



Organization of the Petroleum Exporting Countries



# OPEC Monthly Oil Market Report

12 July 2022

**Feature article:**  
*The outlook for the oil market in 2023*

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In Memoriam

## **Mohammad Sanusi Barkindo**

We dedicate this issue of the *OPEC Monthly Oil Market Report (MOMR)* to the memory of OPEC Secretary General, His Excellency Mohammad Sanusi Barkindo, who passed away on 5 July 2022 in his home country of Nigeria. He was the much-loved leader of the OPEC Secretariat and his passing was a profound loss to the entire OPEC Family, the oil industry and the international community.





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# Oil Market Highlights

## Crude Oil Price Movements

Crude oil spot prices rose in June, extending the previous month's increase. Higher futures prices and strong physical crude market fundamentals drove the increase, amid higher crude demand from refiners and several supply disruptions. The OPEC Reference Basket rose \$3.85, or 3.4%, to settle at \$117.72/b. The ICE Brent front month increased by \$5.54, or 4.9%, in June to average \$117.50/b and NYMEX WTI rose by \$5.08, or 4.6%, to average \$114.34/b. The Brent/WTI futures spread widened by 46¢ to an average of \$3.16/b. The market structure of all three major crude benchmarks – ICE Brent, NYMEX WTI and DME Oman – strengthened further in June and prompt time spreads moved into deeper backwardation. Hedge funds and other money managers cut net long positions by nearly 11% in the two major futures contracts.

## World Economy

World economic growth in 2022 remains broadly unchanged at 3.5%, while the initial forecast for 2023 expects global growth of 3.2%. US GDP growth for 2022 remains unchanged at 3.0%, followed by 2.1% growth in 2023. Euro-zone economic growth for 2022 is unchanged at 3.0%, while growth in 2023 is forecast at 2%. Japan is expected to grow by 1.7% in 2023, following growth of 1.6% in 2022, unchanged from the previous report. China's 2022 growth remains at 5.1% and GDP growth in 2023 is seen slightly lower at 5%. India's GDP growth remains at 7.1% in 2022 and is expected to grow by 6% in 2023. Brazil's economic growth forecast for 2022 remained unchanged at 1.2%, increasing to 1.5% in 2023. For Russia, the 2022 GDP growth forecast is unchanged, showing a contraction of 6.0%, while growth is anticipated to recover to 1.2% in 2023. Consumption remains robust, especially in the advanced economies, with an expected continued recovery particularly in the contact-intensive services sector, which includes travel and transportation activity, leisure and hospitality. However, significant downside risks exist, stemming from ongoing geopolitical tensions, the continued pandemic, rising inflation, aggravated supply chain issues, high sovereign debt levels in many regions, and expected monetary tightening by central banks in the US, the UK, Japan and the Euro-zone.

## World Oil Demand

World oil demand growth in 2022 remains unchanged from the previous month's assessment at 3.4 mb/d. Oil demand in the OECD is estimated to increase by 1.8 mb/d, while non-OECD is seen growing by 1.6 mb/d. Total oil demand is projected to average 100.3 mb/d. The first quarter of this year was revised higher, amid better-than-anticipated oil demand in the main OECD consuming countries. However, with the resurgence of COVID-19 in China and ongoing geopolitical uncertainties, oil demand in 2Q22 is revised lower. For 2023, world oil demand growth is expected to reach 2.7 mb/d to average 103.0 mb/d, with the OECD growing by 0.6 mb/d and non-OECD growth forecast at 2.1 mb/d. Oil demand in 2023 is expected to be supported by a still solid economic performance in major consuming countries, as well as improved geopolitical developments and containment of COVID-19 in China.

## World Oil Supply

Non-OPEC liquids supply growth in 2022 remains broadly unchanged from the previous month's assessment, despite upward revisions to China and Canada, and is now expected to grow by 2.1 mb/d to average 65.7 mb/d. The main drivers of liquids supply growth for the year are expected to be the US, Canada, Brazil, China, Kazakhstan and Guyana, while production is expected to decline mainly in Russia, Indonesia and Thailand. In 2023, non-OPEC liquids production is projected to grow by 1.7 mb/d to average 67.4 mb/d. Liquids supply in the OECD is forecast to increase by 1.4 mb/d in 2023, while non-OECD is seen growing by 0.2 mb/d. The main drivers for 2023 are expected to be the US, with growth of 1.1 mb/d, followed by Norway, Brazil, Canada and Guyana. However, uncertainty regarding the operational aspects of US production and from ongoing geopolitical developments remains high. OPEC NGLs and non-conventional liquids are forecast to grow by 0.1 mb/d in 2022 to average 5.39 mb/d and by 50 tb/d to average 5.44 mb/d in 2023. OPEC-13 crude oil production in June increased by 234 tb/d m-o-m to average 28.72 mb/d, according to available secondary sources.

### Product Markets and Refining Operations

Refinery margins at all main trading hubs continued to increase in June, supported by stronger product fundamentals despite rising product output levels, as refiners continued to increase processing rates following peak maintenance season. Rising transport fuel requirements in line with seasonal trends led to robust gains at the top and middle sections of the barrel. Meanwhile, naphtha and fuel oil came under pressure due to subdued demand and unfavourable economics. Going forward, refinery intakes are expected to rise further to accommodate a seasonal pick up in fuel consumption and allow a much-needed stock build.

### Tanker Market

Dirty tanker spot freight rates in June recovered some of the losses seen the previous month. The tanker market continued to improve following the poor performance in 2021, although gains varied across sectors. Suezmax and Aframax markets have benefited from the rerouting of longstanding trade patterns resulting in longer voyages, while VLCCs have seen less momentum from these shifts, with lower flows on longer haul routes such as from the Americas to Asia. Suezmax rates rose 20% m-o-m and Aframax rates increased 11%, while VLCC rates were up 8% on average. Clean rates continued to see strong m-o-m growth, up 21% on average amid tight product markets and increased demand for longer haul routes.

### Crude and Refined Products Trade

US crude imports remained broadly unchanged in June at 6.4 mb/d, while US crude exports slipped from the high levels seen the month before to average 3.4 mb/d. China's crude imports averaged 10.8 mb/d in May, continuing to increase from the weak performance in February, with flows heading to inventories as refineries continued to cut runs. India's crude imports fell back from an exceptional high the month before to average 4.6 mb/d in May, despite a surge in Russian inflows. Tanker tracking data shows India's crude imports and product exports moving higher in June. Japan's crude imports fell back from the previous month's highs, averaging 2.6 mb/d in May. Recent estimates show OECD Europe's imports strengthening in May and June, with increased y-o-y inflows from West Africa and the Middle East, partially offset by declines in North Africa.

### Commercial Stock Movements

Preliminary May data sees total OECD commercial oil stocks up 10.5 mb m-o-m. At 2,680 mb, inventories were 253 mb less than the same time a year ago, 312 mb lower than the latest five-year average, and 276 mb below the 2015–2019 average. Within components, crude stocks fell by 10.1 mb m-o-m, while product stocks rose 20.6 mb over the same period. At 1,307 mb, OECD crude stocks were 103 mb below the same time a year ago, 176 mb lower than the latest five-year average, and 177 mb below the 2015–2019 average. OECD product stocks stood at 1,373 mb, representing a deficit of 150 mb with the same time a year ago, 136 mb lower than the latest five-year average, and 97 mb below the 2015–2019 average. In terms of days of forward cover, OECD commercial stocks fell 0.7 days m-o-m in May to stand at 57.3 days. This is 7.0 days below May 2021 levels, 7.6 days less than the latest five-year average and 4.6 days lower than the 2015–2019 average.

### Balance of Supply and Demand

Demand for OPEC crude in 2022 remains unchanged from the previous month's assessment to stand at 29.2 mb/d, which is around 1.1 mb/d higher than in 2021. Based on the initial forecasts for world oil demand and non-OPEC supply in 2023, demand for OPEC crude is expected to reach 30.1 mb/d, 0.9 mb/d higher than the 2022 level.



## Feature Article

### The outlook for the oil market in 2023

World GDP growth in 2023 is forecast at 3.2%. This assumes that the ramifications of the pandemic, geo-political developments in Eastern Europe and global financial tightening amid rising inflation do not negatively impact the 2023 growth dynamic to a major degree. It also assumes that major economies revert back towards their growth potentials. However, downside risk exists. Global inflation continues to be a major concern, along with the consequence of further monetary tightening measures by key central banks. The continuation of the pandemic into 2023 is another risk that could curb growth depending on the extent of measures taken to reduce contagion. While

labour markets are forecast to remain tight, supply chain bottlenecks may not be resolved in the short term and high debt levels across the globe may persist. In the OECD, GDP growth is expected at 2.1% in 2023, from 2.9% in 2022. In the non-OECD, 2023 GDP growth is forecast at 4.2%, compared to 3.9% in 2022.

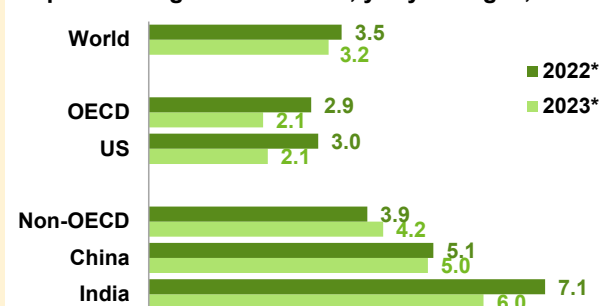
Better-than-expected containment of COVID-19 and expected firm global economic growth are projected to support global oil demand in 2023, which is forecast to grow by 2.7 mb/d y-o-y. Within the regions, OECD oil demand is forecast to rise by 0.6 mb/d and non-OECD oil demand is projected to show an increase of 2.1 mb/d, mostly in China and India. This is supported by a recovery in transportation fuels and firm industrial fuels demand, including petrochemical feedstock.

In terms of fuels, gasoline and diesel are expected to lead oil demand growth in 2023, on increasing mobility in major consuming countries, such as the US, China and India. Both on-road diesel, including trucking, as well as increasing industrial, construction and agricultural activities in OECD America, Europe and China will support diesel demand. Light distillates will be supported by capacity additions – NGL plants in the US, Propane Dehydrogenation (PDH) plants in China, and steady petrochemical margins. Jet fuel will continue to recover, as domestic and international air travel pick up, but business travel is expected to continue to lag. Uncertainties remain, including COVID-19-related challenges, particularly in China, as well as geopolitical uncertainties and their impact on oil demand.

Non-OPEC oil supply is forecast to grow by 1.7 mb/d y-o-y in 2023, supported by stronger demand. Upstream investment in non-OPEC countries is expected at around \$415 billion (bn), broadly the same level as in 2022 and 18% more than in 2021. However, this level is still only half of the \$755 bn seen in back 2014. New production by projects sanctioned up to 2023 is forecast at around 19.7 mb/d, up by 10% compared to the 17.8 mb/d seen in 2022. Liquids production growth in the US is forecast at 1.1 mb/d, mainly from US Permian crude and non-conventional NGLs, as well as from the Gulf of Mexico. Oil production in Norway, Brazil, Guyana, Kazakhstan, and Argentina is forecast to increase through new field start-ups and ramp-ups of existing projects. Moreover, non-OPEC processing gains and OPEC NGLs are forecast to grow by 70 tb/d and 50 tb/d, respectively, y-o-y.

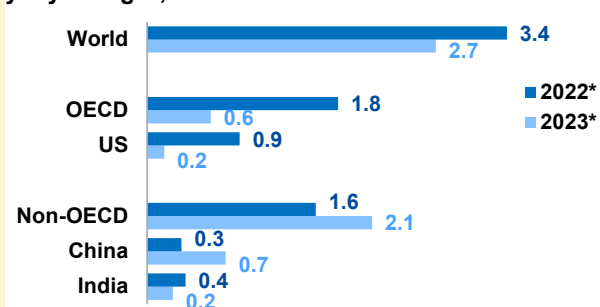
Looking ahead to 2023, strong world oil demand growth, along with the increase in non-OPEC supply, are forecast to lead to demand for OPEC crude to increase by 0.9 mb/d y-o-y to average 30.1 mb/d. Nevertheless, uncertainty to the forecast remain to the downside, with much depending on the course of the pandemic and related measures, global financial tightening in the light of growing inflation, and the resolution of the ongoing geo-political issues in Eastern Europe.

Graph 1: GDP growth forecast, y-o-y changes, %



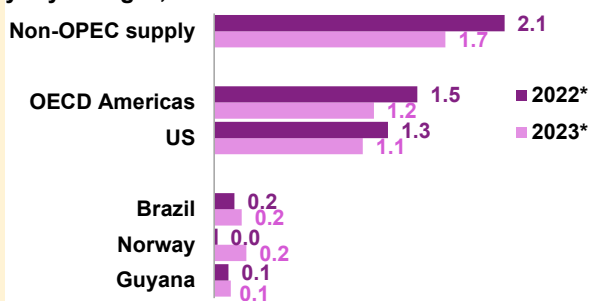
Note: \* 2022-2023 = Forecast. Source: OPEC.

Graph 2: World oil demand growth forecast, y-o-y changes, mb/d



Note: \* 2022-2023 = Forecast. Source: OPEC.

Graph 3: Non-OPEC supply growth forecast, y-o-y changes, mb/d



Note: \* 2022-2023 = Forecast. Source: OPEC.



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# Crude Oil Price Movements

Crude spot prices averaged higher in June, despite elevated volatility in the futures markets, as oil market fundamentals remained strong. Firm buying interest from refiners and high refining margins amid a supply outages in some countries, specifically light sweet crude, buoyed the value of spot prices. In June, North Sea Dated rose by \$10.43, or 9.2%, strongly supported by robust demand for North Sea crude from European refiners amid limited crude supply availability in Northwest Europe.

The OPEC Reference Basket (ORB) value rose in June by \$3.85 m-o-m, or 3.4%, to stand at \$117.72/b. Compared to the previous year, the ORB was up \$41.52, or 65.0%, from \$63.85/b in 2021 to an average of \$105.37/b so far this year.

Oil futures contracts surged in June for the second consecutive month, with ICE Brent and NYMEX WTI averaging nearly 5% higher m-o-m despite a relatively volatile month and tumbling financial markets. The market was driven by a strong supply/demand outlook in the short term and geopolitical developments in major producing regions. However, oil prices reversed the uptrend in the second half of June and dropped sharply, undermined by broader selloffs in major financial markets amid concerns about a slowdown in global economic activity, which could have a negative impact oil demand.

The ICE Brent front-month increased by \$5.54 in June, or 4.9%, to average \$117.50/b, and NYMEX WTI rose by \$5.08, or 4.6%, to average \$114.34/b. Y-t-d, ICE Brent was \$39.71, or 60.9%, higher at \$104.94/b, while NYMEX WTI was higher by \$39.55, or 63.6%, at \$101.77/b, compared with the same period a year earlier. DME Oman crude oil futures prices rose m-o-m in June by \$5.99, or 5.6%, to settle at \$113.38/b. Y-t-d, DME Oman was higher by \$38.14, or 59.7%, at \$102.02/b.

Hedge funds and other money managers sharply cut their bullish positions amid declining oil prices in the second half of June and selloffs in the equity markets. This came amid growing concerns about a global economic slowdown along with rising price volatility and uncertain oil supply and demand outlooks. Total futures and options net-long positions in ICE Brent and NYMEX WTI fell by 10.8% and speculators sold an equivalent of about 53 mb between the weeks of 31 May and 28 June.

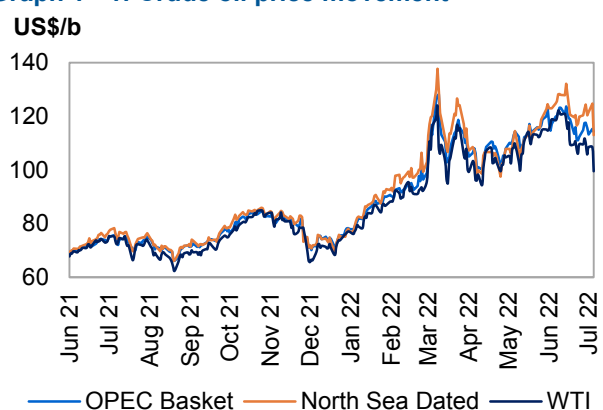
The crude market structure strengthened further in June in all markets, evidence that the oil market perception of strong global supply and demand balance, specifically in the short term amid several planned and unplanned oil supply outages.

The sweet/sour crude differential continued to widen in all regions in June on the better performance of light sweet crudes compared to heavier crudes. The light sweet crude value remained supported by a tighter light sweet crude market and a high Brent-related risk premium. Higher margins of light distillate products, specifically gasoline and gasoil/diesel compared to weaker heavy sour products like fuel oil, also contributed to widening the sweet/sour crude differential.

## Crude spot prices

**Crude spot prices** averaged higher in June despite elevated volatility in the futures markets as oil market fundamentals remained strong. Strong buying interest from refiners and high refining margins amid a tight light sweet crude due to supply outages, buoyed the value of spot prices. In addition to supply disruption in several regions, including Libya and Ecuador, low June and July loading programmes of several grades, and a planned strike in Norway's oil and gas sector tightened the supply outlook. Tight oil product markets, particularly for middle distillates diesel/gasoil, and the prospect of higher oil demand in China amid a gradual easing of lockdown measures along with signs of robust demand for road transportation fuel during the driving season added support to prices.

**Graph 1 - 1: Crude oil price movement**



Sources: Argus, OPEC and Platts.

## Crude Oil Price Movements

In June, North Sea Dated rose by \$10.43, or 9.2%, to reach an average of \$123.56/b, registering the largest monthly rise among other major crude benchmarks. It was supported by strong demand for North Sea crude from European refiners amid limited crude supply availability in Northwest Europe. This pushed the crude differentials of Brent basket grades sharply higher. However, WTI and Dubai's first month rose by \$4.50 and \$5.06, respectively, or 4.7% and 4.1%, to settle at \$114.36/b and \$112.89/b.

Moreover, the **spread between the value of North Sea Dated and futures benchmark ICE Brent** rose by \$4.89 m-o-m in June, settling at a premium of \$6.06/b compared to a premium of \$1.17/b in May. This highlights the strength of the physical market.

**Table 1 - 1: OPEC Reference Basket and selected crudes, US\$/b**

OPEC Reference Basket (ORB)	May 22	Jun 22	Change		Year-to-date	
			Jun 22/May 22	%	2021	2022
<b>ORB</b>	<b>113.87</b>	<b>117.72</b>	<b>3.85</b>	<b>3.4</b>	<b>63.85</b>	<b>105.37</b>
Arab Light	116.44	117.27	0.83	0.7	64.52	106.02
Basrah Medium	111.91	115.56	3.65	3.3	62.97	103.80
Bonny Light	115.07	125.22	10.15	8.8	64.64	109.29
Djeno	105.68	116.11	10.43	9.9	57.47	100.40
Es Sider	113.18	124.96	11.78	10.4	62.96	107.89
Girassol	113.95	127.03	13.08	11.5	65.29	109.94
Iran Heavy	115.48	115.85	0.37	0.3	63.63	105.14
Kuwait Export	116.82	117.26	0.44	0.4	64.31	106.20
Merey	88.07	92.25	4.18	4.7	46.09	81.39
Murban	109.97	117.53	7.56	6.9	63.96	104.32
Rabi Light	112.67	123.10	10.43	9.3	64.46	107.39
Sahara Blend	115.28	128.31	13.03	11.3	64.73	111.05
Zafiro	115.25	127.10	11.85	10.3	65.22	109.69
<b>Other Crudes</b>						
North Sea Dated	113.13	123.56	10.43	9.2	64.92	107.85
Dubai	107.83	112.89	5.06	4.7	63.64	101.93
Isthmus	108.32	113.85	5.53	5.1	61.30	100.24
LLS	111.47	115.52	4.05	3.6	64.16	103.80
Mars	106.71	108.15	1.44	1.3	62.32	99.23
Minas	109.79	115.06	5.27	4.8	62.93	102.82
Urals	81.18	91.61	10.43	12.8	63.91	86.65
WTI	109.86	114.36	4.50	4.1	62.16	101.91
<b>Differentials</b>						
North Sea Dated/WTI	3.27	9.20	5.93	-	2.76	5.94
North Sea Dated/LLS	1.66	8.04	6.38	-	0.76	4.05
North Sea Dated/Dubai	5.30	10.67	5.37	-	1.28	5.92

Sources: Argus, Direct Communication, OPEC and Platts.

**Crude differentials** also strengthened in June in almost all markets and for all crude qualities, mirroring strong physical crude market fundamentals. Some crude differentials rose to record high levels. In the North Sea, crude differentials jumped in June on robust regional crude demand amid high gasoline and middle distillate refining margins, and low supply of crude due to lower availability of Urals in Europe. The North Sea July loading programme sold rapidly amid strong demand. The Forties and Ekofisk crude differentials rose \$3.39 m-o-m and \$2.70, respectively, on a monthly average in June to settle at premiums of \$4.28/b and \$6.78/b. West African crude differentials also rose firmly in June, supported by strong demand from European refiners, as well as renewed demand from Asia Pacific refiners despite a wide Brent/Dubai spread. On a monthly average, crude differentials to the North Sea Dated benchmark of Bonny Light, Forcados and Qua Iboe rose by \$2.45, \$3.26, and \$2.83, respectively m-o-m in June, to settle at a premium of \$5.28/b, \$7.61/b, and \$6.53/b. Angolan crude differentials also rose on demand from Europe. The crude differential of medium-heavy sweet crude Cabinda rose in June by \$2.83 m-o-m on average to a premium of \$3.76/b. In the Mediterranean, lower supply from Libya and strong margins of gasoil/diesel strongly supported the value of similar crude in the region. Azeri light saw its crude differentials increasing by 75¢ m-o-m to a premium of \$7.48/b against North Sea Dated, while Saharan Blend eased slightly by 10¢ to stand at \$2.74/b premium. CPC Blend remained trading at a deep discount, averaging a \$4.25/b discount to North Sea Dated in June, although the differentials increased 72¢

m-o-m. In the Middle East, firm demand from Asian refiners, wide backwardation and a wide Brent-Dubai spread continued to support the market. The value of the Oman crude differential soared in June by \$2.46 m-o-m, to stand at a premium of \$7.33/b.

## OPEC Reference Basket (ORB)

The **ORB** value rose in June, increasing by \$3.85 m-o-m, or 3.4%, to stand at \$117.72/b. This was on the back of higher ORB component-related crude benchmarks, and an increase in crude differentials of light sweet crude components, amid a robust physical crude market.

However, lower official selling prices of most sour **crude components** limited the rise of ORB compared to North Sea Dated. Compared to the previous year, the ORB was up \$41.52, or 65.0%, from \$63.85/b in 2021 to an average of \$105.37/b so far this year. All ORB component values increased over the last month alongside their respective crude oil benchmarks. West and North African Basket components – Bonny Light, Djeno, Es Sider, Girassol, Rabi Light, Sahara Blend, and Zafiro – rose \$11.54 m-o-m in June, or 10.2% on average, to \$124.55/b. However, the multiple regions' destination grades – Arab Light, Basrah Light, Iran Heavy, and Kuwait Export – increased by \$1.32 m-o-m, or 1.1% on average, to settle at \$116.49/b. Murban crude rose by \$7.56 m-o-m, or 6.9% on average, to settle at \$117.53/b, while the Meroy crude component rose by \$4.18 m-o-m, or 4.7% on average, to settle at \$92.25/b.

## The oil futures market

**Oil futures contracts** surged further in June for the second consecutive month, with ICE Brent and NYMEX WTI first-month contracts averaging nearly 5% higher m-o-m despite a relatively volatile month and tumbling financial markets. The market was driven by a strong supply/demand outlook in the short term and geopolitical developments in major producing regions.

Oil futures markets rose firmly in the first half of June, hitting their highest since March, as oil demand outlooks improved after China started to gradually lift some COVID-19 restrictions and new daily cases fell significantly, and the summer driving season showed an optimistic start in the US. Oil futures prices were boosted by robust summer driving demand outlooks amid tight refined oil product supplies, specifically in the Atlantic Basin, and strong gains in refined products prices and margins.

Meanwhile, supply disruptions in several regions, including Eastern Europe, Latin America and North Africa and worries about supply cuts in the North Sea due to strikes also supported oil futures market. Traders also weighed the European Union Member States' agreement to impose gradual sanctions on Russian crude oil and refined product imports, which could further tighten the global oil supply.

Oil prices were also buoyed by data from the EIA showing three consecutive weeks of decline in US crude oil stocks, which declined by about 9.5 mb between the weeks of 13 July and 27 May, and a further decline in the weeks of 17 June and 24 June by about 3.1 mb. These declines occurred despite large releases of crude from the Strategic Petroleum reserves (SPR). According to weekly data from the EIA, US ending stocks of crude oil in the SPR fell about 52 mb between the weeks of 29 April and 24 June.

**Table 1 - 2: Crude oil futures, US\$/b**

Crude oil futures			Change		Year-to-date	
	May 22	Jun 22	Jun 22/May 22	%	2021	2022
<b>NYMEX WTI</b>	109.26	114.34	5.08	4.6	62.22	101.77
<b>ICE Brent</b>	111.96	117.50	5.54	4.9	65.23	104.94
<b>DME Oman</b>	107.39	113.38	5.99	5.6	63.88	102.02
<b>Spread</b>						
<b>ICE Brent-NYMEX WTI</b>	2.70	3.16	0.46	17.1	3.01	3.17

*Note: Totals may not add up due to independent rounding. Sources: CME, DME, ICE and OPEC.*

The **ICE Brent** front-month increased by \$5.54 in June, or 4.9%, to average \$117.50/b, and **NYMEX WTI** rose by \$5.08, or 4.6%, to average \$114.34/b. Y-t-d, ICE Brent was \$39.71, or 60.9%, higher at \$104.94/b, while NYMEX WTI was higher by \$39.55, or 63.6%, at \$101.77/b, compared with the same period a year earlier. **DME Oman** crude oil futures prices rose m-o-m in June by \$5.99, or 5.6%, to settle at \$113.38/b. Y-t-d, DME Oman was higher by \$38.14, or 59.7%, at \$102.02/b.

However, oil prices reversed the uptrend in the second half of June and dropped sharply in highly volatile trading, undermined by broader selloffs in major financial markets amid concerns about a slowdown in global economic

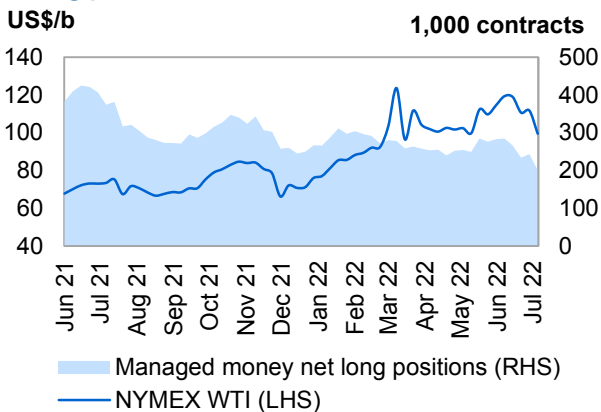
## Crude Oil Price Movements

activity and potential lower world oil demand, which outweighed ongoing concerns about global oil supply and tight oil product markets. Market sentiment deteriorated after major central banks, including the US Federal Reserve, increased interest rates to curb inflation, which raised worries about a slowdown in global economic growth. Market volatility remained elevated due to uncertain oil market fundamental outlooks and uncertainty regarding the impact of aggressive monetary policies from central banks on the global economy. Oil prices were also pushed down by a surge in the US dollar's value, which rose to its highest level since 2002 against a basket of currencies. Oil futures prices recouped some losses later in the month after major stock market indexes stabilized and investors turned their focus on strong oil fundamental

The ICE Brent crude front-month premium to the same month of NYMEX WTI futures rose by 46¢ in June to \$3.16/b, making US crude a more attractive grade for arbitrage into both Europe and Asia compared to Brent-linked grades. However, a sharp decline in Cushing crude stocks to their lowest since October 2014 supported the value of WTI futures and contributed to keeping the ICE Brent-NYMEX WTI spread slightly above \$3/b. The North Sea Dated premium to WTI Houston widened significantly in June by \$5.40 m-o-m to average at \$7.73/b. Strong demand for North Sea crudes from European refiners and tight oil supply in the Atlantic Basin due to supply disruptions pushed the value of the North Sea Dated related crude sharply higher. Meanwhile, sustained crude releases from the US SPR added downward pressure and limited the rise of the WTI price reference.

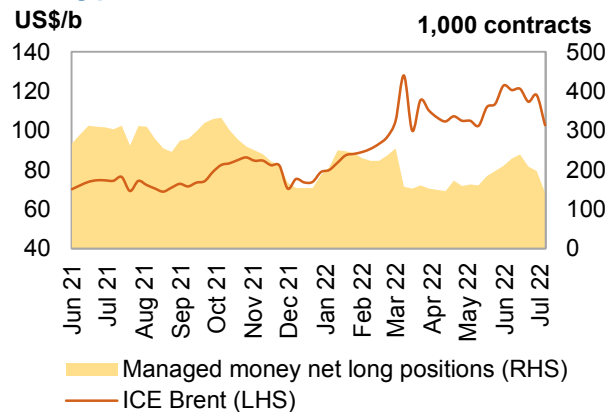
Regarding speculative activity, declining oil prices in the second half of June and selloff in the equity markets prompted hedge funds and other money managers to cut sharply bullish speculative positions in June. This came amid growing concerns about a global economic slowdown which could have a negative impact oil demand, along with rising price volatility and uncertain oil supply and demand outlooks. Total futures and options net-long positions in ICE Brent and NYMEX WTI fell by 10.8% and speculators sold an equivalent of about 53 mb between the weeks of 31 May and 28 June. The cut in net long positions was more pronounced in speculative positions related to NYMEX WTI, along with a sharp decline in open interest that fell by 7.3% between the weeks of 31 May and 28 June, to its lowest since January 2016.

**Graph 1 - 2: NYMEX WTI vs. Managed Money net long positions**



Sources: CFTC, CME and OPEC.

**Graph 1 - 3: ICE Brent vs. Managed Money net long positions**



Sources: ICE and OPEC.

The cut of **net long positions** was more pronounced in futures and options related to **NYMEX WTI**, which were cut by 14.1%, while in the week to 21 June net long positions fell to their lowest since April 2020. Money managers reduced their futures and options net long positions in NYMEX WTI by 39,892 lots between the weeks of 31 May and 28 June to 243,311 contracts, according to the US Commodity Futures Trading Commission (CFTC). During the same period, gross long positions declined by 32,371 lots, or 10.8%, to 267,187 contracts, while gross short positions rose by 7,521 lots, or 46.0%, to 23,876 contracts.

Meanwhile, speculators were sellers of about 13 mb in the **ICE Brent** contract in June, and combined futures and options net long positions related to Brent fell by 13,238 contracts, or 6.3% higher, to reach 197,199 lots in the week to June 28, according to the ICE Exchange. This is a combination of a cut in long and short positions. In the week ending 28 June, gross short positions fell by 8,874 lots, or 17.2%, to stand at 42,830 contracts, while gross long positions declined by 22,112 lots, or 8.4% lower, to 240,029 contracts during the same period.

The **long-to-short ratio** of speculative positions in the NYMEX WTI contract dropped to 11:1 in the week to 28 June, compared to 18:1 in the week to 31 May. However, the ICE Brent long-to-short ratio rose to 6:1 in the week to 28 June, slightly higher compared to 5:1 in the week to 31 May. Total futures and options open interest volumes on the two exchanges continued to decline in June, falling by 5.1%, or 262,207 contracts, to stand at 4.9 million contracts in the week ending 28 June.



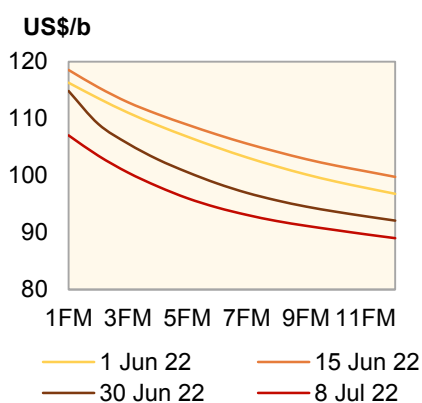
## The futures market structure

The **crude market structure** strengthened further in June in all markets and the nearest months' time-spreads moved into larger backwardation, evidence that the oil market perception of the strong global supply and demand balance specifically for the short term. Several planned and unplanned oil supply outages along with geopolitical developments in major producing regions tightened global oil supply outlooks. Market participants weighed the EU agreement to gradually impose sanctions on Russian oil imports. Meanwhile, demand in the spot market remained strong in June, which also contributed to pushing first-month contracts significantly higher compared to forward months. Prospect of strong oil demand for transportation fuels during the summer holidays season amid tight supply oil products and low stocks contributed in supporting the value of prompt month prices compared to forward month contracts.

Despite sharp declines in first-month contract prices in the second half of June the backwardation remained strong and the futures forward curve stayed steep, specifically on the front of the curve.

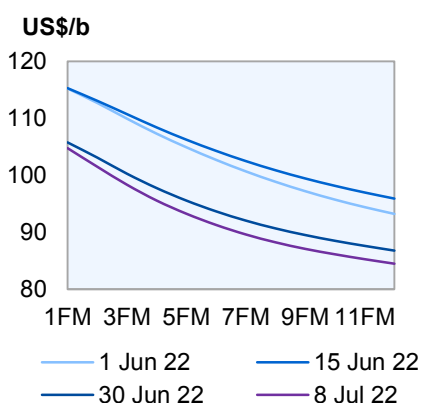
Global marker **Brent's** backwardation steepened in June and the first-to-third month spread jumped to its highest since March 2022, when excluding 31 May settlement, the expiry date of the ICE Brent first month contract. The Brent backwardation strengthened on the widening oil supply/demand deficit in Europe, exacerbated by lower supply availability of Russian oil in Europe, supply disruptions in the North Africa region, and lower loading programmes of some grades in West Africa and the North Sea. At the same time, demand from European and US refiners remained firm. Demand from Asia-Pacific refiners for crudes in the Atlantic Basin also showed recovery for June and July loading volumes. On a monthly average, the ICE Brent M1-M3 spread widened by \$1.29 in June to a backwardation of \$5.92/b, compared to a backwardation of \$4.63/b in May. The ICE Brent M1-M6 also widened in June by \$1.72 to \$11.95 backwardation.

**Graph 1 - 4: ICE Brent forward curves**



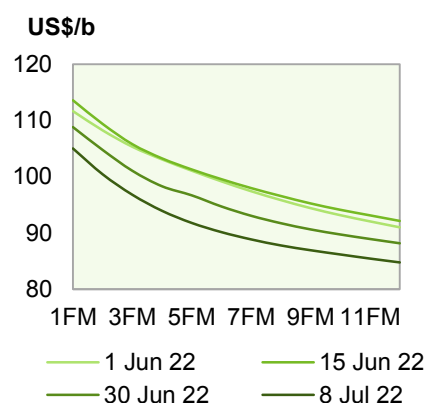
Sources: ICE and OPEC.

**Graph 1 - 5: NYMEX WTI forward curves**



Sources: CME and OPEC.

**Graph 1 - 6: DME Oman forward curves**



Sources: DME and OPEC.

The **NYMEX WTI** forward curve also steepened in June amid strong supply/demand fundamentals in the Cushing, Oklahoma, trading hub, which was reflected in a sharp decline in Cushing crude stocks to their lowest level since October 2014. Firm demand from US refiners amid high refining margins and sustained crude exports also contributed to supporting the WTI futures structure. Sustained SPR releases in the US had a limited impact on the WTI market structure. The NYMEX WTI first-to-third month spread widened by 56¢ to a backwardation of \$5.14/b on average in June, compared to a backwardation of \$4.57/b in May.

The market structure of **DME Oman** and Dubai also strengthened, with demand in Asia remaining robust and demand for Middle East crude stayed strong amid closed west-to-east arbitrage, which makes Dubai-related cargoes more attractive to Asia refiners compared to Brent-related crudes. Large backwardation in Brent also made long-haul barrels unfavourable. On a monthly average, the DME Oman M1-M3 spread widened by \$2.28 to a backwardation of \$6.80/b in June, from a backwardation of \$4.52/b in May.

Regarding the **M1/M3 structure**, the North Sea Brent M1/M3 spread widened in June on a monthly average by \$2.58 to a backwardation of \$7.28/b, compared to \$4.70/b in May. In the US, the WTI M1/M3 backwardation also widened in June by 38¢ to \$4.96/b, compared to a backwardation of \$4.59/b in May. The Dubai M1/M3 backwardation widened in June by \$2.34 to \$7.29/b, compared to a backwardation of \$4.95/b in May.

## Crude spreads

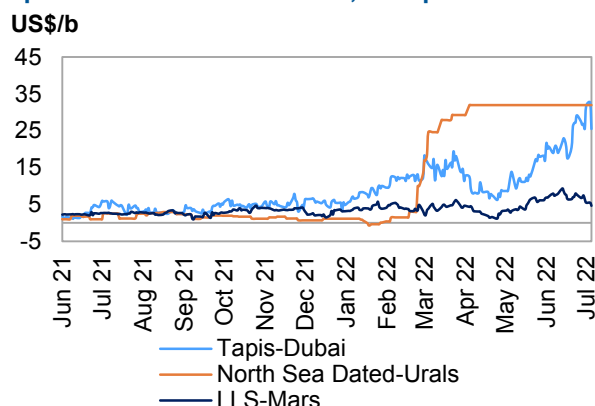
The **sweet/sour crude differential** continued to widen in all regions in June on better performance of light sweet crudes compared to heavier crudes. Light sweet crude value remained supported by a strong light sweet crude market and a high Brent-related risk premium that continued to make the sweet crude value significantly higher compared to sour. Higher margins of light distillate products, specifically gasoline and gasoil/diesel compared to weaker heavy sour products like fuel oil, also contributed to widening the sweet/sour crude differential. Meanwhile, the supply of sour crude from US SPR remained elevated in June.

In **Europe**, the sweet-sour crude spread represented by the North Sea Dated-Urals differential remained at a significantly high level in June. Comparing sweet-sour crude differentials, like Ekofisk or Oseberg to Johan Sverdrup, also showed a widening spread in June. The value of North Sea crude benchmarks – Brent, Forties, Oseberg and Ekofisk (BFOE) – surged to fresh multi-month highs, buoyed by strong European demand and high refining margins of light distillate products. Supply disruptions in the Mediterranean and field maintenance reduced the supply outlook for light sweet crude in northwest Europe. North Sea Dated also remained supported by a high-risk premium. The spread between North Sea Dated and Urals remained unchanged in June at \$31.95/b.

In the **USGC**, the Light Louisiana Sweet (LLS) premium over medium sour Mars widened further in June by \$2.61 m-o-m, to stand at an average of \$7.37/b, as the value of sour crude in the USGC came under pressure from higher supply amid US SPR releases that reached about 1 mb/d in June, based on EIA weekly data. Furthermore, the expectation of higher offshore production of sour crude in the Gulf of Mexico also weighed on sour crude value. In the meantime, high refining margins of gasoline and middle distillates in the US supported the value of light sweet crude, including LLS.

In **Asia**, the Tapis premium over Dubai also widened significantly last month on a strong rise in the value of light sweet crude due to lower availability and strong demand, which was similar to other regions. Wider Brent-Dubai spread that limited west-to-east arbitrage strongly supported the value of light sweet crude in Asia Pacific, like Tapis crude. The first-month Brent-Dubai Exchange of Futures for Swaps (EFS) spread rose by \$2.37 on a monthly average in June to \$11.65/b, compared to an average of \$9.28/b in May. However, firm demand for Middle East sour crude from the Asia Pacific on the prospect of rising demand in coming months amid the easing of China's COVID-19 measures supported the value of sour crude. The Tapis-Dubai spread widened by \$9.67 m-o-m to average \$22.90/b in June compared with \$13.23/b in May.

**Graph 1 - 7: Differential in Asia, Europe and USGC**



Sources: Argus, OPEC and Platts.

# Commodity Markets

Commodity price movements were mixed month-on-month (m-o-m). The energy price index rose for the second consecutive month while the non-energy index fell for the second consecutive month. Base and precious metals fell for the third consecutive month, underscoring the general downside risks experienced by commodity prices m-o-m.

In the paper market, money managers' net length and total open interest declined for the third consecutive month. Commodity prices remained sensitive to ongoing geopolitical developments in eastern Europe; however, tighter financial market conditions and economic indicators increasingly pointing towards economic slowdowns in the US and Europe weighed on investors' sentiment.

M-o-m, China eased mobility restrictions in some regions and in addition provided monetary and fiscal support. However, this has had limited impact on demand for commodities as economic activity remained weak. Additionally, monetary tightening policies have now become broader with major central banks in both developed and emerging markets turning more hawkish in order to contain inflationary pressures. Both of these factors have shifted the focus from supply to demand and added significant downside risk to commodity prices.

## Trends in selected commodity markets

The **energy price index** rose for the second consecutive month, increasing by 6.4% m-o-m. Prices across all index components rallied with the exception of US natural gas. Y-o-y, the index is up by 85.2%.

The **non-energy index** fell for the second consecutive month, declining 4.0% m-o-m. The crop improvement outlook in both North and South America, in addition to an easing of protectionist measures in both India and Indonesia, helped relieve pressure on prices. However, the risk to prices remains to the upside amid ongoing geopolitical tensions in Eastern Europe. The index is up by 22.5% y-o-y, a higher rate compared with the previous month.

