



Short-Term Energy Outlook

Forecast highlights

Global liquid fuels

- The June *Short-Term Energy Outlook* (STEO) remains subject to heightened levels of uncertainty related to the ongoing economic recovery from the COVID-19 pandemic. The U.S. economy continues to rise after reaching multiyear lows in the second quarter of 2020 (2Q20). The increase in economic activity and easing of the COVID-19 pandemic have contributed to rising energy use. U.S. gross domestic product (GDP) declined by 3.5% in 2020 from 2019 levels. This STEO assumes U.S. GDP will grow by 6.7% in 2021 and by 4.9% in 2022. The U.S. macroeconomic assumptions in this outlook are based on forecasts by IHS Markit. Our forecast assumes continuing economic growth and increasing mobility as a result of the easing of the COVID-19 pandemic. Any developments that would cause deviations from these assumptions would likely cause energy consumption and prices to deviate from our forecast.
- Brent crude oil spot prices averaged \$68 per barrel (b) in May, up \$4/b from April. Brent prices were higher in May as global oil inventories continued to decline, albeit at a slower pace than in the first four months of the year. In the coming months, we expect that global oil production will increase to match rising levels of global oil consumption. The rising oil production in the forecast is largely a result of the [OPEC+ decision](#) to raise production. We expect rising production will end the persistent global oil inventory draws that have occurred for much of the past year and lead to relatively balanced global oil markets in the second half of 2021 (2H21). We expect Brent prices will remain near current levels in 3Q21, averaging \$68/b. However, in 2022, we expect that continuing growth in production from OPEC+ and accelerating growth in U.S. tight oil production—along with other supply growth—will outpace decelerating growth in global oil consumption and contribute to declining oil prices. Based on these factors, we expect Brent to average \$60/b in 2022.
- We expect U.S. gasoline consumption will average 9.1 million barrels per day (b/d) this summer (April–September), which is 1.3 million b/d more than last summer but still more than 0.4 million b/d less than summer 2019. Weekly consumption data reflect the [Colonial Pipeline outage](#) and subsequent increase in gasoline demand, but consumption both before and after this event indicate more gasoline demand than we had previously forecast. Our latest forecast also reflects IHS Markit’s increased employment forecast.

We expect U.S. gasoline consumption to average 8.7 million b/d in for all of 2021 and 9.0 million b/d in 2022.

- For the 2021 April–September summer driving season, we forecast U.S. regular gasoline retail prices will average \$2.92 per gallon (gal), up from an average of \$2.07/gal last summer. The higher forecast gasoline prices reflect higher crude oil prices and higher wholesale gasoline margins. Wholesale gasoline margins have risen as a result of [relatively low inventories and rising gasoline demand](#). Margins also temporarily widened because of outages on the Colonial Pipeline. These developments caused U.S. average regular gasoline retail prices to reach a monthly average of \$2.99/gal in May, peaking at [\\$3.03/gal on May 17](#), which were the highest monthly and weekly prices since 2014. We expect that prices will average \$3.03/gal in June before falling to \$2.76/gal by September. The drop in forecast retail gasoline prices reflects our forecast that gasoline margins will fall this summer in response to rising refinery utilization. For all of 2021, we expect U.S. regular gasoline retail prices to average \$2.77/gal and gasoline retail prices for all grades to average \$2.87/gal. Higher prices and more gasoline consumption would result in the average U.S. household spending about \$570 (38%) more on motor fuel in 2021 compared with 2020.
- We estimate that 96.2 million b/d of petroleum and liquid fuels was consumed globally in May, an increase of 11.9 million b/d from May 2020 but 3.7 million b/d less than in May 2019. We forecast that global consumption of petroleum and liquid fuels will average 97.7 million b/d for all of 2021, which is a 5.4 million b/d increase from 2020. We forecast that global consumption of petroleum and liquid fuels will increase by 3.6 million b/d in 2022 to average 101.3 million b/d.
- We forecast OPEC crude oil production will average 26.9 million b/d in 2021 and 28.7 million b/d in 2022. OPEC crude oil production in the forecast rises from 25.0 million b/d in April to an average of 28.0 million b/d in 3Q21. Our expectation of rising OPEC production is primarily based on our assumption that OPEC will raise production by about 1 million b/d in both June and in July in response to rising global oil demand and seasonal increases in oil consumption for power generation for some OPEC members. It also reflects an assumption that Iran’s crude oil production will continue to increase this year. Although sanctions that target Iran’s crude oil exports remain in place, crude oil exports—according to ClipperData, LLC.—and production from Iran are up from most of 2020.
- According to [our most recent data](#), U.S. crude oil production averaged 11.2 million b/d in March 2021, an increase of 1.4 million b/d from February. The March rise indicates that the production outages caused by the February winter freeze were temporary and that production came back online quickly. Because prices of West Texas Intermediate crude oil remain above \$60/b during 2021 in the current forecast, we expect that producers will drill and complete enough wells to raise 2022 production from 2021

levels. We estimate that 2022 production will average 11.8 million b/d, up from a forecast average of 11.1 million b/d in 2021.

Natural Gas

- In May, the natural gas spot price at Henry Hub averaged \$2.91 per million British thermal units (MMBtu), which is up from the April average of \$2.66/MMBtu. We expect the Henry Hub spot price will average \$2.92/MMBtu in 3Q21 and \$3.07/MMBtu for all of 2021, which is up from [the 2020 average of \\$2.03/MMBtu](#). Higher natural gas prices this year primarily reflect two factors: growth in liquefied natural gas (LNG) exports and rising domestic natural gas consumption outside of the power sector. In 2022, we expect the Henry Hub price will average \$2.93/MMBtu amid slowing growth in LNG exports and rising U.S. natural gas production.
- We expect that U.S. consumption of natural gas will average 82.9 billion cubic feet per day (Bcf/d) in 2021, down 0.5% from 2020. U.S. natural gas consumption declines in the forecast, in part, because electric power generators switch to coal from natural gas as a result of rising natural gas prices. In 2021, we expect residential and commercial natural gas consumption combined will rise by 1.2 Bcf/d from 2020 and industrial consumption will rise by 0.7 Bcf/d from 2020. Rising consumption outside of the power sector results from expanding economic activity and colder winter temperatures in 2021 compared with 2020. We expect U.S. natural gas consumption will average 82.8 Bcf/d in 2022.
- We estimate that natural gas inventories ended May 2021 at almost 2.4 trillion cubic feet (Tcf), which is 3% lower than the five-year (2016–20) average. [More natural gas was withdrawn from storage during the winter of 2020–21](#) than the previous five-year average, largely as a result of the colder-than-average February temperatures that contributed to a drop in natural gas production. We forecast that inventories will end the 2021 injection season (end of October) at 3.6 Tcf, which would be 4% below the five-year average.
- Following a significant [weather-related decline in U.S. natural gas production in February](#), U.S. dry natural gas production rose by 6.0 Bcf/d in March to 92.3 Bcf/d. We expect dry natural gas production will average 92.9 Bcf/d in 2H21 and then rise to 93.9 Bcf/d in 2022.

Electricity, coal, renewables, and emissions

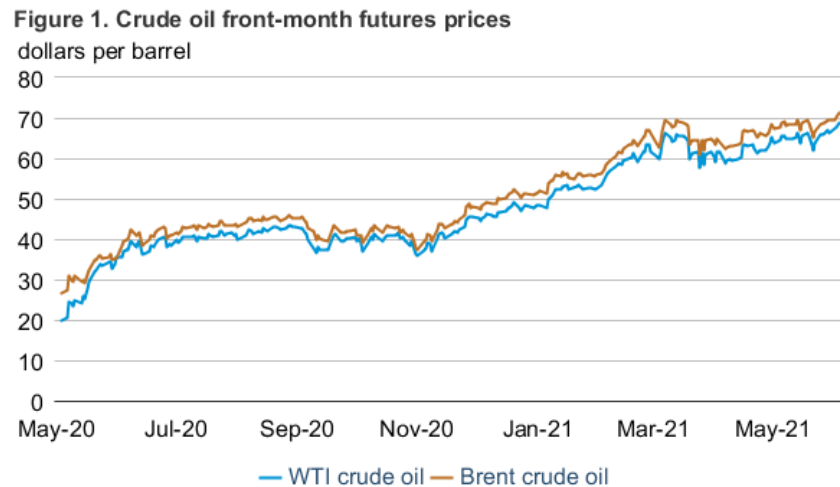
- We forecast that retail sales of electricity in the United States will increase by 2.3% in 2021 after falling by 3.9% in 2020. The largest increase in consumption will occur in the residential sector, where we forecast retail sales of electricity will grow by 2.8% this year. This growth is primarily a result of colder temperatures in the first quarter of 2021 compared with the same period in 2020. Much of the forecast increase in electricity consumption in the commercial and industrial sectors reflects improving economic

conditions in 2021. We expect retail electricity sales to these two sectors combined will increase by 2.0% in 2021. For 2022, we forecast that U.S. retail sales of electricity will grow by another 1.4%.

- We expect the share of electric power generation produced by natural gas in the United States will average 36% in 2021 and 35% in 2022, down from 39% in 2020. The forecast share for natural gas as a generation fuel declines in response to our expectation of a higher delivered natural gas price for electricity generators, which we forecast will average \$4.09/MMBtu in 2021 compared with an average of \$2.39/MMBtu in 2020. As a result of the higher expected natural gas prices, the forecast share of generation from coal rises from 20% in 2020 to 23% this year but falls to 22% next year. New additions of solar and wind generating capacity support our expectation that the renewables share of U.S. generation will rise from 20% in 2020 to 21% in 2021 and to 23% in 2022. The nuclear share of U.S. electricity generation declines from 21% in 2020 to 20% in 2021 and to 19% in 2022 as a result of [retiring capacity](#) at some nuclear power plants.
- We forecast that planned additions to U.S. wind and solar generating capacity in 2021 and 2022 will contribute to rising electricity generation from those sources. We estimate that the U.S. electric power sector added 14.8 gigawatts (GW) of [new wind capacity in 2020](#). We expect 16.0 GW of new wind capacity will come online in 2021 and 5.3 GW in 2022. Utility-scale solar capacity rose by an estimated 10.5 GW in 2020. Our forecast for added utility-scale solar capacity is 15.5 GW 2021 and 16.6 GW for 2022. We expect significant [solar capacity additions in Texas](#) during the forecast period. In addition, 4 GW to 5 GW of small-scale solar capacity (systems less than 1 megawatt) will come online each year during the 2021–22 STEO forecast.
- We expect U.S. coal production to total 600 million short tons (MMst) in 2021, which is 61 MMst (11%) more than in 2020. The increase is driven primarily by rising electricity demand. In 2022, we expect coal production to grow by an additional 5 MMst (1%).
- We expect U.S. coal exports to be about 81 MMst in 2021, 12 MMst (17%) more than in 2020. We expect most of this growth to come from rising demand for steam coal in Europe and Asia as increased steel prices during 2021 and 2022 drive exports. Forecast U.S. coal exports in 2022 rise by an additional 12 MMst (14%).
- We estimate that U.S. energy-related carbon dioxide (CO₂) emissions [decreased by 11% in 2020](#) as a result of less energy consumption related to reduced economic activity and responses to COVID-19. In 2021, we forecast energy-related CO₂ emissions will increase about 6% from the 2020 level as economic activity increases and leads to rising energy use. We also expect energy-related CO₂ emissions to rise in 2022, but by a slower rate of 2%. We forecast that after declining by 19% in 2020, coal-related CO₂ emissions will rise by 15% in 2021 and then decrease by 1% in 2022.

Petroleum and natural gas markets review

Prices: The front month futures price for Brent crude oil settled at \$71.31 per barrel (b) on June 3, up \$3.75/b from \$67.56/b on May 3. The front-month futures price for West Texas Intermediate (WTI) crude oil for delivery at Cushing, Oklahoma, increased by \$4.32/b during the same period, settling at \$68.81/b on June 3 (**Figure 1**).



