (see here and here). Oil, like other commodities, are spot (anchored) physical assets – not anticipatory (unanchored) financial assets like equities – and thus must clear the large inventory overhang (~1bn barrels in excess stocks accumulated year-to-date). This process will take time and require patience. From this, we expect more tepid demand growth and the clearance of the large inventory overhang, to induce an upside cap in oil prices for the rest of 2020 – we forecast Brent ending Q3 and Q4 at USD36/b and USD46/b, respectively.

GOOGLE MOBILITY TRENDS FOR ASIA*



*Source: Google, MUFG MENA Research; * shows the rolling seven day average mobility trend in workplaces, transit hubs as well as retail and recreational sites (baseline day is the median value from the five week period 3 January – 6 February 2020)*

BRENT AND WTI TIMESPREADS, 6 MONTH (USD/B)



Source: Bloomberg, MUFG MENA Research

Ranges & Outlook for the week ahead

BRENT – NEUTRAL BIAS – (39.00-48.00)

WTI – NEUTRAL BIAS – (37.00-46.00)

	Spot close 29.07.20	Q3 2020	Q4 2020	Q1 2021	Q2 2021
Brent	44.42	35.60	46.10	49.20	54.60
NYMEX	42.05	30.60	41.60	45.20	50.30
		Range	Range	Range	Range
Brent		28.35-54.85	35.10-57.10	37.70-60.70	43.10-66.10
NYMEX		23.35-49.85	30.60-52.60	33.70-56.70	38.80-61.80

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