**Table 2 - 1: Commodity prices**

Commodity	Unit	Monthly averages			% Change Jun 22/May 22	Year-to-date	
		Apr 22	May 22	Jun 22		2021	2022
<b>Energy*</b>	Index	<b>153.2</b>	<b>160.9</b>	<b>171.2</b>	<b>6.4</b>	<b>82.0</b>	<b>150.2</b>
Coal, Australia	US\$/mt	288.2	366.8	371.2	1.2	99.6	294.9
Crude oil, average	US\$/b	103.4	110.1	116.8	6.1	63.2	103.4
Natural gas, US	US\$/mbtu	6.5	8.1	7.7	-5.7	3.2	6.0
Natural gas, Europe	US\$/mbtu	32.2	29.8	34.4	15.1	7.7	32.4
<b>Non-energy*</b>	Index	<b>139.9</b>	<b>133.4</b>	<b>128.0</b>	<b>-4.0</b>	<b>108.7</b>	<b>132.2</b>
<b>Base metal*</b>	Index	<b>146.1</b>	<b>130.0</b>	<b>121.8</b>	<b>-6.3</b>	<b>111.4</b>	<b>136.6</b>
<b>Precious metals*</b>	Index	<b>148.1</b>	<b>139.9</b>	<b>138.9</b>	<b>-0.8</b>	<b>142.0</b>	<b>143.0</b>

Note: \* World Bank commodity price indices (2010 = 100).

Sources: World Bank and OPEC.

**Average crude oil prices** rose for the second consecutive month, increasing by 6.1% m-o-m. Although refinery throughputs rose m-o-m, several supply disruptions and ongoing geopolitical tensions in Eastern Europe continued to sustain upward pressure on crude oil prices. Y-o-y, prices are up by 83.1%.

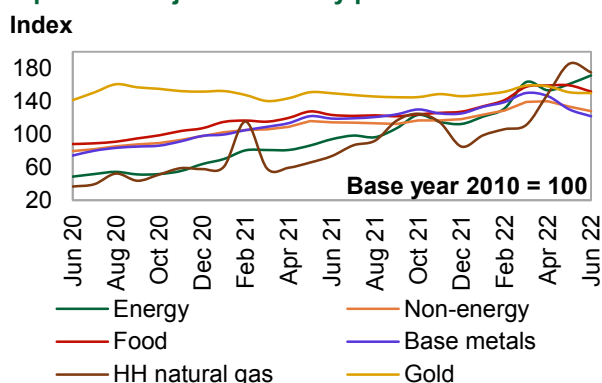
**Henry Hub natural gas prices** receded after five consecutive months of gains, dropping by 5.7% m-o-m. Prices declined following an early June fire at Freeport, a Texas based LNG plant, which represents about 17% of US LNG production capacity. The incident led to a shutdown of the facility, leaving US LNG exports stranded at the port, increasing supply availability in the US. The outage is expected to last for at least another month, which will continue to weigh on prices. Y-o-y, prices are up by 90.4%.

**Natural gas prices in Europe** rose sharply following two consecutive months of decline; the **average Title Transfer Facility (TTF) price** went from \$29.8/mmbtu in May to \$34.4/mmbtu in June, a 15.1% increase m-o-m. Amid increasing demand for US LNG, the shutdown of the US Freeport terminal renewed concerns over European supplies. The European Union (EU) has set a goal to build gas inventories to 80% of capacity by November in order to meet winter demand. However, the shutdown of the US facility represents a major challenge to meet this goal. Additionally, citing technical and logistical issues, Gazprom announced in

mid- June that it would limit gas supply to Europe via the Nord Stream 1 pipeline. The Gazprom announcement exacerbated supply concerns further, adding pressure to TTF prices. Y-o-y, prices are up by 323.2%.

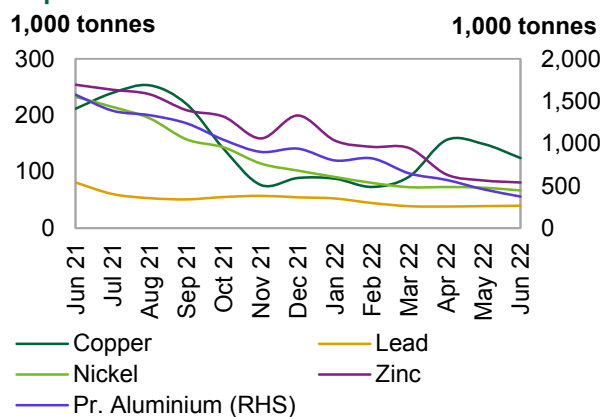
**Australian thermal coal prices** rose for the second consecutive month, increasing by 1.2%, albeit a much lower rate compared with the previous month. Rising natural gas prices renewed the incentive for gas-to-coal fuel switching leading to increased demand for coal. Moreover, some European power plant generators have announced plans to restart coal-powered plants for power generation, with demand for Asia-Pacific coal in Europe continuing to trend upwards amid a ban on Russian coal imports. These factors are supporting the upward pressure on coal prices. However, some Asian buyers, particularly China and India, have increased demand for discounted Russian coal, putting downward pressure on coal prices, hence the lower m-o-m percentage price growth. Y-o-y, prices are up by 196.0%.

**Graph 2 - 1: Major commodity price indices**



Sources: World Bank, S&P Goldman Sachs, Haver Analytics and OPEC.

**Graph 2 - 2: Inventories at the LME**



Sources: LME, Thomson Reuters and OPEC.

The **base metal index** fell for the third consecutive month, declining by 6.3% m-o-m. Increasing supply from China, combined with softer demand, continue to weigh on base metal prices. Outside of China, weak manufacturing activity, amid high energy costs, remain a drag on base metal demand despite critical low stocks. Y-o-y, the index is up 22.7%

**Aluminium prices** declined for the third consecutive month, down by 9.4% m-o-m. Aluminium production continued to rise in China, but demand remained weak and this weighed on prices. Outside of China, according to data from London Metal Exchange (LME), aluminium inventories declined by 18.7% m-o-m. Weak industrial activity amid high energy costs remained a drag on aluminium demand, putting downward pressure on prices, despite declining inventories. Y-o-y, prices are up by 4.8%, a significantly slower rate compared with the previous month.

Average monthly **copper prices** also declined for the third consecutive month, falling by 3.8% m-o-m. Inventories in China continued to rise while demand remained muted, putting downward pressure on prices. Outside of China, LME data shows that inventories declined by 16.7% m-o-m; however, demand also remained soft, weighing on prices. Y-o-y, prices are down by 6.3%.

**Lead prices** receded for the second consecutive month, declining 3.6% m-o-m. The decline in lead prices was supported again by an increase in inventories, as well as weak demand. LME data shows that inventory levels went from 38,850 mt in May to 39,525 mt in June, a 1.7% increase m-o-m. Prices are down by 5.7% y-o-y.

Prices for both **nickel and zinc** are down for the second consecutive month, falling m-o-m by 8.6%, and 3.2%, respectively. Declining prices in iron ore continued to weigh on prices for both metals. Y-o-y, both nickel and zinc were up by 42.7% and 23.0%, respectively.

The **precious metals index** continued its downward trend, falling by 0.8% m-o-m. All the index components fell as the US Federal Reserve (Fed) ramped up efforts to contain inflationary pressures. The Fed increased its policy rate in mid-June by 75 basis points and announced there would be additional rates hikes in the coming months. Following the June rate hike, gold prices fell and closed the month down by 0.6% m-o-m; both silver and platinum also fell m-o-m, declining by 1.6% and 14.9%, respectively.

Weak manufacturing activity also weighed on **silver and platinum prices** as both metals have industrial applications too. Y-o-y, the index continued to trend upwards, up by 0.7%, albeit a slower rate compared with last month. The upward trajectory is supported mainly by gold (up by 0.1% y-o-y), as silver (down by 20.1% y-o-y) and platinum (down by 14.9% y-o-y) continued to trend downwards.

## Investment flows into commodities

**Money managers' net length positions** fell for the third consecutive month, declining by 18.6% m-o-m. Net length declined across all commodities, led by gold. Meanwhile, total open interest fell for the fourth consecutive month, declining by 5.0% m-o-m. Open interest declined across all commodities, with natural gas leading the decline.

**Table 2 - 2: CFTC data on non-commercial positions, 1,000 contracts**

Selected commodity	Open interest		Net length		
	May 22	Jun 22	May 22	Jun 22	% OI
Crude oil	2,528	2,464	269	257	10
Natural gas	1,141	1,070	8	-29	-3
Gold	712	632	70	57	9
Copper	202	204	-13	-10	-5

Note: Data on this table is based on monthly average.

Sources: CFTC and OPEC.

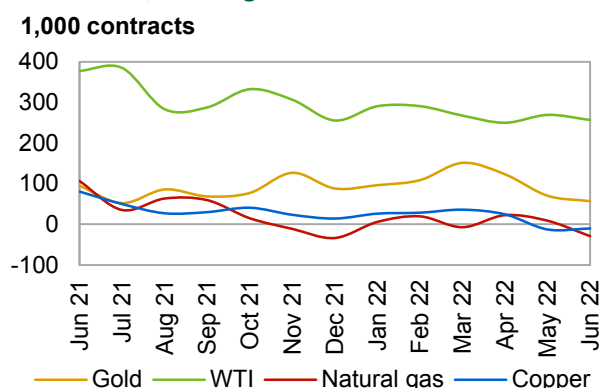
**Total crude oil (WTI) open interest (OI)** fell for the fourth consecutive month, decreasing m-o-m by 2.5%, while money managers' net length declined by 4.6% over the same period. Weak macroeconomic indicators weighed on money managers sentiment towards crude oil.

The **total Henry Hub natural gas OI** declined for the second consecutive month, falling m-o-m by 6.2%, with money managers' net length declining by 446.7% over the same period. A shutdown at the Freeport LNG facility raised the prospect of more US supply availability leading to a decline in prices, which triggered a major sell-off by money managers.

**Gold's OI** fell for the third consecutive month, declining by 11.2% m-o-m. Money managers' net length declined over the same period by 19.0%. The stronger US dollar and expectations of rising interest rates continued to weigh on investor sentiment towards gold.

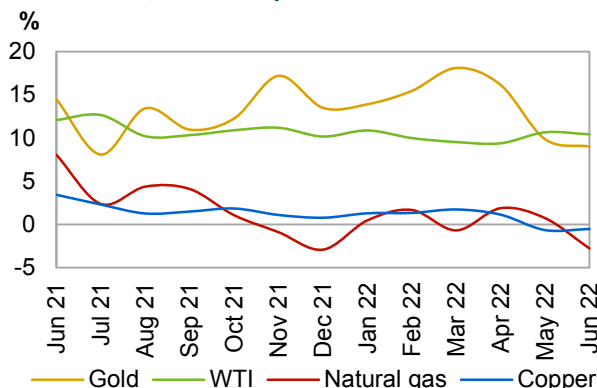
**Copper's OI** rose by 0.8% m-o-m, while money managers' net length declined by 19.4% over the same period. The rise in OIs was driven by producers in an attempt to hedge future production while money managers continued to reduce their exposure amid bearish market sentiment.

**Graph 2 - 3: Money managers' activity in key commodities, net length**



Note: Data on this graph is based on monthly average.  
Sources: CFTC and OPEC.

**Graph 2 - 4: Money managers' activity in key commodities, as % of open interest**



Note: Data on this graph is based on monthly average.  
Sources: CFTC and OPEC.

## World Economy

While uncertainty remain skewed the downside, the 2022 global economic growth forecast remains unchanged at 3.5%, followed by 3.2% for 2023.

The current forecast considers a gradual global economic recovery in 2H22 and beyond. This is based on the assumption that the situation in Eastern Europe will not worsen, and that it will not cause further major spillover effects on other economies beyond its current already negative impact. Moreover, there is still the danger of a shortfall in the supply of agricultural products from Ukraine and Russia. It remains to be seen what consequences a potentially further decline in Russian fossil fuel exports to G7 economies could have for energy supplies, energy prices and consequently global economic growth. These factors will need to be monitored closely, especially in 2H22.

In addition, further pandemic-related developments need to be considered. The pandemic, financial tightening and the consequences of the Russian-Ukraine conflict have already been reflected in a 1Q22 contraction in the US and Japan, as well as relatively low growth in China, among others. The lacklustre dynamic in these major economies appeared to continue in 2Q22. The anticipated rebound in 3Q22 will be fuelled by pent-up demand, buoyed by ongoing solid underlying spending power by households, and supported by sufficient savings. This dynamic is associated with a significant pick-up in the contact-intensive services industry, including travel and transportation, leisure, and hospitality.

Uncertainties remain throughout 4Q22, with a potential ongoing rise in inflation and a response by major central banks via monetary tightening. Pandemic re-emergence, and potential strain in the debt market due to globally rising interest rates, will need to be monitored closely as well.

The upside potential to the current forecast is limited, but it may come from a solution to the Russia-Ukraine conflict, fiscal stimulus where possible, and a fading pandemic, in combination with a strong rise in service sector activity. These factors could potentially, albeit with limited capacity, lift global economic growth beyond the current base case.

**Table 3 - 1: Economic growth rate and revision, 2022–2023\*, %**

	World	OECD	US	Euro- zone	UK	Japan	China	India	Brazil	Russia
<b>2022</b>	<b>3.5</b>	<b>2.9</b>	<b>3.0</b>	<b>3.0</b>	<b>3.5</b>	<b>1.6</b>	<b>5.1</b>	<b>7.1</b>	<b>1.2</b>	<b>-6.0</b>
<b>Change from previous month</b>	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
<b>2023</b>	<b>3.2</b>	<b>2.1</b>	<b>2.1</b>	<b>2.0</b>	<b>1.2</b>	<b>1.7</b>	<b>5.0</b>	<b>6.0</b>	<b>1.5</b>	<b>1.2</b>

Note: \* 2022 and 2023 = Forecast. The GDP numbers have been adjusted to reflect 2017 ppp.

Source: OPEC.

## Update on the latest global developments

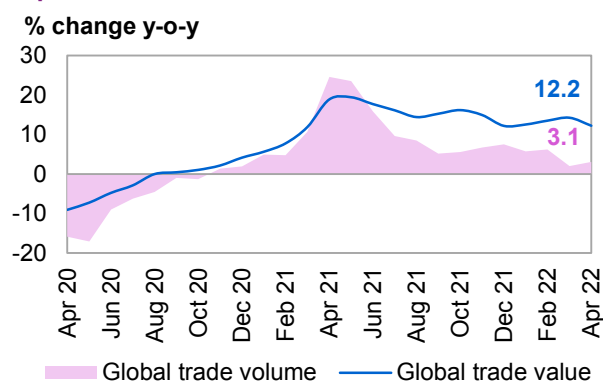
**Global economic uncertainties** have risen and downside risks in 2H22 have become more accentuated. This has been reflected most recently in the commodity market price behaviour. The Standard & Poor's Goldman Sachs Commodity Index (S&P GSCI) declined by around 20% in the four weeks from its peak at the beginning of June. While this retraction comes from very lofty levels, it acknowledges mounting challenges that could lead to a slowdown in economic activity. Uncertainties about the global economy continue, especially regarding the geopolitical tension in Eastern Europe and its impact on economic activity. Global inflation as a consequence of this conflict, among other drivers, has risen further, and hence financial tightening has accelerated. In addition, supply chain bottlenecks constitute an ongoing concern. While the world has become more accustomed to living with the COVID-19, the pandemic continues to impact lives and consumer spending habits and may also be an important reason for growing global labour market tightness, especially in the US and the Euro-zone. Additionally, increasing debt levels in major economies, in combination with rising interest rates, have already led to a selective increases in bond yields, which in turn make refinancing more challenging. In addition, COVID-19 infection rates have risen further in some Euro-zone economies, including Germany, and selective parts of the US. The pandemic and associated lockdowns in China, amid the country's zero-COVID-19 policy, remain an issue.

**Inflation** has become a recurring concern. US inflation stood at 8.6% y-o-y in May. The Euro-zone is facing a similar trend, with inflation at 8.6% y-o-y in June, while the UK faced inflation of 7.9% y-o-y in May, the latest available month. Surging inflation prompted the US Federal Reserve (the Fed) to hike interest rates again by 75 basis points in June, with key policy rates now standing at 1.75%. The European Central bank has been more reluctant to lift interest rates, but pointed to a likely rate hike of 25 basis points in July, with another potential increase of 50 basis points in September. Additionally, the price dynamic has been on the rise in the two major low-inflation economies of China and Japan. Inflation in Japan reached 2.4% in May for a second consecutive month, a level that not seen since 2014, when inflation was artificially lifted through a sales tax increase. Inflation in China stood at 2% in May and in April. While this is around the inflationary level of pre-pandemic times, it compares with much lower rates in 2021, when average annual inflation stood at 0.8%. These developments call for careful monitoring as this current upward spiral of inflation and monetary tightening may turn out to become a stress factor for many highly indebted economies, including some vulnerable and important economies in the Euro-zone.

**World trade values** increased by 12.2% y-o-y in April, compared with 14.3% y-o-y in March, based on the CPB World Trade Monitor Index provided by the CPB Netherlands Bureau for Economic Policy Analysis.

**Trade in volume terms** rose by 3.1% y-o-y in April, after a rise of 2% y-o-y in March.

**Graph 3 - 1: Global trade**



Sources: Netherlands Bureau for Economic Policy Analysis, Haver Analytics and OPEC.

## Near-term global expectations

**Downside risks** to the 2022 global economic growth forecast have risen. Economic growth in the US and China may have again been a disappointment in 2Q22, after these two economies performed below expectations in 1Q22, with a decline in economic growth in the US and only slow growth in China. This was very much impacted by the latest Omicron wave, inflation and the associated monetary tightening, as well as the consequences of the Russian-Ukraine conflict. Some of these factors could continue to dampen 2Q22 growth in these two major economies, which account for around one-third of the global economy. In addition, 2H22 growth remains uncertain given the ongoing energy supply issues across the world and especially in Europe. While 3Q22 momentum is anticipated to be driven by pent-up demand, especially in the contact-intensive services sector, and in particular the sectors of travel and transportation, leisure and hospitality, it remains to be seen to which extent price rises, current air-travel issues and the staff shortage in key economies will affect the growth dynamic. In theory, the still-solid disposable income situation, in combination with sufficient savings, should provide the base for this robust dynamic, but this remains to be seen.

**Global growth in 1Q22** was much lower than expected at the start of the year, with US growth reported to have declined by 1.6% q-o-q SAAR and Japan's GDP to have declined by 0.5% q-o-q SAAR. China's 1Q22 growth was reported at only 4.8%, well below its growth target of around 5.5% on a yearly average. More positively, Euro-zone growth was reported at a remarkable 2.5% q-o-q SAAR.

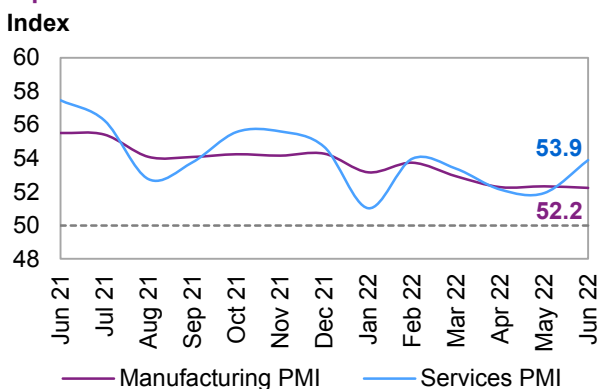
With these base numbers, **quarterly global GDP growth** is estimated at 0.1% q-o-q in 1Q22. Growth is forecast to accelerate to 0.9% q-o-q in 2Q22. In 3Q22, growth is forecast to see its peak for this year at a quarterly level of 1.1% q-o-q. In 4Q22, there may be a slowdown due to the potential seasonal rise in COVID-19 infections, possibly leading to associated social distancing measures, so growth is forecast at 0.6% q-o-q. However, mounting uncertainties in 2H22, beyond the seasonality of the pandemic, could lead to an even more accentuated slowdown.

Importantly, the **forecast considers** that the conflict in Ukraine will not escalate further in 2H22. Another important assumption is that any changes in fossil fuel exports from Russia to Europe will not cause material energy shortages for the Euro-zone in 2H22, but this remains to be seen. Additionally, Russia is assumed to better manage its decline in exports, drop in domestic demand and rising inflation in 2H22. It is also assumed that price rises for agricultural products will not accelerate further in 2H22 due to reduced exports from Ukraine and Russia, although this situation needs to be watched closely. Moreover, it is now forecast that both Russia and Ukraine will face severe recessions in 2022 and that the rest of the global economy will be thoroughly

impacted by the potential outcomes of the conflict through a variety of channels. One of the most important outcomes of this conflict is rising inflation impacting the global economy through strong yearly increases in commodity prices, in combination with ongoing supply chain bottlenecks and COVID-19-related logistical logjams in China and elsewhere, which are further fuelling global inflation. Food inflation, in particular, will likely be an existential challenge for low-income and less-developed economies especially in 2H22. Moreover, increasingly tight labour markets in major advanced economies are expected to further fuel wage and salary increases, feeding into an extended inflation trend. Price pressures will guide central banks across the world to act further to rein-in inflation.

**Global purchasing managers' indices (PMIs)** have so far continued to hold up relatively well, despite the numerous challenges confronting the global economy. The global manufacturing PMI has barely changed and stood at 52.2 in June compared with 52.3 in May and in April. The global services sector PMI rose to a level of 53.9 in June, compared with 51.9 in May, very much confirming the ongoing services sector-related recovery.

**Graph 3 - 2: Global PMI**



Sources: JP Morgan, IHS Markit, Haver Analytics and OPEC.

While downside risks prevail and the situation will require close monitoring, global **economic growth** for 2022 remained unchanged at 3.5%. Growth in 2023 is forecast to slow, mean-reverting towards growth potentials. Assuming there is no extraordinary dampening effect resulting from financial tightening, the pandemic and the Russia-Ukraine conflict, global growth is forecast at 3.2% in the coming year.

**Table 3 - 2: World economic growth rate and revision, 2022-2023\*, %**

	World
<b>2022</b>	<b>3.5</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>3.2</b>

Note: \* 2022 and 2023 = Forecast.  
Source: OPEC.

## OECD

### OECD Americas

#### US

#### Update on the latest developments

**US GDP growth for 1Q22** was revised down slightly, declining by 1.6% q-o-q SAAR in 1Q22 compared with the previous estimate of -1.5% q-o-q SAAR, based on data provided by the US Bureau of Economic Analysis (BEA). The data pointed to a continued weakening trend in the US economy that is likely to have continued to some extent into 2Q22. The data confirmed that growth was likely impacted by the latest Omicron wave and its associated impacts on the contact-intensive services sector. Furthermore, dislocations as a result of the Ukraine crisis that started to unfold at the end of February, such as rising import prices, had a severe negative impact on net trade. In the meantime, the Fed has continued its monetary tightening efforts and lifted its key policy rate further by a further 75 basis points in June, pushing up the key policy rate to around 1.75%. Monetary policy actions are very much guided by inflation numbers. Inflation in May rose again, reaching 8.6% y-o-y, following 8.3% y-o-y in April and 8.5% y-o-y in March, i.e. the highest level in the past three months.

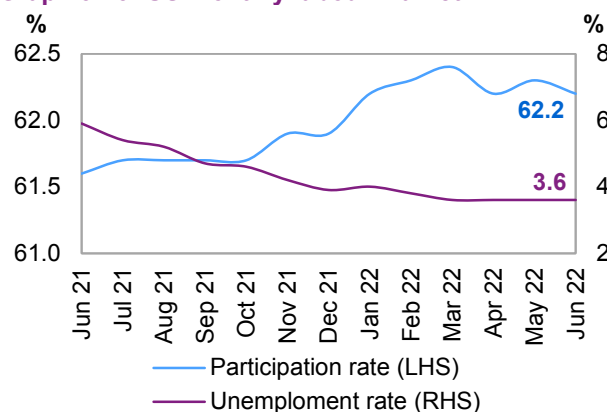
Consumer confidence dropped further, compared with previous months. The index provided by the Conference Board retracted to 98.7 in June, compared with 103.2 in May and 108.6 in April.



The **unemployment rate** remained at a low level of 3.6% in June. However, the **participation rate** fell slightly to stand at 62.2% in June, compared with 62.3% in May.

**Non-farm payrolls** continued to rise, with an increase of 372,000 in June, after 384,000 job additions in May and 368,000 job additions in April. Ongoing labour market tightness and corresponding wage developments need to be closely monitored, as they could materially lift inflation. Hourly earnings rose by 5.1% in June, after a rise of 5.3% y-o-y in May and 5.5% y-o-y was seen in April. With this trend earning growth remains substantially above annual pre-COVID-19 growth of between 2% and 3%.

**Graph 3 - 3: US monthly labour market**



Sources: Bureau of Labor Statistics and Haver Analytics.

### Near-term expectations

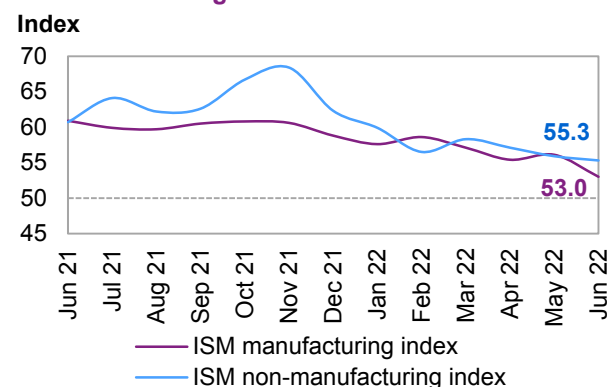
After the **stronger-than-reported decline in 1Q22**, the US economy is forecast to again show relatively lacklustre growth in 2Q22. In line with most advanced economies, it is anticipated that pent-up demand, particularly in the contact-intensive services sector, will support US economic growth and net trade is forecast to counterbalance the dampening effects of underlying 2Q22 growth. With a lessening of COVID-19 related social-distancing measures, an important factor in the 1Q22 decline, the services sector is forecast to recover a bit further in 2Q22 and beyond, particularly with support of the travel and tourism sector and an expected recovery in leisure and hospitality. However, major uncertainties remain. Among the most pressing issue is inflation in combination with rising interest rates as an outcome of monetary tightening. Swiftly rising inflation eats into the disposable spending of households, while monetary tightening is forecast to gradually cool the economy. While it is currently foreseen that these developments will lead to a measured and steady slowdown in the coming quarters, uncertainties remain, especially around rising energy prices. The latter may lead to a more significant reduction in consumption than currently anticipated, especially towards the end of the year. This has been a trend that seemingly began in 2Q22 with retail sales volumes declining in April and May, a trend that has started already in March. This potential inflationary spending reduction may materialize further in 2H22, at a time when the pandemic could lead to the resumption of social distancing measures.

Moreover, the **Fed's monetary policy** actions will remain an influential factor on economic growth. The guiding measure for its policy-making will be the Fed's inflation expectations. Some moderation in inflation is forecast in 2H22, leading to a full-year inflation level of around 7.5%. With this it is forecast that the Fed will lift rates further, by 75 bp in July and another 75 bp towards the end of the year.

In terms of **quarterly growth** developments, a GDP decline of 1.6% q-o-q growth in 1Q22 is forecast to be followed by low positive 2Q22 growth. In 2H22, growth is forecast to rebound and to reach around 3% q-o-q SAAR.

June **PMI** levels, as provided by the Institute for Supply Management (ISM), point to an ongoing positive dynamic, albeit at a slowing rate in both the services and the manufacturing sector amid the latest inflationary developments, continued labour market tightness and ongoing supply chain bottlenecks. The index level for the services sector, representing around 70% of the US economy, retracted slightly to stand at 55.3 in June, compared with 55.9 in May and following 57.1 in April and 58.3 in March. The manufacturing PMI for June declined to stand at 53, after 56.1 in May, 55.4 in April and 57.1 in March.

**Graph 3 - 4: US-ISM manufacturing and non-manufacturing indices**



Sources: Institute for Supply Management and Haver Analytics.

By taking into consideration current 1Q22 data, and at the same time considering a solid rebound for the remainder of the year, the **2022 US GDP growth** estimate remains at 3%. This is forecast to be followed by **2023 GDP growth of 2.1%**.

**Table 3 - 3: US economic growth rate and revision, 2022–2023\*, %**

	US
<b>2022</b>	<b>3.0</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>2.1</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## OECD Europe

### Euro-zone

#### Update on the latest developments

The **Euro-zone’s growth** was reported to be much better than previously expected in 1Q22, although it varied across the region. 1Q22 GDP growth was reported at 2.5% q-o-q SAAR, compared with initially reported growth of 1.1% q-o-q SAAR. An upward revision in Ireland contributed to the strong 1Q22 growth. Additionally, growth was driven by a build in inventories and other potentially temporary factors. Private consumption fell by an annualized rate of 2.7% q-o-q, so as it appears that 1Q22 growth was less supported by this element in GDP. Social distancing measures at the beginning of the year had a considerable negative impact on consumer spending. Furthermore, the start of the armed conflict in Ukraine at the end of February, together with a strong rise in inflation, may have further negatively impacted consumption.

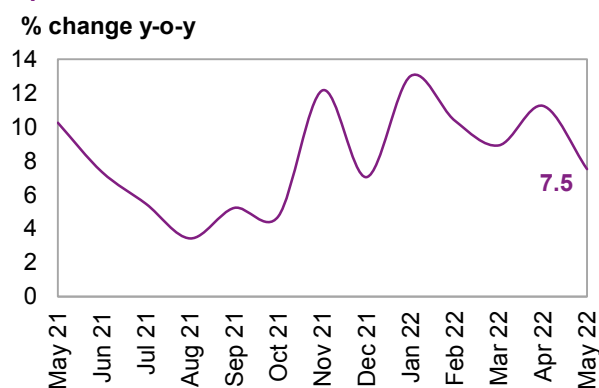
**Inflation** may become an important dampening factor on private household consumption. Inflation continued to rise strongly in June on a yearly basis, to stand at 8.6% y-o-y for the month in the Euro-zone, compared with a 8.1% y-o-y rise in May and a 7.4% increase in April. When excluding volatile items such as food and energy, inflation stood at 4.5% y-o-y in June, compared with 4.4% y-o-y in May and 3.9% y-o-y in April. Supported by the European Central Bank’s (ECB) ongoing monetary easing measures, lending to the private sector by financial institutions continued to expand significantly in May. However, the ECB shifted towards monetary tapering and higher interest rates and made announcements on tightening monetary policy via a likely hike of 25 bp in July. Moreover, the ECB intends to increase the key policy rate by a further 50 bp in September. While its monetary tightening policies are still significantly behind the schedules of the Fed and the Bank of England (BoE), an even higher rate hike in 2H22 should not be ruled out. In the meantime, lending to the private sector rose by a strong 5.3% y-o-y in May, after an already high increase of 4.9% y-o-y in April and a rise of 4.2% y-o-y in March. It should also be noted that the majority of private household lending went into the real estate sector, with consequent likely negative price reactions, after this accommodative monetary policy may end later in the year.

The **labour market** continued to improve. According to the latest numbers from Eurostat, the unemployment rate stood at 6.6% in May, compared with 6.7% in April and 6.8% in March.

**Retail sales** signalled a weakening in the economy’s underlying spending behaviour as retail sales value growth retracted to 7.5% y-o-y in May. This comes after growth of 11.3% y-o-y in April and 8.9% y-o-y in March. However, these levels were also inflated by the already strong price rises, especially in the commodity sector.

**Industrial production** fell in April, with the latest available data showing a decline of 1.9% y-o-y, compared with a decline of 0.5% y-o-y in March. This translates into a monthly increase of 0.4% m-o-m in April, compared with a monthly decline of 1.4% m-o-m in March.

**Graph 3 - 5: Euro-zone retail sales**



Sources: Statistical Office of the European Communities and Haver Analytics.

#### Near-term expectations

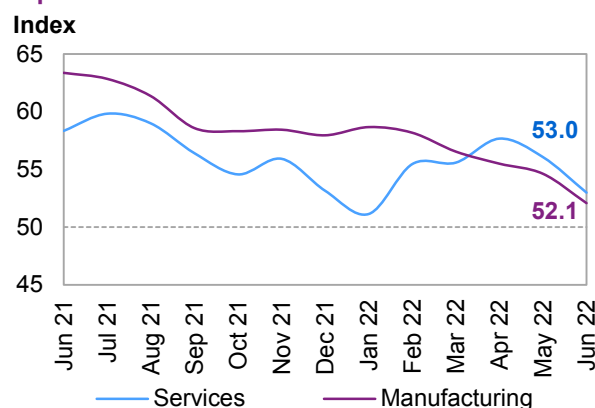
While growth in **1Q22 GDP was much better than expected**, the 2022 GDP growth forecast sees a gradual slowdown of the recovery over the remainder of the year. Especially 2H22 growth will very much depend on a variety of factors. Ongoing uncertainties for the remainder of the year loom large, and the growth trend will

very much depend on the status of the armed conflict in Ukraine and its potential spillover effect on the Euro-zone economy. The energy supply issue in particular will need to be carefully monitored, given the implementation of a partial embargo on Russian oil imports by the EU and its plan to phase out a majority of Russian gas imports by the end of the year. In addition, the pandemic is ongoing in the Euro-zone and infections have risen again due to a highly infectious variant. Moreover, the seasonality of COVID-19 over the past two years suggests a potential return of social distancing measures in the autumn and winter. In the meantime, the ECB has started to gradually tighten its quantitative easing measures and is forecast to lift its key policy rate by at least 75 bp by September, with help of further quantitative tightening measures. This may somewhat strengthen the Euro and lower imported inflation.

Positively, the **reopening of large parts of the Euro-zone economy in 2Q22** has led to a rebound in the contact-intensive services sector, a dynamic that is forecast to carry over into 3Q22. Travel and transportation, leisure and hospitality in particular are forecast to rebound and contribute to the European recovery. On the other hand, some elements in this recovery may be held back by the ongoing issues in air travel. Moreover, the manufacturing sector is forecast to remain impacted by ongoing supply chain bottlenecks.

The Euro-zone's June **PMI** pointed to continued momentum in the manufacturing and services sectors, although both indices retracted. The PMI for services, the largest sector in the Euro-zone, fell to 53 in June, after a level of 56.1 in May and compared with 57.7 in April. The manufacturing PMI retracted as well to stand at 52.1 in June, after 54.6 in May and 55.5 in April.

**Graph 3 - 6: Euro-zone PMIs**



Sources: IHS Markit and Haver Analytics.

The **GDP growth forecast for 2022** remains unchanged at 3.0%. This takes into consideration the lower-than-expected consumption dynamic in 1Q22 and its carry-over into 2Q22, in combination with mounting uncertainties for the remainder of the year. However, this growth forecast also takes into consideration strong support from the services sector, leading to a sound recovery especially for 2Q22 and 3Q22. This forecast is followed by an anticipated slowdown into 2023. The **2023** GDP growth forecast stands at 2.0%.

**Table 3 - 4: Euro-zone economic growth rate and revision, 2022–2023\*, %**

	Euro-zone
<b>2022</b>	<b>3.0</b>
<b>Change from previous month</b>	<b>0.0</b>
<b>2023</b>	<b>2.0</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## OECD Asia Pacific

### Japan

#### Update on latest developments

Japan appears to have recovered somewhat from its **1Q22 decline**, and albeit some accelerating dynamic, it does not seem to materially have taken off, similarly to other key-economies. This comes after Japan's 1Q22 GDP growth was reported at -0.5% q-o-q SAAR. The 1Q22 GDP decline was negatively impacted once again by a severe rise in COVID-19 infections, with associated voluntary and governmentally implemented social distancing measures. In addition, a rise in import prices negatively impacted GDP growth in 1Q22. A third impact came from a slowdown in external trade activity with Japan's two major trading partners, the US and China, with both witnessing slowing growth momentum in 1Q22. Meanwhile, consumer and business sentiment indices point to some rebound in 2Q22, but the extent of the recovery remains to be seen.

The Bank of Japan (BoJ) has maintained its relatively accommodative **monetary policy** as inflation remains much lower than in other OECD economies. However, it has risen considerably when compared to the inflationary level of previous years. Consumer inflation stood at 2.4% y-o-y in May, the same level as in April.

This marks the highest rate since 2014, when inflation rose considerably as the sales tax was increased from 5% to 8%, with a consequent effect on consumer prices. This limited monetary action has led to a further weakening of the yen, especially compared to the US dollar. The currency was trading at more than 130 yen compared to the US dollar at the beginning of July, very much reflecting the differences in US-Japan interest rates and the associated growth differential.

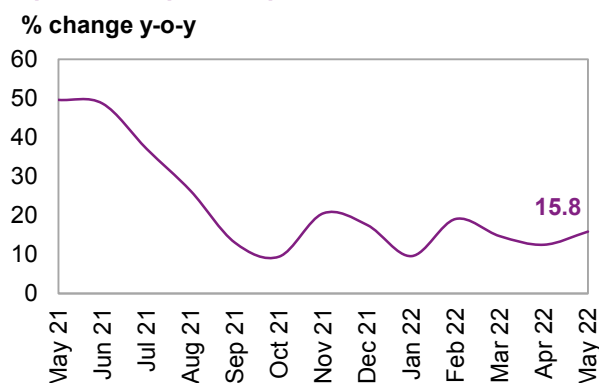
**Industrial production (IP)** declined further in May, falling by 3.9% y-o-y, compared with declines of 3.1% y-o-y in April and 0.5% y-o-y in March, a significant downward trend compared with February's growth of 1%.

**Export** growth accelerated slightly in May, rising by 15.8% y-o-y, compared with 12.5% y-o-y in April and 14.7% y-o-y in March.

**Retail sales** rose by a strong 3.6% y-o-y in May compared with a rise of 3.1% y-o-y in April and 0.7% y-o-y in March.

**Consumer confidence** retracted slightly, reaching a level of 32.2 in June, compared with 32.9 in May and 32.0 in April. Given the re-opening of most parts of the economy in 2Q22, it should be expected that consumer confidence will recover in the coming months.

**Graph 3 - 7: Japan's exports**



Sources: Ministry of Finance, Japan Tariff Association and Haver Analytics.

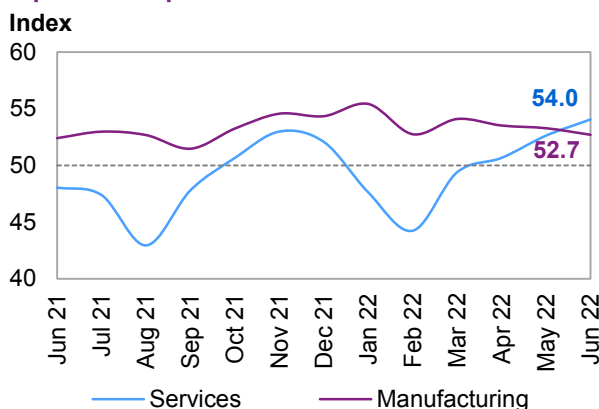
### Near-term expectations

The **Japanese economy is forecast to rebound somewhat in 2Q22** after a decline in 1Q22. This rebound is likely to be primarily supported by domestic demand. Exports are forecast to expand further, but as the country's most important trading partners, the US and China, were experiencing slower growth in 2Q22, the strength of Japan's 2Q22 rebound remains uncertain. While a rebound is anticipated, China's ongoing lockdown measures — which were maintained far into 2Q22 — may keep exports at a lower level than currently anticipated. Though inflation has risen considerably, it is forecast to remain under control, especially as wages and salaries have not risen as significantly as in other high-inflation economies. It is also not expected that incomes will rise strongly in the near term. Hence, it is forecast that the BoJ will keep its monetary policies relatively more accommodative compared with other G4 central banks. The current weakness in the yen may therefore persist for some time. This would be positive for exports, but currently seems to have a net-negative impact as import prices have risen significantly.

**On a quarterly basis**, 1Q22 GDP growth was reported to have declined by 0.5% q-o-q SAAR. Growth is forecast to rebound to stand at more than 3% q-o-q SAAR in 2Q22 and move towards 3% average quarterly growth in 2H22.

While a continuing slowdown in manufacturing activity is reflected in June's **PMI** numbers, the services sector index points to a strong recovery. The services sector PMI, which constitutes around two-thirds of the Japanese economy, rose considerably to stand at 54 in June, after 52.6 in May and compared with 50.7 in April. The manufacturing PMI fell slightly to 52.7 in June, compared with 53.3 in May and 53.5 in April, although this still indicates sound underlying momentum in the manufacturing sector.

**Graph 3 - 8: Japan's PMIs**



Sources: IHS Markit, Nikkei and Haver Analytics.

**GDP growth for 2022** remains unchanged at 1.6% and while 1Q22 GDP growth was slightly better than expected, the growth outlook for the remainder of the year is uncertain. GDP growth is expected to remain supported by domestic demand in the near term, although COVID-19-related developments remain influential. Ongoing fiscal stimulus measures are also expected to support a recovery in private household consumption and investment.

GDP growth in **2023** is forecast at 1.7%. It is anticipated that Japan's economy will continue see soft growth similar to the pre-pandemic trend.

**Table 3 - 5: Japan's economic growth rate and revision, 2022–2023\*, %**

	Japan
<b>2022</b>	<b>1.6</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>1.7</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

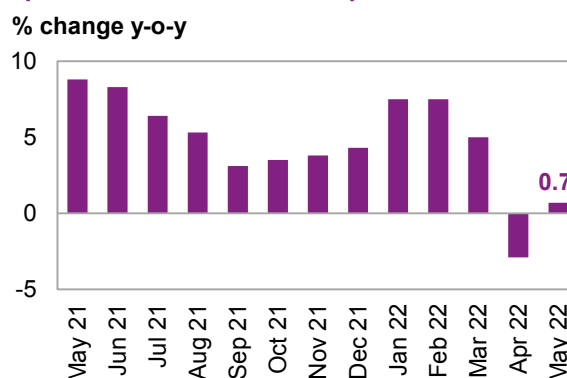
## Non-OECD

### China

#### Update on the latest developments

Recent macroeconomic data suggests that the easing of COVID-19 restrictions, including the lockdown in Shanghai, might reboot China's economy. **Industrial output** grew by 0.7% y-o-y in May 2022, reversing from a contraction of 2.9% y-o-y in April. Indeed, for the first five months of the year, industrial output expanded by 3.3% y-o-y. Retail trade declined at a slower pace, declining by 6.7% y-o-y in May, compared with a 11.1% y-o-y drop in the prior period, which was the steepest decrease since March 2020. Yet over the first five months of the year, retail sales were down 1.5% y-o-y. Overall private consumption might still be fragile amid concerns over jobs and wages.