Sources: Graph by EIA, based on CME Group and Intercontinental Exchange, compiled by Bloomberg L.P.
Note: WTI=West Texas Intermediate

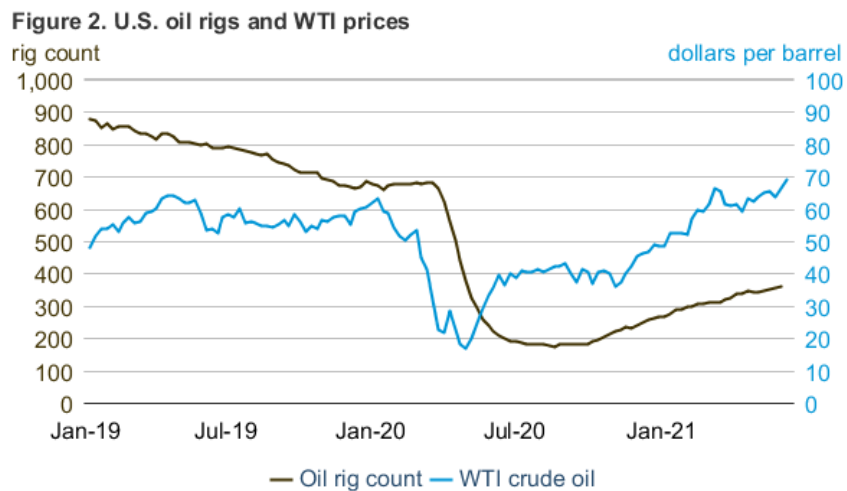
After declining in April, crude oil prices in May moved toward post-pandemic daily highs at nearly \$70/b. Continuing draws on global oil inventories contributed to upward crude oil price pressures. Despite rising COVID-19 case counts in some countries, particularly India, global oil demand remained higher than supply in May, contributing to continued global withdrawals from inventories of crude oil and petroleum products. However, we estimate withdrawals fell to 1.2 million barrels per day (b/d) in May, compared with average monthly withdrawals of 2.1 million b/d since June 2020.

On June 1, front-month Brent futures prices closed above \$70/b for the first time since January 2020. At its [June 1 meeting](#), OPEC+ reaffirmed its commitment to continued production increases in the coming months. Despite the group's plans to raise production, prices increased as the market weighed the planned increases relative to expected increases in consumption. Scheduled increases in production targets contributed to OPEC crude oil production reaching 25.5 million barrels per day (b/d) in May, its highest level since April 2020. This increase brought global supply to an estimated 95.0 million b/d compared with consumption of 96.2 million b/d. We expect OPEC crude oil production will increase to an average of 28.0 million b/d in the third quarter of 2021 (3Q21).

In the June STEO, we raised our Brent price forecast for the coming months. We now expect Brent prices to average \$69/b in June and \$68/b in 3Q21, which are \$4/b and \$5/b higher, respectively, than in last month's forecast. This price forecast keeps prices near or slightly below

current levels through 3Q21, and it incorporates the recent price increases and our forecast of mostly balanced oil markets in the coming months. Given announced increases in OPEC crude oil production, we expect production to increase more rapidly in the second half of 2021 (2H21) to keep pace with rising demand. In the forecast, global oil consumption rises by 2.8 million b/d from 2Q21 to 2H21 while global oil production rises by 4.3 million b/d during the same period, balancing out the 1.5 million b/d of global oil inventory draws from 2Q21. We expect more significant downward oil price pressures to emerge later in 2021 and into 2022 as forecast global oil supply outpaces slowing oil demand growth.

U.S. oil rigs and WTI prices: Baker Hughes’ U.S. crude oil rotary rig count, which serves as an indicator of active U.S. crude oil production capacity, reached a low of 172 active rigs on August 14, 2020 (**Figure 2**). Since then, the number of U.S. oil rigs has more than doubled, increasing by 187 rigs to a total of 359 rigs as of May 28. The pace at which crude oil producers deploy drilling rigs at any price level is an important driver of crude oil production in U.S. tight oil basins.



Source: Graph by EIA, based on data from Baker Hughes and CME Group, as compiled by Bloomberg, L.P.
 Note: WTI=West Texas Intermediate

We expect that the rig count is likely to continue to increase in response to WTI crude oil prices rising from less than \$50/b in late 2020 to a monthly average of \$65/b in May. Our models show changes in rig counts typically lag behind changes in the WTI price from between three and six months, and production typically comes online about two months after rig deployment. Assuming that other factors remain constant, price increases over the past month will likely continue to drive rig deployments through much of the rest of 2021. However, the recent changes in rig counts indicate operators, notably in the Permian, could be deploying fewer rigs at current oil prices than they have [previously deployed](#) when oil prices were at similar levels. In the forecast, we have slightly reduced the responsiveness of rig deployments in the Permian to upward oil price movements.

Although U.S. crude oil producers have some incentive to remain cautious about deploying rigs and increasing production because of overall market uncertainty, if WTI crude oil prices remain near \$65/b in the coming months, as we forecast, prices will continue to provide an incentive for producers to deploy additional rigs and resume production. Onshore U.S. crude oil production in the Lower 48 states during May 2021 was 8.9 million b/d, near its highest level so far in 2021, and we expect production to reach almost 9.3 million b/d by December 2021 with further increases into 2022. However, our crude oil production forecast is lower than in recent STEOs because of relatively fewer rig deployments at existing price levels, particularly in the Permian. In the March STEO, we forecast slightly more onshore U.S. crude oil production at almost 9.4 million b/d by December 2021, while we forecast WTI prices in 2Q21 and 3Q21 to average \$6/b less than in our current forecast. Assumptions about the oil price levels at which rigs are deployed are one of the key uncertainties in our forecast.

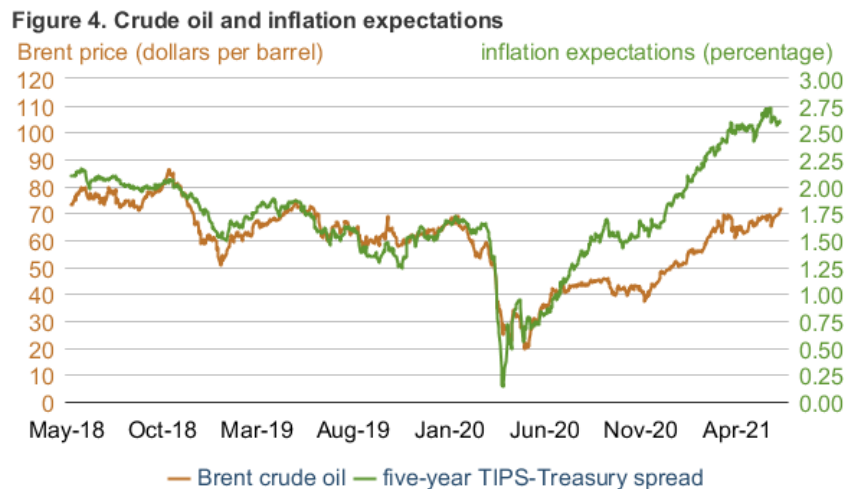
Brent Price and S&P 500 correlation: In 2020, the widespread impact of the COVID-19 pandemic across sectors resulted in an increased correlation between the Brent crude oil price and S&P 500, an equity index of widely traded U.S. public companies (**Figure 3**). Historically, the relationship between Brent prices and publicly traded equities is often mixed. Among many factors, rising oil prices present the risk of inflation and can increase transportation fuel costs for most firms, contributing to negative correlation. However, rising oil prices can also reflect strong economic growth, which leads to rising profitability for many companies, contributing to positive correlation. Rising oil prices can also indicate potentially higher earnings for many large companies in the S&P 500 that produce and refine petroleum, also contributing to a positive correlation. A positive correlation between the two can suggest that both asset prices are being determined primarily by demand-side factors, such as global economic growth, which can influence both demand for crude oil and for goods and services from other sectors. The rolling 30-day correlation between the Brent price and the S&P 500 reached a high point of 0.77 during July 2020, the highest correlation between the two series since December 2010.



 Source: Graph by EIA, based on data from Bloomberg L.P.

Uneven increases in crude oil prices and equity values contributed to a gradual decrease in the correlation since July 2020, suggesting that drivers of the crude oil price are driven more by sector-specific, supply-side factors and less by macroeconomic conditions or global demand. In March 2021, the correlation decreased when crude oil prices increased more rapidly than the S&P 500 overall, which was after OPEC+ producers announced they would maintain production curtailments amid rising crude oil demand. After crude oil prices decreased later in March, and remained relatively flat through April, the S&P 500 climbed to record highs. The opposite directional movements between the two series resulted in a shift to a negative correlation between them. The correlation between the Brent crude oil price and the S&P 500 index reached -0.32 on May 13, the largest negative correlation since July 2014.

Crude oil and inflation expectations: The percentage difference in yields for five-year Treasury Inflation-Protected Securities (TIPS) compared with U.S. treasury bonds is often used to measure market expectations of inflation. Responses to the COVID-19 pandemic resulted in a dramatic decline in demand for goods, which significantly reduced petroleum and other commodity prices in early 2020. Because crude oil and other commodity prices are inputs to other sectors of the economy, changes in crude oil prices can also affect inflation expectations. The TIPS-Treasury spread decreased to an average of 0.7% in March 2020, reflecting low inflation expectations as a result of lower prices and reduced economic activity (**Figure 4**).



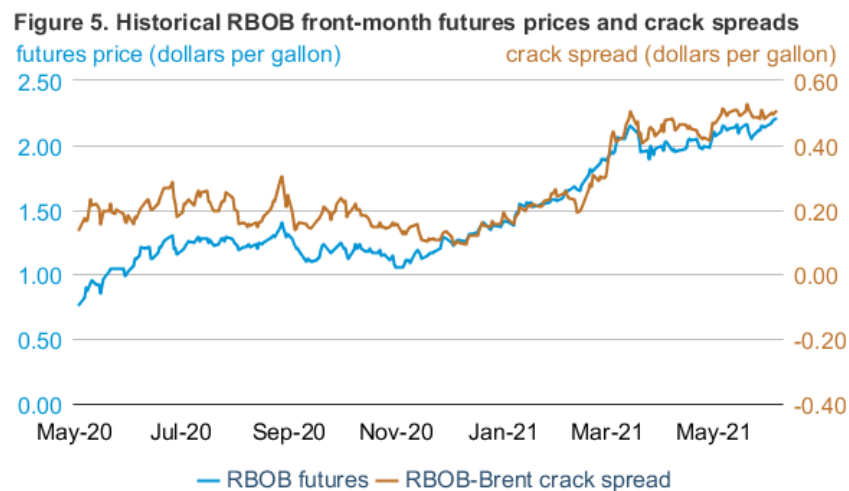
Source: Graph by EIA, based on data from Bloomberg L.P. and Federal Reserve Bank of St. Louis
 Note: TIPS=Treasury Inflation Protected Securities

Inflation expectations have generally increased since August 2020. The TIPS-Treasury spread increased from 2.55% on April 1, 2021, to 2.60% on May 3 (the first trading day of May), before reaching a high of 2.72% on May 12, the spread's highest point since 2008. The increasing inflation expectations correspond to increases in the Brent crude oil price, which increased from \$65/b on April 1 to \$68/b on May 3 and \$69/b on May 12. Fuel price increases for consumers and firms as a result of high crude oil prices are an important contributor to inflation expectations. However, the TIPS-Treasury spread also increased at the end of March and into

April, while Brent prices remained below their mid-March levels. Differing directional movements between the spread and the crude oil price reflect the effects of other goods and commodity prices on inflation expectations.

Petroleum products

Gasoline prices: The front-month futures price of RBOB (the petroleum component of gasoline used in many parts of the country) settled at \$2.20 per gallon (gal) on June 3, up 10 cents/gal from May 3 (**Figure 5**). The RBOB–Brent crack spread (the difference between the price of RBOB and the price of Brent crude oil) increased by 1 cent/gal to settle at 50 cents/gal during the same period.



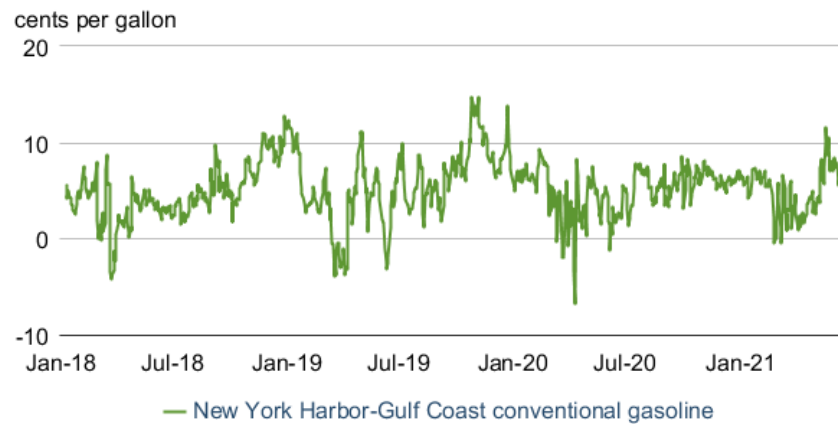
Source: Graph by EIA, based on data from CME Group, as compiled by Bloomberg L.P.
 Note: RBOB is the petroleum component of gasoline used in many parts of the country.

The average RBOB–Brent crack spread of 50 cents/gal in May was the highest since July 2015. The high spread reflected increasing demand, low inventories, and disruptions to the flow of gasoline along the U.S. East Coast because of the Colonial Pipeline outage. We estimate U.S. gasoline consumption averaged 9.1 million b/d in May, a 4% increase from April and the highest level since November 2019. The increase in gasoline demand likely reflected typical seasonal factors such as Memorial Day travel, as well as increased willingness to travel as a result of rising vaccinations, rising employment, and increased gasoline purchases in response to outages at many gas stations during the Colonial Pipeline disruption in early May. In addition, refinery production has not kept up with the increases in demand the past few months. Gasoline stocks fell sharply because of [weather-related outages in February](#). Those disruptions were followed by increasing gasoline consumption from March through May. The increase in gasoline consumption and supply disruptions have resulted in gasoline inventories being below the five-year average for every month in 2021. Low gasoline inventories have supported the high gasoline crack spread, and helped push [retail gasoline prices above \\$3.00/gal](#). We forecast that as refineries increase runs in the coming months and increases in gasoline consumption slow, it

will put some downward pressure on gasoline crack spreads and contribute to U.S. average retail gasoline prices falling to \$2.76/gal by September. However, we expect gasoline stocks to remain near five-year lows for the rest of 2021, keeping gasoline crack spreads higher than the five-year average.

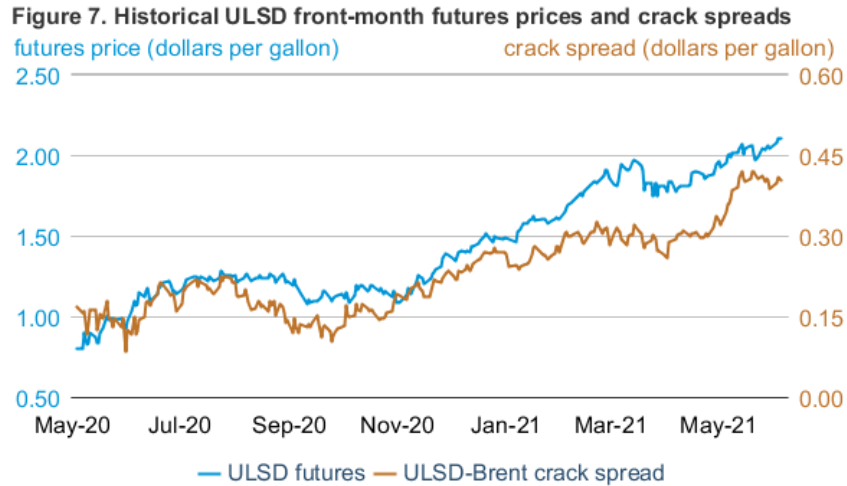
Regional gasoline prices: The Colonial Pipeline outage interrupted the flow of gasoline from the U.S. Gulf Coast to the East Coast and led to a short-term increase in the spread between New York Harbor gasoline spot prices and Gulf Coast conventional gasoline spot prices (**Figure 6**). The spread peaked on May 13 at 11.5 cents/gal, the highest spread since December 16, 2019. The New York Harbor gasoline price increased relative to the Gulf Coast conventional gasoline price likely because of a combination of increasing stocks in the U.S. Gulf Coast, decreasing stocks in the East Coast, and increased demand in the Lower Atlantic. The Lower Atlantic, which receives much of its gasoline from the pipeline, had lower-than-average gasoline stocks at the time of the pipeline outage, and as a result had the highest demand for substitute supply sources. Although the spread exceeded 10 cents/gal for only four days in the month, the spread remained slightly elevated through May, averaging 8 cents/gal, which is higher than the five-year May average of 5 cents/gal and higher than the April 2021 average of 3 cents/gal. The spread decreased in early June, settling at 6 cents/gal on June 3.

Figure 6. New York Harbor-Gulf Coast conventional gasoline spot price differentials



 Source: Graph by EIA, based on data from Bloomberg L.P.

Ultra-low sulfur diesel prices: The front-month futures price for ultra-low sulfur diesel (ULSD) for delivery in New York Harbor settled at \$2.10/gal on June 3, up 15 cent/gal from May 3 (**Figure 7**). The ULSD–Brent crack spread (the difference between the price of ULSD and the price of Brent crude oil) increased 6 cents/gal, settling at 40 cents/gal during the same period.

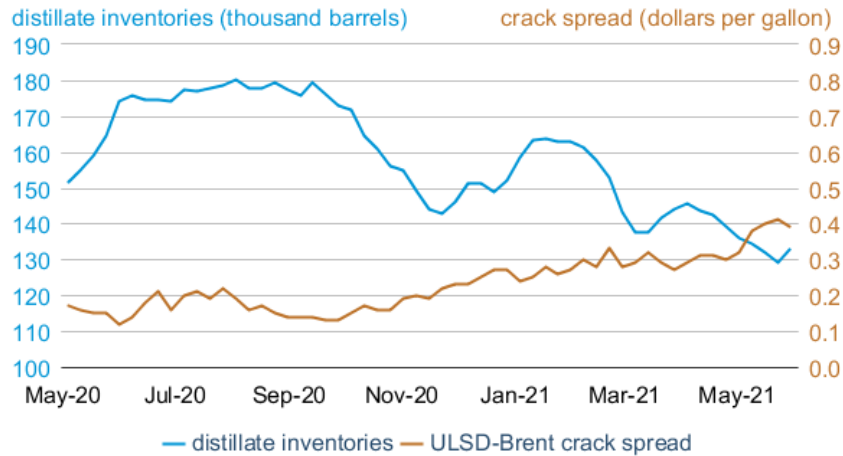


Source: Graph by EIA, based on data from CME Group, as compiled by Bloomberg L.P.
 Note: ULSD=ultra-low sulfur diesel

May had the highest average ULSD–Brent crack spread since December 2019. The crack spread increase was likely the result of the most U.S. consumption of distillate fuel since November 2019 and relatively low distillate production. We estimate May distillate consumption of 4.1 million b/d, an increase of 0.5 million b/d (15%) from the May 2020 levels and 3% higher than the average from the five previous years (2015–2019). Although distillate consumption has increased above the five-year average for May, distillate production was at its lowest May level since 2012.

Because increases in distillate consumption have been outpacing increases in production and net imports in recent months, distillate inventories have been decreasing, which has supported increases in the ULSD–Brent crack spread (**Figure 8**). From August 2020 to April 2021, distillate inventories decreased from 179 million barrels, the highest level since 1982, to approximately 136 million barrels. During that same period, the ULSD–Brent crack spread increased from 17 cents/gal to 31 cents/gal. In May, we estimate inventories fell to about 133 million barrels, which is lower than the five-year average, and this reduction has coincided with steeper increases in the crack spread. On May 11, the crack spread exceeded 40 cents/gal for the first time since March 2020 and remained close to 40 cents/gal through June 3.

Figure 8. Weekly U.S. distillate inventories and crack spreads

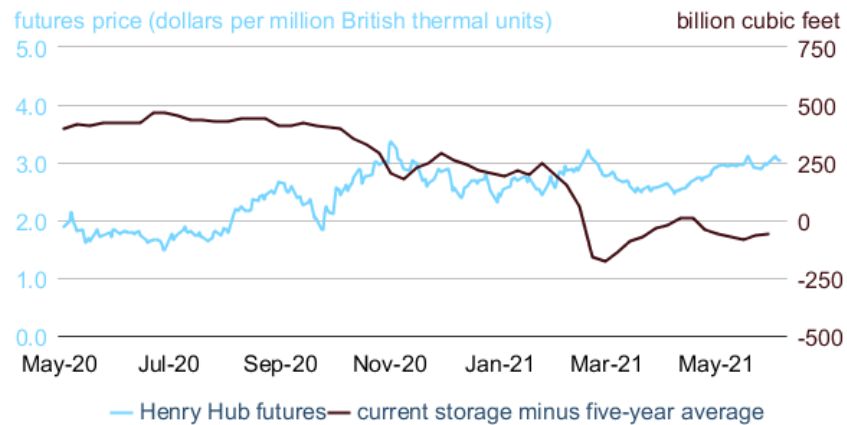


Source: Graph by EIA, based on data from Weekly Petroleum Status Report and Bloomberg L.P.
 Note: ULSD=ultra-low sulfur diesel

Natural Gas

Prices: The front-month natural gas futures contract for delivery at the Henry Hub settled at \$3.04 per million British thermal units (MMBtu) on June 3, 2021, which was up 7 cents/MMBtu from May 3, 2021 (**Figure 9**). The average price for front-month natural gas futures contracts in May was \$2.96/MMBtu, the highest May average since 2017.

Figure 9. U.S. natural gas front-month futures prices and storage deviation from 5-year average

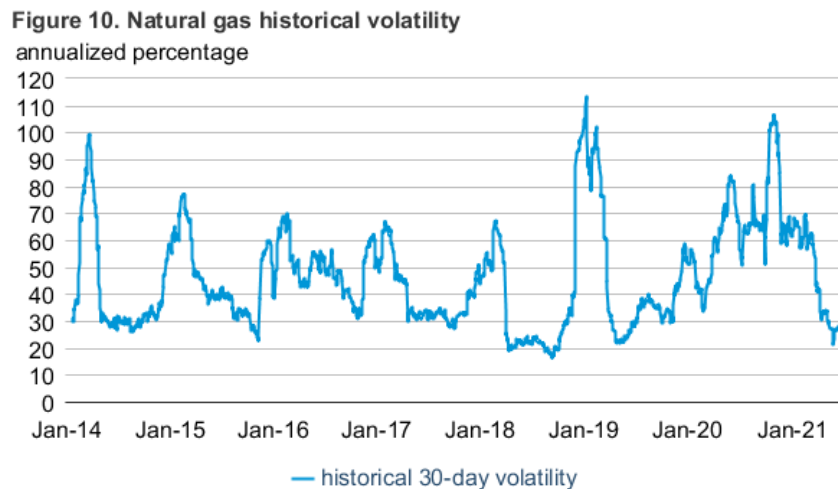


Source: Graph by EIA, based on data from CME Group, as compiled by Bloomberg L.P.

High levels of U.S. LNG exports continued in May and supported Henry Hub natural gas futures prices above \$3.00/MMBtu. We estimate U.S. LNG exports of 10.0 billion cubic feet per day (Bcf/d) in May, the most on record for the month. Every month since November 2020 has been among the 10 highest months for U.S. LNG exports on record. Stable U.S. production during this

period in combination with high exports reduced storage levels below their previous five-year average. Although natural gas stocks were 191 Bcf higher than the five-year (2016–20) average at the start of the year, they were 61 Bcf lower than the five-year average as of the week ending May 28. Front-month natural gas futures prices have increased as stocks have decreased, starting the year at \$2.58/MMBtu and closing at \$3.04/MMBtu on June 3.

Although U.S. natural gas futures prices have risen, futures price volatility has declined to low levels. Historical volatility measures the magnitude of daily changes in closing prices for a commodity during a given time in the past. Based on rolling front-month contracts, the 30-day historical volatility of U.S. natural gas futures prices was 27.9% on June 3, a significant decrease from 73.5% a year ago. **(Figure 10)**. However, the May 2020 historical volatility was unusually high as a result of COVID-19-related disruptions, and historical volatility tends to be low around May because of less demand for natural gas as a fuel for heating or cooling. The previous five-year (2015–19) average historical volatility for the first trading day of June was 35.7%. This year, historical volatility has been even lower so far than the seasonal average. Prices have hovered within a somewhat narrow range around \$3.00/MMBtu, likely because of stable U.S. production and relatively stable U.S. consumption as a result of slightly below-average cooling demand during May.

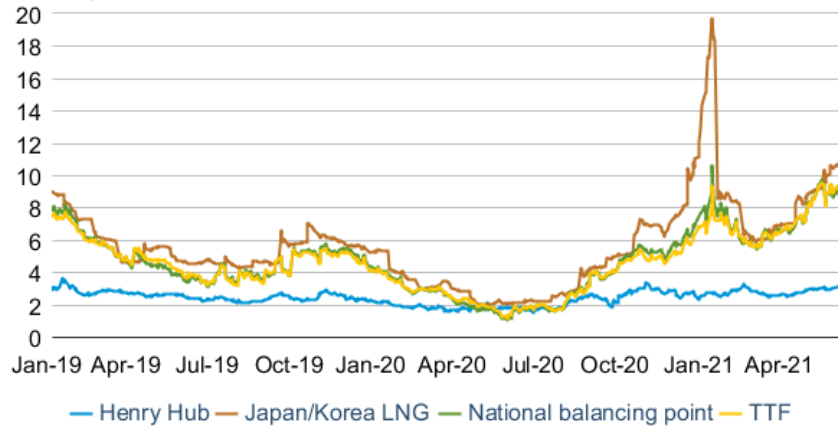


eia Source: Graph by EIA, based on data from Bloomberg L.P.