**Graph 3 - 9: China's industrial production**



Sources: China National Bureau of Statistics and Haver Analytics.

June's central bank survey suggested that individuals' confidence about the labour market was at its lowest level since 2009, and a higher percentage of those surveyed said they plan to save rather than spend. Moreover, the National Bureau of Statistics survey suggested that enterprises were reporting insufficient orders, citing weak market demand as the main challenge facing the manufacturing sector. While the government reiterated that the "zero-COVID" policy is the only option "until the eventual victory", the government has shortened quarantine requirements for inbound visitors and called for a reduction of inter-provincial travel restrictions. While China had vaccinated nearly 90% of its population by June 2022, it has struggled to vaccinate the elderly, who are more vulnerable to COVID-19, and the vaccines used have lower efficacy than some of their international counterparts.

The latest external demand data indicated that the trade surplus surged to \$78.76 billion in May 2022 from \$43.28 billion in May 2021. **Exports** expanded 16.9% y-o-y, the highest growth in external demand in four months amid the resumption of factory production and an easing of logistical issues. **Imports** increased by 4.1%, picking up from a stagnation in April. Considering the first five months of the year, the **trade surplus** was at \$290.46 billion, with exports rising by 13.5% y-o-y and imports gaining by 6.6% y-o-y.

The **annual inflation rate** stayed unchanged from the prior month at 2.1% y-o-y in May 2022. However, food prices have been on the rise since September 2020, and food inflation reached 2.3% y-o-y in May 2022 compared with 1.9% y-o-y in April. China's producer price inflation dropped to a 14-month low of 6.4% y-o-y in May 2022 from 8.0% y-o-y in the prior month. Considering the first five months of the year, China's factory gate prices grew by 8.1% y-o-y.

#### Near-term expectations

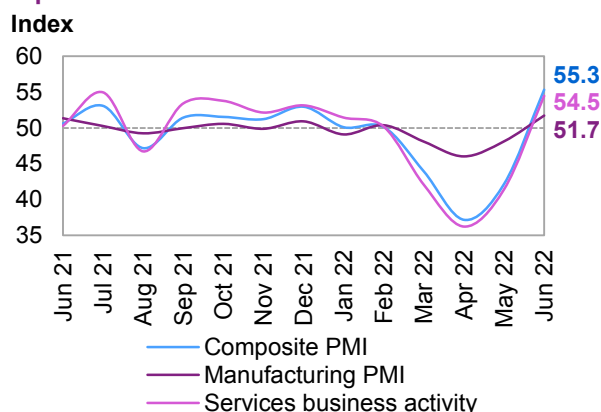
The zero-COVID policy and its related restrictions remain the main challenge facing the short-term economic outlook. The slight recovery is still being restricted by business and consumers' low confidence as well as external economic conditions. China's growth outlook might face more downside risks, also emanating from persistent pressure on the property sector, which might lead to financial repercussions. A potential growth

## World Economy

upside stems from an effective COVID-19 control policy associated with fewer restrictions, as well as stimulus and monetary support.

In June, the manufacturing **PMI** surged to 51.7 from 48.1 in May, marking the first expansion in factory activity since February 2022 amid easing of COVID-19 lockdown and control measures. Similarly, the services PMI surged to 54.5 in June 2022 from 41.4 in May, pointing to the first expansion in the sector in four months. Nevertheless, business confidence was little-changed from May and remained below the series average.

**Graph 3 - 10: China's PMI**



Sources: Caixin, IHS Markit and Haver Analytics.

China's 2022 **GDP forecast** was kept unchanged from the last MOMR at 5.1%, considering governmental support as well as the slight easing of COVID-19 policies. Meanwhile, the economy is forecast to expand by 5.0% in 2023. More downward risk might materialize following the official release of 2Q22 data, which, according to official announcements, might record a contraction. Moreover, risks of a new COVID-19 variant in the winter season could hinder growth in 4Q22 and 1Q23.

**Table 3 - 6: China's economic growth rate and revision, 2022–2023\*, %**

	China
<b>2022</b>	<b>5.1</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>5.0</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## Other Asia

### India

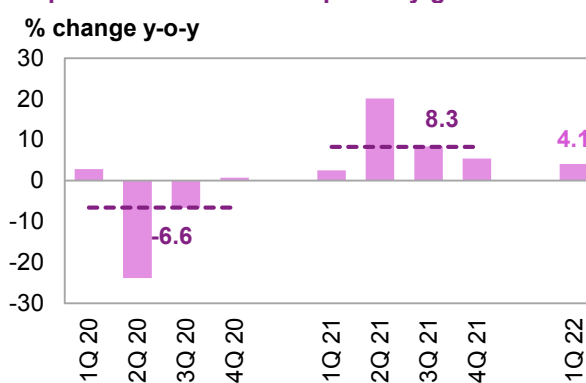
#### Update on the latest developments

In recent months, **India's economy** gathered momentum amid a pent-up demand for services and higher output from industries, as reopening from pandemic restrictions continued. However, the overall price level rise, especially for input costs, may spoil the ongoing recovery.

**Industrial output** growth jumped to 7.1% y-o-y in April, advancing from an upwardly revised 2.2% y-o-y rise the previous month, supported by a pickup in capital, infrastructure and consumer durables output. However, concerns remain regarding manufacturing sector growth amid power shortages and potential supply-chain disruptions from China's lockdowns. Indeed on a monthly basis, industrial output fell 9.2%, compared with a 12.9% surge the previous month.

On the **consumer side**, the impact of a sharp increase in import prices highly impacted consumer spending. Noticeably, total passenger vehicles sales in India, a guideline for consumer spending sentiment, continued to drop in May, falling by 0.2% after a 10% plunge was seen in April, marking the second-straight month of decline in passenger sales.

**Graph 3 - 11: India's GDP quarterly growth**

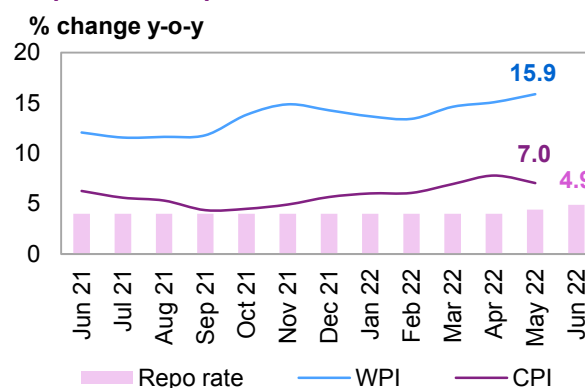


Sources: National Informatics Centre (NIC) and Haver Analytics.

On the **policy front**, the RBI hiked the **repo rate** by 50 bps to 4.9% at the June policy meeting. It also revised up its FY23 (ending March 2023) inflation forecast to 6.7% from 5.7%, but maintained the growth forecast at 7.2%.

On the **fiscal policy front**, the government furthered fiscal stimulus last month to shield the economy from soaring price pressures. Though the new measures only cost around 0.7% of GDP, credit rating agencies Moody's and Fitch raised concerns about a lack of detail on the path to medium-term fiscal consolidation, as general government debt is nearing 90% of GDP.

**Graph 3 - 12: Repo rate and inflation in India**

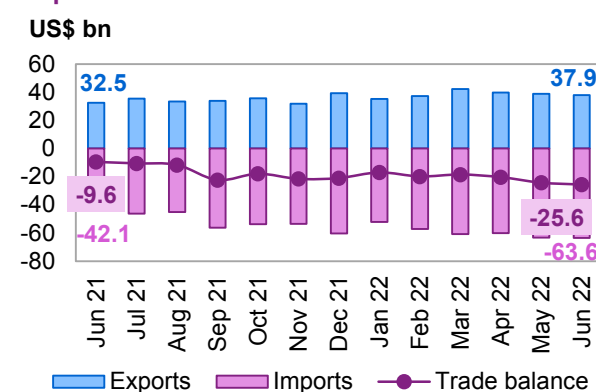


Sources: Ministry of Commerce and Industry, Reserve Bank of India and Haver Analytics.

May's annual **inflation rate** in India edged down to 7.0% from 7.8% in April, but stayed above the RBI's target range of 2%-6% for the fifth straight month. Moreover, food inflation rose by 7.8%, particularly vegetables, along with the cost of transportation and communication. On a monthly basis, consumer prices went up 0.94%, following a 1.43% advance in April.

On external demand, preliminary estimates indicated that **India's trade** deficit posted a record \$25.64 billion in June, as **imports** jumped 50.1% y-o-y to an all-time high of \$63.58 billion due to rising global commodity prices. In the meantime, **exports** rose by 16.8% to \$37.94 billion, as global economic uncertainty and weak growth prospects weighed on demand. Over 2Q22, India's trade deficit more than doubled to \$70.25 billion from \$31.42 billion a year ago.

**Graph 3 - 13: India's trade balance**



Sources: Ministry of Commerce and Industry and Haver Analytics.

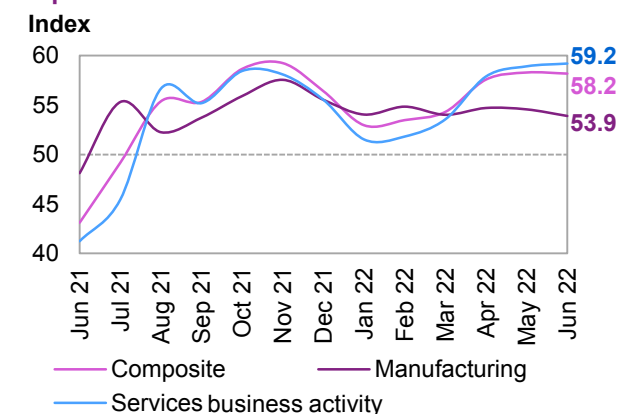
## Near-term expectations

In the short term, India might maintain a slight upward recovery momentum, but the outlook is less bullish given high inflation, less accommodative monetary conditions, and a deteriorating external environment. Indeed, import prices are anticipated to rise over 2H22, hence the trade deficit might enlarge, as India is a major importer of commodities, though slowing global demand would weigh on exports.

In the meantime, signs of slow growth in manufacturing output have been reflected in the June **S&P Global Manufacturing PMI**, which declined to 53.9 from 54.6 in May. Moreover, manufacturing business sentiment deteriorated to a 27-month low amid concerns over inflation.

The **services PMI** increased to 59.2 in June from 58.9 in May amid a further acceleration in the growth of new business and output due to ongoing improvements in demand conditions following reopening of the economy after COVID-19 lockdowns. However, concerns over inflationary pressures kept services business sentiment historically low.

**Graph 3 - 14: India's PMIs**



Sources: IHS Markit and Haver Analytics.

India's 2022 **GDP growth** forecast was kept unchanged from the last MOMR at 7.1%. In 2023, the economy is forecast to grow by 6.0%. Growth potential is likely to be limited, especially with more fiscal support. However, downward pressures would mainly arise from unprecedented COVID-19 developments or a further elevation in inflation rates.

**Table 3 - 7: India's economic growth rate and revision, 2022–2023\*, %**

	India
<b>2022</b>	<b>7.1</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>6.0</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## Latin America

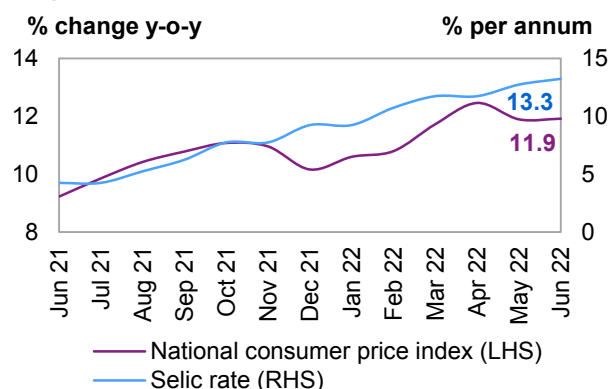
### Brazil

#### Update on latest developments

Early 2Q22 indicators for Brazil suggest the strong economic momentum started in 3Q21 has continued. Yet, recent depreciation of the **Brazilian real** (BRL) may have erased nearly all the gains made earlier this year, when higher prices for raw materials propelled the appreciation of commodity currencies. The BRL fell by 8% versus the USD and is trading at around BRL5.26 per one USD. The current depreciation reflects the strengthening of the USD globally and investors' fears around Brazil's fiscal sustainability, following current tax cuts which the government implemented to curb inflation.

The **inflation rate** remained unchanged at 11.9% in June compared to the previous month. However, the rate shows a ninth consecutive month of double-digit inflation. Also, producer inflation in Brazil increased to 19.15% in May, accelerating for the first time in six months. In a bid to reduce Brazil's high inflation rate, the government proposed a mixture of temporary and permanent tax cuts on fuels. The approved R41.3 bn (US\$7.9 bn) package of social benefits is intended to help households to deal with the hardships caused by high inflation. The new stimulus naturally added extra public spending and widened the fiscal deficit, lifting public debt. However, it is likely to incorporate additional private consumption benefits. In line with fiscal policy support, the Congress approved a law that puts a lid on state-level fuel taxes, electricity tariffs and telecom services in a bid to slow inflation. However, the effects on nationwide CPI are likely to be small, as only two states have implemented tax cuts. Additionally, Petrobras – which is partly private and partly state-owned – announced an increase in petrol and diesel prices.

**Graph 3 - 15: Brazil's inflation vs. interest rate**

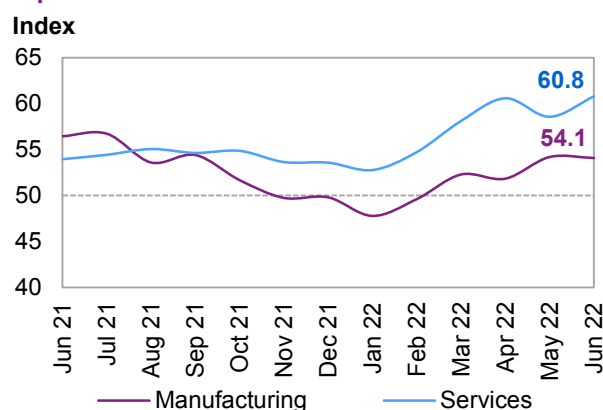


Sources: Banco Central do Brasil, Instituto Brasileiro de Geografia e Estatística and Haver Analytics.

#### Near-term expectations

Economic activity in Brazil might slow in 2H22 amid a mix of political uncertainty and excessive monetary tightening. However, recent developments still show a solid recovery that has been reflected in June **PMI** readings. The composite PMI rose to 59.4 in June from 58 in the prior month as private-sector business expanded at a record pace for the services sector. Indeed, the services PMI surged to 60.8 in June compared with 58.6 the previous month. The manufacturing PMI was little changed at 54.1 in June from 54.2 in May. Yet, Brazilian manufacturers remained strongly confident of a rise in output over the course of the coming months, though overall sentiment slipped to a three-month low in June, due to inflation and interest rate concerns dampening optimism.

**Graph 3 - 16: Brazil's PMIs**



Sources: IHS Markit and Haver Analytics.



Looking ahead, confidence regarding resilient client demand and the hope of a positive outcome to the presidential election lifted business confidence, though concerns over inflation remain the biggest challenge. Considering the mix of economic signals, Brazil's **GDP** growth for 2022 remains unchanged at 1.2% for this month, while the economy is anticipated to post growth of 1.5% in 2023.

**Table 3 - 8: Brazil's economic growth rate and revision, 2022–2023\*, %**

	Brazil
<b>2022</b>	<b>1.2</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>1.5</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## Africa

### South Africa

#### Update on the latest developments

Recent GDP growth data suggest that South Africa's economy has returned to pre-pandemic levels. The real GDP rose by 3.0% y-o-y in 1Q22, but stagflation risks in 2022 remain intact. Indeed, economic activity dropped significantly at the start of 2Q22 as a result of heavy flooding in parts of KwaZulu-Natal (KZN) during April, which led to various businesses being forced to temporarily halt production. Industrial production plunged by 7.8% y-o-y in April, reflecting the adverse impact of severe flooding in parts of the country and intense load-shedding. Moreover, in 2Q22 the RMB/BER business confidence index dropped to 42 in May from 46 in the previous period, reaching the lowest point since 1Q21. The deterioration in business sentiment was mainly felt by manufacturers and new vehicle dealers due to ongoing supply chain shortages and temporary closure of the Toyota plant in the east coast city of Durban because of flooding.

For the first time in more than five years, consumer price inflation jumped to 6.5% y-o-y in May, breaching the 3-6% target ceiling set by the South African Reserve Bank. The CPI increased by 0.7% m-o-m in May, compared with 0.6% m-o-m in April. On the policy front, the South African Reserve Bank raised its benchmark repo rate by 50 bps to 4.75% at its May meeting, as widely expected. This was the sharpest hike in over six years due to heightened inflation risks stemming from geopolitical tension.

#### Near-term expectations

Stagflation risk is still flagged in the near-term economic outlook following the natural disaster shock. The economic shocks in the current quarter might be more pronounced on the production side of the economy, compared with the consumer-driven sectors, which are possibly still recovering from the scarring left by lockdowns. Reflecting these trends, the seasonally adjusted Absa Purchasing Managers' Index decreased to 52.2 in June from 54.8 in May. On the back of an expansion in manufacturing activity, though at a weaker pace, amid a deterioration during the month and continued supply chain issues with power cuts, the Absa also warned the second quarter average for the business activity index may drop to 45 points and pointed to a stark decline in actual factory output in April, "The sector was likely to be a big drag on economic growth in the second quarter". However, the S&P Global South Africa PMI rose to 52.5 in June from 50.7 the prior month, as both output and new orders increased at quicker rates, amid strengthening client demand.

The growth forecast for the South African economy in 2022 remains unchanged from the previous month's assessment of 2.2%. In 2023, the real **GDP forecast** sees expansion of 1.5%. Both forecasts are subject to downside risks stemming from domestic and global economic developments in 2H22.

**Table 3 - 9: South Africa's economic growth rate and revision, 2022–2023\*, %**

	South Africa
<b>2022</b>	<b>2.2</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>1.5</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## Russia and Central Asia

### Russia

#### Update on the latest developments

The Russian economy expanded by 3.5% y-o-y in 1Q22, corresponding to a contraction of -2.8% seasonally. According to official monthly tracking, the GDP contracted by 4.3% y-o-y in May, following shrinkage of 3.0%

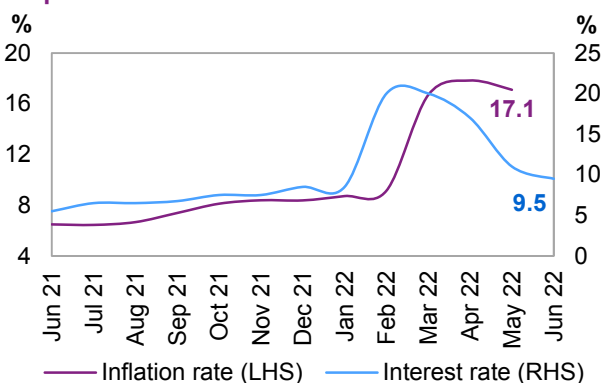
in April, mostly due to a deep slump in retail sales, industrial production and transportation, while construction and agriculture both posted growth. May industrial production data suggests a contraction of only 1.7% y-o-y following a 1.6 % y-o-y decline the previous month. Still, this was the second and steepest fall in industrial activity since February 2021, reflecting lower manufacturing output. On a seasonally and calendar adjusted monthly basis, industrial output fell by 0.2% in May, following a 1.9% drop the previous month.

Western firms exiting Russian markets have so far not put a lot of pressures on labour market, as May's jobless rate indeed dropped to 3.9% due to the gradual exodus.

Consumer spending is still fragile following the war's adverse effects, as suggested by retail trade data, which fell 10.1% y-o-y in May, following an upwardly revised 9.8% decline the prior month. Moreover, consumer confidence decreased to -31 points in 2Q22 from -21 points in 1Q21. On a monthly basis, retail trade edged up 0.5%, virtually stagnating after slumping to a downwardly revised 11.2% the prior month.

Consumer inflationary pressures eased, as the **CPI** fell to 17.1% y-o-y in May from 17.8% in the previous month. Unlikely on the production side, producer prices surged to 19.3% y-o-y in May. Still, the May PPI eased from record growth of 31.5% the previous month. On the same line, The Central Bank of Russia cut its key interest rate by 150 bps to 9.5% during its June meeting, bringing borrowing costs back to levels seen prior to the Ukraine conflict. This policy rate cut indicates that the RCB is considering the need to further loosen monetary normalization, as inflation is slowing faster and the decline in economic activity is of a smaller magnitude than initially expected in April. At the same time, the rouble remains strong, holding close to levels not seen in years.

**Graph 3 - 17: Russia's inflation vs. interest rate**



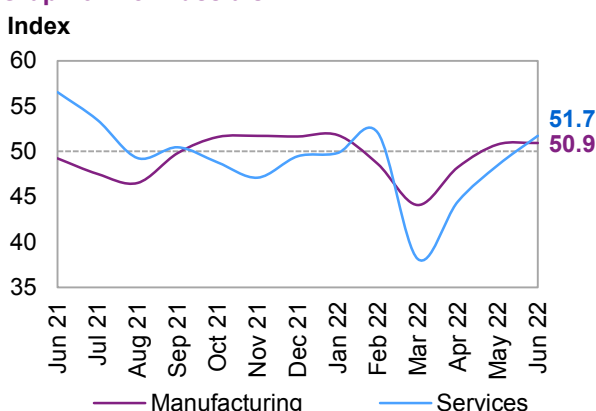
Sources: Federal State Statistics Service, Central Bank of Russia and Haver Analytics.

**Near-term expectations**

Russia's economy has been successful in diverting its fossil fuel exports and very careful government policies have helped support economic activity in light of the ramifications of imposed external conditions. However, the contraction that started in 2Q22 might carry over to 3Q22, especially in consumption and investment activities.

**PMI indices** reflected a slight recovery in both the manufacturing and services sectors. The S&P Global Manufacturing PMI went up slightly to 50.9 in June from 50.8 in May, marking the second straight month of expansion in factory activity, as new orders returned to growth, boosted by greater domestic demand. Likewise, the services PMI increased to 51.7 in June from 48.5 in May, recording the first expansion seen in the sector in four months, as output expanded marginally while new orders increased for the first time in nine months and at the fastest pace for a year. Additionally, business sentiment strengthened for both sectors amid hopes of greater client demand and a stabilisation in economic conditions.

**Graph 3 - 18: Russia's PMI**



Sources: IHS Markit and Haver Analytics.

Following current developments, Russia's real economic growth remained unchanged at a contraction of 6.0% in 2022. The real **GDP** is forecast to grow by 1.2% y-o-y in the coming years, following resilient economic conditions and due to fossil fuel revenues. Uncertainties still exist, mainly related to the development of ongoing tension with Ukraine, as well as any COVID-19-related developments.

**Table 3 - 10: Russia's economic growth rate and revision, 2022–2023\*, %**

	Russia
<b>2022</b>	<b>-6.0</b>
<b>Change from previous month</b>	0.0
<b>2023</b>	<b>1.2</b>

Note: \* 2022 and 2023 = Forecast.

Source: OPEC.

## OPEC Member Countries

### Saudi Arabia

Recent economic activities suggest an increase in consumer spending, pointing to strong domestic demand. In 1Q22, the private final consumption spending share to GDP stood at 2.7% y-o-y. Additionally, non-oil exports expanded by 36.6% y-o-y in April after growth of 28.6% y-o-y in March 2022. On the manufacturing side, the forward-looking PMI indicator rose to 57.0 in June from 55.7 in July, pointing to the 22nd straight month of growth and the sharpest rate increase since October 2021. Further, near-term growth potential is anticipated amid policy support and the improvement in both oil and non-oil economic activities, especially those related to the tourism sector.

### Nigeria

Despite the improvement in fossil fuel prices, the short-term economic outlook for Nigeria is clouded by high inflation, which has reduced private sector optimism and weakened consumer spending. In May 2022, the composite CPI rose to 17.7% y-o-y from 16.8% y-o-y in the prior month. In response to the elevated inflationary pressures, the Central Bank of Nigeria raised its policy rate by 150 bps to 13%, bringing borrowing costs to the highest since April of 2020. It was the biggest rate hike since July of 2016 amid concerns that persistent inflationary pressures could weigh on the country's fragile recovery. Meanwhile, the Stanbic IBTC Bank Nigeria PMI fell to 50.9 in June of 2022 from 53.9 in the prior month, pointing to the weakest improvement in business conditions in Nigeria's private sector since January of 2021. Overall, the above-average fossil fuel prices support a firmly positive outlook for the rest of the year, but concerns over soaring inflation would increase uncertainty next year.

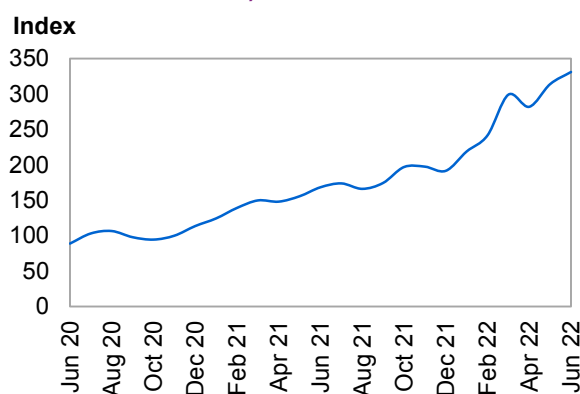
### The United Arab Emirates (UAE)

UAE economic activities have sustained strong growth momentum through 1H22 amid the postponed Expo 2020 and the easing of pandemic-related restrictions as well as above-average crude oil prices. Confidence in the positive short-term economic outlook increased despite the current decline in the PMI reading amid further anticipated global as well as local demand recovery namely in the tourism sector. The June PMI declined to 54.8 from 55.6 in the prior month, marking the 19th-straight month of growth in non-oil private economic activities, supported by a sharp rise in new orders amid stronger domestic demand and foreign demand. However, inflationary pressures have increased prices without derailing growth as employment and sentiment in non-oil economies has remained resilient.

## The impact of the US dollar (USD) and inflation on oil prices

The **US dollar (USD) index** advanced for the sixth consecutive month, increasing by 0.8% m-o-m. In Developed Market (DM) currencies, the USD remained essentially flat m-o-m against the euro. The ECB announcement to raise interest rates in the coming months to slow down inflationary pressures lent support to the euro. Meanwhile, the USD continued to advance against the yen, increasing by 3.8% m-o-m amid monetary policy divergences. Against the pound, the USD rose by 1.1% m-o-m as inflationary pressures continued to erode the value of the pound. In Emerging Market (EM) currencies, the USD increased m-o-m by 1.0% against the rupee and by 1.1% against the real in the same period. The strong performance of the US economy lent support to the USD while inflationary pressures weighed on both currencies. Meanwhile, the USD declined by 0.3% against the yuan. China has reduced the foreign reserve requirement for banks to slow the depreciation of the yuan.

**Graph 3 - 19: The Modified Geneva I + US\$ Basket (base June 2017 = 100)**



Sources: IMF and OPEC.

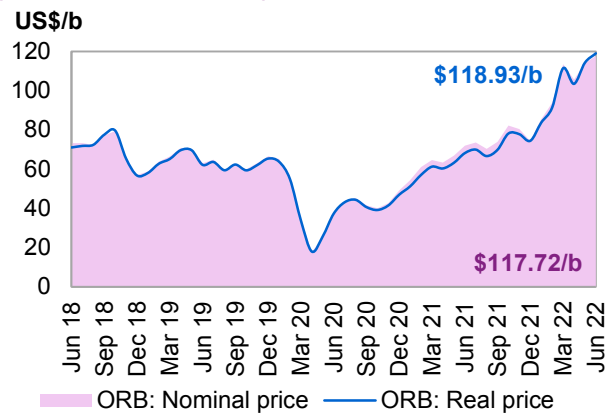
## World Economy

The strengthening of the USD in addition to high crude prices continued to lend support the ORB real prices despite rising Inflation.

In **nominal terms**, accounting for inflation, the price of the ORB went from \$113.87/b in May 2022 to \$117.72/b in June 2022, a 3.4% increase m-o-m.

In **real terms** (excluding inflation), the ORB went from \$114.18/b in May 2022 to \$118.93/b in June 2022, a 4.2% increase m-o-m.

**Graph 3 - 20: Impact of inflation and currency fluctuations on the spot ORB price (base June 2017 = 100)**



Source: OPEC.

## World Oil Demand

For 2022, world oil demand is foreseen to rise by 3.4 mb/d, unchanged from last month's estimate despite some regional revisions. Total oil demand is projected to average 100.3 mb/d. In 1Q22, demand was revised up amid strong economic growth in most consuming countries and a lower baseline. In the OECD region, oil demand is anticipated to rise by 1.8 mb/d to reach 46.6 mb/d. This is nearly 1.2 mb/d lower than total demand in 2019, mainly due to a limited recovery in transportation fuel, especially jet fuel. OECD Americas demand is anticipated to rise the most in 2022, led by the US on the back of recovering gasoline and diesel demand. Light distillates are also projected to support demand growth this year. In the non-OECD region, total oil demand is anticipated to rise by 1.6 mb/d to reach 53.7 mb/d in 2022. That is nearly 1.28 mb/d higher than 2019 total demand. A steady increase in industrial and transportation fuel demand, supported by a recovery in economic activity, is projected to boost demand in 2022.

In 2023, expectations for healthy global economic growth amidst improvements in geopolitical developments, combined with expected improvements in the containment of COVID-19 in China, are expected to boost consumption of oil. World oil demand is anticipated to rise by 2.7 mb/d y-o-y, while total world oil demand is projected to reach 103.0 mb/d. In the OECD, oil demand is anticipated to rise by 0.6 mb/d, as OECD Americas is expected to climb firmly, with US oil demand above 2019 levels mainly due to the recovery in transportation fuels and light distillates demand. OECD Europe and the Asia Pacific will grow above 2019 consumption levels. In the non-OECD, oil demand is projected to show an increase of 2.1 mb/d with, with the largest growth seen in China and India, supported by a recovery in transportation fuels and firm industrial fuel demand, including petrochemical feedstock. Other regions such as Other Asia, Latin America and the Middle East are also expected to see decent gains, supported by a positive economic outlook. In terms of fuels, gasoline and diesel are assumed to lead oil demand growth next year.

**Table 4 - 1: World oil demand in 2022\*, mb/d**

World oil demand	2021	1Q22	2Q22	3Q22	4Q22	2022	Change 2022/21	
							Growth	%
<b>Americas</b>	24.28	24.84	24.99	25.49	25.76	25.27	1.00	4.11
<i>of which US</i>	19.93	20.38	20.57	20.99	21.21	20.79	0.86	4.34
<b>Europe</b>	13.08	13.09	13.31	14.29	14.15	13.71	0.63	4.81
<b>Asia Pacific</b>	7.41	7.91	7.19	7.25	7.93	7.57	0.16	2.16
<b>Total OECD</b>	<b>44.77</b>	<b>45.83</b>	<b>45.49</b>	<b>47.03</b>	<b>47.84</b>	<b>46.55</b>	<b>1.79</b>	<b>3.99</b>
<b>China</b>	14.94	14.67	14.96	15.42	15.97	15.26	0.32	2.14
<b>India</b>	4.77	5.18	4.95	5.01	5.39	5.13	0.36	7.53
<b>Other Asia</b>	8.63	9.09	9.54	8.93	8.95	9.12	0.50	5.77
<b>Latin America</b>	6.23	6.32	6.28	6.53	6.42	6.39	0.16	2.63
<b>Middle East</b>	7.79	8.06	7.82	8.32	8.09	8.07	0.28	3.59
<b>Africa</b>	4.22	4.51	4.15	4.23	4.54	4.36	0.14	3.23
<b>Russia</b>	3.61	3.67	3.28	3.45	3.54	3.48	-0.13	-3.58
<b>Other Eurasia</b>	1.21	1.22	1.15	1.01	1.24	1.15	-0.06	-4.71
<b>Other Europe</b>	0.75	0.79	0.71	0.73	0.80	0.76	0.01	1.01
<b>Total Non-OECD</b>	<b>52.15</b>	<b>53.50</b>	<b>52.85</b>	<b>53.62</b>	<b>54.93</b>	<b>53.73</b>	<b>1.58</b>	<b>3.03</b>
<b>Total World</b>	<b>96.92</b>	<b>99.33</b>	<b>98.33</b>	<b>100.65</b>	<b>102.77</b>	<b>100.29</b>	<b>3.36</b>	<b>3.47</b>
<b>Previous Estimate</b>	96.92	99.28	98.19	100.85	102.77	100.29	3.36	3.47
<b>Revision</b>	0.00	0.06	0.15	-0.20	0.00	0.00	0.00	0.00

Note: \* 2022 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.

Table 4 - 2: World oil demand in 2023\*, mb/d

World oil demand	2022	1Q23	2Q23	3Q23	4Q23	2023	Change 2023/22	
							Growth	%
<b>Americas</b>	25.27	25.20	25.47	26.04	26.27	25.75	0.48	1.88
<b>of which US</b>	20.79	20.42	20.76	21.24	21.36	20.95	0.16	0.77
<b>Europe</b>	13.71	13.10	13.35	14.46	14.26	13.80	0.08	0.61
<b>Asia Pacific</b>	7.57	7.94	7.25	7.29	7.94	7.60	0.04	0.48
<b>Total OECD</b>	<b>46.55</b>	<b>46.24</b>	<b>46.07</b>	<b>47.78</b>	<b>48.47</b>	<b>47.15</b>	<b>0.60</b>	<b>1.28</b>
<b>China</b>	15.26	15.31	15.98	16.14	16.53	15.99	0.73	4.81
<b>India</b>	5.13	5.38	5.20	5.27	5.63	5.37	0.24	4.68
<b>Other Asia</b>	9.12	9.48	9.87	9.29	9.30	9.48	0.36	3.93
<b>Latin America</b>	6.39	6.48	6.41	6.69	6.56	6.54	0.15	2.30
<b>Middle East</b>	8.07	8.43	8.10	8.65	8.38	8.39	0.32	3.91
<b>Africa</b>	4.36	4.70	4.34	4.42	4.73	4.55	0.19	4.31
<b>Russia</b>	3.48	3.68	3.30	3.62	3.72	3.58	0.10	2.73
<b>Other Eurasia</b>	1.15	1.22	1.15	1.02	1.25	1.16	0.01	0.72
<b>Other Europe</b>	0.76	0.80	0.72	0.75	0.82	0.78	0.02	2.34
<b>Total Non-OECD</b>	<b>53.73</b>	<b>55.48</b>	<b>55.05</b>	<b>55.85</b>	<b>56.92</b>	<b>55.84</b>	<b>2.10</b>	<b>3.92</b>
<b>Total World</b>	<b>100.29</b>	<b>101.72</b>	<b>101.12</b>	<b>103.64</b>	<b>105.40</b>	<b>102.99</b>	<b>2.70</b>	<b>2.69</b>

Note: \* 2022 and 2023 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.

## OECD

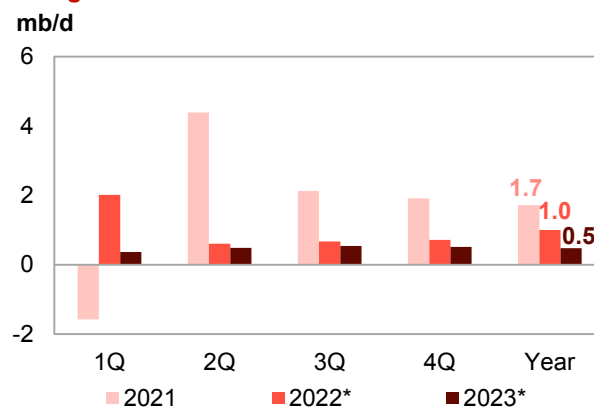
### OECD Americas

#### Update on the latest developments

**US oil demand growth** weakened in **April** after strong y-o-y growth in March. According to the most recent monthly data, the US posted growth of 0.5 mb/d in April, annually, following strong y-o-y growth of 1.2 mb/d in March. The US still faces macroeconomic challenges that are weighing heavily on oil demand. Oil demand growth in April was led by liquefied petroleum gas (LPG), which grew by 0.4 mb/d, about 13% annually. On the back of a strong recovery in air traffic, jet fuel recorded growth of 0.3 mb/d annually, lower by 0.4 mb/d m-o-m. According to the International Air Transport Association's (IATA) Air Passenger Market Analysis for April 2022, the US domestic market made progress towards reaching 2019 revenue passenger kilometres (RPK) levels. The rebound in air traffic continued in April with RPKs down only 1.6% compared to the same month in 2019 (versus -3.9% y-o-y in March 2022). Residual fuel requirements recorded robust y-o-y growth of 0.2 mb/d in April, against a mere 30 tb/d annually in March.

Gasoline demand is on a declining trajectory, recording a y-o-y contraction of 40 tb/d in April for the first month since February 2021 and below 80 tb/d annual growth in March, 2022. The persistent rise in US gasoline prices and high inflation are partly responsible for weakening gasoline demand in the US. Data from the US Federal Highway Administration shows that monthly motor vehicle travel miles in the US declined by 1% in April from their March level. Diesel demand declined for two consecutive months. In April diesel contracted by 0.2 mb/d annually from the 0.1 mb/d contraction recorded in March. Both manufacturing and trucking activities declined in April on a monthly basis from March. These factors weighed on April diesel demand. Naphtha contracted by 60 tb/d annually in April.

Graph 4 - 1: OECD Americas oil demand, y-o-y change



Note: \* 2022-2023 = Forecast. Source: OPEC.

Table 4 - 3: US oil demand, mb/d

By product	Apr 21	Apr 22	Change Apr 22/Apr 21	
			Growth	%
LPG	2.89	3.27	0.38	13.1
Naphtha	0.21	0.15	-0.06	-27.2
Gasoline	8.79	8.75	-0.04	-0.4
Jet/kerosene	1.29	1.54	0.25	19.6
Diesel	3.99	3.81	-0.18	-4.5
Fuel oil	0.14	0.30	0.16	112.6
Other products	2.44	2.42	-0.02	-0.8
<b>Total</b>	<b>19.75</b>	<b>20.25</b>	<b>0.50</b>	<b>2.5</b>

Note: Totals may not add up due to independent rounding. Sources: EIA and OPEC.

## Near-term expectations

Following strong growth of 1.7 mb/d annually in 1Q22, though on top of a low historical baseline, US oil demand growth is forecast to slow in 2Q22 to settle at by 0.4 mb/d, y-o-y. The US economy is projected to slow down in this quarter. The US economy will also be impacted by high domestic inflation combined with tight monetary policy; these factors are going to weigh on oil demand in second quarter. In 3Q22, the combination of the summer driving season and higher employment in the industrial and commercial sectors as well as the decreasing impact of the COVID-19 pandemic are expected to support the demand for gasoline, diesel and jet kerosene. Gasoline demand is expected to be backed by summer driving season activity. Demand for diesel will be supported by rise in demand for trucking, home delivery and distribution of goods due to relative improvements in economic activity in the US. Therefore, during 3Q22, US oil demand growth is forecast to improve and reach 0.6 mb/d annually. Furthermore, the improvement in both domestic and international aviation travel will support jet kerosene demand. Residential and industrial demand for light distillates will support LPG and naphtha and will benefit from petrochemical feedstock requirements in 3Q22.

These improvements in the performance of the US economy in 3Q22 are anticipated to extend into 4Q22. In this quarter, the US oil demand is projected to grow by 0.7 mb/d annually.

As the US government continues to implement some monetary and fiscal policy measures to support the economy, the rise in inflation is likely to slow in 2023, and supply chain bottlenecks are expected to ease further. Consequently, the manufacturing sector and households will benefit and support oil demand growth.

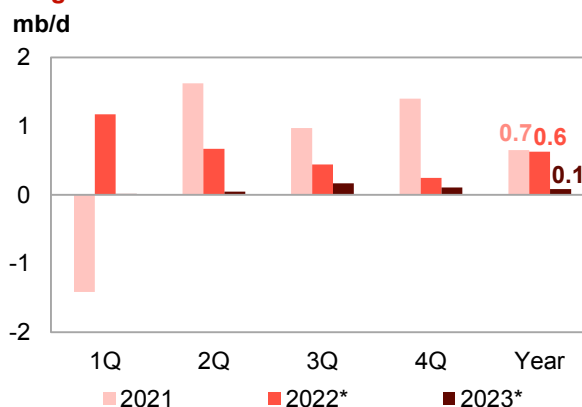
In 2023, OECD Americas is expected to grow by 0.5 mb/d y-o-y, 0.4 mb/d above the 2019 growth. The oil demand growth in the region is expected to be driven mostly by demand from the USA. Expected strong GDP growth recovery and resilient industrial sector activity are assumed to be the main drivers of the growth in the region. In terms of oil products, transportation fuels, backed by strong mobility and trucking will support gasoline and transportation diesel demand in 2023. Furthermore, petrochemicals industry requirements for feedstock is anticipated to support the demand for light distillates. Finally, the continued recovery of air travel, both in terms of international and domestic travel, will support jet fuel demand in 2023.

## OECD Europe

### Update on the latest developments

Oil demand in OECD Europe declined slightly m-o-m in April, growing by 0.9 mb/d annually following annual growth of 1.1 mb/d in March. The gradual relaxation of travel restrictions in various European countries has boosted travel demand within the continent. This has resulted in a significant surge in international demand, with passengers ready to fly abroad once again rather than holidaying domestically. Accordingly, the demand for jet kerosene grew by 0.6 mb/d annually, slightly exceeding growth levels of 0.5 mb/d in March. Improved mobility and economic activity in the region also lent support for gasoline in April, y-o-y.

Graph 4 - 2: OECD Europe's oil demand, y-o-y change



Note: \* 2022-2023 = Forecast. Source: OPEC.