International natural gas prices: International LNG spot prices often reach yearly lows in May, but this year they have climbed to the high prices typically seen in winter months. The Japan-Korea Marker (JKM) price exceeded \$10/MMBtu this May, compared with May 2019 and 2020 averages near \$5/MMBtu and \$2/MMBtu, respectively. The Title Transfer Facility (TTF) and National Balancing Point (NBP) prices in Europe have shown similar trends **(Figure 11)**. In Asia, efforts to build stocks in anticipation of demand for summer electricity and to [prepare for heating demand next winter has increased demand for LNG imports](#) and supported high prices. Because LNG stocks in Asia have been lower than usual this year as a result of significant draws

during the extremely cold winter, demand in Asia for LNG imports has been much greater than usual. In Europe, [the coldest April in nearly a century](#) and [low inventories](#) also supported higher global demand and higher prices for LNG. Because of this strong global demand for LNG, we forecast that U.S. LNG exports will continue to be high and average more than 9.0 Bcf/d during the remainder of 2021.

Figure 11. International natural gas prices
dollars per million British thermal units



Source: Graph by EIA, based on data from CME Group, as compiled by Bloomberg L.P.
Note: TTF=Title Transfer Facility

Notable forecast changes

- We forecast Brent and WTI crude oil spot prices will average \$65/b and \$62/b, respectively, in 2021. Both of these forecasts are \$3/b higher than forecast in the May STEO. The higher forecasts reflect the incorporation of higher-than-forecast actual prices during May, along with our expectation that crude oil markets will be in balance through much of the second half of the year, limiting downward price pressures. However, we expect that Brent crude oil prices will decline to \$60/b on average in 2022 as global oil supply begins to outpace global oil demand.
- We expect global oil inventories will build by 0.5 million b/d in 2022, compared with our expectation of generally unchanged inventories in the May STEO. Our forecast of inventory growth is the result of our expectation of higher global oil supply in 2022. We raised expectations of supply growth across several key producers in the June STEO including OPEC, China, and Mexico.
- We forecast U.S. coal production to total 600 MMst in 2021, up 18 MMst (3%) from last month's STEO. High U.S. coal production in this forecast is the result of our expectation of higher inventory levels and more exports compared with the May STEO.

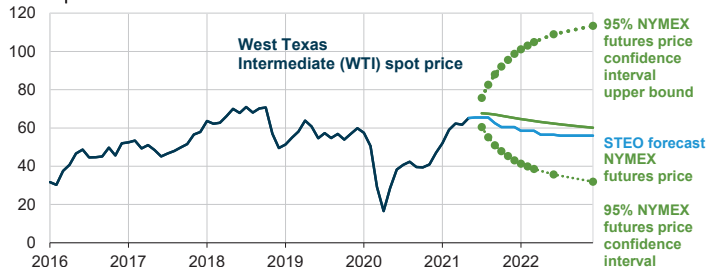
This report was prepared by the U.S. Energy Information Administration (EIA), the statistical and analytical agency within the U.S. Department of Energy. By law, EIA's data, analyses, and forecasts are independent of approval by any other officer or employee of the United States Government. The views in this report therefore should not be construed as representing those of the U.S. Department of Energy or other federal agencies.

Short-Term Energy Outlook Chart Gallery



June 8, 2021

West Texas Intermediate (WTI) crude oil price and NYMEX confidence intervals
dollars per barrel

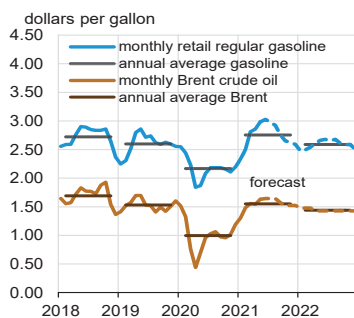


Note: Confidence interval derived from options market information for the five trading days ending Jun 3, 2021. Intervals not calculated for months with sparse trading in near-the-money options contracts.

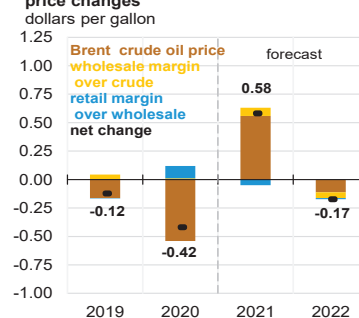
Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021, CME Group, Bloomberg, L.P., and Refinitiv an LSEG Business



U.S. gasoline and crude oil prices



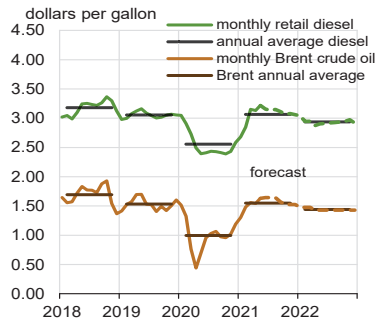
Components of annual gasoline price changes



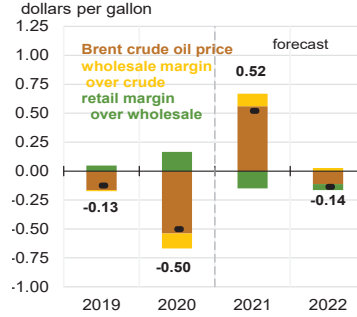
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021, and Refinitiv an LSEG Business



U.S. diesel and crude oil prices



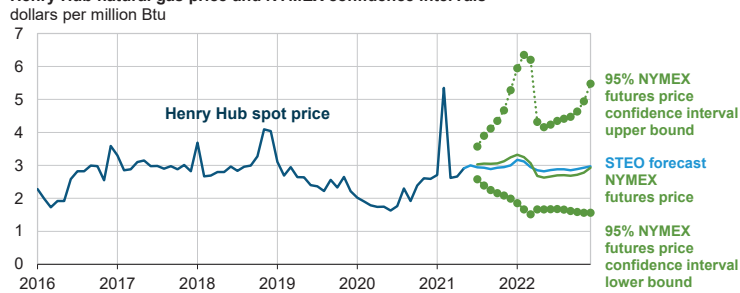
Components of annual diesel prices changes



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021, and Refinitiv an LSEG Business



Henry Hub natural gas price and NYMEX confidence intervals

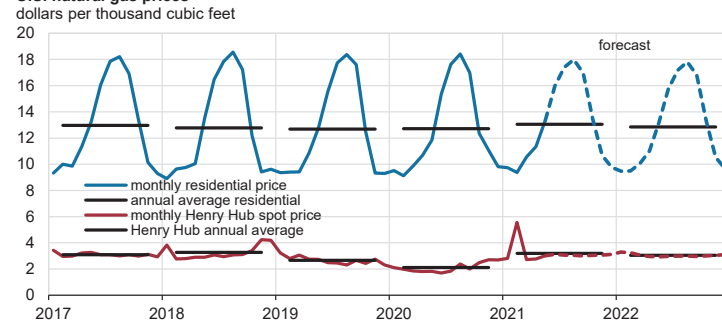


Note: Confidence interval derived from options market information for the five trading days ending Jun 3, 2021. Intervals not calculated for months with sparse trading in near-the-money options contracts.

Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021, CME Group, and Refinitiv an LSEG Business



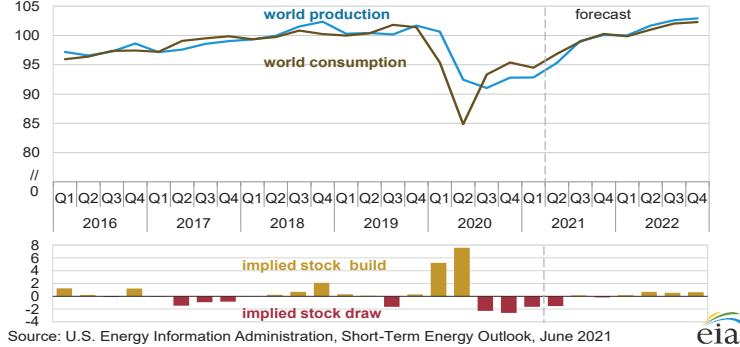
U.S. natural gas prices



Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021, and Refinitiv an LSEG Business



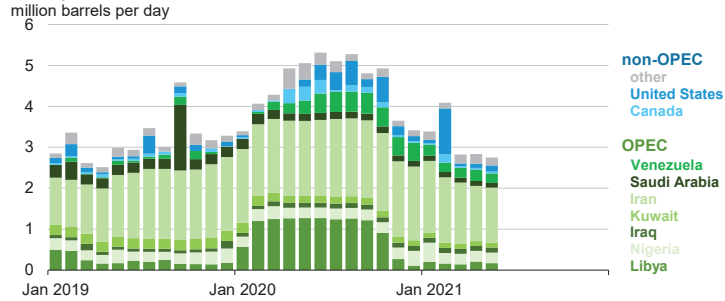
World liquid fuels production and consumption balance
million barrels per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



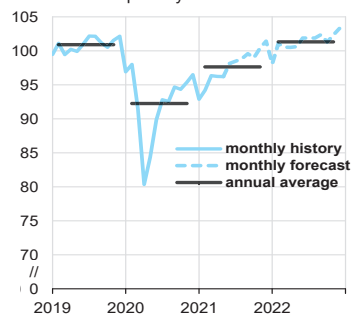
Estimated unplanned liquid fuels production outages among OPEC and non-OPEC producers
million barrels per day



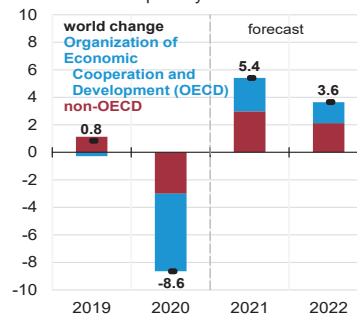
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



World liquid fuels consumption
million barrels per day



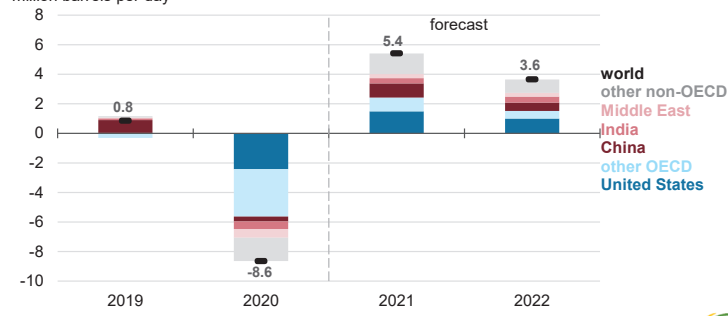
Components of annual change
million barrels per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



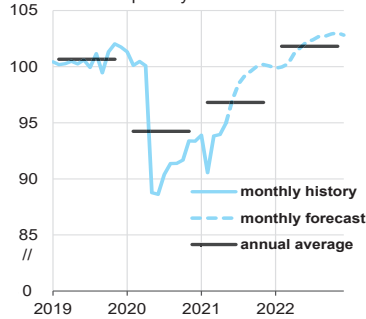
Annual change in world liquid fuels consumption
million barrels per day



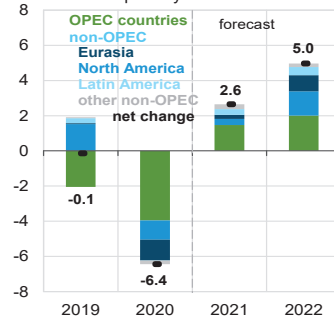
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



World crude oil and liquid fuels production
million barrels per day



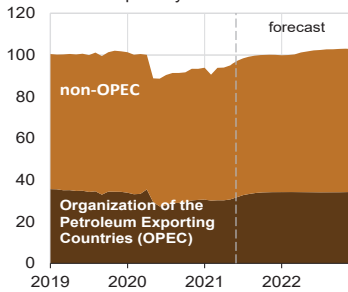
Components of annual change
million barrels per day



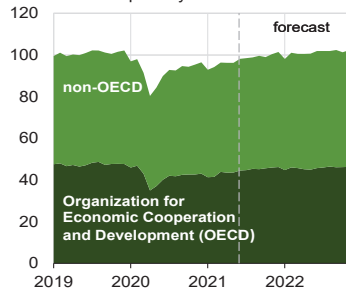
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