## World Oil Demand

In April, new passenger registrations in the European Union (EU) increased from 763,637 in March to 802,868 in April, marking a 5.1% rise m-o-m, although they fell by a significant 20.6% y-o-y. Demand for gasoline grew by 0.3 mb/d annually in April slightly higher than in March.

Annual diesel demand growth in OECD Europe declined y-o-y, reflecting high retail prices and challenges in securing petroleum products supply. In Germany, the mileage covered by trucks grew by 0.8% in April 2022 from the previous month. Statistics from Haver Analytics show that the index of manufacturing output in the EU countries fell from 107.90 in April 2021 to 107.50 in April 2022. On the back of these developments, diesel recorded growth of 0.2 mb/d y-o-y in April, lower than the y-o-y growth of 0.4 mb/d in March. Naphtha recorded a contraction by 0.2 mb/d y-o-y in April, comparatively larger than the corresponding 0.1 mb/d decline in March.

**Table 4 - 4: Europe's Big 4\* oil demand, mb/d**

By product	Apr 21	Apr 22	Change Apr 22/Apr 21	
			Growth	%
LPG	0.45	0.43	-0.02	-4.6
Naphtha	0.60	0.46	-0.14	-22.9
Gasoline	1.00	1.18	0.18	17.8
Jet/kerosene	0.37	0.65	0.28	75.9
Diesel	3.00	3.04	0.05	1.6
Fuel oil	0.14	0.18	0.04	25.2
Other products	0.39	0.52	0.13	32.6
<b>Total</b>	<b>5.95</b>	<b>6.46</b>	<b>0.51</b>	<b>8.6</b>

Note: \* Germany, France, Italy and the UK. Totals may not add up due to independent rounding.

Sources: JODI, UK Department for Business, Energy & Industrial Strategy, Unione Petrolifera and OPEC.

### Near-term expectations

Looking forward, in 2Q22 y-o-y oil demand growth in OECD Europe is projected to weaken by 0.7 mb/d in the second quarter from the 1.2 mb/d recorded in 1Q22, largely affected by geopolitical developments which have fuelled manufacturing inflation and trade-related bottlenecks. In 2Q22, oil demand in OECD Europe is forecast to grow by 0.5 mb/d annually, backed by 1.5% GDP growth in the four big economies of the region during the quarter. In addition, all COVID-19 restrictions were relaxed. These factors are expected to support mobility in the region, thereby inducing gasoline demand. The gradual relaxation of air travel restrictions in various European countries will also lead to a surge in air traffic, thereby supporting jet kerosene demand in the region.

In 3Q22, the GDP in the region is expected to improve 2.3%, y-o-y, combined with expected improvements in geopolitical developments and trade-related supply chain activity, which will support manufacturing in the region. Furthermore, pent-up travel demand and the summer driving activity are expected to enhance gasoline demand in 3Q22. In 4Q22, the GDP in the region is expected to improve by 3.2%, lending support for diesel requirements in the region's manufacturing sector. Winter seasonality is expected to weigh on mobility, thereby reducing gasoline demand. In 4Q22, OECD Europe oil demand is forecast to slow at 0.2 mb/d annually.

In 2023, the region is projected to post an annual growth of 0.1 mb/d, y-o-y. The oil demand growth is posed to supported by strong economic growth recovery in the four big oil consuming countries; this will support mobility and trucking to back demand for gasoline and transportation diesel. In addition, on the back of vibrant industrial and petrochemical sector requirements for distillates, diesel and other light distillates demand will significantly improve in the region. Finally, as air travel demand continue to improve in the region, jet fuel demand will improve further in 2023.

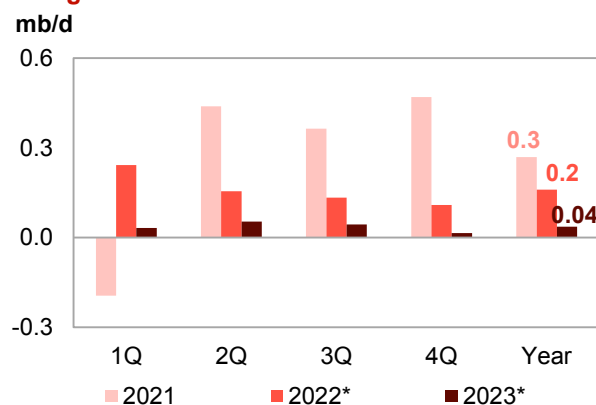


## OECD Asia Pacific

### Update on the latest developments

**Oil demand in the Asia Pacific** nosedived by 0.1 mb/d, y-o-y, in April, 2022 after rising 0.1 mb/d annually in March. Japan and South Korea, the major consuming countries in the region, recorded weakening demand for most products. The GDP of the region is still not performing very well, with 2.2% annual growth in Japan, combined with the country's COVID-19 emergency restrictions, which dented consumer spending and manufacturing activity. These factors capped the oil demand in the country. The index of manufacturing production in Japan slid from 96.7 in March to 95.4 in April. Similarly, South Korea's GDP growth is at 2.9% and manufacturing output has performed below expectation at 105.2 in April, slightly below 105.7 in March.

**Graph 4 - 3: OECD Asia Pacific oil demand, y-o-y change**



Note: \* 2022-2023 = Forecast. Source: OPEC.

Furthermore, South Korea has not fully lifted all its COVID-19 restrictions. The combination of these factors weigh heavily on oil demand in the region, which fell in April compared to positive y-o-y growth in March.

The demand for light distillates – NGLs/LPG, and naphtha – recorded marginal 30 tb/d y-o-y growth in April, 0.1 mb/d lower m-o-m in March. Naphtha consumption grew by 45 tb/d y-o-y against a contraction of 0.1 mb/d in March. Similarly, residual fuel requirements recorded annual growth of 47 tb/d in April. Diesel demand shrank by 0.1 m/d in April, against annual growth of 3 tb/d in March.

Gasoline demand contracted for the second consecutive month by 0.1 mb/d y-o-y from a 60 tb/d annual decline in March. Diesel demand also contracted by 0.1 mb/d in April after an annual decline of 10 tb/d in March. Finally, jet kerosene demand nosedived by 10 tb/d in April against annual growth of 50 tb/d in March.

**Table 4 - 5: Japan's oil demand, mb/d**

By product	May 21	May 22	Change Growth	May 22/May 21 %
LPG	0.35	0.49	0.13	37.5
Naphtha	0.69	0.58	-0.11	-15.5
Gasoline	0.68	0.69	0.01	1.7
Jet/kerosene	0.23	0.24	0.02	6.9
Diesel	0.60	0.63	0.03	4.8
Fuel oil	0.19	0.21	0.02	12.3
Other products	0.20	0.07	-0.13	-66.7
<b>Total</b>	<b>2.93</b>	<b>2.90</b>	<b>-0.03</b>	<b>-0.9</b>

Note: Totals may not add up due to independent rounding. Sources: JODI, METI and OPEC.

### Near-term expectations

After growth of 0.2 mb/d in 1Q22, y-o-y, the economy of the region is expected to continue with its rather slow pace of growth at an annual 2.3%. This will affect both manufacturing activity and mobility. Furthermore, the current COVID-19 containment measures are expected to impact supply chain activity.

Despite the slow economic growth and the state of the COVID-19 pandemic in the region, the gradual economic and mobility recovery in the region, combined with improvements in aviation activity could boost gasoline and jet kerosene demand and provide additional support for oil demand in 2022. Currently, South Korea's government subsidy rate hike and rapid removal of COVID-19 restrictions may lead to higher demand for the middle distillate fuels over the peak summer driving season. Similarly, the Japanese government has introduced subsidies on gasoline prices. Improvements in the aviation industry will also support the demand for jet kerosene in the region. Overall, the oil demand in the region is forecast to remain flat at 0.1 mb/d, annually in 2022.

In 2023, the region is expected to have an improvements in its COVID-19 situation and also record improvements in the economic growth in most of the major oil consuming countries in the region. Furthermore, supply chain bottlenecks are also expected to ease further. Therefore, mobility and industrial activity are expected to improve gradually; these factor combined with air travel recovery will support oil demand growth in the region in 2023. The region is forecast to grow by 40 tb/d, annually in 2023.

## Non-OECD

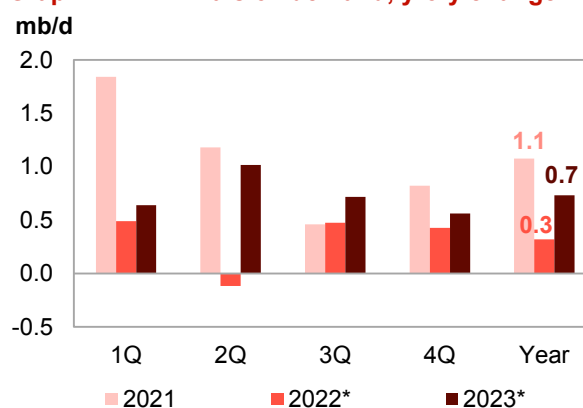
### China

#### Update on the latest developments

Although **Chinese oil demand** started to show signs of improvement, the latest data show a contraction in oil demand for two consecutive months, April and May. In May, China's oil demand nosedived by 0.3 mb/d, about 2.2% annually. Nonetheless, it is an improvement m-o-m, when compared with 0.8 mb/d annual decline in April. Chinese diesel demand saw a minor recovery in May as Shanghai started ending city-wide lockdowns; diesel consumption grew by 70 tb/d annually in May following a contraction of 0.2 mb/d in April. Even though the lockdowns in Shanghai were relaxed, lingering mobility restrictions across the country weighed on gasoline demand in May and recorded a contraction of about 0.2 mb/d, or 6%. It is still an improvement on a monthly basis compared to the 0.3 mb/d contraction in April.

On the back of petrochemical and household requirements for light distillates, naphtha and LPG demand has marginally improved. While naphtha posted growth of 0.1 mb/d, LPG grew by 80 tb/d annually. Domestic air travel demand is slowly recovering – domestic passenger flights averaged 4,100 in May but remain far below the 10,000 flights recorded before the COVID-19 resurgence in March. Accordingly, jet kerosene demand is still yet to recover from slowdown in April. In May jet kerosene demand declined by 0.4 mb/d annually. Residual fuel oil demand y-o-y growth improved on monthly basis from 20 tb/d in April to 90 tb/d in May.

**Graph 4 - 4: China's oil demand, y-o-y change**



Note: \* 2022-2023 = Forecast. Source: OPEC.

**Table 4 - 6: China's oil demand\*, mb/d**

By product	May 21	May 22	Change May 22/May 21	
			Growth	%
LPG	2.27	2.35	0.08	3.5
Naphtha	1.08	1.18	0.10	8.8
Gasoline	3.32	3.14	-0.18	-5.6
Jet/kerosene	0.92	0.52	-0.41	-44.2
Diesel	3.15	3.22	0.07	2.3
Fuel oil	0.63	0.72	0.09	14.7
Other products	2.12	2.08	-0.04	-1.9
<b>Total</b>	<b>13.49</b>	<b>13.20</b>	<b>-0.29</b>	<b>-2.2</b>

Note: \* Apparent oil demand. Totals may not add up due to independent rounding.

Sources: Argus Global Markets, China OGP (Xinhua News Agency), Facts Global Energy, JODI, National Bureau of Statistics China and OPEC.

#### Near-term expectations

China's oil demand in April and May continued to decline due to the extension of the zero-COVID-19 policy. In 2Q22, oil demand is expected to contract by 0.1 mb/d from relatively strong annual growth of 0.5 mb/d in 1Q22. Nevertheless, as China proceeds with COVID-19 containment measures, there is some hope that the situation will improve. Combined with expected improvements in GDP growth in 3Q22, the government is also keen to support the economy with stimulus packages.

Overall, mobility is expected to start improving, supply chain bottlenecks are also expected to gradually ease with the expected relaxation of mobility restrictions, thereby supporting the country's industrial sector activity. In 3Q22, oil demand is expected to improve and reach 0.5 mb/d annual growth. Demand is expected to be driven by gasoline resulting from pent-up demand due to COVID-19 lockdowns. Diesel demand is also expected to support gradual improvements in manufacturing and trucking activities during 3Q22. However, in 4Q22, oil demand growth will slow by 0.1 mb/d to 0.4 mb/d annually. In 4Q22, festivities are expected to boost requirements for diesel to support manufacturing requirements for the global market and domestically. However, risks are skewed to the downside due to uncertainties about the COVID-19 containment measures, particularly during 4Q22.

In 2023, China is projected to fully contain the menace of COVID-19, the country should also resume back to its normal economic growth trajectory; with rejuvenation of its industrial activity and ease of trade related bottlenecks. Mobility and air travels are also expected to pick up in China. By 2Q23, China is expected to record a strong oil demand growth of 1.0 mb/d, strongly supported by transportation fuels; gasoline and transportation diesel. Similarly, petrochemical feedstock and jet fuel are also going to support the oil demand recovery in 2023. In 2023, China is forecast to grow by 0.7 mb/d y-o-y, to average 16.0 mb/d.

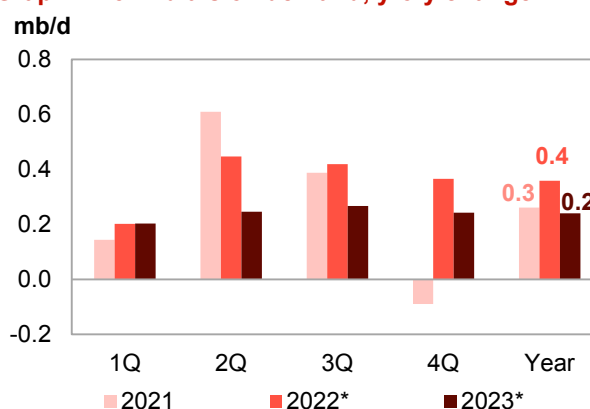
## India

### Update on the latest developments

**India's oil demand** jumped 0.8 mb/d, increasing by 22% annually in May from growth of 0.5 mb/d in April, supported by strong economic growth of 7.1% and a continuing recovery from the Omicron variant of COVID-19 as well as a relatively low baseline for the same period in 2021. Demand for diesel, the most widely used oil product in India, rose from 0.2 mb/d in April to 0.4 mb/d in May, y-o-y, the equivalent of 11%. The demand for diesel is higher due to a rise in small-scale industry requirements and the beginning of the harvest season that requires diesel for trucking. Similarly, the firmer demand for diesel was encouraged by lower retail prices after taxes were cut to curb inflation. On the back of a strong mobility recovery, gasoline demand grew by 0.3 mb/d, 48% annually in May.

Gasoline demand growth in May was comparatively higher than the growth of 0.2 mb/d recorded in April. Furthermore, demand was supported by a surge in summer travel to colder areas of the country to escape from the heat and vacations during annual breaks at educational institutions. As the aviation sector opens up, India's overall passenger traffic (both domestic and international) at airports reached 93% of pre-COVID-19 levels in May 2022. Accordingly, jet kerosene demand grew by 70 tb/d, about 32% annually – higher than the 40 tb/d annually recorded in April. However, naphtha contracted by 90 tb/d annually and LPG did not see any sign of improvement in May. Other products recorded strong growth of 0.2 mb/d annually in May.

**Graph 4 - 5: India's oil demand, y-o-y change**



Note: \* 2022-2023 = Forecast. Source: OPEC.

**Table 4 - 7: India's oil demand, mb/d**

By product	May 21	May 22	Change May 22/May 21	
			Growth	%
LPG	0.93	0.93	0.00	0.1
Naphtha	0.38	0.28	-0.09	-25.1
Gasoline	0.58	0.86	0.28	48.4
Jet/kerosene	0.20	0.27	0.07	32.5
Diesel	1.22	1.62	0.40	33.1
Fuel oil	0.18	0.21	0.03	14.3
Other products	0.28	0.43	0.15	53.9
<b>Total</b>	<b>3.77</b>	<b>4.61</b>	<b>0.83</b>	<b>22.1</b>

Note: Totals may not add up due to independent rounding.

Sources: JODI, Petroleum Planning and Analysis Cell of India and OPEC.

## Near-term expectations

With strong economic growth of 7.1%, India's oil demand has been rising steadily since the country eased pandemic lockdowns. In 2Q22 and 3Q22, oil demand is expected to be firm and healthy. In 3Q22, oil demand is expected to grow by 0.4 mb/d on the back of healthy economic growth that will lend support for the industrial and agricultural sectors. Diesel demand is expected to be the main driver of oil demand in the 3Q22. Furthermore, mobility activity will be backed by social activities and the continued preference for using personal vehicles over public transport for safety reasons and to avoid heatwaves, implying firm gasoline demand. Additionally, a possible drop in fuel prices due to cuts in fuel taxes will provide additional support for gasoline and diesel demand. Jet kerosene is projected to be supported by improvements in Indian air travel.

Requirements from the residential and industrial sectors are expected to revive demand for light distillates. In 4Q22, oil demand growth is expected to remain at 0.4 mb/d annually. Overall in 2022, the oil demand is expected to grow on average by 0.4 mb/d. Finally, there are strong prospects for oil demand growth in the near future with risks skewed slightly to the upside.

After containment of COVID-19, India is poised to continue along its growth oil demand growth trajectory in 2023. On the back of strong GDP growth and vibrant small scale industrial activities, in 2023 India is forecast to grow by 0.2 mb/d. The 2023, oil demand growth will be strongly supported by mobility driven gasoline and diesel. Light distillates requirements from petrochemical and residential sectors are also expected to play a significant role in 2023 demand growth in India. Finally improvements in air travels will boost demand for jet fuels in 2023.

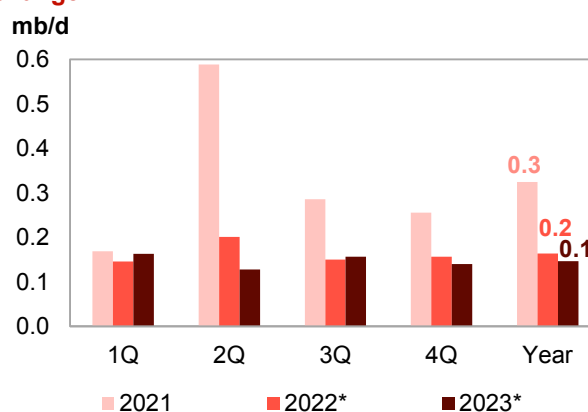
## Latin America

### Update on the latest developments

**Latin America's oil demand** increased further in April to rise by 0.3 mb/d y-o-y, above the 0.1 mb/d annually recorded in March, with transportation fuels accounting for most of the growth. April oil demand growth in the region was largely supported by gasoline and jet kerosene. Gasoline increased by 0.1 mb/d, equal to 17% annually, relatively higher than the 0.1 mb/d y-o-y growth in March. Jet kerosene demand increased by 70 tb/d in April against 40 tb/d in March 2022. On a positive note, diesel recorded growth of 10 tb/d, y-o-y in April, compared to a contraction of 10 tb/d annually in March. However, the demand for light distillates – LPG and naphtha – is still sluggish and has not yet recovered from the negative growth recorded in March. Nevertheless, LPG has improved from the 30 tb/d decline in March to a 10 tb/d contraction in April.

Demand increased the most in Brazil (0.14 mb/d y-o-y) and Argentina (0.1 mb/d y-o-y), while other countries in the region posted marginal y-o-y gains. Mobility also improved in March and April as compared to 2020 levels. The manufacturing PMI in Brazil improved from -1.4% in March to -0.5% in April. In Argentina, the manufacturing PMI increased from 3% in March to 5% in April. These factors supported oil demand growth in the Latin American region in April 2022. According to data from IATA's April 2022 Air Passenger Monthly Analysis, Latin American carriers saw appreciable growth in international RPK growth, up 263.2%. Recovery to 2019 levels is progressing in the region, with increased passenger flows coming from Europe, the Middle East and between those regions.

**Graph 4 - 6: Latin America's oil demand, y-o-y change**



Note: \* 2022-2023 = Forecast. Source: OPEC.

### Near-term expectations

Despite the slowdown in the momentum of economic recovery in Latin America, with current GDP growth in the region pegged at 2.2%, the oil demand recovery will be supported by the acceleration in vaccinations and signs of improvement in mobility and the manufacturing PMI in the region's big consuming countries. Accordingly, the 0.1 mb/d annual oil demand growth recorded in 1Q22 is expected to slightly improve in 2Q22 and subsequent quarters to 0.2 mb/d, annually. The demand growth in the region is expected to be supported by gasoline and jet kerosene as mobility and air travels improves. The prospects for oil demand improvements in the region largely depend on the momentum of the economic recovery and the pace of containment of COVID-19 in several countries.

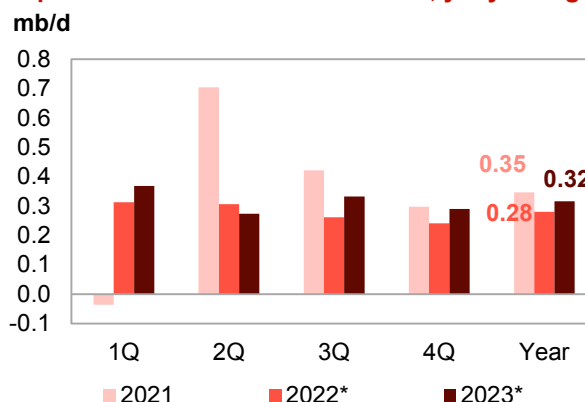
In 2023, the region is projected to improve significantly in its COVID-19 containment, economic growth in the region is also poised to improve significantly. These factors will back the mobility and industrial sector requirements for transportation fuels and other light distillates. In 1Q23, the oil demand is projected to remain at the same level of 0.2 mb/d, y-o-y growth. However, by 4Q23, the oil demand is projected to slow down to 0.1 mb/d, due to winter seasonal slow in demand in the region.

## Middle East

### Update on the latest developments

**Oil demand in Middle East** remained firm and continued to improve in April when compared to March 2022. The latest data indicates that oil demand grew by 0.5 mb/d in April, surpassing March by 0.2 mb/d. Oil demand was supported by firm GDP growth in the region's two large economies, Saudi Arabia and the United Arab Emirates (UAE). Mobility activity in the region has also improved significantly with the relaxation of COVID-19 restrictions. On the back of these developments, gasoline grew by 0.13 mb/d, 10% annual growth. The easing of COVID-19 restrictions also helped to reduce supply chain bottlenecks in region, thereby supporting construction and manufacturing activity, helping diesel to grow by 0.1 mb/d in April compared to 80 tb/d in March.

**Graph 4 - 7: Middle East's oil demand, y-o-y change**



Note: \* 2022-2023 = Forecast. Source: OPEC.

Middle Eastern airlines recorded a jump in air travel demand y-o-y in April 2022, with revenue passenger kilometres, or RPKs, higher than in March 2022. Accordingly, jet fuel posted growth of 0.14 mb/d in April, compared to 60 tb/d in March. Fuel oil also benefitted from direct burning in power generation and energy-intensive industries in the region. Fuel oil recorded growth of 0.12 mb/d in April, compared to 50 tb/d in March. However, LPG demand remained at 20 tb/d, annually, the same as March. The demand for naphtha is still sluggish, recording a contraction by 20 tb/d annually.

**Table 4 - 8: Saudi Arabia's oil demand, mb/d**

By product	May 21	May 22	Change May 22/May 21	
			Growth	%
LPG	0.05	0.06	0.01	17.4
Gasoline	0.46	0.48	0.03	5.8
Jet/kerosene	0.05	0.07	0.02	52.6
Diesel	0.46	0.54	0.08	17.7
Fuel oil	0.61	0.60	-0.01	-1.5
Other products	0.52	0.68	0.16	30.4
<b>Total</b>	<b>2.15</b>	<b>2.43</b>	<b>0.28</b>	<b>13.1</b>

Note: Totals may not add up due to independent rounding.

Sources: JODI and OPEC.

### Near-term expectations

Going forward, potential positives for oil demand projections in the Middle East are the upward possibilities for overall economic performance, which is anticipated to accelerate in 2H22. Saudi Arabia is expected to maintain strong GDP growth of 9.0% and the UAE 7.0%, GDP growth. In addition, demand is expected to be supported by the full containment of COVID-19 in the region and an expected uptick from the transportation, power and industrial sectors due to summer peak demand for gasoline and distillates. Furthermore, demand for air travel during the annual hajj, with more than 2 million pilgrims expected, will boost jet fuel and other distillates. Already, major airline operators in the region have increased their Saudi Arabian operations in response to large pilgrimage demand. In 3Q22, the demand for oil is expected to grow by 0.3 mb/d annually from 0.2 mb/d in 2Q22. Generally, the overall prospects for oil demand growth in the region are very strong, due to expected healthy GDP growth and successful COVID-19 management.

## World Oil Demand

In 2023, the region is projected to continue with its current strong economic growth momentum, mobility and industrial activity will benefit immensely from the strong economic growth in the region. Furthermore, air travels activity will continue improving in the region. These factors will drive the oil demand in 2023. In 1Q23, the region is forecast to grow by 0.4 mb/d, y-o-y, however, by 2Q23 though 4Q23, the oil demand will remain on average of 0.3 mb/d, annually.

## World Oil Supply

Non-OPEC liquids supply growth in 2022 (including processing gains) is forecast at 2.1 mb/d for an average of 65.7 mb/d, which is broadly unchanged from the previous assessment. The upward revisions to China and Canada were offset by downward revision to other countries. Russia's liquids production for the rest of the year poses large uncertainty. Labour, supply chain issues and cost inflation are the primary drivers of uncertainty in the US, however, the current rate of hydraulic fracturing and drilling in the major shale oil areas of the US could support production growth in the coming months. Robust growth in the US oil and gas rig count, as well as an estimated 1,000 monthly hydraulic fracturing operations have continued so far in 2022. Nevertheless, the US liquids supply growth forecast for 2022 was kept unchanged at 1.3 mb/d. The main drivers of liquids supply growth for the year are expected to be the US, Canada, Brazil, China, Kazakhstan and Guyana, while production is expected to decline mainly in Russia, Indonesia and Thailand.

Non-OPEC liquids production in 2023 is expected to grow by 1.7 mb/d to average 67.4 mb/d (including 70 tb/d in processing gains). Liquids supply in the OECD countries is forecast to increase next year by 1.4 mb/d, and the non-OECD region is forecast to grow by 0.2 mb/d. The main drivers for liquids supply growth are expected to be the US (1.1 mb/d), Norway, Brazil, Canada and Guyana, whereby the majority of the increase in the US and other countries is expected to come from current project ramp-ups. Nevertheless, uncertainty regarding the operational aspects of US production and the geopolitical situation in Eastern Europe remains high.

OPEC NGLs and non-conventional liquids production in 2022 is forecast to grow by 0.1 mb/d to average 5.39 mb/d. For 2023, it is forecast to grow by 50 tb/d to average 5.44 mb/d. OPEC-13 crude oil production in June increased by 234 tb/d m-o-m to average 28.72 mb/d, according to available secondary sources.

Preliminary non-OPEC liquids production in June, including OPEC NGLs, is estimated to have increased m-o-m by 1.1 mb/d to average 71.1 mb/d, and is up by 2.5 mb/d y-o-y. As a result, preliminary data indicates that global oil supply in June increased by 1.32 mb/d m-o-m to average 99.82 mb/d, up by 5.13 mb/d y-o-y.

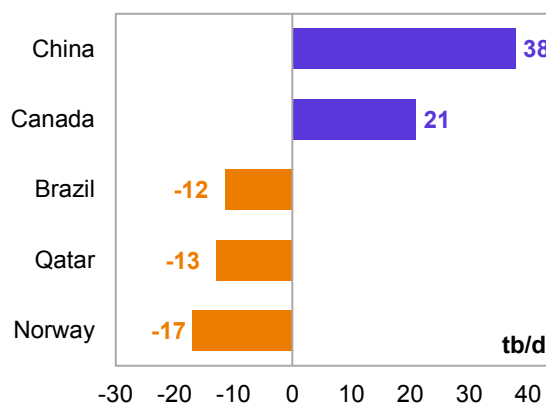
The **non-OPEC supply growth forecast for 2022** remained broadly unchanged from the previous assessment. Production declines in the Middle East and Latin America have been offset by some upward revisions in other countries. Non-OPEC supply is now expected to rise by 2.1 mb/d to average 65.7 mb/d for the year.

In the **OECD**, there have been minor upward and downward revisions in this month's assessment. The main upward adjustment was due to higher production during 2Q22 in Canada and other OECD Europe, which was partially compensated by lower output in Norway. Other OECD countries remained predominantly unchanged in terms of growth.

The **non-OECD** supply forecast for 2022 was revised down by 20 tb/d, mainly due to a downward revision for Latin America, the Middle East and other Asia. However, China accounted for the major upward revision this month.

With this, the non-OPEC liquids supply forecast for 2022 remained unchanged to average 65.7 mb/d, showing y-o-y growth of 2.1 mb/d.

**Graph 5 - 1: Major revisions to annual supply change forecast in 2022\*, MOMR Jul 22/Jun 22**

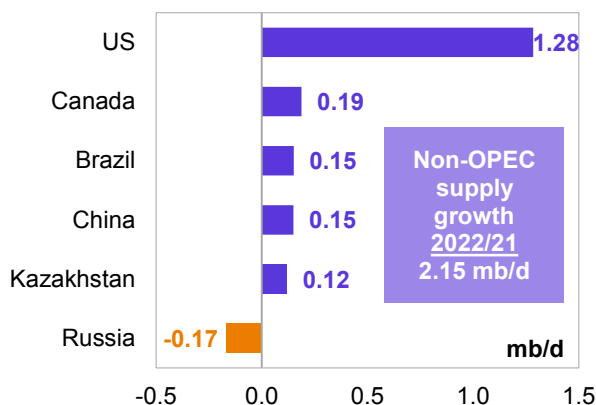


Note: \* 2022 = Forecast. Source: OPEC.

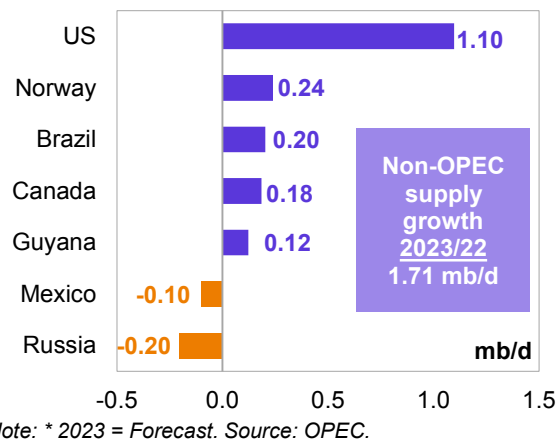
## Key drivers of growth and decline

The **key drivers of non-OPEC liquids supply growth in 2022** are projected to be the US, Canada, Brazil, China, Kazakhstan and Guyana, while oil production is expected to decline mainly in Russia, Thailand and Indonesia.

**Graph 5 - 2: Annual liquids production changes for selected countries in 2022\***



**Graph 5 - 3: Annual liquids production changes for selected countries in 2023\***



For **2023**, the key drivers of non-OPEC supply growth are forecast to be the US, Norway, Brazil, Canada and Guyana, while oil production is projected to decline mainly in Russia, Mexico and Azerbaijan.

## Non-OPEC liquids production in 2022 and 2023

**Table 5 - 1: Non-OPEC liquids production in 2022\*, mb/d**

Non-OPEC liquids production	2021	1Q22	2Q22	3Q22	4Q22	2022	Change 2022/21	
							Growth	%
<b>Americas</b>	25.16	25.86	26.35	26.95	27.46	26.66	1.50	5.97
of which US	17.75	18.26	18.94	19.27	19.67	19.04	1.28	7.23
<b>Europe</b>	3.76	3.73	3.58	3.79	4.12	3.81	0.05	1.27
<b>Asia Pacific</b>	0.51	0.49	0.52	0.56	0.54	0.53	0.01	2.80
<b>Total OECD</b>	<b>29.43</b>	<b>30.08</b>	<b>30.45</b>	<b>31.30</b>	<b>32.12</b>	<b>30.99</b>	<b>1.56</b>	<b>5.31</b>
<b>China</b>	4.31	4.49	4.49	4.42	4.43	4.46	0.15	3.49
<b>India</b>	0.77	0.77	0.78	0.80	0.83	0.79	0.02	2.72
<b>Other Asia</b>	2.41	2.37	2.36	2.36	2.35	2.36	-0.05	-1.90
<b>Latin America</b>	5.95	6.14	6.22	6.21	6.43	6.25	0.30	4.96
<b>Middle East</b>	3.24	3.29	3.31	3.38	3.38	3.34	0.10	3.14
<b>Africa</b>	1.35	1.33	1.29	1.31	1.32	1.31	-0.03	-2.55
<b>Russia</b>	10.80	11.33	10.63	10.29	10.29	10.63	-0.17	-1.57
<b>Other Eurasia</b>	2.93	3.06	2.91	3.17	3.22	3.09	0.16	5.38
<b>Other Europe</b>	0.11	0.11	0.11	0.10	0.10	0.11	-0.01	-6.36
<b>Total Non-OECD</b>	<b>31.87</b>	<b>32.88</b>	<b>32.10</b>	<b>32.04</b>	<b>32.35</b>	<b>32.34</b>	<b>0.47</b>	<b>1.47</b>
<b>Total Non-OPEC production</b>	61.30	62.96	62.54	63.34	64.48	63.33	2.03	3.32
<b>Processing gains</b>	2.29	2.40	2.40	2.40	2.40	2.40	0.11	4.90
<b>Total Non-OPEC liquids production</b>	<b>63.59</b>	<b>65.36</b>	<b>64.94</b>	<b>65.74</b>	<b>66.88</b>	<b>65.73</b>	<b>2.15</b>	<b>3.37</b>
<b>Previous estimate</b>	63.60	65.37	64.80	65.79	67.00	65.74	2.15	3.38
<b>Revision</b>	-0.01	-0.01	0.14	-0.05	-0.12	-0.01	0.00	0.00

Note: \* 2022 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.



Table 5 - 2: Non-OPEC liquids production in 2023\*, mb/d

Non-OPEC liquids production	2022	1Q23	2Q23	3Q23	4Q23	2023	Change 2022/21	
							Growth	%
Americas	26.66	27.65	27.59	27.88	28.24	27.84	1.18	4.43
of which US	19.04	19.85	20.06	20.20	20.43	20.14	1.10	5.77
Europe	3.81	4.14	4.05	3.96	4.06	4.05	0.25	6.46
Asia Pacific	0.53	0.54	0.50	0.53	0.49	0.51	-0.01	-2.20
<b>Total OECD</b>	<b>30.99</b>	<b>32.32</b>	<b>32.15</b>	<b>32.37</b>	<b>32.79</b>	<b>32.41</b>	<b>1.41</b>	<b>4.56</b>
China	4.46	4.51	4.50	4.47	4.47	4.49	0.03	0.64
India	0.79	0.82	0.81	0.80	0.78	0.80	0.01	1.08
Other Asia	2.36	2.36	2.32	2.29	2.27	2.31	-0.05	-1.96
Latin America	6.25	6.40	6.60	6.69	6.75	6.61	0.36	5.82
Middle East	3.34	3.37	3.39	3.40	3.40	3.39	0.05	1.49
Africa	1.31	1.32	1.34	1.35	1.37	1.35	0.04	2.69
Russia	10.63	10.42	10.41	10.42	10.46	10.43	-0.20	-1.93
Other Eurasia	3.09	3.19	3.06	3.00	3.09	3.08	-0.01	-0.27
Other Europe	0.11	0.10	0.10	0.10	0.10	0.10	0.00	-2.83
<b>Total Non-OECD</b>	<b>32.34</b>	<b>32.49</b>	<b>32.54</b>	<b>32.54</b>	<b>32.70</b>	<b>32.57</b>	<b>0.22</b>	<b>0.69</b>
<b>Total Non-OPEC production</b>	<b>63.33</b>	<b>64.81</b>	<b>64.68</b>	<b>64.90</b>	<b>65.49</b>	<b>64.97</b>	<b>1.64</b>	<b>2.59</b>
Processing gains	2.40	2.47	2.47	2.47	2.47	2.47	0.07	2.96
<b>Total Non-OPEC liquids production</b>	<b>65.73</b>	<b>67.28</b>	<b>67.15</b>	<b>67.37</b>	<b>67.96</b>	<b>67.44</b>	<b>1.71</b>	<b>2.60</b>
Previous estimate	65.74	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Revision	-0.01	67.28	67.15	67.37	67.96	67.44	1.71	2.60

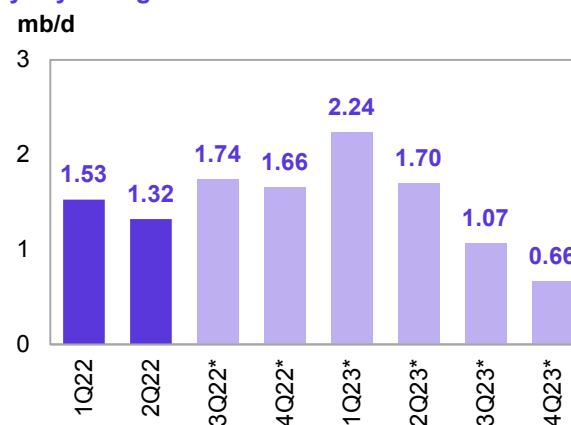
Note: \* 2022-2023 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.

## OECD

OECD liquids production in 2022 is forecast to increase by 1.6 mb/d y-o-y to average 31 mb/d. This has been revised up by a minor 19 tb/d, compared to a month earlier, on the back of upward revisions for Canada and other OECD Europe, and was partially offset by lower-than-expected output in Norway. OECD Americas was revised up by a minor 22 tb/d, compared to last month's assessment.

Based on these revisions, OECD Americas is forecast to grow by 1.5 mb/d to average 26.7 mb/d. Oil production in OECD Europe and OECD Asia Pacific is anticipated to grow y-o-y by 48 tb/d and 14 tb/d to average 3.8 mb/d and 0.5 mb/d, respectively.

Graph 5 - 4: OECD quarterly liquids supply, y-o-y changes



Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

For 2023, oil production in the OECD is likely to grow by 1.4 mb/d to average 32.4 mb/d, with growth from OECD Americas of 1.2 mb/d to average 27.8 mb/d. Yearly oil production in OECD Europe is anticipated to grow by 0.2 mb/d to average 4.0 mb/d, while OECD Asia Pacific is expected to decline by 15 tb/d y-o-y to average 0.5 mb/d.

## OECD Americas

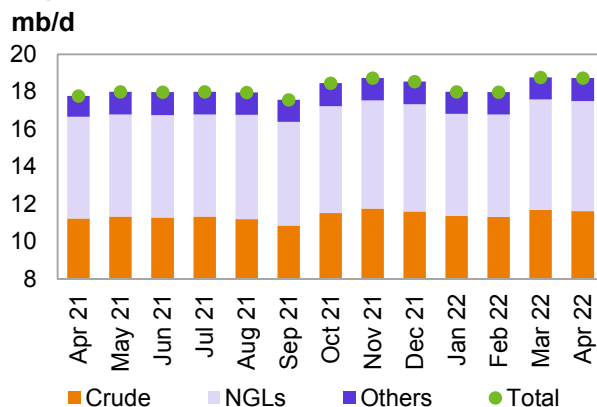
### US

US liquids production declined by a minor 40 tb/d m-o-m in April 2022 to average 18.7 mb/d and was higher by 0.9 mb/d compared with April 2021.

**Crude oil and condensate production** declined in **April 2022** by 60 tb/d m-o-m to average 11.6 mb/d, and was up by 0.4 mb/d y-o-y.

Regarding the **crude and condensate production breakdown by region (PADDs)**, production increased mainly in the US Gulf Coast (USGC), up by 151 tb/d to average 8.4 mb/d. The Rocky Mountains and East Coast showed slight decreases, while the West Coast remained broadly unchanged. However, declines of 195 tb/d were recorded in the Midwest (North Dakota). Production growth in the main regions was primarily due to the better weather conditions and higher drilling activities, while the April blizzards in North Dakota were the main source of production declines this month.

**Graph 5 - 5: US monthly liquids output by key component**



Source: OPEC.

**NGL production** was down by 32 tb/d m-o-m to average 5.9 mb/d in April, which was higher by 0.4 mb/d y-o-y. Production of non-conventional liquids (mainly ethanol) increased by 52 tb/d m-o-m to average 1.2 mb/d in April, according to the US Department of Energy (DoE). Preliminary estimates see non-conventional liquids averaging 1.2 mb/d in May 2022, up by 25 tb/d compared to the previous month.

**Production in the Gulf of Mexico (GoM)** recovered m-o-m by 72 tb/d in April to average 1.8 mb/d on the back of a partial return from maintenance in the Shell platforms, while in the **onshore lower 48**, April production decreased m-o-m by 134 tb/d to average 9.4 mb/d.

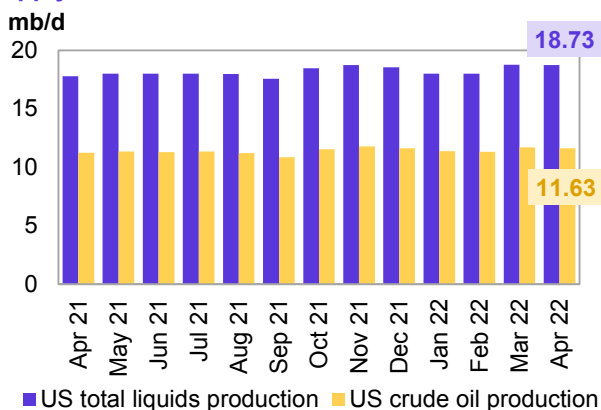
Looking at **individual states**, oil production in New Mexico increased by 39 tb/d m-o-m to average 1.5 mb/d, 333 tb/d higher than a year ago. Production in Texas was up by 35 tb/d to average 5.0 mb/d, 178 tb/d higher than a year ago. Production in North Dakota decreased by 214 tb/d m-o-m to average 0.9 mb/d, down by 143 tb/d y-o-y. Production in Oklahoma was up by 8 tb/d to average 0.4 mb/d. Oil output in Alaska remained broadly unchanged, while Colorado showed a marginal m-o-m decline of 13 tb/d.

**Table 5 - 3: US crude oil production by selected state and region, tb/d**

State				Change	
	Apr 21	Mar 22	Apr 22	m-o-m	y-o-y
Texas	4,837	4,980	5,015	35	178
Gulf of Mexico (GOM)	1,768	1,691	1,763	72	-5
New Mexico	1,174	1,468	1,507	39	333
North Dakota	1,037	1,108	894	-214	-143
Alaska	446	440	442	2	-4
Colorado	403	434	421	-13	18
Oklahoma	399	410	418	8	19
<b>Total</b>	<b>11,230</b>	<b>11,688</b>	<b>11,628</b>	<b>-60</b>	<b>398</b>

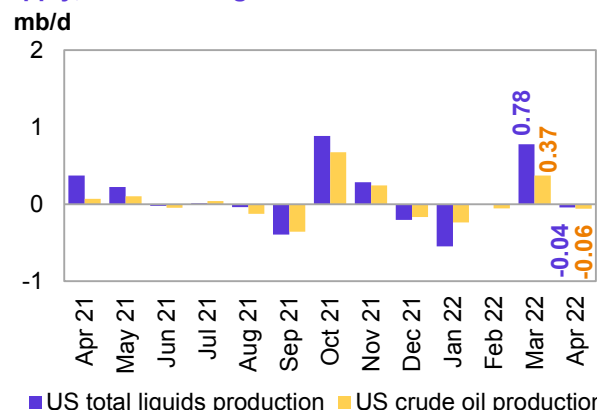
Sources: EIA and OPEC.

**Graph 5 - 6: US monthly crude oil and total liquids supply**



Sources: EIA and OPEC.

**Graph 5 - 7: US monthly crude oil and total liquids supply, m-o-m changes**



Sources: EIA and OPEC.

**US tight crude output in April 2022** increased by 85 tb/d m-o-m to average 7.8 mb/d, which was 0.6 mb/d higher than the same month a year earlier, according to EIA estimates.

The m-o-m increase from shale and tight formations through horizontal wells came mostly from the Permian, which increased by 50 tb/d to average 4.6 mb/d. This was up by 0.5 mb/d, y-o-y.

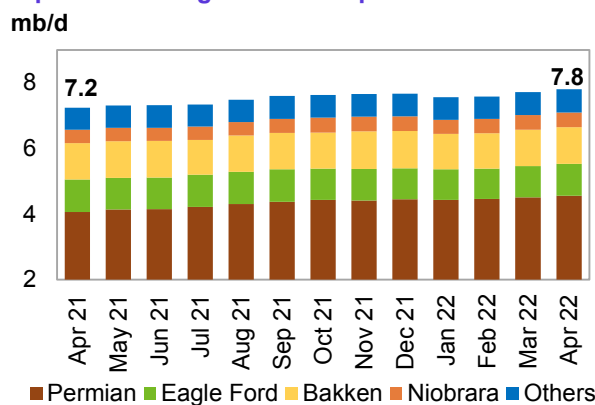
In the Williston Basin, production in the Bakken shale increased marginally by 13 tb/d to average 1.1 mb/d, up by a minor 10 tb/d, y-o-y. Tight crude output at Eagle Ford in Texas rose by 23 tb/d to average 1.0 mb/d down by 28 tb/d y-o-y, while production in Niobrara-Codell in Colorado and Wyoming was down marginally by 8 tb/d to average 0.4 mb/d.

**US liquids production in 2022**, excluding processing gains, is forecast to grow y-o-y by 1.3 mb/d to average 19.0 mb/d, unchanged from the previous assessment.

The 2022 gains are due primarily to expected tight crude production growth of 0.9 mb/d, to average 8.2 mb/d, NGL growth, mainly from unconventional basins, of 0.4 mb/d, to average 5.8 mb/d, and projected growth of 0.1 mb/d in the GoM. Non-conventional liquids are projected to grow by 40 tb/d to average 1.2 mb/d.

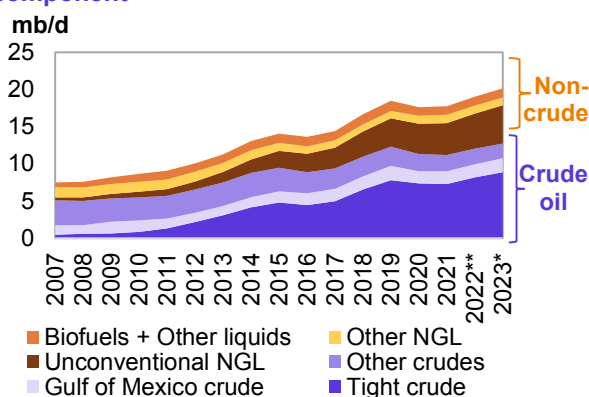
However, the expected growth will be partially offset by natural declines in onshore conventional fields of 0.1 mb/d y-o-y.

**Graph 5 - 8: US tight crude output breakdown**



Sources: EIA, Rystad Energy and OPEC.

**Graph 5 - 9: US liquids supply developments by component**



Note: \* 2022-2023 = Forecast.  
Source: OPEC.

Given the current pace of drilling and well completions in oil fields, **production of crude oil and condensate** is forecast to grow by 0.8 mb/d y-o-y to average 12.0 mb/d in 2022. This forecast assumes ongoing capital discipline, current inflation rates, continuing supply chain issues and the oil field service section limitations (labour and equipment).

**US liquids production in 2023**, excluding processing gains, is expected to grow by 1.1 mb/d y-o-y to average 20.1 mb/d, assuming the current level of drilling activities and lower supply chain issues in the prolific Permian Basin, Eagle Ford and Bakken shale sites. Crude oil output is anticipated to jump by 0.7 mb/d y-o-y to average 12.7 mb/d. At the same time, NGL production and non-conventional liquids, particularly ethanol, are projected to increase by 0.4 mb/d and 40 tb/d y-o-y to average 6.2 mb/d and 1.3 mb/d, respectively. Average tight crude output in 2023 is expected at 8.9 mb/d, up by 0.7 mb/d.

**Table 5 - 4: US liquids production breakdown, mb/d**

US liquids	Change		Change		Change	
	2021	2021/20	2022*	2022/21	2023*	2023/22
<b>Tight crude</b>	7.29	-0.04	8.18	0.88	8.89	0.71
<b>Gulf of Mexico crude</b>	1.70	0.06	1.77	0.06	1.86	0.09
<b>Conventional crude oil</b>	2.19	-0.11	2.10	-0.09	2.00	-0.10
<b>Total crude</b>	<b>11.19</b>	<b>-0.10</b>	<b>12.04</b>	<b>0.85</b>	<b>12.74</b>	<b>0.70</b>
<b>Unconventional NGLs</b>	4.28	0.20	4.70	0.42	5.12	0.42
<b>Conventional NGLs</b>	1.12	0.03	1.10	-0.02	1.04	-0.05
<b>Total NGLs</b>	<b>5.40</b>	<b>0.22</b>	<b>5.80</b>	<b>0.40</b>	<b>6.16</b>	<b>0.36</b>
<b>Biofuels + Other liquids</b>	1.17	0.02	1.21	0.04	1.25	0.04
<b>US total supply</b>	<b>17.75</b>	<b>0.15</b>	<b>19.04</b>	<b>1.29</b>	<b>20.14</b>	<b>1.10</b>

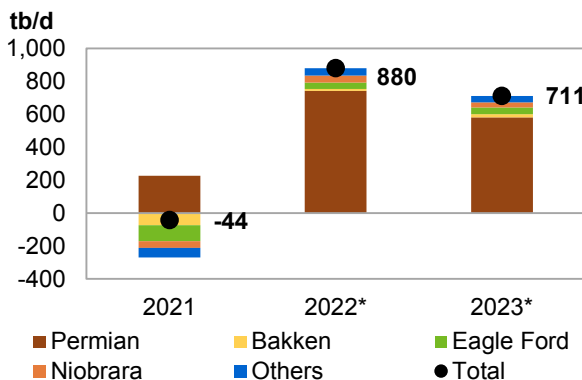
Note: \* 2022-2023 = Forecast. Sources: EIA, OPEC and Rystad Energy.

**US tight crude production** in the Permian in 2022 is estimated to have increased by 0.7 mb/d to 4.9 mb/d and is forecast to grow by 0.6 tb/d y-o-y to average 5.5 mb/d in 2023.

The negative growth in Bakken shale production during 2020 and 2021 is expected to change in 2022, and is now estimated to average 1.1 mb/d in 2022, which is still lower than the pre-pandemic average output of 1.4 mb/d. For 2022, tight crude production from the Bakken shale is forecast to grow by 11 tb/d on the back of increased drilling activity in North Dakota and available DUC wells, despite the impact of spring blizzards in April. Growth of 20 tb/d for 2023 is anticipated, to average 1.1 mb/d.

The Eagle Ford output in Texas recorded at 1.2 mb/d in 2019, experienced declines in 2020 and 2021, but is forecast to expand in 2022 by 39 tb/d to average 1.0 mb/d. Quite the same growth is expected for 2023, by 40 tb/d to average 1.0 mb/d.

**Graph 5 - 10: US tight crude output by shale play, y-o-y changes**



Note: \* 2022-2023 = Forecast.  
Sources: EIA, Rystad Energy and OPEC.

Production in the Niobrara, is forecast to grow by 43 tb/d in 2022 and 30 tb/d in 2023, y-o-y, to average 456 tb/d and 486 tb/d, respectively. Other shale plays are expected to show marginal increases totalling 45 tb/d and 40 tb/d in 2022 and 2023, given current drilling and completion activities.

**Table 5 - 5: US tight oil production growth, mb/d**

US tight oil	2021	Change 2021/20	2022*	Change 2022/21	2023*	Change 2023/22
Permian tight	4.15	0.23	4.89	0.74	5.47	0.58
Bakken shale	1.11	-0.07	1.12	0.01	1.14	0.02
Eagle Ford shale	0.96	-0.10	1.00	0.04	1.04	0.04
Niobrara shale	0.41	-0.04	0.46	0.04	0.49	0.03
Other tight plays	0.67	-0.06	0.72	0.05	0.76	0.04
<b>Total</b>	<b>7.29</b>	<b>-0.04</b>	<b>8.17</b>	<b>0.88</b>	<b>8.89</b>	<b>0.71</b>

Note: \* 2022-2023 = Forecast. Source: OPEC.

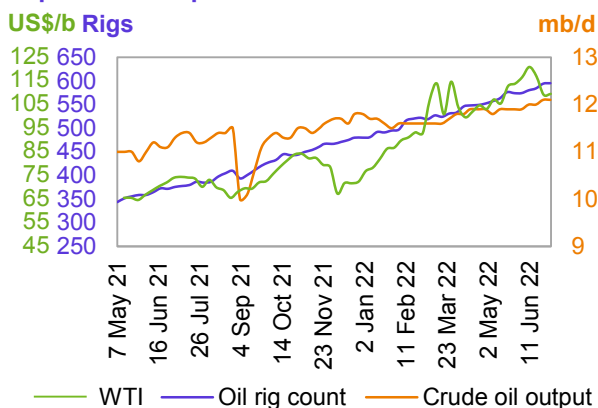
**US rig count, spudded, completed, DUC wells and fracking activity**

Total **US active drilling rigs** decreased by 3 units to 750 rigs in the week ending 1 July, but were up by 275 rigs compared to a year ago. The number of active offshore rigs rose by one w-o-w to 17, three rigs more than the same month in 2021. On the other hand, on shore oil and gas rigs dropped by four w-o-w to stand at 730 rigs, with three rigs in inland waters.

The **US horizontal rig count** was reduced by three rigs w-o-w to 682 rigs, compared with 429 horizontal rigs a year ago. The number of drilling rigs for oil climbed by one to 595 w-o-w, while gas drilling rigs were reduced by four to 153.

The rig count in the Permian remained unchanged w-o-w at 349 rigs. At the same time, the number of active rigs remained unchanged at 38 in the Williston basin and at 16 in the DJ-Niobrara basins. However, there were 4 fewer rigs in the Eagle Ford at 68 and 5 less in the Cana Woodford at 27. Four oil rigs have been operating in the Barnett basin.

**Graph 5 - 11: US weekly rig count vs. US crude oil output and WTI price**

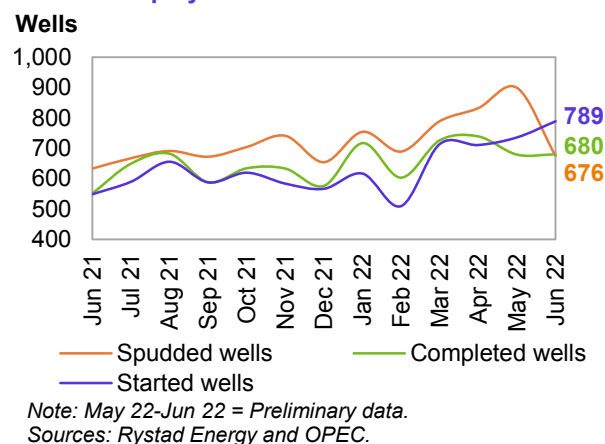


Sources: Baker Hughes, EIA and OPEC.

**Drilling and completion (D&C) activities** for spudded, completed and started wells in all US shale plays, based on the EIA-DPR regions, saw 863 horizontal wells spudded in May 2022 (as per preliminary data), up by 67 m-o-m, and 61% higher than in May 2021.

In May 2022, preliminary data indicates a lower number of completed wells at 679 m-o-m, but up by 15% y-o-y. Moreover, the number of started wells was estimated at 736, which is 36% higher than in May 2021. Preliminary data for June estimates 676 spudded, 680 completed and 789 started wells, according to Rystad Energy.

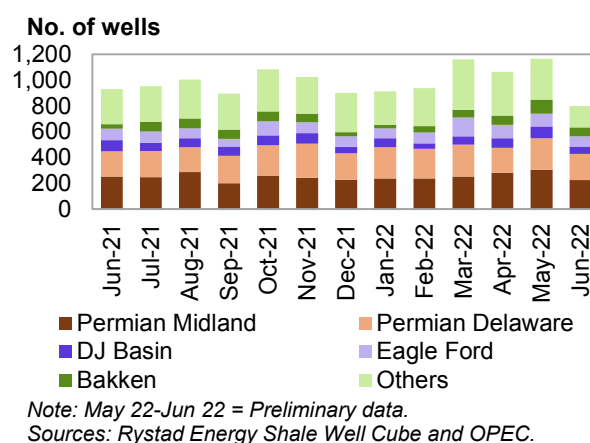
**Graph 5 - 12: Spudded, completed and started wells in US shale plays**



In terms of identified **US oil and gas fracking operations by region**, Rystad Energy reported that following a peak in January 2020, 1,160 well were fracked in April 2022, and 1,065 and 1,166 wells started to frack in May and June, respectively. These preliminary numbers are based on analysis of high-frequency satellite data.

Preliminary data on fracking in May shows that 305 and 243 wells were fracked in the Permian Midland Tight and Permian Delaware Tight, respectively. In comparison with April, there was a jump of 51 wells fracked in the Delaware and a rise of 23 wells fracked in the Midland tight, according to preliminary data. Data also indicated that 93 wells were fracked in the DJ Basin, 98 in the Eagle Ford and 110 in the Bakken during May.

**Graph 5 - 13: Fracked wells count per month**



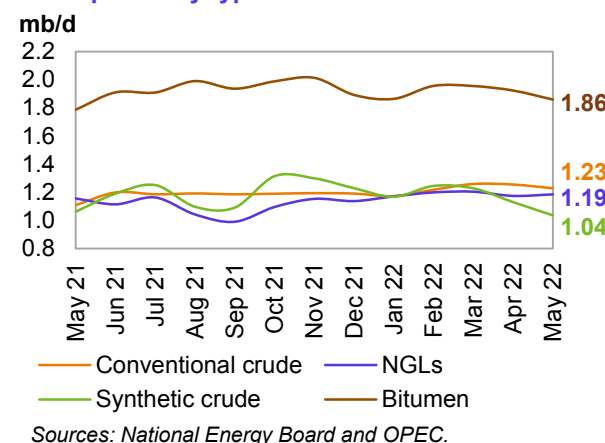
## Canada

**Canada's liquids production in May** is estimated to have declined by 173 tb/d m-o-m to average 5.3 mb/d. However, this drop was less than initially expected.

Crude bitumen production and synthetic crude output decreased by 64 tb/d and 94 tb/d, respectively. Taken together, crude bitumen and synthetic crude production declined by 158 tb/d to 3.0 mb/d. At the same time, production of conventional crude decreased slightly by 26 tb/d, while NGL output increased by 11 tb/d to average 1.2 mb/d each.

Non-mining crude oil and condensate production in Alberta touched 3.2 mb/d in April on the back of robust thermal oil sands output and conventional crude, however, due to the maintenance season the output was subjected to a 0.3 mb/d decline in May. Seasonal turnarounds in the main sand mine facilities started in April and are expected to reduce total output in 2Q22. However, project ramp-ups and optimization in oil sands output are expected to drive production in 4Q22.

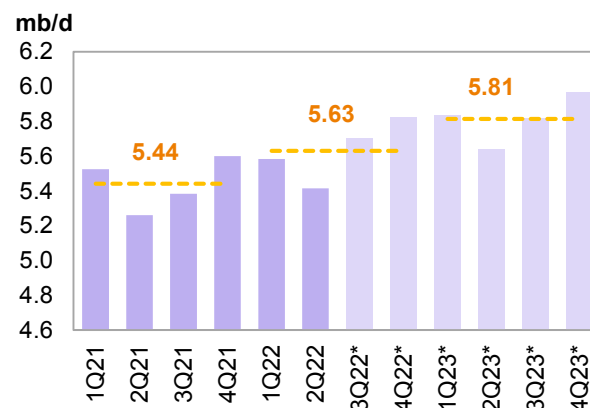
**Graph 5 - 14: Canada's monthly liquids production development by type**



Canadian liquids supply in **2022** is forecast to grow by 0.2 mb/d to average 5.6 mb/d, up by 20 tb/d compared to the previous assessment. Thermal oil sands projects are expected to increase output up to December, driven primarily by the return of Cenovus' Christina Lake SAGD project from maintenance in 2Q22 and continued production ramp-ups at CNOOC's Long Lake southwest expansion.

For **2023**, Canada's liquids production is forecast to gradually increase at a similar pace compared with 2022, rising by 0.2 mb/d to average 5.8 mb/d. Incremental production will come mainly from Alberta's oil sands, which saw average output of 3.1 mb/d in 1Q22 before the beginning of the turnarounds.

**Graph 5 - 15: Canada's quarterly liquids production and forecast**



Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

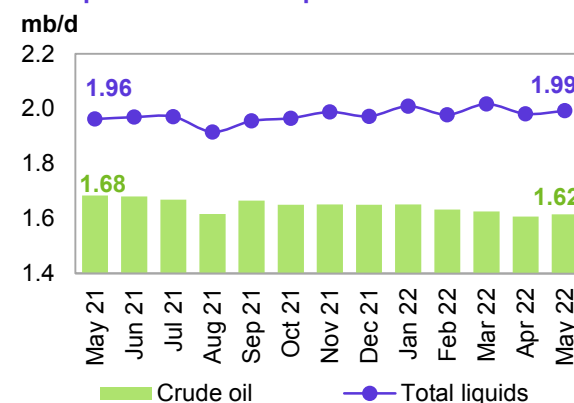
## Mexico

Mexico's crude output rose slightly in **May** by 9 tb/d to average 1.6 mb/d, while NGL output increased by a minor 2 tb/d. Therefore, Mexico's total liquids output in May increased by 11 tb/d m-o-m to average 1.99 mb/d, according to national oil company Pemex.

For **2022**, liquids production in Mexico is forecast to grow by 30 tb/d to average 2.0 mb/d, unchanged from the previous month. Production from new projects like Esah and Suuk is forecast to support production ramp-ups from Ichalkil-Pokoch, Area 1, Hokchi, Hok and Mulach, all located offshore.

For **2023**, liquids production is forecast to decline by 0.1 mb/d to average 1.9 mb/d. Pemex' total crude production decline in mature fields like Ku-Maloob-Zaap, Abkatun-Pol-Chuc, and Integral Yaxche-Xanab is forecast to outweigh production ramp-ups in Area-1 and Hokchi.

**Graph 5 - 16: Mexico's monthly liquids and crude production development**



Sources: PEMEX and OPEC.

## OECD Europe

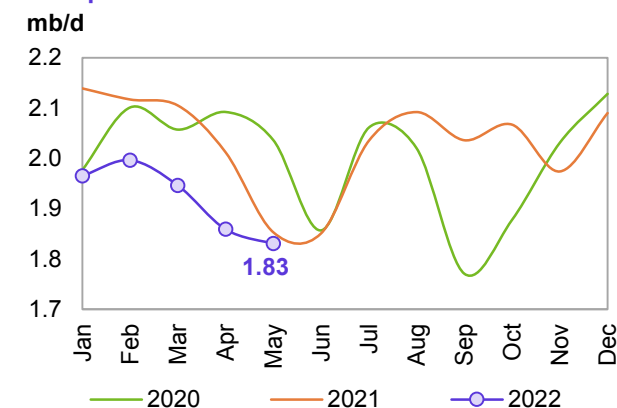
### Norway

Norwegian liquids production in **May** declined by 28 tb/d m-o-m to average 1.8 mb/d. This was due to summer maintenance in offshore platforms and some operators prioritizing gas production.

Norway's crude production decreased by 43 tb/d m-o-m in May to average 1.6 mb/d, down by 49 tb/d y-o-y. Oil production in May was 2.4% lower than the Norwegian Petroleum Directorate's (NPD) forecast.

On the other hand, production of NGLs and condensates marginally increased by 15 tb/d m-o-m to average 0.2 mb/d, according to NPD data.

**Graph 5 - 17: Norway's monthly liquids production development**



Sources: NPD and OPEC.

For **2022**, growth forecast has been revised down by 17 tb/d m-o-m based on lower-than-expected output for 2Q22. Production is now expected to grow by 25 tb/d y-o-y and average 2.1 mb/d. Njord and Nova are two main start-ups this year that continue to ramp up gradually. Growth is expected in 4Q22 with the return from maintenance and when the second phase of the Johan Sverdrup field development starts production.

For **2023**, Norwegian liquids production is forecast to grow by 0.24 mb/d to average 2.3 mb/d. Plenty of small-to-large projects are scheduled to ramp up in 2023 in the Njord, Nova, Ringhorne, Alvheim, Oseberg and Snohvit fields, however the Johan Sverdrup is projected to be the main source of output increases for the year.

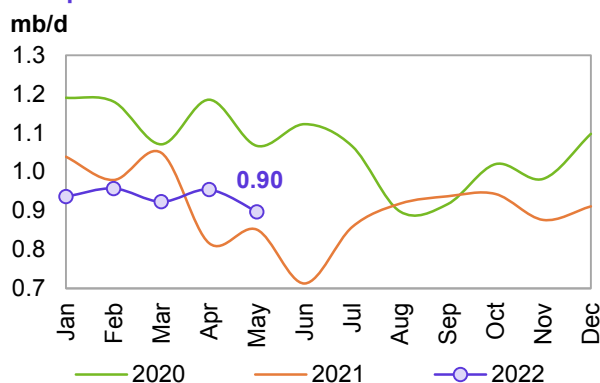
## UK

**UK liquids production** decreased in **May** by 57 tb/d m-o-m to average 0.9 mb/d. Crude oil output decreased by 47 tb/d m-o-m to average 0.8 mb/d, according to official data, and was up by 23 tb/d y-o-y. NGL output was also down slightly by 10 tb/d to 82 tb/d.

For **2022**, UK liquids production is forecast to grow by 30 tb/d to average 0.94 mb/d, up by a minor 9 tb/d m-o-m, due to a revision to 1Q22, and following two consecutive years of heavy declines. Low investment levels, COVID-19-related delays and poor mature reservoir performance have pressured the growth forecast.

For **2023**, UK liquids production is forecast to stay steady for an average of 0.94 mb/d. Production ramp-ups will be seen in the Penguins oil field (Redevelop), ETAP, Clair, the Schiehallion quad and at some other small fields. However, liquids production in the UK is expected to continue to face challenges, given an inadequate number of new projects and low investment levels.

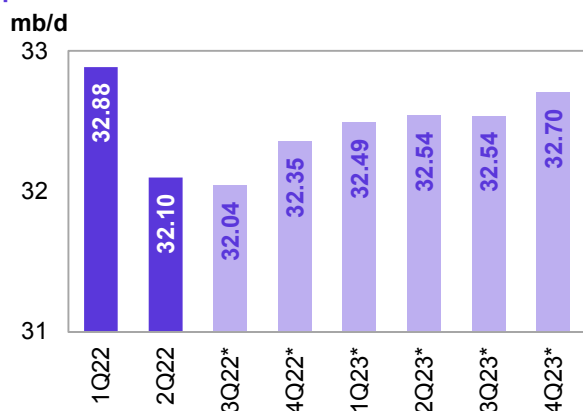
**Graph 5 - 18: UK monthly liquids production development**



Sources: Department of Energy & Climate Change and OPEC.

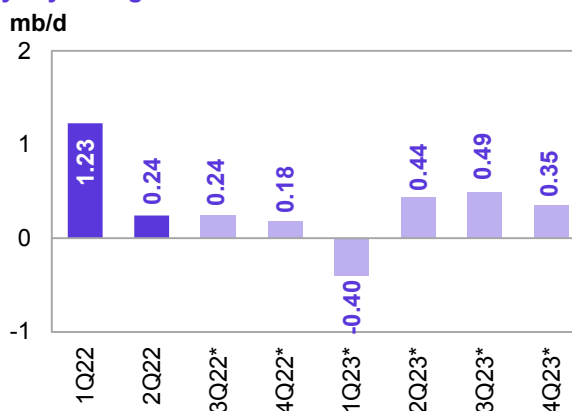
## Non-OECD

**Graph 5 - 19: Non-OECD quarterly liquids production and forecast**



Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

**Graph 5 - 20: Non-OECD quarterly liquids supply, y-o-y changes**

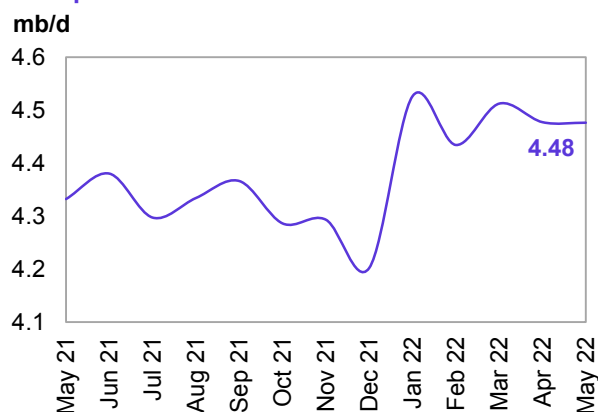


Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

## China

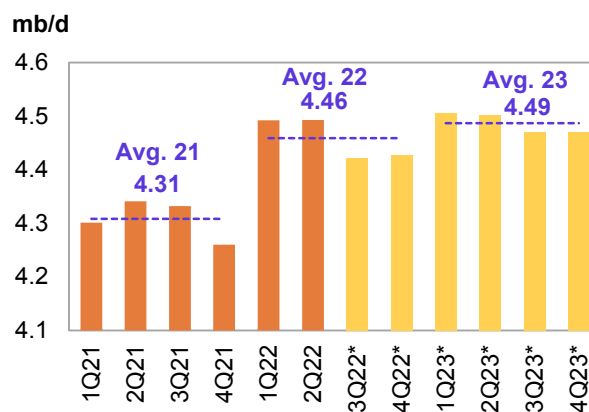
**China's liquids production** remained unchanged m-o-m in **May** to average 4.5 mb/d, which was up by 144 tb/d y-o-y, according to official data. Crude oil output in May averaged 4.1 mb/d, unchanged from the previous month, and higher by 127 tb/d y-o-y. Liquids production over the first five months of the year averaged 4.5 mb/d, higher by 5% compared to last year.

**Graph 5 - 21: China's monthly liquids production development**



Sources: CNPC and OPEC.

**Graph 5 - 22: China's quarterly liquids production and forecast**



Note: \* 3Q22-4Q23 = Forecast. Sources: CNPC and OPEC.

For **2022**, growth of 150 tb/d is forecast for an average of 4.5 mb/d, revised up by 38 tb/d on higher production expectations for 2Q22 and 3Q22 compared to the previous assessment. Natural decline rates are expected to be offset by Chinese companies' investments, leading to additional in-fill wells and EOR projects.

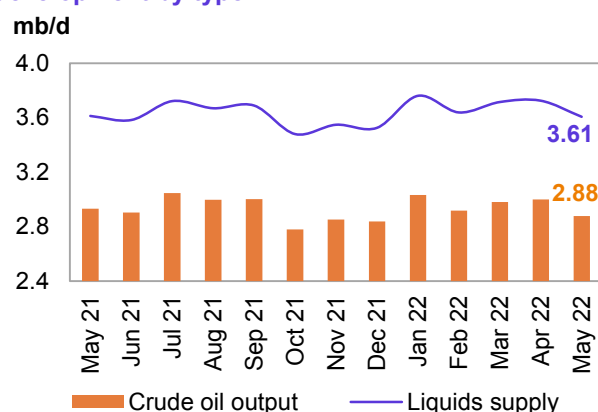
For **2023**, y-o-y growth of 30 tb/d is forecast for an average of 4.5 m/d. For the next year, Bozhong 29-6, Wushi 17-2 and Kenli 10-1N are planned to come on stream under CNOOC. At the same time, the main ramp-ups are expected from the Changqing, Jilin and Liaohe projects, which are managed by Petro China.

## Latin America

### Brazil

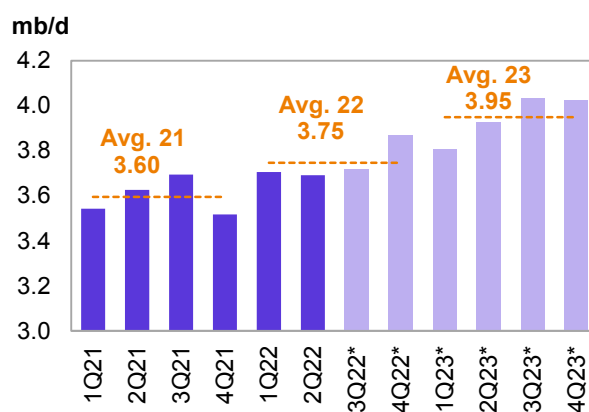
**Brazil's crude output in May** decreased by 121 tb/d m-o-m to average 2.9 mb/d. NGL production remained steady at average of 98 tb/d and is also expected to remain flat in June. Biofuel output (mainly ethanol) remained unchanged in May to average 632 tb/d, with preliminary data showing a flat trend in June as well. Therefore, in May, total liquids production decreased by 119 tb/d to average 3.6 mb/d, broadly unchanged y-o-y. This was mainly due to interruptions in offshore maintenance at the Tupi field.

**Graph 5 - 23: Brazil's monthly liquids production development by type**



Sources: ANP, Petrobras and OPEC.

**Graph 5 - 24: Brazil's quarterly liquids production**



Note: \* 3Q22-4Q23 = Forecast. Sources: ANP and OPEC.

For **2022**, Brazil's liquids supply, including biofuels, is forecast to increase by 0.2 mb/d y-o-y to average 3.8 mb/d, revised down by 12 tb/d, due to lower production in May. Growth in 2022 will be driven by the continued ramp-up of the Sepia field, which came online in August 2021, along with the start-ups of Mero 1 and Peregrino Phase 2 in the pre-salt Santos basin. FPSO Guanabara MV31 deployed for operations at the Mero Field in the giant pre-salt region of the Santos Basin off the coast of Brazil, achieved first oil production and started charter services on 1 May, according to the Offshore Magazine.

For **2023**, Brazil's liquids supply forecast, including biofuels, is forecast to increase by 0.2 mb/d y-o-y to average 3.9 mb/d. Crude oil output is expected to increase through production ramp-ups in the Mero

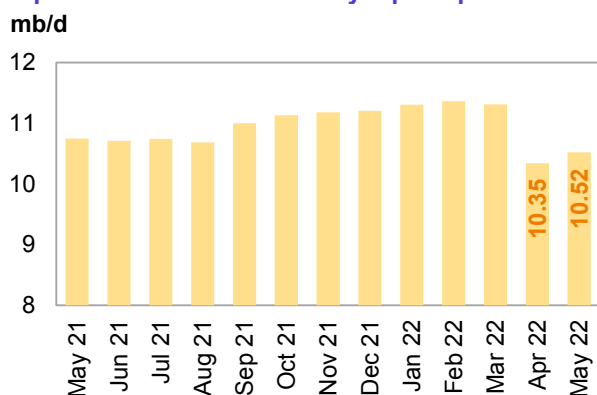


(Libra NW), Buzios (Franco), Tupi (Lula), Peregrino and Sepia fields. The Itapu (Florim) field discovered in 2013 in the Santos basin is expected to start up production in 2023 with peak capacity of 130 tb/d by 2025.

## Russia

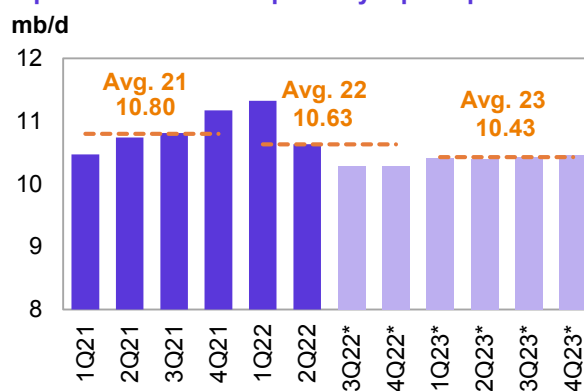
**Russia's liquids production in May** increased m-o-m by 175 tb/d to average 10.5 mb/d. This includes 9.3 mb/d of crude oil and condensate, and 1.3 mb/d of NGLs. A preliminary estimate for Russia's crude and condensate production in June 2022 shows an increase of 500 tb/d m-o-m for crude and condensate to average 9.8 mb/d, and around a 14 tb/d rise is expected for NGLs.

**Graph 5 - 25: Russia's monthly liquids production**



Sources: Nefte Compass, The Ministry of Energy of the Russian Federation and OPEC.

**Graph 5 - 26: Russia's quarterly liquids production**



Note: \* 3Q22-4Q23 = Forecast.

Sources: Nefte Compass and OPEC.

Russian liquids output in **2022** is forecast to decrease by 0.2 mb/d y-o-y to average 10.6 mb/d, unchanged from the previous month's assessment.

For **2023**, Russian liquids production is forecast to decrease by 0.2 mb/d to average 10.4 mb/d. It should be noted that the Russian oil forecast is subject to high uncertainty.

## Caspian

### Kazakhstan & Azerbaijan

**Liquids output in Kazakhstan** increased by 148 tb/d to average 1.9 mb/d in **May**. Crude production rose by 109 tb/d m-o-m to average 1.5 mb/d. Production of NGLs increased by 39 tb/d m-o-m to average 0.4 mb/d.

Kazakhstan's liquids supply forecast for **2022** is forecast to grow by 120 tb/d to average 1.95 mb/d, unchanged from the previous month's assessment.

For **2023**, liquids supply is forecast to increase by 60 tb/d, mainly due to production ramp ups in the Kashagan oil field. Oil production in the Tengiz field and gas condensate output in the Karachaganak field are also expected to rise marginally.

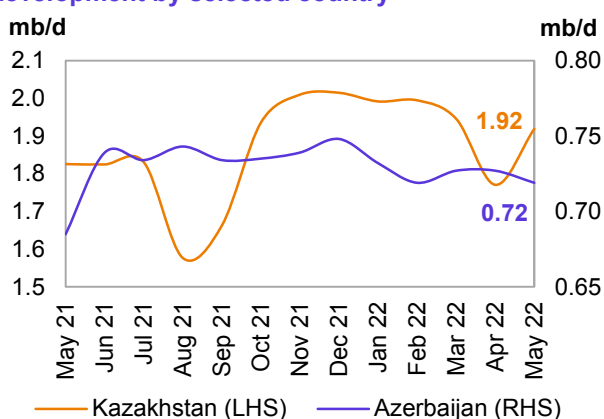
**Azerbaijan's liquids production in May** declined by a minor 8 tb/d m-o-m to average 0.7 mb/d, but was up by 34 tb/d y-o-y. Crude production decreased by 8 tb/d m-o-m to average 571 tb/d, while NGL output averaged unchanged at 148 tb/d, according to official sources.

No new projects are expected to come online in the country in 2022, and the main declines in the legacy fields are expected to be offset by ramp-ups in other fields, such as Shah Deniz Phase 2.

Azerbaijan's liquids production is expected to increase in June 2022 to average 0.8 mb/d, according to preliminary data.

For **2022**, liquids supply in Azerbaijan is forecast to grow by 47 tb/d y-o-y to average 0.8 mb/d.

**Graph 5 - 27: Caspian monthly liquids production development by selected country**



— Kazakhstan (LHS) — Azerbaijan (RHS)

Sources: Nefte Compass and OPEC.

Azerbaijan liquids supply for **2023** is forecast to decline by 60 tb/d for an average of 0.7 mb/d. While the Absheron gas condensate project is expected to start up next year, adding approximately 7 tb/d to liquids output, however, the overall decline rate will be higher than the planned ramp-ups.

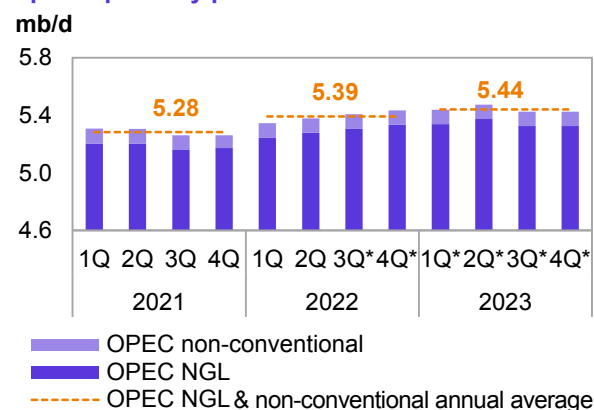
## OPEC NGLs and non-conventional oils

**OPEC NGLs and non-conventional liquids in 2022** are forecast to grow by 0.1 mb/d to average 5.4 mb/d, unchanged from the previous assessment.

Output of NGLs in 1Q22 is estimated to have averaged 5.2 mb/d, while OPEC non-conventionals remained steady at 0.1 mb/d.

The preliminary **2023** forecast indicates growth of 50 tb/d for an average of 5.4 mb/d. NGL production is projected to grow by 50 tb/d to average 5.3 mb/d, while non-conventional liquids are projected to remain unchanged at 0.1 mb/d.

**Graph 5 - 28: OPEC NGLs and non-conventional liquids quarterly production and forecast**



Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

**Table 5 - 6: OPEC NGL + non-conventional oils, mb/d**

OPEC NGL and non-conventional oils	Change		Change						Change	
	2021	21/20	2022	22/21	1Q23	2Q23	3Q23	4Q23	2023	23/22
<b>OPEC NGL</b>	<b>5.18</b>	<b>0.12</b>	<b>5.29</b>	<b>0.11</b>	5.34	5.37	5.33	5.33	<b>5.34</b>	<b>0.05</b>
<b>OPEC non-conventional</b>	<b>0.10</b>	<b>0.00</b>	<b>0.10</b>	<b>0.00</b>	0.10	0.10	0.10	0.10	<b>0.10</b>	<b>0.00</b>
<b>Total</b>	<b>5.28</b>	<b>0.12</b>	<b>5.39</b>	<b>0.11</b>	<b>5.44</b>	<b>5.47</b>	<b>5.43</b>	<b>5.43</b>	<b>5.44</b>	<b>0.05</b>

Note: 2022-2023 = Forecast. Source: OPEC.

## OPEC crude oil production

According to secondary sources, total **OPEC-13 crude oil production** averaged 28.72 mb/d in June 2022, higher by 234 tb/d m-o-m. Crude oil output increased mainly in Saudi Arabia, the UAE, IR Iran, Kuwait and Angola, while production in Libya and Venezuela declined.

Table 5 - 7: OPEC crude oil production based on *secondary sources*, tb/d

Secondary sources	2020	2021	4Q21	1Q22	2Q22	Apr 22	May 22	Jun 22	Change Jun/May
Algeria	904	913	959	984	1,013	1,004	1,013	1,021	9
Angola	1,247	1,117	1,124	1,152	1,173	1,180	1,155	1,182	27
Congo	293	265	265	264	266	263	270	265	-5
Equatorial Guinea	114	98	87	92	94	96	93	92	-1
Gabon	191	182	185	199	187	199	173	189	16
IR Iran	1,991	2,392	2,472	2,528	2,560	2,565	2,543	2,574	31
Iraq	4,076	4,049	4,240	4,286	4,428	4,433	4,416	4,434	17
Kuwait	2,439	2,419	2,531	2,612	2,689	2,660	2,688	2,718	29
Libya	366	1,143	1,111	1,063	743	893	707	629	-78
Nigeria	1,575	1,372	1,321	1,376	1,252	1,285	1,233	1,238	5
Saudi Arabia	9,204	9,113	9,879	10,164	10,458	10,364	10,425	10,585	159
UAE	2,804	2,727	2,861	2,954	3,047	3,015	3,044	3,083	39
Venezuela	512	555	662	684	716	721	720	706	-14
<b>Total OPEC</b>	<b>25,716</b>	<b>26,347</b>	<b>27,696</b>	<b>28,358</b>	<b>28,624</b>	<b>28,678</b>	<b>28,482</b>	<b>28,716</b>	<b>234</b>

Notes: Totals may not add up due to independent rounding, given available secondary sources to date. Source: OPEC.