World liquid fuels production
million barrels per day



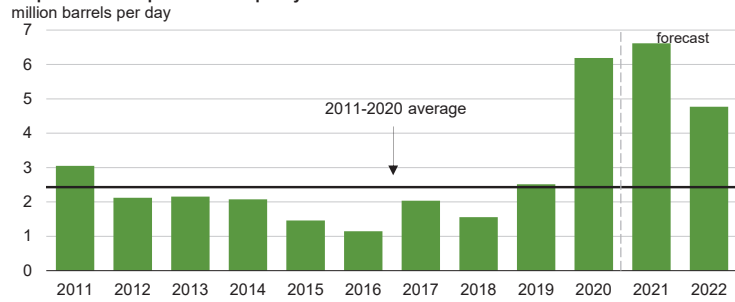
World liquid fuels consumption
million barrels per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



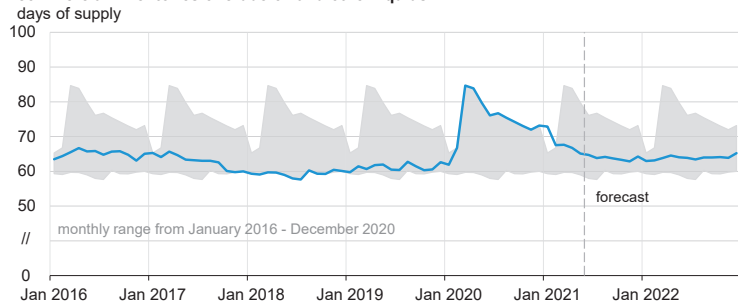
**Organization of the Petroleum Exporting Countries (OPEC)
surplus crude oil production capacity**



Note: Black line represents 2011-2020 average (2.4 million barrels per day).
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



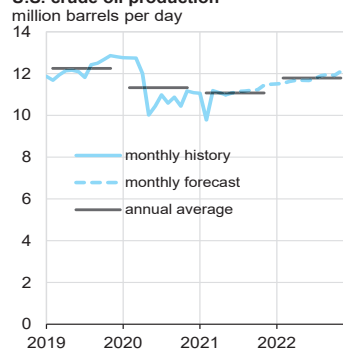
**Organization for Economic Cooperation and Development (OECD)
commercial inventories of crude oil and other liquids**



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021

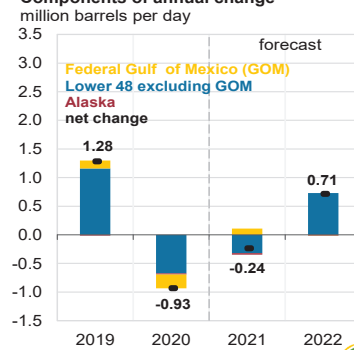


U.S. crude oil production

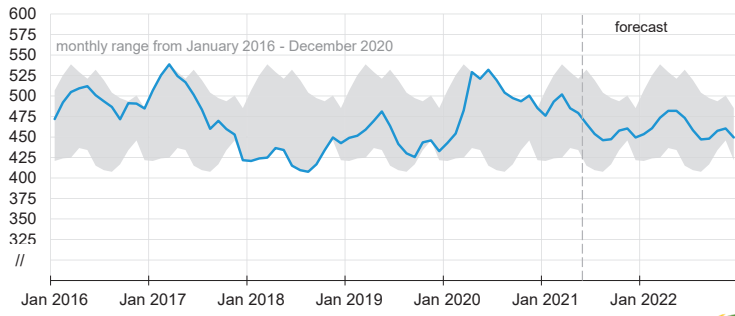


Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021

Components of annual change



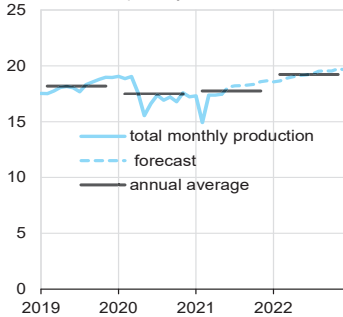
U.S. commercial crude oil inventories
million barrels



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



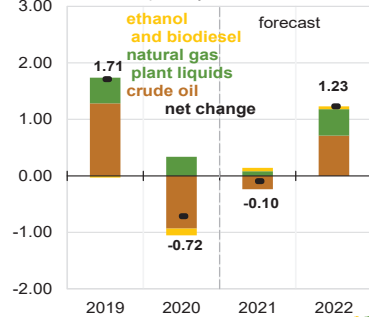
U.S. crude oil and liquid fuels production
million barrels per day



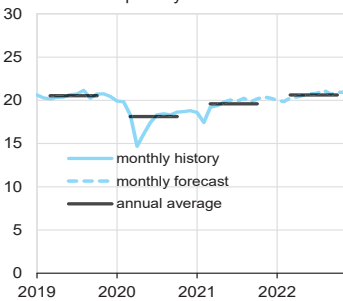
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



Components of annual change
million barrels per day



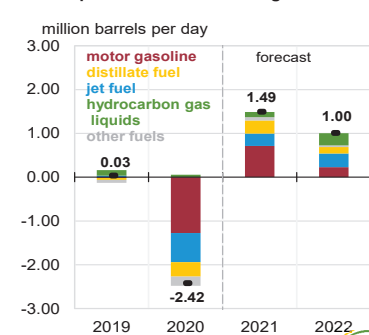
U.S. liquid fuels product supplied (consumption)
million barrels per day



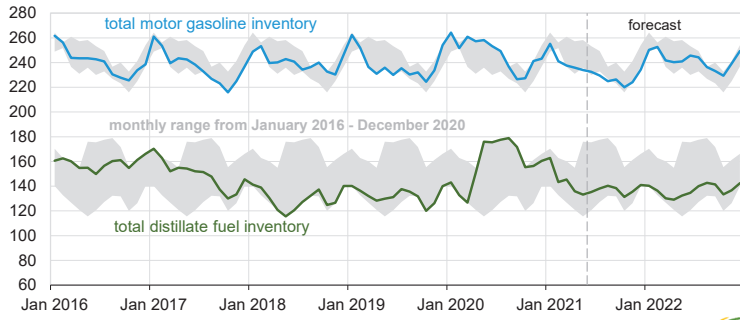
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



Components of annual change
million barrels per day



U.S. gasoline and distillate inventories
million barrels

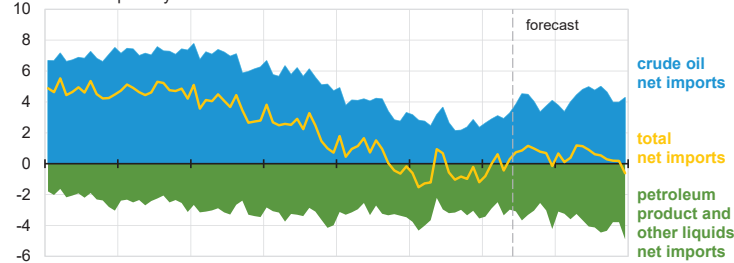


Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. net imports of crude oil and liquid fuels

million barrels per day



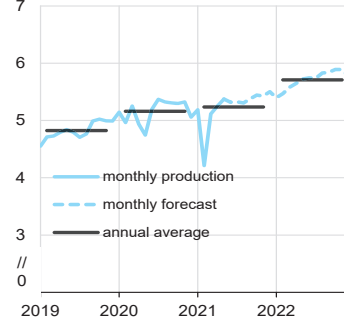
Note: Petroleum product and other liquids include: gasoline, distillate fuels, hydrocarbon gas liquids, jet fuel, residual fuel oil, unfinished oils, other hydrocarbons/oxygenates, and other oils.

Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. natural gas plant liquids production

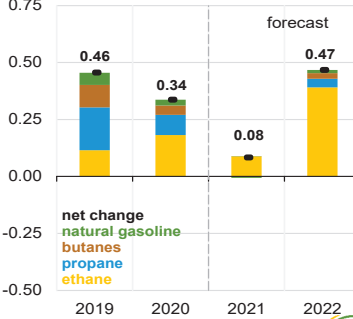
million barrels per day



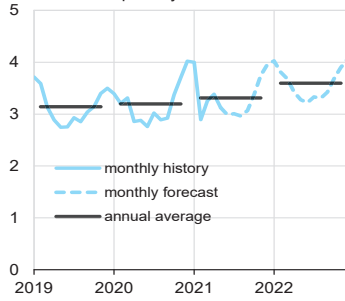
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021

Components of annual change

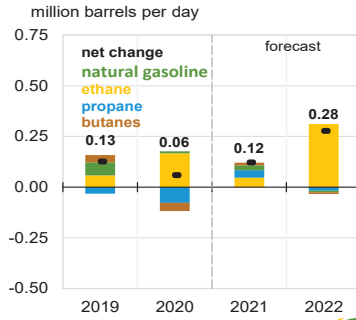
million barrels per day



U.S. hydrocarbon gas liquids product supplied (consumption)
million barrels per day



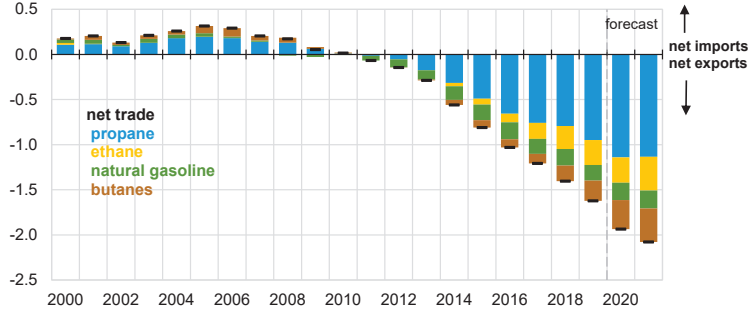
Components of annual change



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



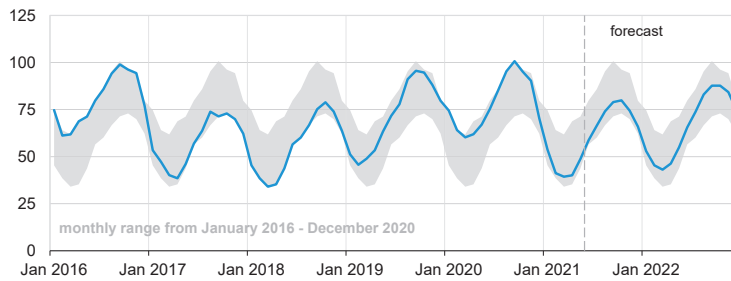
U.S. net trade of hydrocarbon gas liquids (HGL)
million barrels per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. commercial propane inventories
million barrels

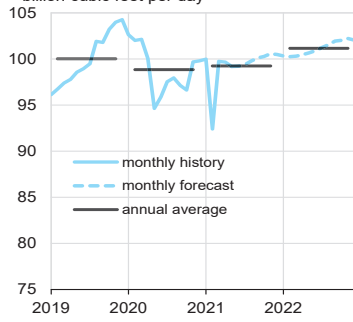


Note: Excludes propylene.

Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



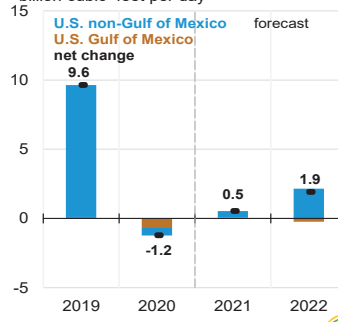
U.S. marketed natural gas production
billion cubic feet per day



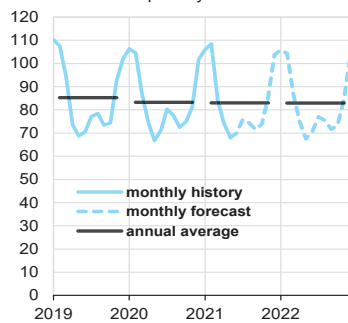
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



Components of annual change
billion cubic feet per day



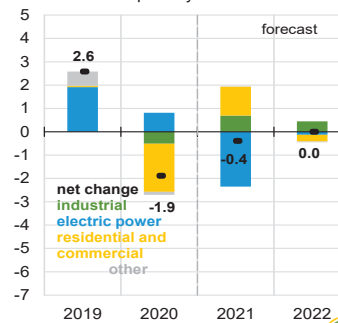
U.S. natural gas consumption
billion cubic feet per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



Components of annual change
billion cubic feet per day



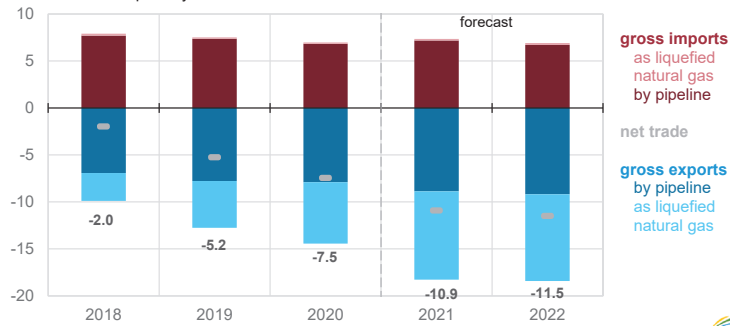
U.S. natural gas production, consumption, and net imports
billion cubic feet per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



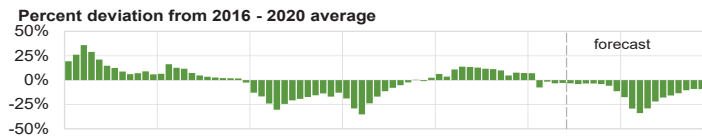
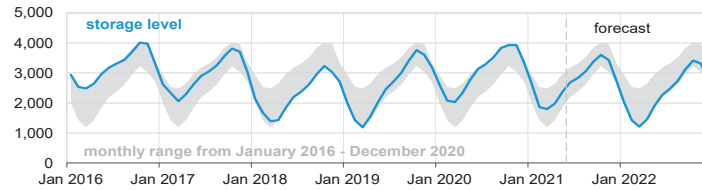
U.S. annual natural gas trade
billion cubic feet per day



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



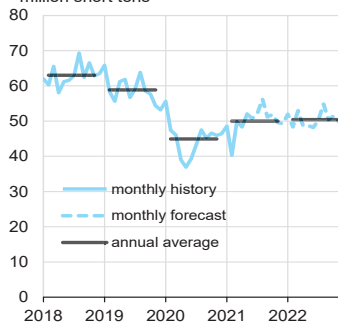
U.S. working natural gas in storage
billion cubic feet



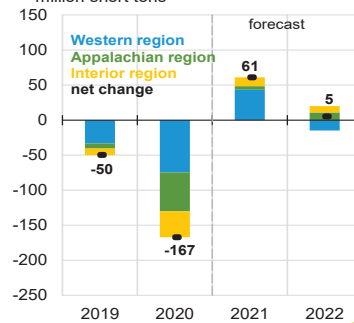
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. coal production
million short tons



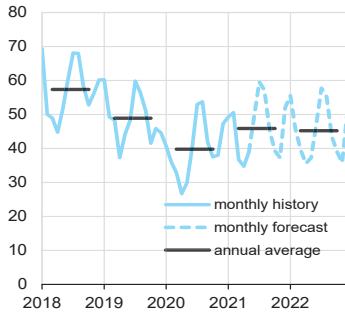
Components of annual change
million short tons



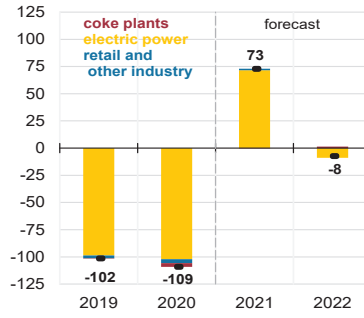
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. coal consumption
million short tons



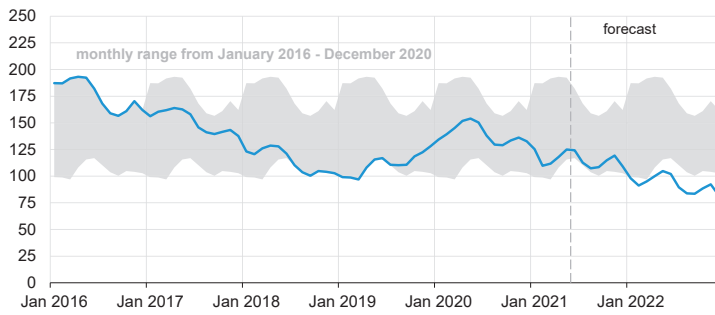
Components of annual change
million short tons



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



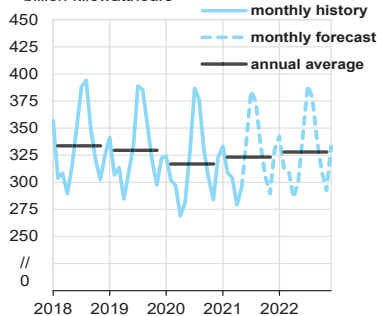
U.S. electric power coal inventories
million short tons



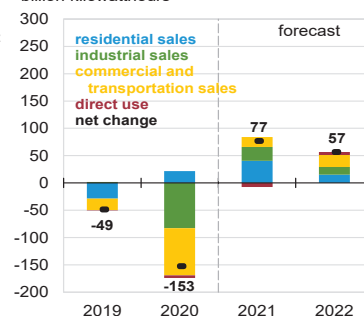
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. electricity consumption
billion kilowatthours



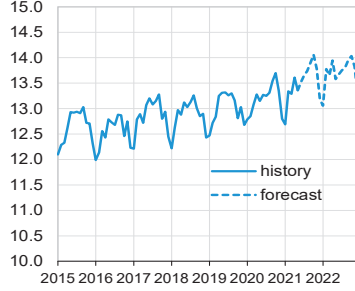
Components of annual change
billion kilowatthours



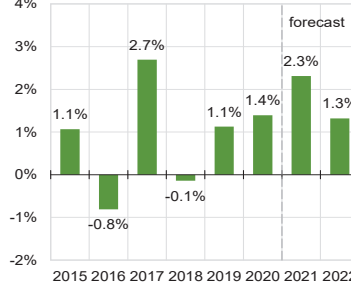
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. monthly residential electricity price
cents per kilowatthour



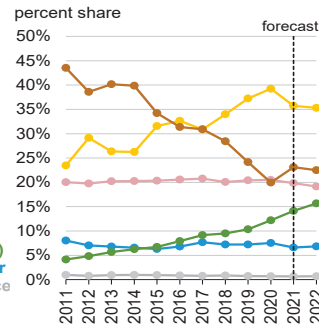
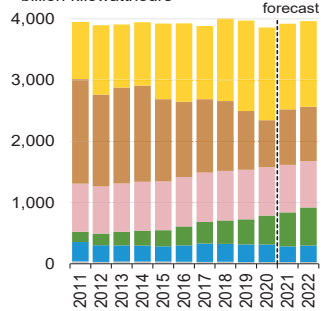
Annual growth in residential electricity prices
percent



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



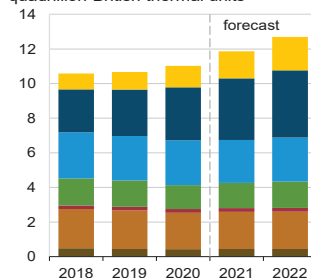
U.S. electricity generation by fuel, all sectors
billion kilowatthours



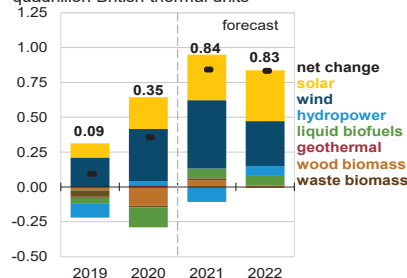
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. renewable energy supply
quadrillion British thermal units



Components of annual change
quadrillion British thermal units

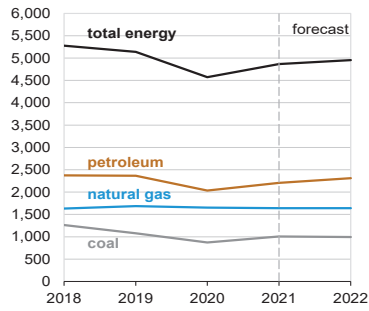


Note: Hydropower excludes pumped storage generation. Liquid biofuels include ethanol and biodiesel. Other biomass includes municipal waste from biogenic sources, landfill gas, and other non-wood waste.

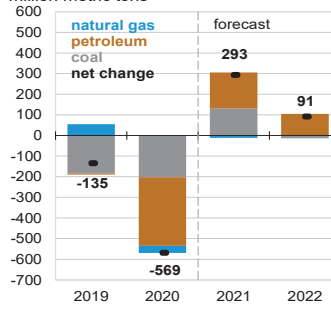
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. annual CO2 emissions by source
million metric tons



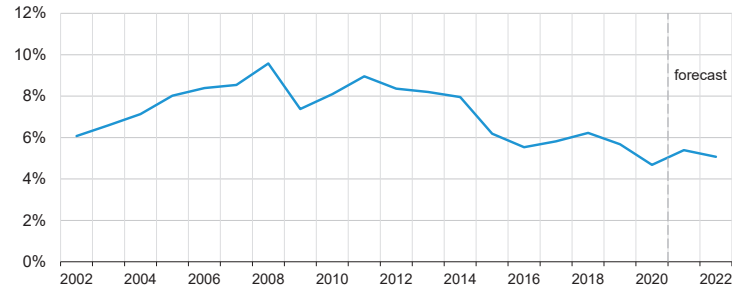
Components of annual change
million metric tons



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



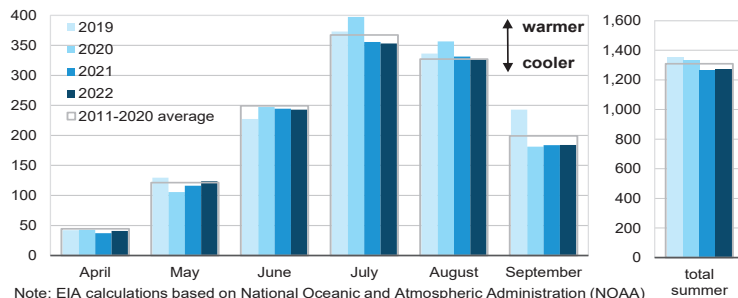
U.S. annual energy expenditures
share of gross domestic product



Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. summer cooling degree days
population-weighted

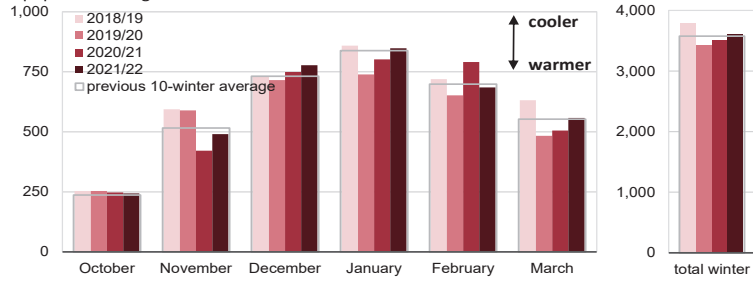


Note: EIA calculations based on National Oceanic and Atmospheric Administration (NOAA) data. Projections reflect NOAA's 14-16 month outlook.

Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. winter heating degree days
population-weighted

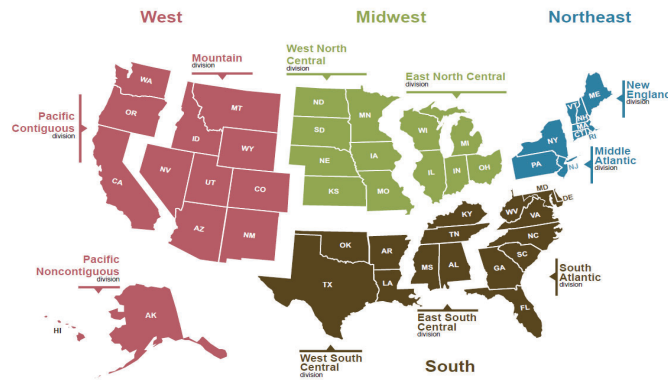


Note: EIA calculations based on National Oceanic and Atmospheric Administration (NOAA) data. Projections reflect NOAA's 14-16 month outlook.