Table 5 - 8: OPEC crude oil production based on *direct communication*, tb/d

Direct communication	2020	2021	4Q21	1Q22	2Q22	Apr 22	May 22	Jun 22	Change Jun/May
Algeria	899	911	958	984	1,016	1,006	1,015	1,027	12
Angola	1,271	1,124	1,123	1,161	1,173	1,183	1,162	1,175	13
Congo	300	267	260	267	..	261	261	..	..
Equatorial Guinea	114	93	79	95	91	95	89	91	2
Gabon	207	181	183	197	..	174	183	..	..
IR Iran	..	..	..	..	..	..	..	..	..
Iraq	3,997	3,971	4,167	4,188	4,472	4,430	4,470	4,515	45
Kuwait	2,438	2,415	2,528	2,612	2,694	2,664	2,694	2,724	30
Libya	389	1,207	1,182	1,151	..	..	..	..	..
Nigeria	1,493	1,323	1,260	1,299	1,133	1,219	1,024	1,158	134
Saudi Arabia	9,213	9,125	9,905	10,224	10,542	10,441	10,538	10,646	109
UAE	2,779	2,718	2,854	2,949	3,042	3,011	3,032	3,083	51
Venezuela	569	636	817	756	745	775	735	727	-8
<b>Total OPEC</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>	<b>..</b>

Notes: .. Not available. Totals may not add up due to independent rounding. Source: OPEC.

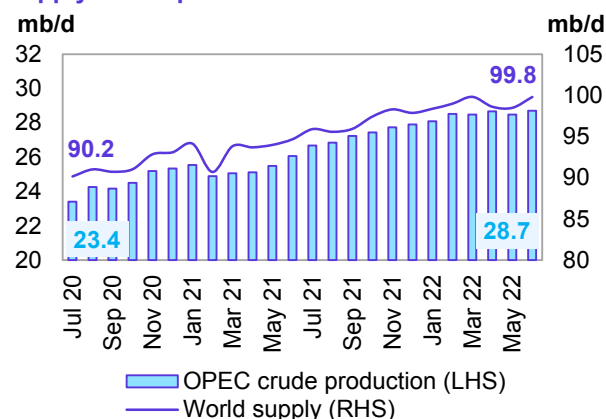
## World oil supply

Preliminary data indicates that **global liquids production in June** increased by 1.32 mb/d to average 99.82 mb/d compared with the previous month.

**Non-OPEC liquids production (including OPEC NGLs)** is estimated to have increased in June by a minor 1.1 mb/d m-o-m to average 71.1 mb/d, and was higher by 2.5 mb/d y-o-y. Preliminary estimated increases in production during June were mainly driven by Russia and the US, by 0.7 mb/d, while Norway and Kazakhstan are expected to have seen declines in liquids output of 0.3 mb/d.

The **share of OPEC crude oil in total global production** decreased by 0.1 pp to 28.8% in June compared with the previous month. Estimates are based on preliminary data from direct communication for non-OPEC supply, OPEC NGLs and non-conventional oil, while estimates for OPEC crude production are based on secondary sources.

**Graph 5 - 29: OPEC crude production and world oil supply development**



Source: OPEC.

## Product Markets and Refinery Operations

In June, refinery margins in all main trading hubs continued to increase supported by stronger product fundamentals despite the high crude price environment and rising product output levels as refiners continue to increase their processing rates following the peak maintenance season. Rising transport fuel requirements in line with seasonal trends led to robust gains at the top and middle sections of the barrel. Meanwhile, naphtha and fuel oil markets came under pressure due to subdued demand and unfavourable economics as crude prices reached a multi-year high in June. Going forward, refinery intakes are expected to rise further to accommodate for seasonal pickups in fuel consumption and allow for much needed stock builds.

### Refinery margins

**US Gulf Coast (USGC) refining margins against WTI** gained more momentum and further extended the gains registered in the previous month. Gasoline was the strongest positive contributor as gasoline demand rose amid stronger mobility activities with the onset of the peak driving season. Solid support emerged as well from gasoil and jet/kero markets, despite rising US utilization rates as refineries continue to ramp up their processing rates.

According to preliminary estimates, refinery intake in the US moved up by around 0.4 mb/d m-o-m to settle at 16.95 mb/d in June, as strong refining margins, and the seasonal pick up in fuel consumption contributed to the increase in intakes. Refinery offline capacity due to maintenance in the US dropped by around 765 tb/d m-o-m in June, which represents a 50% drop relative to the levels registered in the previous month.

Going forward, US refinery intakes are expected to increase further as product inventories for some key products remain low. This could weigh on refining economics in the near term. USGC margins against WTI averaged \$49.92/b in June, up by \$8.69 m-o-m and by \$38.17 y-o-y.

**Refinery margins in Rotterdam against Brent** increased and further extended the upward trend seen in the previous month. Continued gasoil tightness within the region, and a decline in Amsterdam-Rotterdam-Antwerp storage hub gasoil inventories led to the largest monthly price rise across the barrel and across all regions, and ultimately also led to a jump in gasoil crack spreads. Despite lower gasoline exports to the US over the month, gasoline markets still managed to exhibit robust performance, supported by healthy regional transport fuel requirements, as compound mobility indicators have reportedly surpassed pre-pandemic levels.

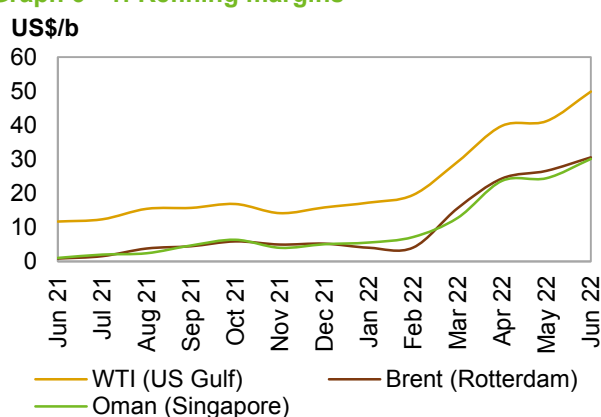
European refinery processing rates in June increased by 240 tb/d m-o-m, according to preliminary data, as refinery maintenance in this region further subsided. Refinery margins against Brent in Europe averaged \$30.56/b in June, up by \$3.96 compared with a month earlier and up by \$29.71 y-o-y.

**Singapore refining margins against Oman** rose with support manifested all in top and middle sections of the barrel, despite weaker naphtha and fuel oil markets. Improvement in fuel consumption levels, and stronger middle distillate fundamentals led to massive gains in middle distillate margins, particularly that of gasoil.

The overall change in Asian refinery intakes was estimated to be 390 tb/d higher in June relative to the previous month, and averaged 25.16 mb/d in June.

Going forward, relaxation of COVID-19-related restrictions in China are expected to boost fuel consumption levels in the coming months. Moreover, the shift in product trade flows in Eastern Europe, as a result of the geopolitical tensions, is projected to further incentivize Asian, particularly Indian, refiners to increase processing rates to supply more products to Europe. Refinery margins against Oman in Asia gained \$5.66 m-o-m to average \$30.08/b in June, higher by \$29.09 y-o-y.

Graph 6 - 1: Refining margins



Sources: Argus and OPEC.

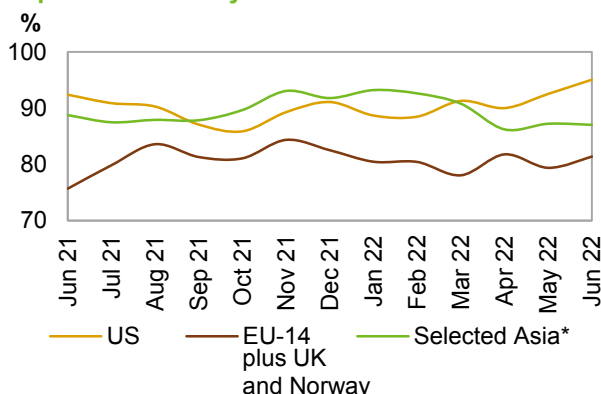
## Refinery operations

**US refinery utilization rates** increased in June to average 95.06%, which corresponds to a throughput of 16.95 mb/d. This represented a rise of 2.5 pp and 400 tb/d, respectively, compared with the previous month. Y-o-y, the June refinery utilization rate was up by 2.7 pp, with throughput showing a rise of 210 tb/d.

**European** refinery utilization averaged 81.43%, corresponding to a throughput of 9.6 mb/d. This is a m-o-m rise of 2.0 pp or 240 tb/d. On a y-o-y basis, utilization rates increased by 5.7 pp, while throughput was up by 583 tb/d.

In **selected Asia** – comprising Japan, China, India, Singapore and South Korea – refinery utilization rates declined to average 87.03% in June, corresponding to a throughput of 25.55 mb/d. Compared with the previous month, utilization rates were down by 0.2 pp, while throughput was up by 390 tb/d. Meanwhile, utilization rates were lower by 1.7 pp y-o-y, and throughput was down by 76 tb/d.

**Graph 6 - 2: Refinery utilization rates**



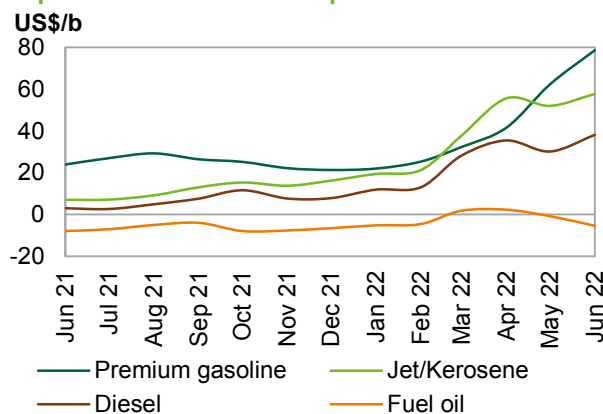
Note: \* China, India, Japan, Singapore and South Korea.  
Sources: Argus, EIA, Euroilstock, PAJ and OPEC.

## Product markets

### US market

**USGC gasoline crack spreads** rose further for the fifth consecutive month, supported mainly by demand-side dynamics, backed by strong transport fuel requirements amid the peak driving season. US total gasoline inventory levels declined in the first half of the month but recovered for the second half, and showed a significant monthly rise compared with the levels seen at the end of the previous month. Nonetheless, the summer related bullish market sentiment as well as signs of prevailing demand recovery continued to push gasoline prices to new record highs. In June, gasoline prices averaged \$193.06/b compared with \$172.15/b witnessed in the previous month, a new multi-year record, which was higher by \$20.91 m-o-m. The USGC gasoline crack spread gained \$16.41 m-o-m to average \$78.70/b in June, and was up by \$54.81 y-o-y.

**Graph 6 - 3: US Gulf crack spread vs. WTI**



Sources: Argus and OPEC.

**USGC jet/kerosene crack spreads** strengthened despite stronger refinery outputs as jet fuel requirements for air passenger travel were supportive. Going forward, with the onset of the summer season, jet fuel markets are expected to respond positively to upside potential in air travel activity, which should add support to middle distillate crack spreads in the coming months. The US jet/kerosene crack spread against WTI averaged \$57.79/b, up by \$5.72 m-o-m and was higher by \$50.71 y-o-y.

The USGC **gasoil crack spread** against WTI rebounded following the losses registered in the previous month although diesel stocks showed signs of recovery. US gasoil prices averaged \$152.53/b in June, which was up by \$12.48 relative to the previous month. Sizeable gasoil stock build in the US during the last week of June, led to significantly higher stocks compared with the levels registered in the previous month as output levels from US refineries rose. On the demand side, gasoil requirements remained healthy domestically while in international markets, availability for the same product continued to be limited, which helped lend support to US gasoil crack spreads. The US gasoil crack spread against WTI averaged \$38.17/b, up by \$7.98 m-o-m and up by \$35.20 y-o-y.

**USGC fuel oil crack spreads** against WTI extended its' downward trend and dove further into negative territory as fuel oil supplies rose while fuel oil margins came under added pressure affected by higher crude prices. Going forward, strong interest for fuel oil destruction to alleviate the gasoil tightness and rising fuel oil demand for feedstock blending amid high crude prices, is expected to contribute positively to markets for the

same product. In June, the US fuel oil crack spread against WTI averaged minus \$5.37/b, lower by \$4.60/b m-o-m, and up by \$2.53 y-o-y.

## European market

**Gasoline crack spreads** gained notable ground backed by firm regional consumption levels, as compound mobility indicators reportedly surpassed pre-COVID-19 levels around mid-June. Gasoline exports to the US, subsided in June, affected by high freight costs, strong backwardation and consequently, unfavourable transatlantic arbitrage.

Expectations of higher mobility activities going forward point to continued downward pressure on gasoline stock levels in the near term, which should be supportive to European gasoline markets in the coming months. The gasoline crack spread against Brent averaged \$64.98/b in June, up by \$11.97 m-o-m, and by \$51.24 y-o-y.

In June, **jet/kerosene** increased, shadowing the outstanding performances in gasoil crack spreads, on supportive demand-side dynamics despite of higher refinery output. The Rotterdam jet/kerosene crack spread against Brent averaged \$55.01/b, up by \$7.33 m-o-m but up by \$50.14 y-o-y.

**Gasoil 10 ppm crack spreads** skyrocketed as the already tight European diesel balance contracted further due to some European countries halting purchases of Russian diesel for reputational concerns over sanctions. This led to a worsening of the regional diesel supply-demand imbalance. The negative impact of rising refinery output as refiners continue to ramp up their processing rates following the most recent maintenance season appear to have been partially offset by firm transport fuel and gasoil requirements from the manufacturing and industrial sectors. Gasoil prices rose to \$179.29/b compared with \$152.37/b (+\$26.92) in the previous month, reaching a new multi-year high. The gasoil crack spread against Brent averaged \$55.73/b, which was higher by \$16.49 m-o-m and by \$49.35 y-o-y.

At the bottom of the barrel, **fuel oil 1.0% crack spreads** declined for the second consecutive month and headed deeper into negative territory. Maintenance works at secondary and conversion units likely weighed on fuel oil processing rates, and led to relatively higher volume availability of the residual fuel. However, prices for the same product rose considerably in response to higher crude prices. This weighed further on fuel oil margins, turning production of the residual fuel even more economically unattractive. In Europe, fuel oil cracks averaged minus \$23.33/b in June, having lost \$10.86 m-o-m and \$19.21 y-o-y.

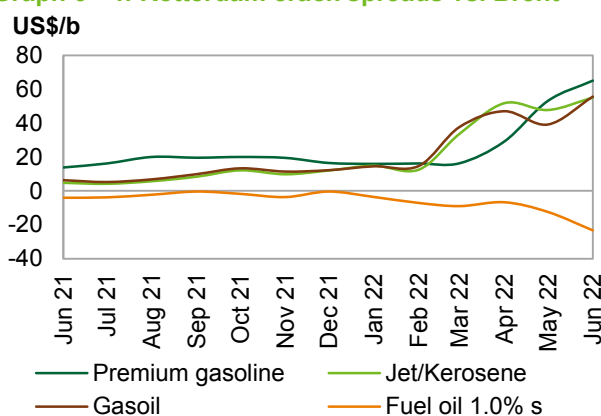
## Asian market

The **Asian gasoline 92 crack spread** increased and benefitted from strong regional demand, particularly from India as issues at one of the Paradip refinery FCC's units prompted quick gasoline spot cargoes into the country.

The Singapore **gasoline crack spread** against Oman in June averaged \$35.97/b, up by \$2.81 m-o-m and up by \$28.66 y-o-y.

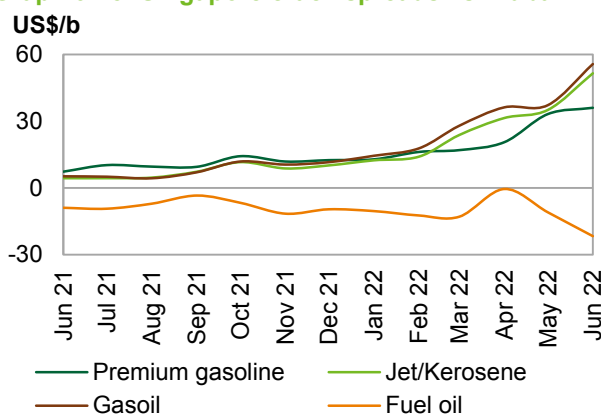
Asian **naphtha crack spreads** extended its' downward trend affected by ample supply availability amid still suppressed petrochemical feedstock requirements, particularly in China. The Singapore naphtha crack spread against Oman averaged minus \$27.17/b, having decreased by \$15.10 m-o-m and by \$26.31 y-o-y.

Graph 6 - 4: Rotterdam crack spreads vs. Brent



Sources: Argus and OPEC.

Graph 6 - 5: Singapore crack spreads vs. Dubai



Sources: Argus and OPEC.

## Product Markets and Refinery Operations

In the middle of the barrel, **jet/kerosene crack spreads** trended upwards as the eased virus travel restrictions, resulted in stronger air travel activities, including for international travel. At the same time, the jet fuel vs. diesel price differential registered in the most recent months will likely have incentivized refiners to maximize diesel yields over that of jet fuel, which may have contributed as well to lower-than-optimal jet fuel output, and exerted upward pressure on price and crack spreads for the same product. The Singapore jet/kerosene crack spread against Oman averaged \$51.51/b, up by \$16.44 m-o-m and by \$47.10 y-o-y.

The Singapore **gasoil crack spread** soared to a new record-breaking high reflective of strong regional demand, firm industrial and manufacturing activity as well as strong exports amid the ongoing gasoil tightness in Europe. The Singapore gasoil crack spread against Oman averaged \$55.72/b, up by \$18.47 m-o-m and up by \$50.44 y-o-y.

The Singapore **fuel oil 3.5% crack spread** saw an extension of its downturn trajectory pressured by weaker fundamentals as strong high sulphur fuel oil availability in the region amid seasonally lower demand weighed on HSFO markets. Going forward, an upside potential in fuel oil markets could be expected with a possible revived focus on fuel oil for feedstock blending amid the strong crude oil price environment, as well as in power generation for cooling requirements, in the near term. Singapore fuel oil cracks against Oman averaged minus \$21.63/b, down by \$10.71 m-o-m and lower by \$12.75 y-o-y.

**Table 6 - 1: Short-term prospects for product markets and refinery operations**

Event	Time frame	Asia	Europe	US	Observations
<b>Shifts in product trade flows in Europe</b>	Jul 22	↑ Impact on product markets	↑ Impact on product markets	↑ Impact on product markets	The loss in product supplies in the immediate near term could support:  1. Refinery intakes within and outside the region 2. Fuel oil requirements for feedstock blending 3. Upward pressure on product prices
<b>Summer season</b>	Jul 22– Sep 22	↑ Positive impact on product markets	↑ Positive impact on product markets	↑ Positive impact on product markets	Mobility is expected to increase further, which should boost transportation fuel recovery. This consequently points to product tightness over the summer months.

Source: OPEC.

**Table 6 - 2: Refinery operations in selected OECD countries**

	Refinery throughput, mb/d				Refinery utilization, %			
	Apr 22	May 22	Jun 22	Change Jun/May	Apr 22	May 22	Jun 22	Change Jun/May
<b>US</b>	<b>16.15</b>	<b>16.55</b>	<b>16.95</b>	<b>0.40</b>	<b>90.02</b>	<b>92.54</b>	<b>95.06</b>	<b>2.5 pp</b>
<b>Euro-14, plus UK and Norway</b>	<b>9.63</b>	<b>9.35</b>	<b>9.59</b>	<b>0.24</b>	<b>81.81</b>	<b>79.42</b>	<b>81.43</b>	<b>2.0 pp</b>
<b>France</b>	0.83	0.82	0.85	0.03	71.68	71.42	74.02	2.6 pp
<b>Germany</b>	1.90	1.73	1.78	0.05	92.42	84.38	86.66	2.3 pp
<b>Italy</b>	1.34	1.31	1.33	0.03	70.26	68.79	70.15	1.4 pp
<b>UK</b>	1.10	1.05	1.08	0.03	93.86	89.34	91.78	2.4 pp
<b>Selected Asia*</b>	<b>24.87</b>	<b>25.16</b>	<b>25.55</b>	<b>0.39</b>	<b>86.22</b>	<b>87.23</b>	<b>87.03</b>	<b>-0.2 pp</b>

Note: \* Includes Japan, China, India, Singapore and South Korea.

Sources: Argus Media, EIA, Euroilstock, NBS, PAJ and OPEC.



Table 6 - 3: Refinery crude throughput, mb/d

Refinery crude throughput	2019	2020	2021	2Q21	3Q21	4Q21	1Q22	2Q22
<b>OECD Americas</b>	<b>19.04</b>	<b>16.59</b>	<b>17.79</b>	<b>18.20</b>	<b>18.42</b>	<b>18.20</b>	<b>18.37</b>	<b>18.95</b>
<i>of which US</i>	16.99	14.72	15.65	16.17	16.22	16.02	16.06	16.55
<b>OECD Europe</b>	<b>12.13</b>	<b>10.65</b>	<b>10.92</b>	<b>10.65</b>	<b>11.35</b>	<b>11.51</b>	<b>11.06</b>	<b>11.26</b>
<i>of which:</i>								
<i>France</i>	1.00	0.67	0.69	0.65	0.79	0.76	0.79	0.83
<i>Germany</i>	1.78	1.72	1.72	1.66	1.75	1.90	1.75	1.80
<i>Italy</i>	1.35	1.11	1.23	1.24	1.27	1.34	1.16	1.32
<i>UK</i>	1.08	0.92	0.92	0.94	0.99	0.99	1.04	1.08
<b>OECD Asia Pacific</b>	<b>6.79</b>	<b>5.89</b>	<b>5.78</b>	<b>5.49</b>	<b>5.78</b>	<b>6.01</b>	<b>6.22</b>	<b>5.68</b>
<i>of which Japan</i>	3.02	2.48	2.49	2.22	2.51	2.69	2.80	2.73
<b>Total OECD</b>	<b>37.96</b>	<b>33.14</b>	<b>34.48</b>	<b>34.33</b>	<b>35.55</b>	<b>35.72</b>	<b>35.65</b>	<b>35.89</b>
<b>Latin America</b>	<b>3.83</b>	<b>3.12</b>	<b>3.41</b>	<b>3.27</b>	<b>3.44</b>	<b>3.51</b>	<b>3.29</b>	<b>3.38</b>
<b>Middle East</b>	<b>6.97</b>	<b>6.09</b>	<b>6.78</b>	<b>6.52</b>	<b>6.80</b>	<b>7.27</b>	<b>7.23</b>	<b>7.54</b>
<b>Africa</b>	<b>1.97</b>	<b>1.79</b>	<b>1.97</b>	<b>2.00</b>	<b>1.99</b>	<b>1.98</b>	<b>1.98</b>	<b>1.95</b>
<b>India</b>	<b>5.04</b>	<b>4.42</b>	<b>4.73</b>	<b>4.55</b>	<b>4.40</b>	<b>5.02</b>	<b>5.18</b>	<b>5.26</b>
<b>China</b>	<b>13.02</b>	<b>13.48</b>	<b>14.07</b>	<b>14.38</b>	<b>13.76</b>	<b>14.03</b>	<b>13.96</b>	<b>12.82</b>
<b>Other Asia</b>	<b>5.13</b>	<b>4.74</b>	<b>4.80</b>	<b>4.85</b>	<b>4.84</b>	<b>4.90</b>	<b>5.11</b>	<b>5.15</b>
<b>Russia</b>	<b>5.70</b>	<b>5.39</b>	<b>5.61</b>	<b>5.52</b>	<b>5.63</b>	<b>5.75</b>	<b>5.71</b>	<b>5.36</b>
<b>Other Eurasia</b>	<b>1.21</b>	<b>1.03</b>	<b>1.18</b>	<b>1.16</b>	<b>1.28</b>	<b>1.20</b>	<b>1.22</b>	<b>1.06</b>
<b>Other Europe</b>	<b>0.55</b>	<b>0.43</b>	<b>0.41</b>	<b>0.48</b>	<b>0.43</b>	<b>0.33</b>	<b>0.45</b>	<b>0.51</b>
<b>Total Non-OECD</b>	<b>43.40</b>	<b>40.49</b>	<b>42.96</b>	<b>42.72</b>	<b>42.57</b>	<b>44.01</b>	<b>44.14</b>	<b>43.02</b>
<b>Total world</b>	<b>81.36</b>	<b>73.63</b>	<b>77.44</b>	<b>77.06</b>	<b>78.12</b>	<b>79.72</b>	<b>79.79</b>	<b>78.91</b>

Note: Totals may not add up due to independent rounding.

Sources: AFREC, APEC, EIA, IEA, Euroilstock, PAJ, Ministry data, including Ministry of Energy of the Russian Federation, Ministry of Petroleum and Natural Gas of India, OPEC and JODI.

## Product Markets and Refinery Operations

**Table 6 - 4: Refined product prices, US\$/b**

	May 22	Jun 22	Change Jun/May	Annual avg. 2021	Year-to-date 2022
<b>US Gulf (Cargoes FOB)</b>					
<b>Naphtha*</b>	98.69	108.85	10.16	70.70	100.14
<b>Premium gasoline</b> (unleaded 93)	172.15	193.06	20.91	91.41	145.22
<b>Regular gasoline</b> (unleaded 87)	157.81	170.93	13.12	86.72	135.16
<b>Jet/Kerosene</b>	161.93	172.15	10.22	78.32	142.24
<b>Gasoil</b> (0.2% S)	140.05	152.53	12.48	73.94	127.71
<b>Fuel oil</b> (3.0% S)	94.82	94.67	-0.15	59.84	87.88
<b>Rotterdam (Barges FoB)</b>					
<b>Naphtha</b>	98.23	88.76	-9.47	70.15	96.76
<b>Premium gasoline</b> (unleaded 98)	166.14	188.54	22.40	85.89	139.94
<b>Jet/Kerosene</b>	160.81	178.57	17.76	77.17	143.32
<b>Gasoil/Diesel</b> (10 ppm)	152.37	179.29	26.92	78.31	142.26
<b>Fuel oil</b> (1.0% S)	100.66	100.23	-0.43	69.12	97.00
<b>Fuel oil</b> (3.5% S)	99.42	94.88	-4.54	61.38	91.22
<b>Mediterranean (Cargoes FOB)</b>					
<b>Naphtha</b>	94.86	83.67	-11.19	69.40	94.23
<b>Premium gasoline**</b>	148.78	169.74	20.96	80.46	129.64
<b>Jet/Kerosene</b>	157.01	171.55	14.54	75.06	139.04
<b>Diesel</b>	148.63	173.09	24.46	77.73	138.77
<b>Fuel oil</b> (1.0% S)	106.96	107.04	0.08	70.51	101.79
<b>Fuel oil</b> (3.5% S)	91.99	85.70	-6.29	58.98	84.58
<b>Singapore (Cargoes FOB)</b>					
<b>Naphtha</b>	95.76	85.72	-10.04	70.83	95.16
<b>Premium gasoline</b> (unleaded 95)	146.88	155.10	8.22	80.28	128.09
<b>Regular gasoline</b> (unleaded 92)	140.99	148.86	7.87	78.28	124.20
<b>Jet/Kerosene</b>	142.90	164.40	21.50	75.10	129.65
<b>Gasoil/Diesel</b> (50 ppm)	152.90	176.61	23.71	77.36	138.21
<b>Fuel oil</b> (180 cst)	143.96	168.56	24.60	75.71	132.11
<b>Fuel oil</b> (380 cst 3.5% S)	96.91	91.26	-5.65	62.07	90.17

Note: \* Barges. \*\* Cost, insurance and freight (CIF).

Sources: Argus and OPEC.

# Tanker Market

Dirty tanker spot freight rates in June recovered some of the losses seen the previous month. The tanker market continued to improve following the poor performance in 2021, although gains varied across sectors.

Suezmax and Aframax markets have benefited from the rerouting of longstanding trade patterns, resulting in longer voyages. Suezmax rates rose 20% m-o-m, while Aframax rates increased 11% m-o-m on average. VLCCs have seen less momentum from these shifts, with lower flows on longer haul routes such as from the Americas to Asia. As a result, VLCC rates remained at comparatively soft levels, up 8% on average, with gains were seen both East and West of Suez.

Product trade flows have continued to strengthen, amid a shift to longer haul routes due to trade dislocations and refinery capacity expansions in export regions. Clean rates were up 21% m-o-m on average.

## Spot fixtures

The latest estimates show **global spot fixtures** declined in June, averaging 13.0 mb/d. Fixtures fell 1.8 mb/d, or around 13% m-o-m. Compared with the previous year, spot fixtures were down 2.5 mb/d, or about 16%.

**Table 7 - 1: Spot fixtures, mb/d**

Spot fixtures	Apr 22	May 22	Jun 22	Change Jun 22/May 22
All areas	16.50	14.81	13.00	-1.81
OPEC	10.65	10.43	9.09	-1.34
Middle East/East	6.61	6.08	4.93	-1.15
Middle East/West	1.04	1.60	1.47	-0.13
Outside Middle East	3.00	2.75	2.69	-0.06

Sources: Oil Movements and OPEC.

**OPEC spot fixtures** slipped m-o-m in June, averaging 9.1 mb/d. This represented a drop of 13%, or 1.3 mb/d. In comparison with the same month in 2021, they were about 0.3 mb/d, or 4%, lower.

**Middle East-to-East** fixtures fell 1.2 mb/d, or 19%, to average 4.9 mb/d. Compared with the same month last year, eastward flows declined 0.3 mb/d, or almost 6%.

In contrast, spot fixtures from the **Middle East-to-West** fell m-o-m by around 0.1 mb/d, or 8%, in June, to average 1.5 mb/d. Y-o-y, rates were 0.4 mb/d, or 37%, higher.

**Outside the Middle East**, fixtures averaged 2.7 mb/d in June. This represents a marginal m-o-m decline of about 2%, and a decline of 0.4 mb/d, or 14%, y-o-y.

## Sailings and arrivals

**OPEC sailings** increased m-o-m by 0.1 mb/d, or less than 1%, in June to average 22.6 mb/d. OPEC sailings were 0.9 mb/d, or 4%, higher compared with the same month a year ago.

**Middle East sailings** edged down by 0.1 mb/d in June to average 17.0 mb/d. Y-o-y, sailings from the region rose 1.7 mb/d, or around 11%, compared with June 2021.

**Crude arrivals** in June saw m-o-m gains across all regions except West Asia. Arrivals in the Far East increased m-o-m by 0.5 mb/d, or about 4%, to average 14.4 mb/d. Y-o-y, arrivals were almost 1.0 mb/d, or about 7%, higher. Arrivals were marginally lower m-o-m in West Asia, edging down 1% in June to average 8.2 mb/d, representing a y-o-y increase of 2.1 mb/d, or 35%.

Meanwhile, arrivals in North America increased by 0.4 mb/d or 4% to average 9.1 mb/d, representing a y-o-y rise of 0.2 mb/d, or about 2%. European arrivals rose m-o-m by 0.2 mb/d, or about 2%, to average 13.7 mb/d. This was 0.9 mb/d, or about 7%, higher than in the same month last year.

Table 7 - 2: Tanker sailings and arrivals, mb/d

Sailings	Apr 22	May 22	Jun 22	Change Jun 22/May 22
OPEC	23.37	22.47	22.58	0.11
Middle East	17.97	17.11	17.00	-0.11
Arrivals				
North America	8.95	8.70	9.07	0.37
Europe	13.28	13.48	13.69	0.21
Far East	16.12	13.88	14.41	0.53
West Asia	9.04	8.29	8.21	-0.08

Sources: Oil Movements and OPEC.

## Dirty tanker freight rates

### Very large crude carriers (VLCCs)

VLCC spot rates recovered some of the previous month's losses and were up 8% on average m-o-m. The sector has seen less momentum from recent trade dislocations, amid lower flows on longer haul routes such as from the Americas to Asia. Y-o-y, VLCC rates were up 43% on average.

On the **Middle East-to-East** route, rates increased 10% m-o-m to average WS46 points and were 44% higher y-o-y. Rates on the **Middle East-to-West** route rose 8% m-o-m to average WS27 points. Y-o-y, rates on the route increased 29%.

**West Africa-to-East** spot rates gained 9% m-o-m to average WS48 in June. Compared with the same month last year, rates were 45% higher.

Table 7 - 3: Dirty VLCC spot tanker freight rates, Worldscale (WS)

VLCC	Size 1,000 DWT	Apr 22	May 22	Jun 22	Change Jun 22/May 22
Middle East/East	230-280	50	42	46	4
Middle East/West	270-285	31	25	27	2
West Africa/East	260	57	44	48	4

Sources: Argus and OPEC.

### Suezmax

Suezmax rates also recovered some of the previous month's losses in June, increasing 20% m-o-m. Rates were supported by ongoing trade dislocations which have boosted demand for longer haul voyages. These include higher Russian flows to Asia and increased European imports from the Middle East and the Americas, as well as West Africa. Y-o-y, rates were almost 130% higher.

Rates on the **West Africa-to-US Gulf Coast (USGC)** route increased by 23% m-o-m in June to average WS102. Compared with the same month last year, rates were 127% higher.

Spot freight rates on the **USGC-to-Europe** route rose 17% over the previous month to average WS91 points. Y-o-y, rates were 133% higher.

Table 7 - 4: Dirty Suezmax spot tanker freight rates, WS

Suezmax	Size 1,000 DWT	Apr 22	May 22	Jun 22	Change Jun 22/May 22
West Africa/US Gulf Coast	130-135	136	83	102	19
US Gulf Coast/ Europe	150	118	78	91	13

Sources: Argus and OPEC.

### Aframax

Aframax spot freight rates also gained back some of the previous month's losses, which had been driven by disruptions in North African flows. On average, spot Aframax rates rose 11% m-o-m. Compared with the same month last year, rates were 100% higher.

Rates on the **Indonesia-to-East** route built on the previous month's gains, rising 1% m-o-m to average WS173. Y-o-y, rates on the route were up 111%.

Spot rates on the **Caribbean-to-US East Coast (USEC)** route rose 6% m-o-m to average WS172. Y-o-y, rates were 112% higher.

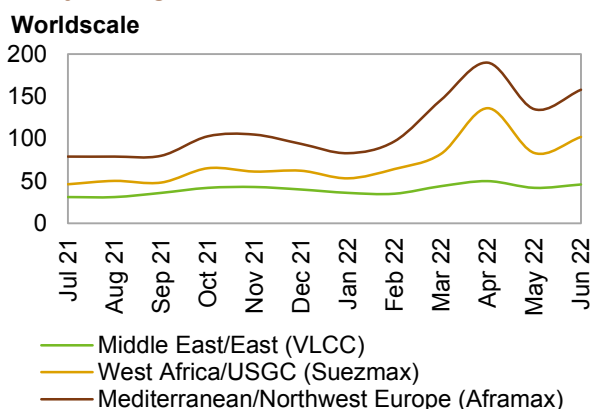
**Table 7 - 5: Dirty Aframax spot tanker freight rates, WS**

Aframax	Size	Apr 22	May 22	Jun 22	Change
	1,000 DWT				Jun 22/May 22
<b>Indonesia/East</b>	80-85	155	172	173	1
<b>Caribbean/US East Coast</b>	80-85	235	163	172	9
<b>Mediterranean/Mediterranean</b>	80-85	199	139	169	30
<b>Mediterranean/Northwest Europe</b>	80-85	190	135	158	23

Sources: Argus and OPEC.

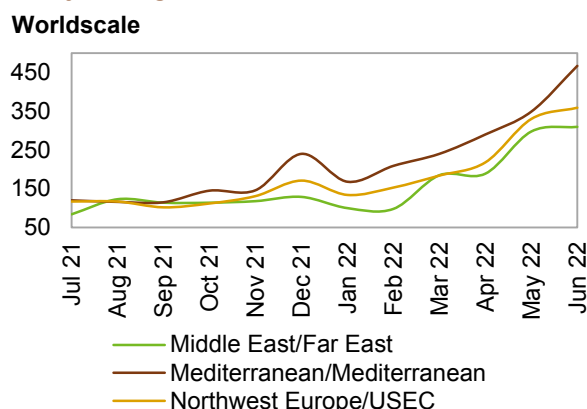
**Cross-Med** spot freight rates saw an increase in June, up 22% m-o-m to average WS169. Y-o-y, rates were 86% higher. On the **Mediterranean-to-NWE** route, rates rose 17% m-o-m to average WS158. Compared with the same month last year, rates were around 90% higher on both routes.

**Graph 7 - 1: Crude oil spot tanker freight rates, monthly average**



Sources: Argus and OPEC.

**Graph 7 - 2: Products spot tanker freight rates, monthly average**



Sources: Argus and OPEC.

## Clean tanker freight rates

**Clean spot freight rates** continued to show robust gains across all monitored routes, supported by trade dislocations which have boosted demand for longer haul routes particularly towards Europe. On average, rates increased 21% m-o-m in June and were up by 235% compared with the levels seen in the same month last year. Gains were seen on both sides of the Suez, amid the continuation of a globally tight product balance.

**Table 7 - 6: Clean spot tanker freight rates, WS**

East of Suez	Size	Apr 22	May 22	Jun 22	Change
	1,000 DWT				Jun 22/May 22
<b>Middle East/East</b>	30-35	189	298	310	12
<b>Singapore/East</b>	30-35	223	336	414	78
<b>West of Suez</b>					
<b>Northwest Europe/US East Coast</b>	33-37	218	330	359	29
<b>Mediterranean/Mediterranean</b>	30-35	290	349	467	118
<b>Mediterranean/Northwest Europe</b>	30-35	300	359	477	118

Sources: Argus and OPEC.

Rates on the **Middle East-to-East** route rose a further 4% m-o-m in June, building on the strong gains of recent months, to average WS310. Y-o-y, rates are up 248%. Freight rates on the **Singapore-to-East** route gained 23% m-o-m to average WS414 and were 211% higher compared with the same month last year.

In the West of Suez market, rates on the **Northwest Europe (NWE)-to-USEC** route rose 9% m-o-m to average WS359 points. They were 209% higher y-o-y. Rates in the **Cross-Med** and **Med-to-NWE** saw gains of 34% each to average WS467 and WS477 points, respectively. Compared with the same month last year, rates were 259% higher Cross-Med and up 241% on the Med-to-NWE route.

## Crude and Refined Products Trade

US crude imports remained broadly unchanged in June at 6.4 mb/d, while US crude exports fell back from record highs the month before to average 3.4 mb/d. US product imports declined 9% amid lower outflows of gasoline and distillates. Product exports edged back from the high levels seen the month before, despite increased outflows of distillates.

China's crude imports averaged 10.8 mb/d in May, continuing to rebound from the weak performance back in February. Flows were seen increasing inventories as refineries continued to reduce runs due to reduced domestic demand amid lockdown measures. Product imports strengthened by 10%, amid increased inflows of fuel oil and naphtha. Product exports fell 16%, amid strong declines in gasoil, gasoline and jet fuel exports, which offset higher outflows of fuel oil.

India's crude imports fell back from an exceptionally high level the month before to average 4.6 mb/d in May, despite a widely-reported surge in Russian inflows. Imports are expected to pick up in June. Product imports fell more than 18%, with all major categories contributing to the decline. Product exports edged up around 1%, with gains across most major products, particularly gasoil.

Japan's crude imports retreated from the strong level seen the month before to average 2.6 mb/d in May. Product imports, including LPG, declined 3%, driven primarily by outflows of fuel oil, which fell back from the strong levels seen over winter. Product exports recovered most of the previous month's loss, up almost 38%, with gains across all major products. Tanker tracking data shows India's crude imports and product exports moving higher in June.

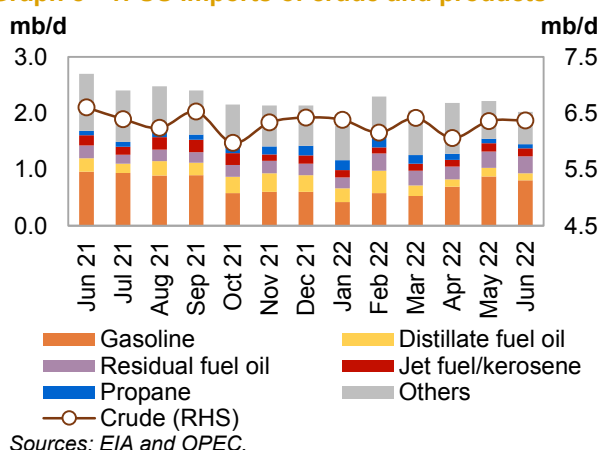
Recent estimates show OECD Europe's imports strengthening from a low reached in March, with increased y-o-y inflows in June from West Africa and the Middle East, partially offset by declines in North Africa.

## US

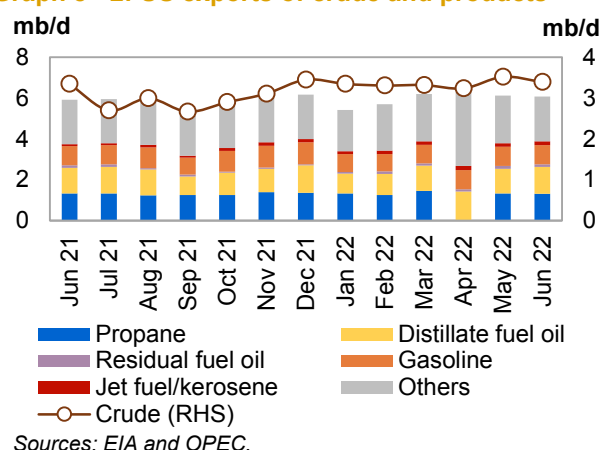
Preliminary data shows **US crude imports** were negligibly higher in **June**, averaging 6.4 mb/d. Compared with the same month in 2021, inflows declined by about 0.2 mb/d, or almost 4%, lower.

**US crude exports** fell back from record highs the month before, averaging 3.4 mb/d, a decline of 0.1 mb/d or 4% m-o-m. The decline was driven primarily by lower flows to Asia, amid shifting trade flows.

**Graph 8 - 1: US imports of crude and products**



**Graph 8 - 2: US exports of crude and products**



The **top three suppliers of crude** to the US remained unchanged in **April**, according to the latest monthly EIA data. Canada held the top spot with a share of 61%, followed by Mexico with 10%. Saudi Arabia was third with a share of almost 7%.

The Netherlands and the UK were the top two **destinations** for **US crude exports** in April, with a share of 12% each. Canada was third with a 10% share.

Based on weekly data, **US net crude imports** averaged just under 3.0 mb/d in **June**, compared with 2.8 mb/d the month before and 3.3 mb/d in the same month last year.

On the **product** side, **imports** declined by 0.2 mb/d or 9% to average 2.0 mb/d in June. Declines were driven by gasoline and distillates. Compared with the same month last year, product imports fell 0.7 mb/d or 25% from the strong levels seen in the previous year.

**Product exports** fell back from the high levels seen the month before, averaging 6.0 mb/d in June. Naphtha flows were lower, offsetting higher flows of distillates. Compared with June 2021, product exports were 0.2 mb/d, or about 3%, higher.

As a result, preliminary data shows **US net product exports** averaged just over 4.0 mb/d in June, broadly in line with the previous month and compared with 3.2 mb/d in the same month of 2021.

Preliminary data indicates that **US net crude and product exports** averaged 1.1 mb/d in June, broadly unchanged from the previous month. This compares with net imports of 37 tb/d in June 2021.

**Table 8 - 1: US crude and product net imports, mb/d**

US	Apr 22	May 22	Jun 22	Change Jun 22/May 22
<b>Crude oil</b>	2.82	2.84	2.98	0.14
<b>Total products</b>	-4.11	-3.90	-4.05	-0.15
<b>Total crude and products</b>	<b>-1.29</b>	<b>-1.06</b>	<b>-1.07</b>	<b>-0.01</b>

Note: Totals may not add up due to independent rounding.

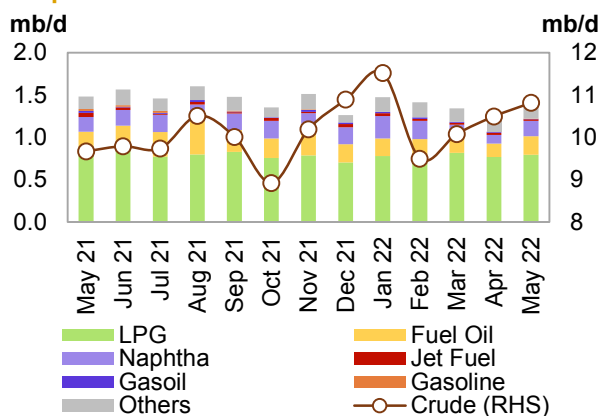
Sources: EIA and OPEC.

**Looking ahead**, US crude imports should remain supported over the driving season, along with gasoline inflows. US crude and product exports are likely to see support from Europe's need for alternative supplies of crude and products.

## China

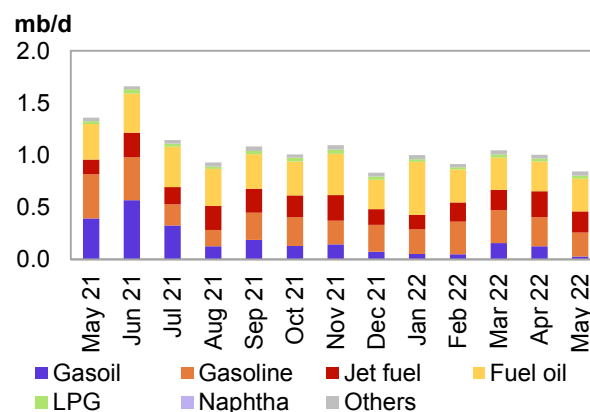
**China's crude imports** averaged 10.8 mb/d in May, continuing to pick up from the weak performance in February, with flows increasing inventories as refineries continued to cut runs. M-o-m, crude flows into China were 3%, or 0.3 mb/d, higher. Compared with the same month last year, crude imports rose almost 12%, or 0.2 mb/d in May.

**Graph 8 - 3: China's import of crude and total products**



Sources: China, Oil and Gas Petrochemicals and OPEC.

**Graph 8 - 4: China's export of total products**



Sources: China, Oil and Gas Petrochemicals and OPEC.

In terms of **crude imports by source**, Russia was the top supplier of crude to China in May, with a share of 18%, amid a surge in volumes. Saudi Arabia fell to second place with 17%, amid a decline in volumes m-o-m. Iraq came in third with a 10% share, unchanged from the previous month but volumes were higher.

**Product imports** strengthened by 10% or 0.1 mb/d to average 1.4 mb/d in May, amid increased inflows of fuel oil and naphtha. Compared with the same month last year, product imports decreased by 9%, or around 0.1 mb/d.

**Product exports** fell 16% or 0.2 mb/d in May to average 0.8 mb/d, amid strong declines in gasoil, gasoline, and jet fuel exports, which offset higher fuel oil outflows. Y-o-y, product outflows fell 38%, or 0.5 mb/d, amid a government policy of more closely tailoring refinery output to domestic needs.

As a result, China's **net product imports** averaged 504 tb/d in May, compared with net imports of 220 tb/d the month before and 121 tb/d in the same month of 2021.

## Crude and Refined Products Trade

**Table 8 - 2: China's crude and product net imports, mb/d**

China	Mar 22	Apr 22	May 22	Change May 22/Apr 22
Crude oil	10.09	10.46	10.82	0.36
Total products	0.30	0.22	0.50	0.28
<b>Total crude and products</b>	<b>10.38</b>	<b>10.68</b>	<b>11.32</b>	<b>0.65</b>

Note: Totals may not add up due to independent rounding.

Sources: China, Oil and Gas Petrochemicals and OPEC.

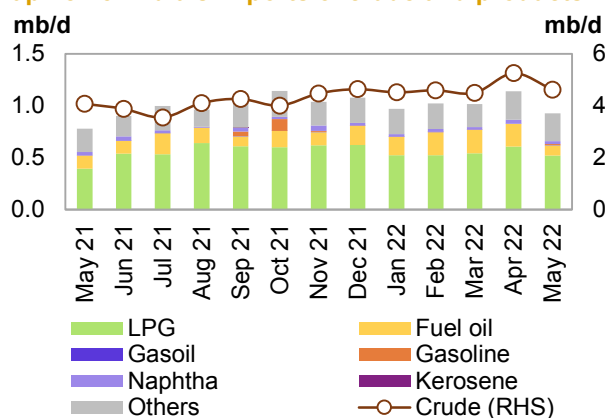
**Looking ahead**, crude imports are expected to be capped in June, as inventories are seen to be high due to increased arrivals from long haul crude purchased back in March. Product export could pick up in June due to higher outflows of gasoline, as lockdown measures have boosted inventories of motor fuels.

## India

**India's crude imports** fell back from the exceptionally high levels the month before to average 4.6 mb/d in **May**, despite a widely reported surge in Russian inflows. Crude inflows were 12% or 0.6 mb/d lower m-o-m although 13%, or about 0.6 mb/d, higher y-o-y.

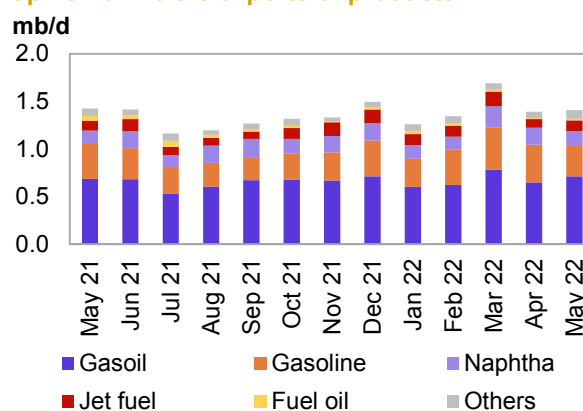
In terms of **crude imports by source**, the latest official data shows the United Arab Emirates (UAE) moved up to the top position in **April**, with a share of 54%. Iraq was second with 30%, followed by Colombia with 16%. Official data shows no imports of Russian crude in April, while Kpler data shows flows of almost 1 mb/d for that month, as domestic refiners took advantage of deeply discounted Urals crude.

**Graph 8 - 5: India's imports of crude and products**



Sources: PPAC and OPEC.

**Graph 8 - 6: India's exports of products**



Sources: PPAC and OPEC.

Regarding **products, imports** averaged 0.9 mb/d, representing a decrease of more than 18% or 0.2 mb/d, with all major categories contributing to the decline. Compared with the same month in 2021, inflows were 19%, or around 0.2 mb/d, higher.

**Product exports** edged up around 1% to remain close to 1.4 mb/d on average. Gains were across most major products, particularly gasoil. Compared with the same month last year, product exports were negligibly lower, down by just over 1%.

As a result, **net product exports** averaged 480 tb/d in May, compared with 254 tb/d the month before and 646 tb/d in the same month of 2021.

**Table 8 - 3: India's crude and product net imports, mb/d**

India	Mar 22	Apr 22	May 22	Change May 22/Apr 22
Crude oil	4.49	5.25	4.62	-0.63
Total products	-0.67	-0.25	-0.48	-0.23
<b>Total crude and products</b>	<b>3.82</b>	<b>5.00</b>	<b>4.14</b>	<b>-0.86</b>

Note: Totals may not add up due to independent rounding.

India data table does not include information for crude import and product export by Reliance Industries.

Sources: PPAC and OPEC.



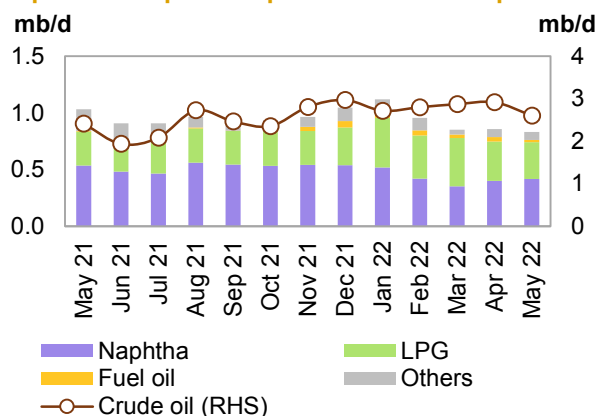
**Looking ahead**, June data is expected to show an increase in crude imports, with Russian inflows rising above 1.1 mb/d and US inflows also increasing. Product imports are expected to remain close to the previous month's levels in June, amid a jump in fuel oil inflows. Product exports are expected to edge higher, driven by higher outflows of naphtha and jet fuel.

## Japan

**Japan's crude imports** fell back from a two-year high, averaging 2.6 mb/d in May, but showed y-o-y growth for the tenth-straight month. M-o-m, crude inflows were about 11%, or 0.3 mb/d, lower. Compared with the same month last year, imports rose almost 8%, or 0.2 mb/d.

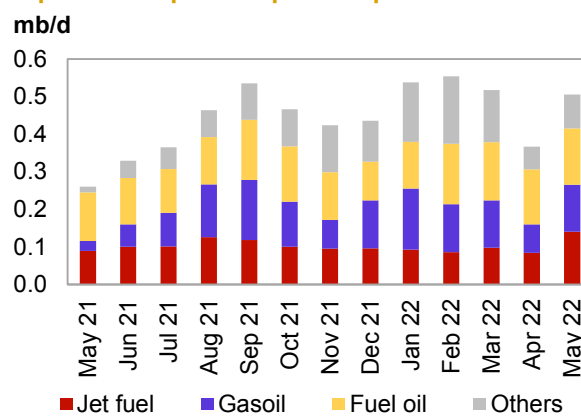
In terms of **crude imports by source**, the UAE claimed the top spot with a share of almost 45%, amid higher inflows. Saudi Arabia was second with 34%, followed by Qatar with around 7%. Russia supplied just 21 tb/d, or less than 1%, of Japan's crude imports in May, compared with about 0.2 mb/d or an almost 6% share in the same month last year.

**Graph 8 - 7: Japan's imports of crude and products**



Sources: METI and OPEC.

**Graph 8 - 8: Japan's exports of products**



Sources: METI and OPEC.

**Product imports**, including LPG, declined 3% to average 832 tb/d in May. Declines were primarily driven by fuel oil, which fell back from the strong levels seen since November 2021. Y-o-y, imports fell 19%, or 0.2 mb/d.

**Product exports** recovered the previous month's losses, up 0.1 mb/d or almost 38% to average 505 tb/d in May, with gains across all major products. Healthy margins and the return of some refineries boosted outflows. Product outflows were 0.2 mb/d, or around 94%, higher than in the same month of 2021.

As a consequence, Japan's **net product imports** averaged 326 tb/d in May. This was down from 489 tb/d the month before and 771 tb/d in May 2021.

**Table 8 - 4: Japan's crude and product net imports, mb/d**

Japan	Mar 22	Apr 22	May 22	Change May 22/Apr 22
Crude oil	2.87	2.91	2.60	-0.31
Total products	0.33	0.49	0.33	-0.16
<b>Total crude and products</b>	<b>3.21</b>	<b>3.40</b>	<b>2.93</b>	<b>-0.48</b>

Note: Totals may not add up due to independent rounding.

Sources: METI and OPEC.

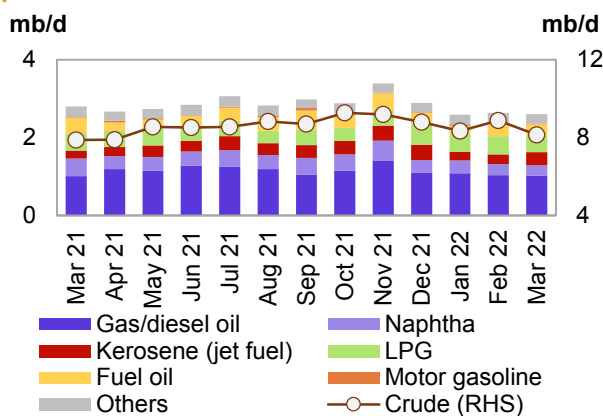
**Looking ahead**, crude imports are expected to slow due to planned refinery maintenance. Product imports are seen higher in June, amid higher inflows of naphtha and fuel oil, while product exports are seen at strong levels, amid higher diesel outflows.

## OECD Europe

The latest official data for **OECD Europe** crude imports averaged 8.1 mb/d in **March**, declining 8% or 0.7 mb/d from the previous month. Y-o-y, imports rose by 0.3 mb/d, or more than 3%.

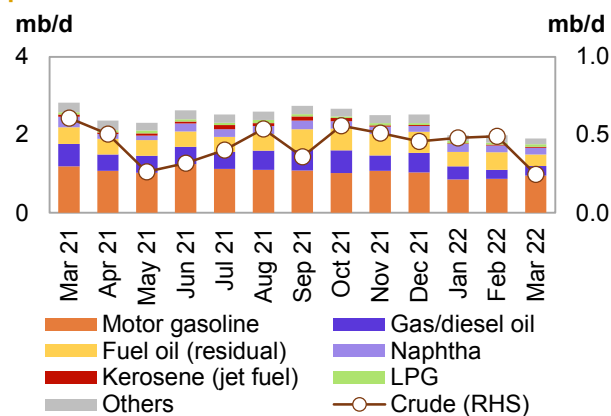
In terms of **import sources** from outside the region, Russia retained the top spot in March with around 2.2 mb/d, followed by the US, which supplied close to 1.2 mb/d, and Kazakhstan with 0.8 mb/d. Crude imports from Russia were down by around 1.0 mb/d m-o-m, while the largest gains were seen from Nigeria, Iraq, Brazil and Saudi Arabia.

**Graph 8 - 9: OECD Europe imports of crude and products**



Sources: IEA and OPEC.

**Graph 8 - 10: OECD Europe exports of crude and products**



Sources: IEA and OPEC.

**Crude exports** also fell, averaging 247 tb/d for a decrease of almost 50% or 0.3 mb/d m-o-m and around 60% or 0.4 mb/d lower y-o-y, as more North Sea crude remained in the region.

In terms of **destination**, China remained the top buyer of OECD Europe crude exports outside the region in March, although buying was sharply lower at 157 tb/d compared with 360 tb/d the month before.

**Net crude imports** averaged 7.9 mb/d in March, compared with 8.3 mb/d the month before and 7.3 mb/d in the same month last year.

On the **product** side, **imports** slipped 1% m-o-m in March, averaging 2.6 mb/d, as a jump in jet fuel inflows was offset by declines across most major products. Product imports declined around 7%, or 0.2 mb/d, compared with March 2021 levels.

**Product exports** fell by 81 tb/d or 4% to average 1.9 mb/d, with a sharp decline in fuel oil outflows partly offset by higher gasoline exports. Y-o-y, exports were 32%, or over 0.9 mb/d, lower than in the same month of 2021.

**Net product imports** averaged 691 tb/d in March, compared with net imports of 646 tb/d in February 2022 and net product exports of 26 tb/d in March 2021, when extended lockdown measures led to a surplus of refined products in the region.

Combined, **net crude and product imports** averaged 8.6 mb/d in March. This compares with 9.0 mb/d the month before, and 7.2 mb/d in March 2021.

**Table 8 - 5: OECD Europe's crude and product net imports, mb/d**

OECD Europe	Jan 22	Feb 22	Mar 22	Change Mar 22/Feb 22
<b>Crude oil</b>	7.86	8.38	7.89	-0.49
<b>Total products</b>	0.60	0.65	0.69	0.04
<b>Total crude and products</b>	<b>8.46</b>	<b>9.03</b>	<b>8.58</b>	<b>-0.45</b>

Note: Totals may not add up due to independent rounding.

Sources: IEA and OPEC.

**Looking ahead**, crude imports are seen increasing in subsequent months, amid relatively steady Russia flows and higher imports from Nigeria. Product imports are seen stable while exports are seen picking up in May and June amid higher outflows of gasoil.

## Eurasia

**Total crude oil exports from Russia and Central Asia** edged up marginally in **May** to average 7.2 mb/d. Compared with the same month in 2021, total crude exports from the region were about 14%, or 889 tb/d, higher. The increase was driven primarily by jump in flows from the CPC terminal near Novorossiysk.

Crude exports through the **Transneft system** declined slightly m-o-m in May. Outflows slipped 35 tb/d, or less than 1%, to remain close to 4.6 mb/d. Compared with the same month last year, exports were 0.8 mb/d, or 24%, higher. From the **Baltic Sea**, exports fell 57 tb/d m-o-m, or about 3%, to average 1.6 mb/d. Exports from Ust-Luga declined 45 tb/d m-o-m, or about 7%, to average 630 tb/d, while flows from Primorsk declined 1%, or 13 tb/d, to remain close to 1.0 mb/d. In contrast, shipments from the **Black Sea** port of Novorossiysk were up 51 tb/d, or about 8%, to average 697 tb/d. Meanwhile, shipments via the **Druzhba** pipeline edged down 25 tb/d, or about 3% m-o-m, to average 832 tb/d. Pacific flows were slightly lower, with **Kozmino** shipments down negligibly m-o-m, to average 811 tb/d. Exports to China via the **ESPO pipeline** were unchanged m-o-m averaging 619 tb/d in May.

In the **Lukoil system**, exports via the Varandey offshore platform in the Barents Sea averaged 136 tb/d in May, while exports from the Kaliningrad terminal fell by 17%.

On other routes, **Russia's Far East** exports declined by 148 tb/d m-o-m, or 56%, to average 116 tb/d in May. This was 64%, or 0.2 mb/d, lower than volumes in May 2021.

**Central Asian** exports averaged 240 tb/d in May, representing an almost 6% increase compared with the month before but a decline of 16%, y-o-y.

**Black Sea** total exports from the CPC terminal showed a robust recovery in May, rising 0.2 mb/d m-o-m, or over 20%, and were 10%, or 134 tb/d, higher than the same month of 2021. There were no exports via the Supsa in May. Exports via the **Baku-Tbilisi-Ceyhan (BTC) pipeline** declined 17 tb/d, or about 3%, to average 658 tb/d, which represented a gain of 30% y-o-y.

**Total product exports from Russia and Central Asia** declined 150 tb/d, or 6% m-o-m, to average 2.3 mb/d in May. M-o-m declines were seen across all major products, led by gasoline. Y-o-y, total product exports were 24%, or 733 tb/d, lower in May.

## Commercial Stock Movements

Preliminary May data sees total OECD commercial oil stocks up m-o-m by 10.5 mb. At 2,680 mb, they were 253 mb less than the same time one year ago, 312 mb lower than the latest five-year average and 276 mb below the 2015-2019 average. Within the components, crude stocks fell m-o-m by 10.1 mb, while product stocks rose m-o-m by 20.6 mb.

At 1,307 mb, OECD crude stocks were 103 mb lower than the same time one year ago, 176 mb lower than the latest five-year average and 179 mb below the 2015-2019 average. OECD product stocks stood at 1,373 mb, representing a deficit of 150 mb with the same time one year ago, 136 mb lower than the latest five-year average and 97 mb below the 2015-2019 average.

In terms of days of forward cover, OECD commercial stocks fell m-o-m by 0.7 days in May to stand at 57.3 days. This is 7.0 days below May 2021 levels, 7.6 days less than the latest five-year average and 4.6 days lower than the 2015-2019 average.

Preliminary data for June showed that total US commercial oil stocks rose sharply m-o-m by 31.1 mb to stand at 1,185.8 mb. This is 85.7 mb lower than the same month in 2021 and 127.9 mb below the latest five-year average. Crude and product stocks rose by 9.1 mb and 22.0 mb, m-o-m, respectively.

## OECD

Preliminary **May** data sees **total OECD commercial oil stocks** up m-o-m by 10.5 mb. At 2,680 mb, they were 253 mb less than the same time one year ago, 312 mb lower than the latest five-year average and 276 mb below the 2015-2019 average.

**Within the components**, crude stocks fell m-o-m by 10.1 mb, while product stocks rose m-o-m by 20.6 mb. Total commercial oil stocks in May rose in OECD Americas and OECD Asia-Pacific while they declined in OECD Europe.

OECD commercial **crude stocks** stood at 1,307 mb in May. This is 103 mb lower than the same time a year ago and 176 mb below the latest five-year average. Compared with the previous month, OECD Americas saw a stock draw of 4.4 mb, OECD Asia Pacific fell by 0.9 mb and OECD Europe dropped by 4.8 mb.

**Total product inventories** stood at 1,373 mb in May. This is 150 mb less than the same time a year ago, and 136 mb lower than the latest five-year average. Product stocks in OECD Americas and OECD Asia Pacific rose m-o-m by 24.8 mb and 3.5 mb, respectively, while product stocks fell m-o-m by 7.7 mb in OECD Asia Pacific.

**Table 9 - 1: OECD's commercial stocks, mb**

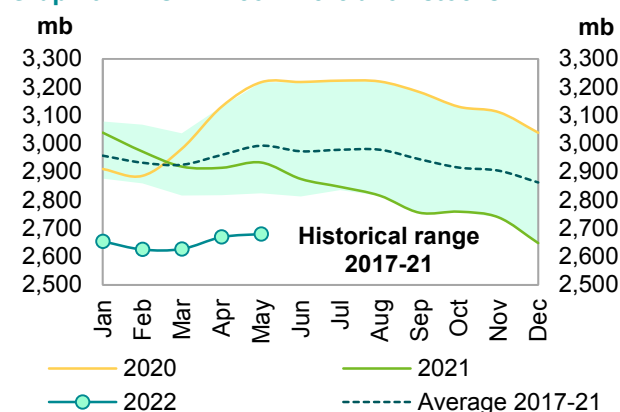
OECD stocks	May 21	Mar 22	Apr 22	May 22	Change May 22/Apr 22
Crude oil	1,410	1,296	1,317	1,310	-6.7
Products	1,523	1,331	1,353	1,370	17.2
<b>Total</b>	<b>2,933</b>	<b>2,627</b>	<b>2,669</b>	<b>2,680</b>	<b>10.5</b>
<b>Days of forward cover</b>	<b>64.4</b>	<b>58.0</b>	<b>58.0</b>	<b>57.2</b>	<b>-0.8</b>

Note: Totals may not add up due to independent rounding.

Sources: Argus, EIA, Euroilstock, IEA, METI and OPEC.

In terms of **days of forward cover**, OECD commercial stocks fell m-o-m by 0.7 days in May to stand at 57.3 days. This is 7.0 days below May 2021 levels, 7.6 days less than the latest five-year average and 4.6 days lower than the 2015-2019 average. All three OECD regions were below the latest five-year average: the Americas by 7.6 days at 56.2 days, Asia Pacific by 6.8 days at 47.0 days and Europe by 8.2 days at 64.6 days.

**Graph 9 - 1: OECD commercial oil stocks**



Sources: Argus, EIA, Euroilstock, IEA, METI and OPEC.

## OECD Americas

**OECD Americas total commercial stocks** rose by 20.4 mb m-o-m in May to settle at 1,441 mb. This is 122 mb less than the same month in 2021 and 142 mb lower than the latest five-year average.

Commercial **crude oil stocks** in OECD Americas fell m-o-m by 4.4 mb in May to stand at 732 mb, which is 68 mb lower than in May 2021 and 80 mb less than the latest five-year average. The stock draw came on the back of higher crude runs.

In contrast, **total product stocks** in OECD Americas rose m-o-m by 24.8 mb in May to stand at 709 mb. This was 54 mb lower than in the same month of 2021 and 62 mb below the latest five-year average. Lower total consumption in the region was behind the stock build.

## OECD Europe

**OECD Europe total commercial stocks** fell m-o-m by 12.6 mb in May to settle at 900 mb. This is 109 mb less than the same month in 2021 and 113 mb below the latest five-year average.

OECD Europe's **commercial crude stocks** in May fell m-o-m by 4.8 mb to end the month at 403 mb, which is 16 mb lower than one year ago and 42 mb below the latest five-year average. The fall in crude oil inventories came despite lower m-o-m refinery throughputs in the EU-14, plus UK and Norway, which decreased by 280 tb/d to stand at 9.4 mb/d.

Europe's **product stocks** fell m-o-m by 7.7 mb to end May at 497 mb. This is 94 mb lower than a year ago and 71 mb below the latest five-year average. The fall in product stocks could be attributed to higher consumption in the region.

## OECD Asia Pacific

**OECD Asia Pacific's total commercial oil stocks** rose m-o-m by 2.6 mb in May to stand at 339 mb. This is 22 mb lower than a year ago and 57 mb below the latest five-year average.

OECD Asia Pacific's **crude inventories** fell by 0.9 mb m-o-m to end May at 171 mb, which is 19 mb lower than one year ago and 54 mb below the latest five-year average.

In contrast, OECD Asia Pacific's **total product inventories** rose m-o-m by 3.5 mb to end May at 167 mb. This is 3.0 mb lower than the same time a year ago and 2.7 mb below the latest five-year average.

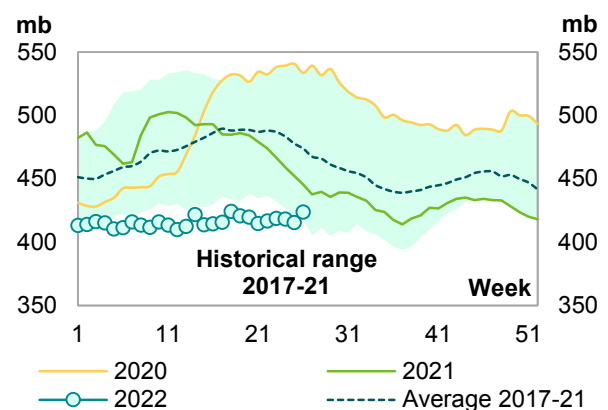
## US

Preliminary data for June showed that **total US commercial oil stocks** rose sharply m-o-m by 31.1 mb to stand at 1,185.8 mb. This is 85.7 mb, or 6.7%, lower than the same month in 2021 and 127.9 mb, or 9.7%, below the latest five-year average. Crude and product stocks rose by 9.1 mb and 22.0 mb, m-o-m, respectively.

US **commercial crude stocks** in June stood at 423.8 mb. This is 24.2 mb, or 5.4%, lower than the same month of the previous year, and 48.4 mb, or 10.2%, below the latest five-year average. The monthly build in crude oil stocks can be attributed to additions from the SPR release.

**Total product stocks** also rose in June to stand at 762.0 mb. This is 61.6 mb, or 7.5%, below May 2021 levels, and 79.5 mb, or 9.5%, lower than the latest five-year average. The stock build was mainly driven by higher product output.

**Graph 9 - 2: US weekly commercial crude oil inventories**



Sources: EIA and OPEC.

## Commercial Stock Movements

**Gasoline stocks** in June rose slightly m-o-m by 0.1 mb to settle at 219.1 mb. This is 18.1 mb, or 7.6% lower than in the same month in 2021, and 21.0 mb, or 8.8%, lower than the latest five-year average. The monthly stock draw came mainly on the back of higher gasoline production.

**Distillate stocks** also rose m-o-m in June by 4.7 mb to stand at 111.1 mb. This is 28.9 mb, or 20.7%, lower than the same month of the previous year, and 33.0 mb, or 22.9%, below the latest five-year average.

**Residual fuel oil stocks** rose by 1.5 mb m-o-m in June. At 28.4 mb, this was 2.7 mb, or 8.7%, lower than a year earlier, and 4.4 mb, or 13.5%, below the latest five-year average.

**Jet fuel stocks** also rose m-o-m by 0.3 mb, ending June at 39.6 mb. This is 4.8 mb, or 10.7%, lower than the same month of 2021, and 1.8 mb, or 4.4%, below the latest five-year average.

**Table 9 - 2: US commercial petroleum stocks, mb**

US stocks					Change
	Jun 21	Apr 22	May 22	Jun 22	Jun 22/May 22
Crude oil	448.0	419.1	414.7	423.8	9.1
Gasoline	237.2	230.1	219.0	219.1	0.1
Distillate fuel	140.1	106.4	106.4	111.1	4.7
Residual fuel oil	31.1	29.4	26.9	28.4	1.5
Jet fuel	44.7	37.7	39.6	39.9	0.3
Total products	823.5	734.4	739.9	762.0	22.0
Total	1,271.5	1,153.5	1,154.7	1,185.8	31.1
SPR	621.3	547.9	526.6	492.0	-34.6

Sources: EIA and OPEC.

## Japan

In **Japan**, **total commercial oil stocks** in May rose m-o-m by 2.6 mb to settle at 117.9 mb. This is 22.4 mb, or 16.0%, lower than the same month in 2021 and 25.0 mb, or 17.5%, below the latest five-year average. Crude stocks fell by 0.9 mb, while product stocks rose by 3.5 mb.

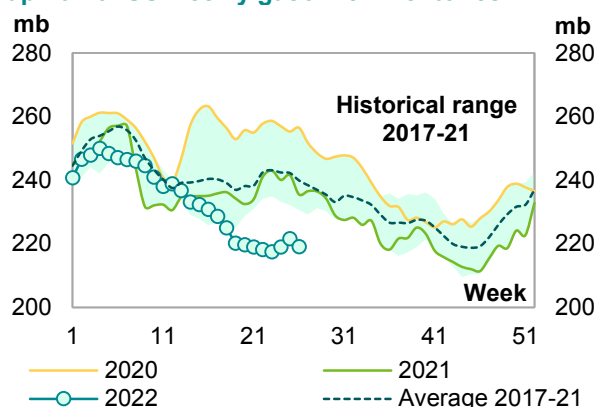
Japanese **commercial crude oil stocks** declined in May to stand at 63.9 mb. This is 11.7 mb, or 15.5%, lower than the same month of the previous year, and 18.8 mb, or 22.7%, lower than the latest five-year average. The drop came on the back of lower crude imports along with higher crude runs.

In contrast, Japan's **total product inventories** rose m-o-m by 3.5 mb to end May at 54.0 mb. This is 10.7 mb, or 16.6%, lower than the same month in 2021 and 6.2 mb, or 10.3%, below the latest five-year average.

**Gasoline stocks** remained unchanged m-o-m to stand at 10.4 mb in May. This was 4.5 mb, or 30.3% lower than a year earlier, and 1.8 mb, or 14.6%, lower than the latest five-year average. Higher gasoline sales offset lower gasoline imports, resulting in the same level of gasoline stocks as last month.

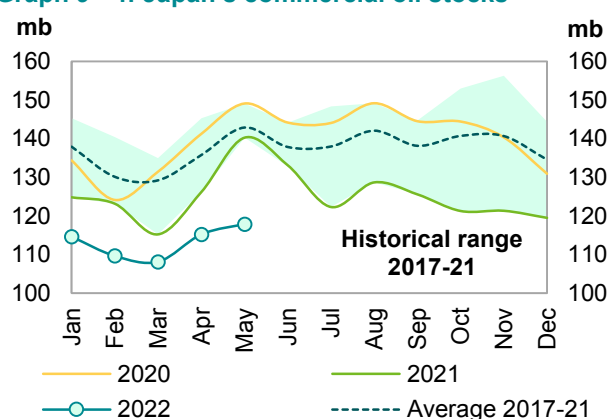
**Distillate stocks** rose m-o-m by 1.7 mb to end May at 22.0 mb. This is 5.5 mb, or 19.8%, lower than the same month in 2021, and 3.1 mb, or 12.5%, below the latest five-year average. Within distillate components, jet fuel stocks went down by 5.7%, while kerosene and gasoil stocks rose by 12.7% and 14.1%, respectively.

**Graph 9 - 3: US weekly gasoline inventories**



Sources: EIA and OPEC.

**Graph 9 - 4: Japan's commercial oil stocks**



Sources: METI and OPEC.

**Total residual fuel oil stocks** rose m-o-m by 0.7 mb to end May at 11.7 mb. This is 1.1 mb, or 8.3%, lower than in the same month of the previous year, and 1.4 mb, or 10.8%, below the latest five-year average. Within the components, fuel oil A and fuel oil B.C stocks rose by 4.1% and 8.5%, respectively.

**Table 9 - 3: Japan's commercial oil stocks\*, mb**

Japan's stocks	May 21	Mar 22	Apr 22	May 22	Change May 22/Apr 22
<b>Crude oil</b>	<b>75.6</b>	<b>60.5</b>	<b>64.8</b>	<b>63.9</b>	<b>-0.9</b>
Gasoline	14.9	9.9	10.4	10.4	0.0
Naphtha	9.5	8.4	8.8	9.8	1.0
Middle distillates	27.5	19.3	20.3	22.0	1.7
Residual fuel oil	12.8	10.1	11.0	11.7	0.7
<b>Total products</b>	<b>64.7</b>	<b>47.6</b>	<b>50.4</b>	<b>54.0</b>	<b>3.5</b>
<b>Total**</b>	<b>140.3</b>	<b>108.2</b>	<b>115.2</b>	<b>117.9</b>	<b>2.6</b>

Note: \* At the end of the month. \*\* Includes crude oil and main products only.

Sources: METI and OPEC.

## EU-14 plus UK and Norway

Preliminary data for May showed that **total European commercial oil stocks** fell m-o-m by 12.6 mb to stand at 993.6 mb. At this level, they were 136.8 mb, or 12.1%, below the same month a year earlier, and 142.6 mb, or 12.5%, lower than the latest five-year average. Crude and product stocks fell by 4.8 mb, and 7.7 mb, respectively.

European **crude inventories** fell in May to stand at 425.0 mb. This is 39.1 mb, or 8.4%, lower than the same month in 2021, and 68.2 mb, or 13.8%, below the latest five-year average. The fall in crude oil inventories came despite lower m-o-m refinery throughputs in the EU-14, plus UK and Norway, which decreased by 280 tb/d to stand at 9.4 mb/d.

**Total European product stocks** also fell m-o-m by 7.7 mb to end May at 568.6 mb. This is 97.7 mb, or 14.7%, lower than the same month of the previous year, and 74.4 mb, or 11.6%, below the latest five-year average.

**Gasoline stocks** fell m-o-m by 1.3 mb in May to stand at 110.7 mb. At this level, they were 5.6 mb, or 4.8%, lower than the same time a year earlier, and 4.2 mb/d, or 3.7%, less than the latest five-year average.

**Distillate stocks** also fell m-o-m by 8.3 mb in May to stand at 368.3 mb. This is 82.6 mb, or 18.3%, below the same month in 2021, and 62.6 mb, or 14.5%, less than the latest five-year average.

In contrast, **residual fuel stocks** rose m-o-m by 1.4 mb in May to stand at 62.0 mb. This is 4.6 mb, or 6.8%, lower than the same month in 2021, and 5.6 mb, or 8.2%, below the latest five-year average.

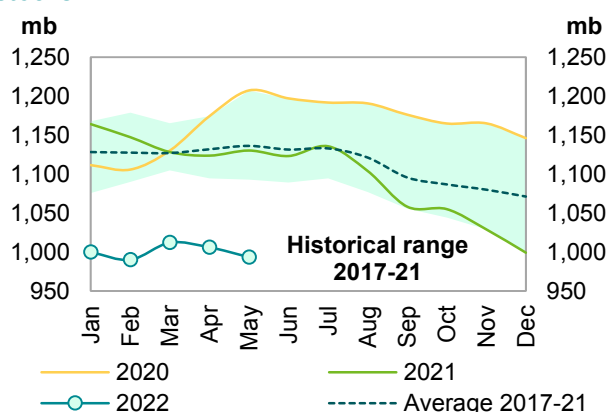
**Naphtha stocks** also rose by 0.3 mb in May, ending the month at 27.6 mb. This is 5.0 mb, or 15.3 % below May 2021 levels, and 2.1 mb, or 7.0%, below the latest five-year average.

**Table 9 - 4: EU-14 plus UK and Norway's total oil stocks, mb**

EU stocks	May 21	Mar 22	Apr 22	May 22	Change May 22/Apr 22
<b>Crude oil</b>	<b>464.1</b>	<b>428.0</b>	<b>429.8</b>	<b>425.0</b>	<b>-4.8</b>
Gasoline	116.3	110.0	112.0	110.7	-1.3
Naphtha	32.6	24.8	27.3	27.6	0.3
Middle distillates	450.8	389.9	376.5	368.3	-8.3
Fuel oils	66.6	59.5	60.6	62.0	1.4
<b>Total products</b>	<b>666.3</b>	<b>584.2</b>	<b>576.3</b>	<b>568.6</b>	<b>-7.7</b>
<b>Total</b>	<b>1,130.4</b>	<b>1,012.2</b>	<b>1,006.1</b>	<b>993.6</b>	<b>-12.6</b>

Sources: Argus, Euroilstock and OPEC.

**Graph 9 - 5: EU-14 plus UK and Norway's total oil stocks**



Sources: Argus, Euroilstock and OPEC.

## Singapore, Amsterdam-Rotterdam-Antwerp (ARA) and Fujairah

### Singapore

In May, **total product stocks in Singapore** rose m-o-m by 2.7 mb to 43.0 mb. This is 6.9 mb, or 13.8%, lower than the same month in 2021.

**Light distillate stocks** rose m-o-m by 1.4 mb in May to stand at 15.3 mb. This is 2 mb, or 14.9%, higher than the same month of the previous year.

**Middle distillate stocks** also rose m-o-m by 0.4 mb in May to stand at 7.0 mb. This is 4.7 mb, or 40.2%, lower than a year earlier.

**Residual fuel oil stocks** also rose m-o-m by 0.9 mb, ending May at 20.7 mb. This is 4.2 mb, or 16.8%, lower than in May 2021.

### ARA

**Total product stocks in ARA** fell m-o-m in May by 1.5 mb for the second consecutive month. At 37.2 mb, they are 9.6 mb, or 20.5%, lower than the same month in 2021.

**Gasoline stocks** in May fell m-o-m 1.0 mb to stand at 10.6 mb, which is 0.5 mb, or 4.9%, higher than the same month of the previous year.

**Jet oil stocks** also fell m-o-m by 0.3 mb to end May at 6.3 mb. This is 2.8 mb, or 30.6%, lower than the level registered one year earlier

In contrast, **fuel oil stocks** rose m-o-m by 0.5 mb in May to stand at 6.9 mb, which is 1.5 mb, or 18.0%, lower than in May 2021.

Meanwhile, **gasoil stocks** remained unchanged m-o-m at 11.2 mb. This is 5.7 mb, or 33.5%, lower than the level seen in May 2021.

### Fujairah

During the week ending 27 June 2022, **total oil product stocks in Fujairah** fell w-o-w by 0.09 mb to stand at 19.37 mb, according to data from Fed Com and S&P Global Platts. At this level, total oil stocks were 3.69 mb lower than the same time a year ago.

**Light distillate stocks** fell by 0.37 mb w-o-w to stand at 5.44 mb in the week to 27 June 2022, which is 1.82 mb lower than the same period a year ago. **Middle distillate stocks** also fell by 0.57 mb to stand at 2.89 mb, which is 1.05 mb lower than a year ago. **Heavy distillate stocks** rose w-o-w by 0.85 mb to stand at 11.05 mb, which is 0.81 mb lower than the same time last year.



## Balance of Supply and Demand

Demand for OPEC crude in 2022 remains unchanged from the previous month to stand at 29.2 mb/d, which is around 1.1 mb/d higher than in 2021. According to secondary sources, OPEC crude production averaged 28.4 mb/d in 1Q22, which is 0.3 mb/d lower than demand for OPEC crude. In 2Q22, OPEC crude production averaged 28.6 mb/d, 0.6 mb/d higher than demand.

Based on the first world oil demand and non-OPEC supply forecast in 2023, demand for OPEC crude is expected to reach 30.1 mb/d, 0.9 mb/d higher than in 2022.

## Balance of supply and demand in 2022

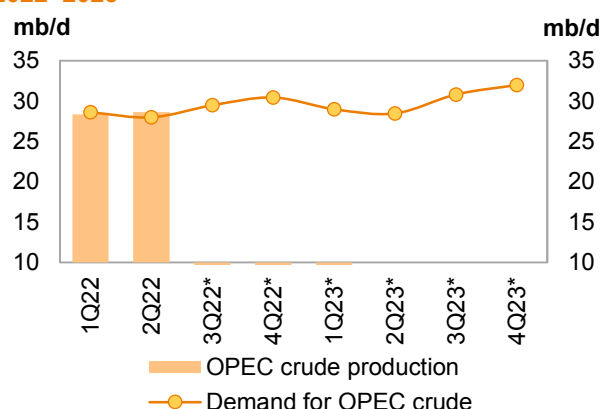
**Demand for OPEC crude in 2022** remains unchanged from the previous MOMR to stand at 29.2 mb/d. This is around 1.1 mb/d higher than in 2021.