Source: U.S. Energy Information Administration, Short-Term Energy Outlook, June 2021



U.S. Census regions and divisions



Source: U.S. Energy Information Administration, Short-Term Energy Outlook



Table 1. U.S. Energy Markets Summary

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Energy Supply															
Crude Oil Production (a) (million barrels per day)	12.75	10.81	10.81	10.90	10.70	<i>11.04</i>	<i>11.17</i>	<i>11.38</i>	<i>11.55</i>	<i>11.67</i>	<i>11.88</i>	<i>12.05</i>	11.31	<i>11.08</i>	<i>11.79</i>
Dry Natural Gas Production (billion cubic feet per day)	94.79	89.68	89.83	91.15	90.53	<i>92.26</i>	<i>92.63</i>	<i>93.26</i>	<i>93.13</i>	<i>93.48</i>	<i>94.31</i>	<i>94.80</i>	91.35	<i>92.18</i>	<i>93.93</i>
Coal Production (million short tons)	149	115	136	139	139	<i>151</i>	<i>160</i>	<i>151</i>	<i>153</i>	<i>146</i>	<i>155</i>	<i>151</i>	539	<i>600</i>	<i>605</i>
Energy Consumption															
Liquid Fuels (million barrels per day)	19.33	16.08	18.36	18.71	18.45	<i>19.73</i>	<i>19.97</i>	<i>20.26</i>	<i>20.06</i>	<i>20.58</i>	<i>20.90</i>	<i>20.90</i>	18.12	<i>19.61</i>	<i>20.61</i>
Natural Gas (billion cubic feet per day)	99.31	70.84	76.83	86.08	99.22	<i>70.70</i>	<i>73.94</i>	<i>87.78</i>	<i>98.81</i>	<i>70.99</i>	<i>74.72</i>	<i>87.09</i>	83.25	<i>82.85</i>	<i>82.85</i>
Coal (b) (million short tons)	110	96	149	123	136	<i>123</i>	<i>162</i>	<i>129</i>	<i>141</i>	<i>120</i>	<i>157</i>	<i>126</i>	477	<i>550</i>	<i>543</i>
Electricity (billion kilowatt hours per day)	10.14	9.64	11.87	9.89	10.52	<i>10.04</i>	<i>11.88</i>	<i>10.07</i>	<i>10.72</i>	<i>10.23</i>	<i>12.01</i>	<i>10.16</i>	10.39	<i>10.63</i>	<i>10.78</i>
Renewables (c) (quadrillion Btu)	2.92	3.00	2.83	2.91	2.95	<i>3.35</i>	<i>3.08</i>	<i>3.16</i>	<i>3.29</i>	<i>3.56</i>	<i>3.26</i>	<i>3.31</i>	11.65	<i>12.54</i>	<i>13.41</i>
Total Energy Consumption (d) (quadrillion Btu)	25.10	20.63	23.42	23.79	24.83	<i>22.77</i>	<i>24.06</i>	<i>24.70</i>	<i>25.56</i>	<i>23.30</i>	<i>24.51</i>	<i>24.95</i>	92.94	<i>96.36</i>	<i>98.31</i>
Energy Prices															
Crude Oil West Texas Intermediate Spot (dollars per barrel)	45.34	27.96	40.89	42.50	58.09	<i>64.14</i>	<i>64.53</i>	<i>60.50</i>	<i>58.50</i>	<i>56.50</i>	<i>56.00</i>	<i>56.00</i>	39.17	<i>61.85</i>	<i>56.74</i>
Natural Gas Henry Hub Spot (dollars per million Btu)	1.91	1.71	2.00	2.53	3.56	<i>2.86</i>	<i>2.92</i>	<i>2.96</i>	<i>3.08</i>	<i>2.84</i>	<i>2.87</i>	<i>2.93</i>	2.03	<i>3.07</i>	<i>2.93</i>
Coal (dollars per million Btu)	1.93	1.91	1.93	1.92	1.91	<i>1.90</i>	<i>1.88</i>	<i>1.85</i>	<i>1.87</i>	<i>1.87</i>	<i>1.85</i>	<i>1.82</i>	1.92	<i>1.88</i>	<i>1.85</i>
Macroeconomic															
Real Gross Domestic Product (billion chained 2012 dollars - SAAR)	19,011	17,303	18,597	18,794	19,088	<i>19,503</i>	<i>19,849</i>	<i>20,231</i>	<i>20,451</i>	<i>20,601</i>	<i>20,689</i>	<i>20,773</i>	18,426	<i>19,668</i>	<i>20,629</i>
Percent change from prior year	0.3	-9.0	-2.8	-2.4	0.4	<i>12.7</i>	<i>6.7</i>	<i>7.6</i>	<i>7.1</i>	<i>5.6</i>	<i>4.2</i>	<i>2.7</i>	-3.5	<i>6.7</i>	<i>4.9</i>
GDP Implicit Price Deflator (Index, 2012=100)	113.4	112.9	113.8	114.4	115.6	<i>116.5</i>	<i>117.0</i>	<i>117.5</i>	<i>118.0</i>	<i>118.6</i>	<i>119.2</i>	<i>119.8</i>	113.6	<i>116.6</i>	<i>118.9</i>
Percent change from prior year	1.7	0.6	1.1	1.3	1.9	<i>3.2</i>	<i>2.8</i>	<i>2.7</i>	<i>2.1</i>	<i>1.8</i>	<i>1.8</i>	<i>2.0</i>	1.2	<i>2.7</i>	<i>1.9</i>
Real Disposable Personal Income (billion chained 2012 dollars - SAAR)	15,061	16,630	15,851	15,434	17,391	<i>16,138</i>	<i>15,898</i>	<i>15,719</i>	<i>15,892</i>	<i>16,005</i>	<i>16,094</i>	<i>16,145</i>	15,744	<i>16,286</i>	<i>16,034</i>
Percent change from prior year	1.4	12.2	6.4	3.1	15.5	<i>-3.0</i>	<i>0.3</i>	<i>1.8</i>	<i>-8.6</i>	<i>-0.8</i>	<i>1.2</i>	<i>2.7</i>	5.8	<i>3.4</i>	<i>-1.5</i>
Manufacturing Production Index (Index, 2012=100)	104.4	89.3	100.1	103.1	103.4	<i>105.0</i>	<i>107.0</i>	<i>109.7</i>	<i>111.4</i>	<i>112.4</i>	<i>112.7</i>	<i>113.0</i>	99.2	<i>106.3</i>	<i>112.4</i>
Percent change from prior year	-2.0	-15.5	-5.5	-2.6	-0.9	<i>17.5</i>	<i>6.9</i>	<i>6.5</i>	<i>7.7</i>	<i>7.0</i>	<i>5.3</i>	<i>2.9</i>	-6.4	<i>7.1</i>	<i>5.7</i>
Weather															
U.S. Heating Degree-Days	1,874	541	70	1,418	2,098	<i>480</i>	<i>72</i>	<i>1,511</i>	<i>2,091</i>	<i>479</i>	<i>73</i>	<i>1,509</i>	3,902	<i>4,161</i>	<i>4,153</i>
U.S. Cooling Degree-Days	71	395	935	122	50	<i>398</i>	<i>871</i>	<i>99</i>	<i>46</i>	<i>407</i>	<i>864</i>	<i>99</i>	1,524	<i>1,418</i>	<i>1,416</i>

(a) Includes lease condensate.

(b) Total consumption includes Independent Power Producer (IPP) consumption.

(c) Renewable energy includes minor components of non-marketed renewable energy that is neither bought nor sold, either directly or indirectly, as inputs to marketed energy.

EIA does not estimate or project end-use consumption of non-marketed renewable energy.

(d) The conversion from physical units to Btu is calculated using a subset of conversion factors used in the calculations of gross energy consumption in EIA's Monthly Energy Review (MER).

Consequently, the historical data may not precisely match those published in the MER or the Annual Energy Review (AER).

(e) Refers to the refiner average acquisition cost (RAC) of crude oil.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Prices are not adjusted for inflation.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Petroleum Supply Monthly*, DOE/EIA-0109; *Petroleum Supply Annual*, DOE/EIA-0340/2; *Weekly Petroleum Status Report*, DOE/EIA-0208; *Petroleum Marketing Monthly*, DOE/EIA-0380; *Natural Gas Monthly*, DOE/EIA-0130; *Electric Power Monthly*, DOE/EIA-0226; *Quarterly Coal Report*, DOE/EIA-0121; and *International Petroleum Monthly*, DOE/EIA-0520.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System. U.S. macroeconomic forecasts are based on the IHS Markit model of the U.S. Economy.

Weather forecasts from National Oceanic and Atmospheric Administration.

Table 2. Energy Prices

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Crude Oil (dollars per barrel)															
West Texas Intermediate Spot Average	45.34	27.96	40.89	42.50	58.09	<i>64.14</i>	<i>64.53</i>	<i>60.50</i>	<i>58.50</i>	<i>56.50</i>	<i>56.00</i>	<i>56.00</i>	39.17	<i>61.85</i>	<i>56.74</i>
Brent Spot Average	49.97	29.52	42.97	44.34	61.12	<i>67.44</i>	<i>68.03</i>	<i>64.00</i>	<i>62.00</i>	<i>60.00</i>	<i>60.00</i>	<i>60.00</i>	41.69	<i>65.19</i>	<i>60.49</i>
U.S. Imported Average	43.76	26.33	39.90	40.64	54.93	<i>62.30</i>	<i>62.60</i>	<i>58.50</i>	<i>56.25</i>	<i>54.25</i>	<i>53.50</i>	<i>53.50</i>	37.26	<i>59.94</i>	<i>54.29</i>
U.S. Refiner Average Acquisition Cost	47.48	26.88	40.79	42.09	57.19	<i>63.17</i>	<i>63.55</i>	<i>59.50</i>	<i>57.25</i>	<i>55.25</i>	<i>54.50</i>	<i>54.50</i>	39.75	<i>60.99</i>	<i>55.32</i>
U.S. Liquid Fuels (cents per gallon)															
Refiner Prices for Resale															
Gasoline	153	104	137	133	180	<i>213</i>	<i>207</i>	<i>182</i>	<i>174</i>	<i>185</i>	<i>186</i>	<i>174</i>	133	<i>196</i>	<i>180</i>
Diesel Fuel	160	97	124	133	178	<i>201</i>	<i>206</i>	<i>196</i>	<i>190</i>	<i>186</i>	<i>187</i>	<i>187</i>	129	<i>196</i>	<i>188</i>
Fuel Oil	160	87	113	121	162	<i>186</i>	<i>198</i>	<i>193</i>	<i>186</i>	<i>176</i>	<i>176</i>	<i>178</i>	125	<i>186</i>	<i>182</i>
Refiner Prices to End Users															
Jet Fuel	165	85	116	125	163	<i>188</i>	<i>197</i>	<i>189</i>	<i>187</i>	<i>184</i>	<i>184</i>	<i>185</i>	131	<i>186</i>	<i>185</i>
No. 6 Residual Fuel Oil (a)	176	93	116	119	162	<i>155</i>	<i>152</i>	<i>143</i>	<i>136</i>	<i>134</i>	<i>130</i>	<i>130</i>	125	<i>153</i>	<i>132</i>
Retail Prices Including Taxes															
Gasoline Regular Grade (b)	241	194	218	215	256	<i>296</i>	<i>289</i>	<i>262</i>	<i>251</i>	<i>265</i>	<i>265</i>	<i>256</i>	218	<i>277</i>	<i>259</i>
Gasoline All Grades (b)	251	203	227	224	265	<i>305</i>	<i>301</i>	<i>275</i>	<i>264</i>	<i>278</i>	<i>278</i>	<i>270</i>	227	<i>287</i>	<i>273</i>
On-highway Diesel Fuel	289	243	243	246	290	<i>317</i>	<i>313</i>	<i>307</i>	<i>298</i>	<i>290</i>	<i>293</i>	<i>295</i>	255	<i>307</i>	<i>294</i>
Heating Oil	280	200	214	230	272	<i>287</i>	<i>307</i>	<i>322</i>	<i>312</i>	<i>287</i>	<i>273</i>	<i>274</i>	244	<i>293</i>	<i>293</i>
Natural Gas															
Henry Hub Spot (dollars per thousand cubic feet)	1.98	1.77	2.07	2.63	3.70	<i>2.97</i>	<i>3.03</i>	<i>3.08</i>	<i>3.20</i>	<i>2.95</i>	<i>2.98</i>	<i>3.04</i>	2.11	<i>3.19</i>	<i>3.05</i>
Henry Hub Spot (dollars per million Btu)	1.91	1.71	2.00	2.53	3.56	<i>2.86</i>	<i>2.92</i>	<i>2.96</i>	<i>3.08</i>	<i>2.84</i>	<i>2.87</i>	<i>2.93</i>	2.03	<i>3.07</i>	<i>2.93</i>
U.S. Retail Prices (dollars per thousand cubic feet)															
Industrial Sector	3.52	2.85	2.88	3.77	5.74	<i>3.88</i>	<i>4.00</i>	<i>4.28</i>	<i>4.55</i>	<i>3.94</i>	<i>3.83</i>	<i>4.15</i>	3.29	<i>4.49</i>	<i>4.14</i>
Commercial Sector	7.13	7.63	8.49	7.53	7.56	<i>8.29</i>	<i>8.91</i>	<i>7.91</i>	<i>7.68</i>	<i>8.09</i>	<i>8.47</i>	<i>7.54</i>	7.48	<i>7.94</i>	<i>7.79</i>
Residential Sector	9.46	11.89	17.65	10.60	9.80	<i>12.90</i>	<i>17.41</i>	<i>10.63</i>	<i>9.63</i>	<i>12.57</i>	<i>17.25</i>	<i>10.49</i>	10.83	<i>11.01</i>	<i>10.88</i>
U.S. Electricity															
Power Generation Fuel Costs (dollars per million Btu)															
Coal	1.93	1.91	1.93	1.92	1.91	<i>1.90</i>	<i>1.88</i>	<i>1.85</i>	<i>1.87</i>	<i>1.87</i>	<i>1.85</i>	<i>1.82</i>	1.92	<i>1.88</i>	<i>1.85</i>
Natural Gas	2.39	2.08	2.26	2.87	7.34	<i>3.10</i>	<i>3.08</i>	<i>3.28</i>	<i>3.62</i>	<i>3.04</i>	<i>3.01</i>	<i>3.24</i>	2.39	<i>4.09</i>	<i>3.21</i>
Residual Fuel Oil (c)	12.15	6.65	8.85	8.90	11.11	<i>12.79</i>	<i>12.66</i>	<i>12.00</i>	<i>11.89</i>	<i>12.19</i>	<i>11.39</i>	<i>11.17</i>	9.15	<i>12.10</i>	<i>11.65</i>
Distillate Fuel Oil	13.27	8.39	10.37	10.54	13.66	<i>15.57</i>	<i>15.94</i>	<i>15.33</i>	<i>14.93</i>	<i>14.59</i>	<i>14.53</i>	<i>14.61</i>	10.73	<i>14.87</i>	<i>14.70</i>
Retail Prices (cents per kilowatthour)															
Industrial Sector	6.38	6.63	7.08	6.53	7.15	<i>7.03</i>	<i>7.19</i>	<i>6.59</i>	<i>6.93</i>	<i>7.02</i>	<i>7.20</i>	<i>6.59</i>	6.66	<i>6.99</i>	<i>6.94</i>
Commercial Sector	10.33	10.63	10.97	10.62	11.11	<i>10.94</i>	<i>11.40</i>	<i>10.98</i>	<i>11.35</i>	<i>11.13</i>	<i>11.49</i>	<i>11.04</i>	10.65	<i>11.12</i>	<i>11.26</i>
Residential Sector	12.90	13.24	13.35	13.25	13.09	<i>13.50</i>	<i>13.75</i>	<i>13.64</i>	<i>13.47</i>	<i>13.72</i>	<i>13.83</i>	<i>13.66</i>	13.20	<i>13.50</i>	<i>13.68</i>