Compared with the previous assessment, 1Q22 was revised up by 0.1 mb/d, while 2Q22 remains unchanged. 3Q22 was revised down by 0.2 mb/d, while 4Q22 was revised up by 0.1 mb/d.

Compared with the same quarters in 2021, demand for OPEC crude in 1Q22, 2Q22 and 3Q22 is forecast to be higher by 2.4 mb/d, 1.0 mb/d and 0.8 mb/d, respectively, while 4Q22 is forecast to be slightly higher by 0.3 mb/d.

According to secondary sources, OPEC crude production averaged 28.4 mb/d in 1Q22, which is 0.3 mb/d lower than the demand for OPEC crude. In 2Q22, OPEC crude production averaged 28.6 mb/d, 0.6 mb/d higher than demand.

**Graph 10 - 1: Balance of supply and demand, 2022–2023\***



Note: \* 3Q22-4Q23 = Forecast. Source: OPEC.

**Table 10 - 1: Supply/demand balance for 2022\*, mb/d**

	2021	1Q22	2Q22	3Q22	4Q22	2022	Change 2022/21
<b>(a) World oil demand</b>	<b>96.92</b>	<b>99.33</b>	<b>98.33</b>	<b>100.65</b>	<b>102.77</b>	<b>100.29</b>	<b>3.36</b>
Non-OPEC liquids production	63.59	65.36	64.94	65.74	66.88	65.73	2.15
OPEC NGL and non-conventionals	5.28	5.35	5.38	5.41	5.43	5.39	0.11
<b>(b) Total non-OPEC liquids production and OPEC NGLs</b>	<b>68.87</b>	<b>70.71</b>	<b>70.32</b>	<b>71.14</b>	<b>72.31</b>	<b>71.13</b>	<b>2.25</b>
<b>Difference (a-b)</b>	<b>28.05</b>	<b>28.63</b>	<b>28.01</b>	<b>29.50</b>	<b>30.46</b>	<b>29.16</b>	<b>1.11</b>
OPEC crude oil production	26.35	28.36	28.62				
<b>Balance</b>	<b>-1.70</b>	<b>-0.27</b>	<b>0.61</b>				

Note: \* 2022 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.

## Balance of supply and demand in 2023

Based on the first world oil demand and non-OPEC supply forecast in **2023**, demand for OPEC crude is expected to reach 30.1 mb/d, 0.9 mb/d higher than in 2022.

Compared with the same quarters in 2022, demand for OPEC crude in 1Q23 and 2Q23 is forecast to be 0.4 mb/d and 0.5 mb/d higher, respectively. An increase of 1.3 mb/d and 1.5 mb/d, respectively, are projected for 3Q23 and 4Q23.

**Table 10 - 2: Supply/demand balance for 2023\*, mb/d**

	2022	1Q23	2Q23	3Q23	4Q23	2023	Change 2023/22
<b>(a) World oil demand</b>	<b>100.29</b>	<b>101.72</b>	<b>101.12</b>	<b>103.64</b>	<b>105.40</b>	<b>102.99</b>	<b>2.70</b>
Non-OPEC liquids production	65.73	67.28	67.15	67.37	67.96	67.44	1.71
OPEC NGL and non-conventionals	5.39	5.44	5.47	5.43	5.43	5.44	0.05
<b>(b) Total non-OPEC liquids production and OPEC NGLs</b>	<b>71.13</b>	<b>72.71</b>	<b>72.63</b>	<b>72.80</b>	<b>73.38</b>	<b>72.88</b>	<b>1.76</b>
<b>Difference (a-b)</b>	<b>29.16</b>	<b>29.01</b>	<b>28.50</b>	<b>30.84</b>	<b>32.01</b>	<b>30.10</b>	<b>0.94</b>

Note: \* 2022-2023 = Forecast. Totals may not add up due to independent rounding. Source: OPEC.

# Appendix

Table 11 - 1: World oil demand and supply balance, mb/d

World oil demand and supply balance	2019	2020	2021	1Q22	2Q22	3Q22	4Q22	2022	1Q23	2Q23	3Q23	4Q23	2023
<b>World demand</b>													
Americas	25.53	22.56	24.28	24.84	24.99	25.49	25.76	25.27	25.20	25.47	26.04	26.27	25.75
of which US	20.58	18.35	19.93	20.38	20.57	20.99	21.21	20.79	20.42	20.76	21.24	21.36	20.95
Europe	14.31	12.43	13.08	13.09	13.31	14.29	14.15	13.71	13.10	13.35	14.46	14.26	13.80
Asia Pacific	7.93	7.14	7.41	7.91	7.19	7.25	7.93	7.57	7.94	7.25	7.29	7.94	7.60
<b>Total OECD</b>	<b>47.78</b>	<b>42.13</b>	<b>44.77</b>	<b>45.83</b>	<b>45.49</b>	<b>47.03</b>	<b>47.84</b>	<b>46.55</b>	<b>46.24</b>	<b>46.07</b>	<b>47.78</b>	<b>48.47</b>	<b>47.15</b>
China	13.71	13.86	14.94	14.67	14.96	15.42	15.97	15.26	15.31	15.98	16.14	16.53	15.99
India	4.99	4.51	4.77	5.18	4.95	5.01	5.39	5.13	5.38	5.20	5.27	5.63	5.37
Other Asia	9.06	8.13	8.63	9.09	9.54	8.93	8.95	9.12	9.48	9.87	9.29	9.30	9.48
Latin America	6.59	5.90	6.23	6.32	6.28	6.53	6.42	6.39	6.48	6.41	6.69	6.56	6.54
Middle East	8.20	7.45	7.79	8.06	7.82	8.32	8.09	8.07	8.43	8.10	8.65	8.38	8.39
Africa	4.34	4.05	4.22	4.51	4.15	4.23	4.54	4.36	4.70	4.34	4.42	4.73	4.55
Russia	3.57	3.39	3.61	3.67	3.28	3.45	3.54	3.48	3.68	3.30	3.62	3.72	3.58
Other Eurasia	1.19	1.07	1.21	1.22	1.15	1.01	1.24	1.15	1.22	1.15	1.02	1.25	1.16
Other Europe	0.76	0.70	0.75	0.79	0.71	0.73	0.80	0.76	0.80	0.72	0.75	0.82	0.78
<b>Total Non-OECD</b>	<b>52.42</b>	<b>49.06</b>	<b>52.15</b>	<b>53.50</b>	<b>52.85</b>	<b>53.62</b>	<b>54.93</b>	<b>53.73</b>	<b>55.48</b>	<b>55.05</b>	<b>55.85</b>	<b>56.92</b>	<b>55.84</b>
<b>(a) Total world demand</b>	<b>100.20</b>	<b>91.19</b>	<b>96.92</b>	<b>99.33</b>	<b>98.33</b>	<b>100.65</b>	<b>102.77</b>	<b>100.29</b>	<b>101.72</b>	<b>101.12</b>	<b>103.64</b>	<b>105.40</b>	<b>102.99</b>
<b>Y-o-y change</b>	<b>1.00</b>	<b>-9.01</b>	<b>5.74</b>	<b>5.29</b>	<b>2.73</b>	<b>2.99</b>	<b>2.47</b>	<b>3.36</b>	<b>2.39</b>	<b>2.79</b>	<b>2.99</b>	<b>2.62</b>	<b>2.70</b>
<b>Non-OPEC liquids production</b>													
Americas	25.82	24.71	25.16	25.86	26.35	26.95	27.46	26.66	27.65	27.59	27.88	28.24	27.84
of which US	18.47	17.61	17.75	18.26	18.94	19.27	19.67	19.04	19.85	20.06	20.20	20.43	20.14
Europe	3.70	3.89	3.76	3.73	3.58	3.79	4.12	3.81	4.14	4.05	3.96	4.06	4.05
Asia Pacific	0.52	0.52	0.51	0.49	0.52	0.56	0.54	0.53	0.54	0.50	0.53	0.49	0.51
<b>Total OECD</b>	<b>30.04</b>	<b>29.13</b>	<b>29.43</b>	<b>30.08</b>	<b>30.45</b>	<b>31.30</b>	<b>32.12</b>	<b>30.99</b>	<b>32.32</b>	<b>32.15</b>	<b>32.37</b>	<b>32.79</b>	<b>32.41</b>
China	4.05	4.15	4.31	4.49	4.49	4.42	4.43	4.46	4.51	4.50	4.47	4.47	4.49
India	0.82	0.78	0.77	0.77	0.78	0.80	0.83	0.79	0.82	0.81	0.80	0.78	0.80
Other Asia	2.72	2.51	2.41	2.37	2.36	2.36	2.35	2.36	2.36	2.32	2.29	2.27	2.31
Latin America	6.08	6.03	5.95	6.14	6.22	6.21	6.43	6.25	6.40	6.60	6.69	6.75	6.61
Middle East	3.19	3.19	3.24	3.29	3.31	3.38	3.38	3.34	3.37	3.39	3.40	3.40	3.39
Africa	1.51	1.41	1.35	1.33	1.29	1.31	1.32	1.31	1.32	1.34	1.35	1.37	1.35
Russia	11.61	10.59	10.80	11.33	10.63	10.29	10.29	10.63	10.42	10.41	10.42	10.46	10.43
Other Eurasia	3.07	2.92	2.93	3.06	2.91	3.17	3.22	3.09	3.19	3.06	3.00	3.09	3.08
Other Europe	0.12	0.12	0.11	0.11	0.11	0.10	0.10	0.11	0.10	0.10	0.10	0.10	0.10
<b>Total Non-OECD</b>	<b>33.18</b>	<b>31.71</b>	<b>31.87</b>	<b>32.88</b>	<b>32.10</b>	<b>32.04</b>	<b>32.35</b>	<b>32.34</b>	<b>32.49</b>	<b>32.54</b>	<b>32.54</b>	<b>32.70</b>	<b>32.57</b>
Total Non-OPEC production	63.23	60.84	61.30	62.96	62.54	63.34	64.48	63.33	64.81	64.68	64.90	65.49	64.97
Processing gains	2.37	2.16	2.29	2.40	2.40	2.40	2.40	2.40	2.47	2.47	2.47	2.47	2.47
<b>Total Non-OPEC liquids production</b>	<b>65.60</b>	<b>62.99</b>	<b>63.59</b>	<b>65.36</b>	<b>64.94</b>	<b>65.74</b>	<b>66.88</b>	<b>65.73</b>	<b>67.28</b>	<b>67.15</b>	<b>67.37</b>	<b>67.96</b>	<b>67.44</b>
OPEC NGL + non-conventional oils	5.21	5.17	5.28	5.35	5.38	5.41	5.43	5.39	5.44	5.47	5.43	5.43	5.44
<b>(b) Total non-OPEC liquids production and OPEC NGLs</b>	<b>70.81</b>	<b>68.16</b>	<b>68.87</b>	<b>70.71</b>	<b>70.32</b>	<b>71.14</b>	<b>72.31</b>	<b>71.13</b>	<b>72.71</b>	<b>72.63</b>	<b>72.80</b>	<b>73.38</b>	<b>72.88</b>
<b>Y-o-y change</b>	<b>2.11</b>	<b>-2.65</b>	<b>0.71</b>	<b>2.90</b>	<b>1.75</b>	<b>2.24</b>	<b>2.13</b>	<b>2.25</b>	<b>2.01</b>	<b>2.30</b>	<b>1.66</b>	<b>1.08</b>	<b>1.76</b>
<b>OPEC crude oil production (secondary sources)</b>	<b>29.37</b>	<b>25.72</b>	<b>26.35</b>	<b>28.36</b>	<b>28.62</b>								
<b>Total liquids production</b>	<b>100.18</b>	<b>93.87</b>	<b>95.22</b>	<b>99.06</b>	<b>98.95</b>								
<b>Balance (stock change and miscellaneous)</b>	<b>-0.02</b>	<b>2.69</b>	<b>-1.70</b>	<b>-0.27</b>	<b>0.61</b>								
<b>OECD closing stock levels, mb</b>													
Commercial	2,894	3,038	2,648	2,627									
SPR	1,535	1,541	1,484	1,442									
<b>Total</b>	<b>4,429</b>	<b>4,579</b>	<b>4,131</b>	<b>4,069</b>									
<b>Oil-on-water</b>	<b>1,033</b>	<b>1,148</b>	<b>1,202</b>	<b>1,225</b>									
<b>Days of forward consumption in OECD, days</b>													
Commercial onland stocks	69	68	57	58									
SPR	36	34	32	32									
<b>Total</b>	<b>105</b>	<b>102</b>	<b>89</b>	<b>89</b>									
<b>Memo items</b>													
<b>(a) - (b)</b>	<b>29.39</b>	<b>23.03</b>	<b>28.05</b>	<b>28.63</b>	<b>28.01</b>	<b>29.50</b>	<b>30.46</b>	<b>29.16</b>	<b>29.01</b>	<b>28.50</b>	<b>30.84</b>	<b>32.01</b>	<b>30.10</b>

Note: Totals may not add up due to independent rounding.

Source: OPEC.

Table 11 - 2: World oil demand and supply balance: changes from last month's table\*, mb/d

World oil demand and supply balance	2019	2020	2021	1Q22	2Q22	3Q22	4Q22	2022	1Q23	2Q23	3Q23	4Q23	2023
<b>World demand</b>													
Americas	-	-	-	0.06	-	-0.20	-	-0.04					
of which US	-	-	-	0.08	-	-0.20	-	-0.03					
Europe	-	-	-	-0.01	0.25	-	0.01	0.06					
Asia Pacific	-	-	-	0.01	-0.03	-	-	-0.01					
<b>Total OECD</b>	-	-	-	<b>0.06</b>	<b>0.22</b>	<b>-0.20</b>	<b>0.01</b>	<b>0.02</b>					
China	-	-	-	-	-0.20	-	-	-0.05					
India	-	-	-	-	0.10	-	-	0.02					
Other Asia	-	-	-	-	-0.05	-	-	-0.01					
Latin America	-	-	-	-	0.03	-	-	0.01					
Middle East	-	-	-	-	0.05	-	-	0.01					
Africa	-	-	-	-	-	-	-	-					
Russia	-	-	-	-	-	-	-	-					
Other Eurasia	-	-	-	-	-	-	-	-					
Other Europe	-	-	-	-	-	-	-	-					
<b>Total Non-OECD</b>	-	-	-	-	<b>-0.08</b>	-	<b>-0.01</b>	<b>-0.02</b>					
<b>(a) Total world demand</b>	-	-	-	<b>0.06</b>	<b>0.15</b>	<b>-0.20</b>	-	-					
Y-o-y change	-	-	-	<b>0.06</b>	<b>0.15</b>	<b>-0.20</b>	-	-					
<b>Non-OPEC liquids production</b>													
Americas	-	-	-0.02	-0.03	0.04	-	-	-					
of which US	-	-	-	-	-	-	-	-					
Europe	-	-	-	0.03	-0.01	-	-	-					
Asia Pacific	-	-	-	-	-0.02	-	-	-					
<b>Total OECD</b>	-	-	<b>-0.02</b>	-	<b>0.01</b>	<b>-0.01</b>	<b>-0.01</b>	-					
China	-	-	-	-	0.09	0.08	-	0.04					
India	-	-	-	-	-	-	-	-					
Other Asia	-	-	-0.01	-0.01	-0.03	-0.01	-0.01	-0.02					
Latin America	-	-	-	-0.01	-0.06	-	-	-0.02					
Middle East	-	-	-	-	-0.05	-	-	-0.02					
Africa	-	-	0.01	-	-0.02	0.01	-	-					
Russia	-	-	-	-	0.23	-0.12	-0.11	-					
Other Eurasia	-	-	-	-	-0.02	-	-	-0.01					
Other Europe	-	-	-	-	-	-	-	-					
<b>Total Non-OECD</b>	-	-	-	<b>-0.02</b>	<b>0.13</b>	<b>-0.05</b>	<b>-0.12</b>	<b>-0.02</b>					
Total Non-OPEC production	-	-	-0.02	-0.02	0.13	-0.06	-0.13	-0.02					
Processing gains	0.01	-	0.01	0.01	0.01	0.01	0.01	0.01					
<b>Total Non-OPEC liquids production</b>	<b>0.01</b>	-	<b>-0.01</b>	<b>-0.01</b>	<b>0.14</b>	<b>-0.05</b>	<b>-0.12</b>	<b>-0.01</b>					
OPEC NGL + non-conventional oils	-	-	-	-	-	-	-	-					
<b>(b) Total non-OPEC liquids production and OPEC NGLs</b>	<b>0.01</b>	-	<b>-0.01</b>	<b>-0.01</b>	<b>0.14</b>	<b>-0.05</b>	<b>-0.12</b>	<b>-0.01</b>					
Y-o-y change	<b>0.01</b>	<b>-0.01</b>	<b>-0.01</b>	<b>0.01</b>	<b>0.16</b>	<b>-0.05</b>	<b>-0.12</b>	-					
<b>OPEC crude oil production (secondary sources)</b>	-	-	-	-	28.62								
<b>Total liquids production</b>	0.01	-	-0.01	-0.01	98.95								
<b>Balance (stock change and miscellaneous)</b>	0.01	-	-0.01	-0.07	0.61								
<b>mb</b>													
Commercial	-	-	1	1									
SPR	-	-	-	3									
<b>Total</b>	-	-	<b>1</b>	<b>4</b>									
<b>Oil-on-water</b>	-	-	-	-									
<b>Days of forward consumption in OECD, days</b>													
Commercial onland stocks	-	-	-	-									
SPR	-	-	-	-									
<b>Total</b>	-	-	-	-									
<b>Memo items</b>													
<b>(a) - (b)</b>	<b>-0.01</b>	<b>0.00</b>	<b>0.01</b>	<b>0.07</b>	<b>0.01</b>	<b>-0.15</b>	<b>0.12</b>	<b>0.01</b>					

Note: \* This compares Table 11 - 1 in this issue of the MOMR with Table 11 - 1 in the June 2022 issue.

This table shows only where changes have occurred.

Source: OPEC.

Table 11 - 3: OECD oil stocks and oil on water at the end of period

OECD oil stocks and oil on water	2019	2020	2021	1Q20	2Q20	3Q20	4Q20	1Q21	2Q21	3Q21	4Q21	1Q22
<b>Closing stock levels, mb</b>												
<b>OECD onland commercial</b>	<b>2,894</b>	<b>3,038</b>	<b>2,648</b>	<b>2,982</b>	<b>3,217</b>	<b>3,182</b>	<b>3,038</b>	<b>2,918</b>	<b>2,875</b>	<b>2,755</b>	<b>2,648</b>	<b>2,627</b>
Americas	1,522	1,615	1,466	1,583	1,719	1,691	1,615	1,570	1,543	1,508	1,466	1,415
Europe	978	1,043	858	1,033	1,099	1,079	1,043	1,002	974	892	858	896
Asia Pacific	394	380	324	366	400	411	380	346	357	355	324	316
<b>OECD SPR</b>	<b>1,535</b>	<b>1,541</b>	<b>1,484</b>	<b>1,537</b>	<b>1,561</b>	<b>1,551</b>	<b>1,541</b>	<b>1,546</b>	<b>1,524</b>	<b>1,513</b>	<b>1,484</b>	<b>1,442</b>
Americas	637	640	596	637	658	644	640	640	623	620	596	568
Europe	482	488	479	484	487	490	488	493	487	485	479	468
Asia Pacific	416	414	409	416	416	417	414	413	413	408	409	406
<b>OECD total</b>	<b>4,429</b>	<b>4,579</b>	<b>4,131</b>	<b>4,519</b>	<b>4,779</b>	<b>4,733</b>	<b>4,579</b>	<b>4,464</b>	<b>4,398</b>	<b>4,268</b>	<b>4,131</b>	<b>4,069</b>
<b>Oil-on-water</b>	<b>1,033</b>	<b>1,148</b>	<b>1,202</b>	<b>1,187</b>	<b>1,329</b>	<b>1,174</b>	<b>1,148</b>	<b>1,138</b>	<b>1,131</b>	<b>1,169</b>	<b>1,202</b>	<b>1,225</b>
<b>Days of forward consumption in OECD, days</b>												
<b>OECD onland commercial</b>	<b>69</b>	<b>68</b>	<b>57</b>	<b>79</b>	<b>76</b>	<b>74</b>	<b>72</b>	<b>66</b>	<b>63</b>	<b>59</b>	<b>58</b>	<b>58</b>
Americas	67	67	58	79	76	73	71	64	62	60	59	57
Europe	79	80	63	94	85	86	88	79	70	64	66	68
Asia Pacific	55	51	43	55	59	56	50	49	50	45	41	44
<b>OECD SPR</b>	<b>37</b>	<b>35</b>	<b>34</b>	<b>41</b>	<b>37</b>	<b>36</b>	<b>36</b>	<b>35</b>	<b>33</b>	<b>32</b>	<b>32</b>	<b>32</b>
Americas	28	26	24	32	29	28	28	26	25	25	24	23
Europe	39	37	35	44	38	39	41	39	35	35	37	36
Asia Pacific	58	56	54	63	62	57	54	59	58	52	52	57
<b>OECD total</b>	<b>107</b>	<b>104</b>	<b>91</b>	<b>120</b>	<b>113</b>	<b>110</b>	<b>108</b>	<b>101</b>	<b>96</b>	<b>91</b>	<b>90</b>	<b>90</b>

Sources: Argus, EIA, Euroilstock, IEA, JODI, METI and OPEC.

Table 11 - 4: Non-OPEC liquids production and OPEC natural gas liquids, mb/d\*

Non-OPEC liquids production and OPEC NGLs	Change							Change					
	2019	2020	2021	3Q22	4Q22	2022	22/21	1Q23	2Q23	3Q23	4Q23	2023	23/22
<b>US</b>	18.5	17.6	17.8	19.3	19.7	19.0	1.3	19.9	20.1	20.2	20.4	20.1	1.1
<b>Canada</b>	5.4	5.2	5.4	5.7	5.8	5.6	0.2	5.8	5.6	5.8	6.0	5.8	0.2
<b>Mexico</b>	1.9	1.9	2.0	2.0	2.0	2.0	0.0	1.9	1.9	1.9	1.8	1.9	-0.1
<b>Chile</b>	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
<b>OECD Americas</b>	<b>25.8</b>	<b>24.7</b>	<b>25.2</b>	<b>27.0</b>	<b>27.5</b>	<b>26.7</b>	<b>1.5</b>	<b>27.6</b>	<b>27.6</b>	<b>27.9</b>	<b>28.2</b>	<b>27.8</b>	<b>1.2</b>
<b>Norway</b>	1.7	2.0	2.0	2.1	2.3	2.1	0.0	2.3	2.3	2.3	2.3	2.3	0.2
<b>UK</b>	1.1	1.1	0.9	0.9	1.0	0.9	0.0	1.0	1.0	0.9	0.9	0.9	0.0
<b>Denmark</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Other OECD</b>	0.7	0.7	0.7	0.7	0.7	0.7	0.0	0.8	0.8	0.7	0.7	0.8	0.0
<b>OECD Europe</b>	<b>3.7</b>	<b>3.9</b>	<b>3.8</b>	<b>3.8</b>	<b>4.1</b>	<b>3.8</b>	<b>0.0</b>	<b>4.1</b>	<b>4.1</b>	<b>4.0</b>	<b>4.1</b>	<b>4.1</b>	<b>0.2</b>
<b>Australia</b>	0.5	0.5	0.4	0.5	0.5	0.5	0.0	0.5	0.4	0.5	0.4	0.4	0.0
<b>Other Asia Pacific</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>OECD Asia Pacific</b>	<b>0.5</b>	<b>0.5</b>	<b>0.5</b>	<b>0.6</b>	<b>0.5</b>	<b>0.5</b>	<b>0.0</b>	<b>0.5</b>	<b>0.5</b>	<b>0.5</b>	<b>0.5</b>	<b>0.5</b>	<b>0.0</b>
<b>Total OECD</b>	<b>30.0</b>	<b>29.1</b>	<b>29.4</b>	<b>31.3</b>	<b>32.1</b>	<b>31.0</b>	<b>1.6</b>	<b>32.3</b>	<b>32.1</b>	<b>32.4</b>	<b>32.8</b>	<b>32.4</b>	<b>1.4</b>
<b>China</b>	<b>4.1</b>	<b>4.2</b>	<b>4.3</b>	<b>4.4</b>	<b>4.4</b>	<b>4.5</b>	<b>0.2</b>	<b>4.5</b>	<b>4.5</b>	<b>4.5</b>	<b>4.5</b>	<b>4.5</b>	<b>0.0</b>
<b>India</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.0</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.8</b>	<b>0.0</b>
<b>Brunei</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Indonesia</b>	0.9	0.9	0.8	0.8	0.8	0.8	0.0	0.8	0.8	0.8	0.8	0.8	0.0
<b>Malaysia</b>	0.7	0.6	0.6	0.6	0.7	0.6	0.0	0.7	0.6	0.6	0.6	0.6	0.0
<b>Thailand</b>	0.5	0.5	0.4	0.4	0.4	0.4	0.0	0.4	0.4	0.4	0.4	0.4	0.0
<b>Vietnam</b>	0.3	0.2	0.2	0.2	0.2	0.2	0.0	0.2	0.2	0.2	0.2	0.2	0.0
<b>Asia others</b>	0.2	0.2	0.2	0.2	0.2	0.2	0.0	0.2	0.2	0.2	0.2	0.2	0.0
<b>Other Asia</b>	<b>2.7</b>	<b>2.5</b>	<b>2.4</b>	<b>2.4</b>	<b>2.3</b>	<b>2.4</b>	<b>0.0</b>	<b>2.4</b>	<b>2.3</b>	<b>2.3</b>	<b>2.3</b>	<b>2.3</b>	<b>0.0</b>
<b>Argentina</b>	0.7	0.7	0.7	0.7	0.7	0.7	0.1	0.8	0.8	0.8	0.8	0.8	0.1
<b>Brazil</b>	3.6	3.7	3.6	3.7	3.9	3.7	0.2	3.8	3.9	4.0	4.0	3.9	0.2
<b>Colombia</b>	0.9	0.8	0.8	0.7	0.7	0.7	0.0	0.7	0.7	0.7	0.7	0.7	0.0
<b>Ecuador</b>	0.5	0.5	0.5	0.5	0.5	0.5	0.0	0.5	0.5	0.5	0.5	0.5	0.0
<b>Guyana</b>	0.0	0.1	0.1	0.2	0.3	0.2	0.1	0.3	0.3	0.3	0.4	0.3	0.1
<b>Latin America</b>	0.4	0.3	0.3	0.3	0.3	0.3	0.0	0.3	0.3	0.3	0.3	0.3	0.0
<b>Latin America</b>	<b>6.1</b>	<b>6.0</b>	<b>6.0</b>	<b>6.2</b>	<b>6.4</b>	<b>6.2</b>	<b>0.3</b>	<b>6.4</b>	<b>6.6</b>	<b>6.7</b>	<b>6.8</b>	<b>6.6</b>	<b>0.4</b>
<b>Bahrain</b>	0.2	0.2	0.2	0.2	0.2	0.2	0.0	0.2	0.2	0.2	0.2	0.2	0.0
<b>Oman</b>	1.0	1.0	1.0	1.1	1.1	1.0	0.1	1.1	1.1	1.1	1.1	1.1	0.0
<b>Qatar</b>	1.9	1.9	2.0	2.0	2.0	2.0	0.0	2.0	2.0	2.0	2.0	2.0	0.0
<b>Syria</b>	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.0	0.0
<b>Yemen</b>	0.0	0.1	0.1	0.0	0.0	0.1	0.0	0.0	0.1	0.1	0.1	0.1	0.0
<b>Middle East</b>	<b>3.2</b>	<b>3.2</b>	<b>3.2</b>	<b>3.4</b>	<b>3.4</b>	<b>3.3</b>	<b>0.1</b>	<b>3.4</b>	<b>3.4</b>	<b>3.4</b>	<b>3.4</b>	<b>3.4</b>	<b>0.0</b>
<b>Cameroon</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Chad</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Egypt</b>	0.7	0.6	0.6	0.6	0.6	0.6	0.0	0.6	0.6	0.6	0.6	0.6	0.0
<b>Ghana</b>	0.2	0.2	0.2	0.1	0.1	0.2	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>South Africa</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Sudans</b>	0.2	0.2	0.2	0.2	0.2	0.2	0.0	0.2	0.2	0.2	0.2	0.2	0.0
<b>Africa other</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>Africa</b>	<b>1.5</b>	<b>1.4</b>	<b>1.3</b>	<b>1.3</b>	<b>1.3</b>	<b>1.3</b>	<b>0.0</b>	<b>1.3</b>	<b>1.3</b>	<b>1.4</b>	<b>1.4</b>	<b>1.3</b>	<b>0.0</b>
<b>Russia</b>	<b>11.6</b>	<b>10.6</b>	<b>10.8</b>	<b>10.3</b>	<b>10.3</b>	<b>10.6</b>	<b>-0.2</b>	<b>10.4</b>	<b>10.4</b>	<b>10.4</b>	<b>10.5</b>	<b>10.4</b>	<b>-0.2</b>
<b>Kazakhstan</b>	1.9	1.8	1.8	2.0	2.0	2.0	0.1	2.1	2.0	2.0	2.0	2.0	0.1
<b>Azerbaijan</b>	0.8	0.7	0.7	0.8	0.8	0.8	0.0	0.8	0.7	0.7	0.7	0.7	-0.1
<b>Eurasia others</b>	0.4	0.4	0.4	0.3	0.3	0.3	0.0	0.3	0.3	0.3	0.3	0.3	0.0
<b>Other Eurasia</b>	<b>3.1</b>	<b>2.9</b>	<b>2.9</b>	<b>3.2</b>	<b>3.2</b>	<b>3.1</b>	<b>0.2</b>	<b>3.2</b>	<b>3.1</b>	<b>3.0</b>	<b>3.1</b>	<b>3.1</b>	<b>0.0</b>
<b>Other Europe</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.0</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.1</b>	<b>0.0</b>
<b>Total Non-OECD</b>	<b>33.2</b>	<b>31.7</b>	<b>31.9</b>	<b>32.0</b>	<b>32.4</b>	<b>32.3</b>	<b>0.5</b>	<b>32.5</b>	<b>32.5</b>	<b>32.5</b>	<b>32.7</b>	<b>32.6</b>	<b>0.2</b>
<b>Non-OPEC</b>	63.2	60.8	61.3	63.3	64.5	63.3	2.0	64.8	64.7	64.9	65.5	65.0	1.6
<b>Processing gains</b>	2.4	2.2	2.3	2.4	2.4	2.4	0.1	2.5	2.5	2.5	2.5	2.5	0.1
<b>Non-OPEC liquids production</b>	<b>65.6</b>	<b>63.0</b>	<b>63.6</b>	<b>65.7</b>	<b>66.9</b>	<b>65.7</b>	<b>2.1</b>	<b>67.3</b>	<b>67.2</b>	<b>67.4</b>	<b>68.0</b>	<b>67.4</b>	<b>1.7</b>
<b>OPEC NGL</b>	5.1	5.1	5.2	5.3	5.3	5.3	0.1	5.3	5.4	5.3	5.3	5.3	0.0
<b>OPEC Non- conventional</b>	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.1	0.0
<b>OPEC (NGL+NCF)</b>	<b>5.2</b>	<b>5.2</b>	<b>5.3</b>	<b>5.4</b>	<b>5.4</b>	<b>5.4</b>	<b>0.1</b>	<b>5.4</b>	<b>5.5</b>	<b>5.4</b>	<b>5.4</b>	<b>5.4</b>	<b>0.0</b>
<b>Non-OPEC &amp; OPEC (NGL+NCF)</b>	<b>70.8</b>	<b>68.2</b>	<b>68.9</b>	<b>71.1</b>	<b>72.3</b>	<b>71.1</b>	<b>2.3</b>	<b>72.7</b>	<b>72.6</b>	<b>72.8</b>	<b>73.4</b>	<b>72.9</b>	<b>1.8</b>

Note: Totals may not add up due to independent rounding. Source: OPEC.

## Appendix

**Table 11 - 5: World rig count, units**

World rig count	2019	2020	Change		3Q21	4Q21	1Q22	2Q22	Change		
			2021	2021/20					May 22	Jun 22	Jun/May
<b>US</b>	944	436	475	39	498	559	634	717	719	740	21
<b>Canada</b>	134	90	133	43	151	161	195	113	93	147	54
<b>Mexico</b>	37	41	45	4	43	48	44	44	43	46	3
<b>OECD Americas</b>	<b>1,116</b>	<b>567</b>	<b>654</b>	<b>87</b>	<b>694</b>	<b>770</b>	<b>874</b>	<b>876</b>	<b>857</b>	<b>935</b>	<b>78</b>
<b>Norway</b>	17	16	17	1	17	18	16	18	17	18	1
<b>UK</b>	15	6	8	2	9	8	7	10	11	12	1
<b>OECD Europe</b>	<b>74</b>	<b>59</b>	<b>58</b>	<b>-1</b>	<b>59</b>	<b>61</b>	<b>57</b>	<b>65</b>	<b>65</b>	<b>68</b>	<b>3</b>
<b>OECD Asia Pacific</b>	<b>29</b>	<b>22</b>	<b>23</b>	<b>1</b>	<b>28</b>	<b>25</b>	<b>22</b>	<b>22</b>	<b>23</b>	<b>24</b>	<b>1</b>
<b>Total OECD</b>	<b>1,219</b>	<b>648</b>	<b>735</b>	<b>87</b>	<b>781</b>	<b>856</b>	<b>954</b>	<b>964</b>	<b>945</b>	<b>1,027</b>	<b>82</b>
<b>Other Asia*</b>	221	187	174	-13	181	182	185	184	186	186	0
<b>Latin America</b>	128	58	91	33	93	105	111	113	110	112	2
<b>Middle East</b>	68	57	57	0	57	59	60	62	62	63	1
<b>Africa</b>	55	43	42	-1	47	49	57	55	54	55	1
<b>Other Europe</b>	14	12	9	-3	9	9	9	9	9	11	2
<b>Total Non-OECD</b>	<b>486</b>	<b>357</b>	<b>373</b>	<b>16</b>	<b>385</b>	<b>404</b>	<b>423</b>	<b>423</b>	<b>421</b>	<b>427</b>	<b>6</b>
<b>Non-OPEC rig count</b>	<b>1,705</b>	<b>1,005</b>	<b>1,108</b>	<b>103</b>	<b>1,166</b>	<b>1,260</b>	<b>1,376</b>	<b>1,387</b>	<b>1,366</b>	<b>1,454</b>	<b>88</b>
<b>Algeria</b>	45	31	26	-5	24	31	30	32	34	33	-1
<b>Angola</b>	4	3	4	1	4	5	6	6	6	6	0
<b>Congo</b>	3	1	0	-1	0	1	1	0	0	0	0
<b>Equatorial Guinea**</b>	1	0	0	0	0	1	1	0	0	0	0
<b>Gabon</b>	7	3	2	-1	3	4	2	3	3	3	0
<b>Iran**</b>	117	117	117	0	117	117	117	117	117	117	0
<b>Iraq</b>	74	47	39	-8	42	45	46	50	48	55	7
<b>Kuwait</b>	46	45	25	-20	25	23	27	27	28	26	-2
<b>Libya</b>	14	12	13	1	14	14	15	4	2	2	0
<b>Nigeria</b>	16	11	7	-4	10	7	8	11	11	11	0
<b>Saudi Arabia</b>	115	93	62	-31	59	64	70	71	78	64	-14
<b>UAE</b>	62	54	42	-12	39	42	38	48	48	48	0
<b>Venezuela</b>	25	15	6	-9	4	3	3	3	3	3	0
<b>OPEC rig count</b>	<b>529</b>	<b>432</b>	<b>343</b>	<b>-89</b>	<b>340</b>	<b>358</b>	<b>364</b>	<b>371</b>	<b>378</b>	<b>368</b>	<b>-10</b>
<b>World rig count***</b>	<b>2,234</b>	<b>1,437</b>	<b>1,451</b>	<b>14</b>	<b>1,506</b>	<b>1,618</b>	<b>1,740</b>	<b>1,758</b>	<b>1,744</b>	<b>1,822</b>	<b>78</b>
<i>of which:</i>											
<b>Oil</b>	1,788	1,116	1,143	27	1,191	1,294	1,383	1,390	1,371	1,447	76
<b>Gas</b>	415	275	275	0	281	293	329	337	342	342	0
<b>Others</b>	31	46	33	-13	34	31	28	31	31	33	2

Note: \* Other Asia includes India and offshore rigs for China.

\*\* Estimated data when Baker Hughes Incorporated did not reported the data.

\*\*\* Data excludes onshore China as well as Russia and other Eurasia.

Totals may not add up due to independent rounding.

Sources: Baker Hughes and OPEC.



# Glossary of Terms

## Abbreviations

b	barrels
b/d	barrels per day
bp	basis points
bb	billion barrels
bcf	billion cubic feet
cu m	cubic metres
mb	million barrels
mb/d	million barrels per day
mmbtu	million British thermal units
mn	million
m-o-m	month-on-month
mt	metric tonnes
q-o-q	quarter-on-quarter
pp	percentage points
tb/d	thousand barrels per day
tcf	trillion cubic feet
y-o-y	year-on-year
y-t-d	year-to-date

## Acronyms

ARA	Amsterdam-Rotterdam-Antwerp
BoE	Bank of England
BoJ	Bank of Japan
BOP	Balance of payments
BRIC	Brazil, Russia, India and China
CAPEX	capital expenditures
CCI	Consumer Confidence Index
CFTC	Commodity Futures Trading Commission
CIF	cost, insurance and freight
CPI	consumer price index
DoC	Declaration of Cooperation
DCs	developing countries
DUC	drilled, but uncompleted (oil well)
ECB	European Central Bank
EIA	US Energy Information Administration
Emirates NBD	Emirates National Bank of Dubai
EMs	emerging markets
EV	electric vehicle

## Glossary of Terms

FAI	fixed asset investment
FCC	fluid catalytic cracking
FDI	foreign direct investment
Fed	US Federal Reserve
FID	final investment decision
FOB	free on board
FPSO	floating production storage and offloading
FSU	Former Soviet Union
FX	Foreign Exchange
FY	fiscal year
GDP	gross domestic product
GFCF	gross fixed capital formation
GoM	Gulf of Mexico
GTLs	gas-to-liquids
HH	Henry Hub
HSFO	high-sulphur fuel oil
ICE	Intercontinental Exchange
IEA	International Energy Agency
IMF	International Monetary Fund
IOCs	international oil companies
IP	industrial production
ISM	Institute of Supply Management
JODI	Joint Organisations Data Initiative
LIBOR	London inter-bank offered rate
LLS	Light Louisiana Sweet
LNG	liquefied natural gas
LPG	liquefied petroleum gas
LR	long-range (vessel)
LSFO	low-sulphur fuel oil
MCs	(OPEC) Member Countries
MED	Mediterranean
MENA	Middle East/North Africa
MOMR	(OPEC) Monthly Oil Market Report
MPV	multi-purpose vehicle
MR	medium-range or mid-range (vessel)
NBS	National Bureau of Statistics
NGLs	natural gas liquids
NPC	National People's Congress (China)
NWE	Northwest Europe
NYMEX	New York Mercantile Exchange
OECD	Organisation for Economic Co-operation and Development
OPEX	operational expenditures
OIV	total open interest volume
ORB	OPEC Reference Basket
OSP	Official Selling Price
PADD	Petroleum Administration for Defense Districts
PBoC	People's Bank of China
PMI	purchasing managers' index
PPI	producer price index

RBI	Reserve Bank of India
REER	real effective exchange rate
ROI	return on investment
SAAR	seasonally-adjusted annualized rate
SIAM	Society of Indian Automobile Manufacturers
SRFO	straight-run fuel oil
SUV	sports utility vehicle
ULCC	ultra-large crude carrier
ULSD	ultra-low sulphur diesel
USEC	US East Coast
USGC	US Gulf Coast
USWC	US West Coast
VGO	vacuum gasoil
VLCC	very large crude carriers
WPI	wholesale price index
WS	Worldscale
WTI	West Texas Intermediate
WTS	West Texas Sour





## OPEC Basket average price

US\$/b



up 3.85 in June

June 2022	117.72
May 2022	113.87
<b>Year-to-date</b>	<b>105.37</b>

## June OPEC crude production

mb/d, according to secondary sources



up 0.23 in June

June 2022	28.72
May 2022	28.48

## Economic growth rate

per cent

	World	OECD	US	Euro-zone	Japan	China	India
<b>2022</b>	3.5	2.9	3.0	3.0	1.6	5.1	7.1
<b>2023</b>	3.2	2.1	2.1	2.0	1.7	5.0	6.0

## Supply and demand

mb/d

<b>2022</b>		<b>22/21</b>	<b>2023</b>		<b>23/22</b>
World demand	100.3	3.4	World demand	103.0	2.7
Non-OPEC liquids production	65.7	2.1	Non-OPEC liquids production	67.4	1.7
OPEC NGLs	5.4	0.1	OPEC NGLs	5.4	0.0
<b>Difference</b>	<b>29.2</b>	<b>1.1</b>	<b>Difference</b>	<b>30.1</b>	<b>0.9</b>

## OECD commercial stocks

mb

	<b>May 21</b>	<b>Mar 22</b>	<b>Apr 22</b>	<b>May 22</b>	<b>May 22/Apr 22</b>
Crude oil	1,410	1,296	1,317	1,307	-10.1
Products	1,523	1,331	1,353	1,373	20.6
<b>Total</b>	<b>2,933</b>	<b>2,627</b>	<b>2,669</b>	<b>2,680</b>	<b>10.5</b>
Days of forward cover	64.4	58.0	58.0	57.3	-0.7

Next report to be issued on 11 August 2022.