(a) Average for all sulfur contents.

(b) Average self-service cash price.

(c) Includes fuel oils No. 4, No. 5, No. 6, and topped crude.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Prices are not adjusted for inflation; prices exclude taxes unless otherwise noted.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Petroleum Marketing Monthly*, DOE/EIA-0380;

Weekly Petroleum Status Report, DOE/EIA-0208; *Natural Gas Monthly*, DOE/EIA-0130; *Electric Power Monthly*, DOE/EIA-0226; and *Monthly Energy Review*, DOE/EIA-0035.

Natural gas Henry Hub and WTI crude oil spot prices from Reuter's News Service (<http://www.reuters.com>).

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 3a. International Petroleum and Other Liquids Production, Consumption, and Inventories

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Supply (million barrels per day) (a)															
OECD	32.95	29.43	29.97	30.69	30.20	<i>30.89</i>	<i>31.53</i>	<i>32.00</i>	<i>32.20</i>	<i>32.48</i>	<i>32.76</i>	<i>33.21</i>	30.76	<i>31.16</i>	<i>32.67</i>
U.S. (50 States)	20.22	17.58	18.30	18.31	17.63	<i>18.74</i>	<i>18.89</i>	<i>19.19</i>	<i>19.39</i>	<i>19.81</i>	<i>20.17</i>	<i>20.40</i>	18.60	<i>18.62</i>	<i>19.95</i>
Canada	5.65	4.92	4.95	5.55	5.65	<i>5.26</i>	<i>5.74</i>	<i>5.77</i>	<i>5.81</i>	<i>5.78</i>	<i>5.80</i>	<i>5.83</i>	5.27	<i>5.61</i>	<i>5.80</i>
Mexico	2.00	1.94	1.91	1.90	1.93	<i>1.95</i>	<i>1.92</i>	<i>1.89</i>	<i>1.83</i>	<i>1.80</i>	<i>1.77</i>	<i>1.73</i>	1.94	<i>1.92</i>	<i>1.78</i>
Other OECD	5.08	4.99	4.81	4.94	4.99	<i>4.93</i>	<i>4.98</i>	<i>5.15</i>	<i>5.17</i>	<i>5.10</i>	<i>5.02</i>	<i>5.25</i>	4.95	<i>5.01</i>	<i>5.13</i>
Non-OECD	67.69	63.02	61.06	62.10	62.63	<i>64.44</i>	<i>67.55</i>	<i>68.09</i>	<i>67.83</i>	<i>69.21</i>	<i>69.84</i>	<i>69.70</i>	63.46	<i>65.70</i>	<i>69.16</i>
OPEC	33.50	30.72	28.65	30.00	30.35	<i>30.90</i>	<i>33.30</i>	<i>34.12</i>	<i>34.26</i>	<i>34.13</i>	<i>34.16</i>	<i>34.20</i>	30.71	<i>32.18</i>	<i>34.19</i>
Crude Oil Portion	28.28	25.65	23.63	24.88	25.08	<i>25.64</i>	<i>27.97</i>	<i>28.75</i>	<i>28.67</i>	<i>28.67</i>	<i>28.67</i>	<i>28.67</i>	25.60	<i>26.87</i>	<i>28.67</i>
Other Liquids (b)	5.22	5.07	5.02	5.12	5.27	<i>5.26</i>	<i>5.33</i>	<i>5.38</i>	<i>5.59</i>	<i>5.46</i>	<i>5.49</i>	<i>5.53</i>	5.11	<i>5.31</i>	<i>5.52</i>
Eurasia	14.73	13.18	12.72	13.13	13.39	<i>13.68</i>	<i>13.73</i>	<i>13.88</i>	<i>14.06</i>	<i>14.65</i>	<i>14.80</i>	<i>14.94</i>	13.44	<i>13.67</i>	<i>14.62</i>
China	4.96	4.91	4.95	4.90	5.05	<i>5.04</i>	<i>5.01</i>	<i>5.06</i>	<i>5.05</i>	<i>5.08</i>	<i>5.08</i>	<i>5.13</i>	4.93	<i>5.04</i>	<i>5.08</i>
Other Non-OECD	14.50	14.21	14.75	14.06	13.84	<i>14.83</i>	<i>15.51</i>	<i>15.02</i>	<i>14.46</i>	<i>15.36</i>	<i>15.79</i>	<i>15.44</i>	14.38	<i>14.81</i>	<i>15.27</i>
Total World Supply	100.64	92.45	91.04	92.79	92.83	<i>95.33</i>	<i>99.08</i>	<i>100.10</i>	<i>100.03</i>	<i>101.70</i>	<i>102.60</i>	<i>102.91</i>	94.22	<i>96.86</i>	<i>101.82</i>
Non-OPEC Supply	67.14	61.73	62.39	62.79	62.48	<i>64.43</i>	<i>65.78</i>	<i>65.97</i>	<i>65.77</i>	<i>67.57</i>	<i>68.44</i>	<i>68.71</i>	63.51	<i>64.68</i>	<i>67.63</i>
Consumption (million barrels per day) (c)															
OECD	45.26	37.40	42.12	42.80	42.29	<i>43.90</i>	<i>45.11</i>	<i>45.96</i>	<i>45.51</i>	<i>45.29</i>	<i>46.20</i>	<i>46.37</i>	41.90	<i>44.33</i>	<i>45.85</i>
U.S. (50 States)	19.33	16.08	18.36	18.71	18.45	<i>19.73</i>	<i>19.97</i>	<i>20.26</i>	<i>20.06</i>	<i>20.58</i>	<i>20.90</i>	<i>20.90</i>	18.12	<i>19.61</i>	<i>20.61</i>
U.S. Territories	0.17	0.15	0.16	0.17	0.20	<i>0.18</i>	<i>0.18</i>	<i>0.19</i>	<i>0.20</i>	<i>0.18</i>	<i>0.19</i>	<i>0.20</i>	0.16	<i>0.19</i>	<i>0.19</i>
Canada	2.33	1.88	2.16	2.05	2.03	<i>2.16</i>	<i>2.28</i>	<i>2.31</i>	<i>2.27</i>	<i>2.22</i>	<i>2.32</i>	<i>2.30</i>	2.10	<i>2.20</i>	<i>2.28</i>
Europe	13.33	11.01	12.87	12.51	11.96	<i>12.75</i>	<i>13.41</i>	<i>13.38</i>	<i>13.05</i>	<i>13.21</i>	<i>13.57</i>	<i>13.27</i>	12.43	<i>12.88</i>	<i>13.28</i>
Japan	3.69	2.89	3.03	3.50	3.67	<i>3.00</i>	<i>3.12</i>	<i>3.45</i>	<i>3.64</i>	<i>2.98</i>	<i>3.06</i>	<i>3.37</i>	3.27	<i>3.31</i>	<i>3.26</i>
Other OECD	6.41	5.41	5.55	5.87	5.98	<i>6.08</i>	<i>6.15</i>	<i>6.37</i>	<i>6.29</i>	<i>6.13</i>	<i>6.16</i>	<i>6.32</i>	5.81	<i>6.15</i>	<i>6.22</i>
Non-OECD	50.13	47.45	51.21	52.59	52.21	<i>52.96</i>	<i>53.85</i>	<i>54.31</i>	<i>54.36</i>	<i>55.72</i>	<i>55.85</i>	<i>55.92</i>	50.35	<i>53.34</i>	<i>55.47</i>
Eurasia	4.86	4.48	5.28	5.17	4.92	<i>5.00</i>	<i>5.39</i>	<i>5.23</i>	<i>5.05</i>	<i>5.13</i>	<i>5.54</i>	<i>5.39</i>	4.95	<i>5.14</i>	<i>5.28</i>
Europe	0.71	0.69	0.71	0.72	0.72	<i>0.73</i>	<i>0.73</i>	<i>0.74</i>	<i>0.73</i>	<i>0.74</i>	<i>0.76</i>	<i>0.76</i>	0.71	<i>0.73</i>	<i>0.75</i>
China	13.89	14.08	14.65	15.11	15.03	<i>15.59</i>	<i>15.30</i>	<i>15.59</i>	<i>15.89</i>	<i>16.11</i>	<i>15.78</i>	<i>16.02</i>	14.43	<i>15.38</i>	<i>15.95</i>
Other Asia	13.16	11.64	12.60	13.61	13.83	<i>13.52</i>	<i>13.61</i>	<i>14.17</i>	<i>14.53</i>	<i>14.77</i>	<i>14.34</i>	<i>14.74</i>	12.75	<i>13.78</i>	<i>14.60</i>
Other Non-OECD	17.53	16.55	17.98	17.99	17.71	<i>18.12</i>	<i>18.81</i>	<i>18.58</i>	<i>18.16</i>	<i>18.97</i>	<i>19.43</i>	<i>19.00</i>	17.51	<i>18.31</i>	<i>18.89</i>
Total World Consumption	95.40	84.85	93.33	95.39	94.50	<i>96.86</i>	<i>98.96</i>	<i>100.27</i>	<i>99.86</i>	<i>101.01</i>	<i>102.05</i>	<i>102.29</i>	92.26	<i>97.67</i>	<i>101.31</i>
Total Crude Oil and Other Liquids Inventory Net Withdrawals (million barrels per day)															
U.S. (50 States)	-0.43	-1.68	0.49	0.89	0.48	<i>0.39</i>	<i>-0.14</i>	<i>0.47</i>	<i>0.06</i>	<i>-0.53</i>	<i>0.03</i>	<i>0.42</i>	-0.18	<i>0.30</i>	<i>0.00</i>
Other OECD	-0.50	-1.17	0.04	0.68	0.43	<i>0.36</i>	<i>0.00</i>	<i>-0.10</i>	<i>-0.07</i>	<i>-0.05</i>	<i>-0.18</i>	<i>-0.33</i>	-0.23	<i>0.17</i>	<i>-0.16</i>
Other Stock Draws and Balance	-4.32	-4.75	1.77	1.03	0.77	<i>0.78</i>	<i>0.01</i>	<i>-0.21</i>	<i>-0.16</i>	<i>-0.11</i>	<i>-0.40</i>	<i>-0.72</i>	-1.55	<i>0.34</i>	<i>-0.35</i>
Total Stock Draw	-5.25	-7.60	2.30	2.60	1.67	<i>1.53</i>	<i>-0.12</i>	<i>0.17</i>	<i>-0.17</i>	<i>-0.69</i>	<i>-0.55</i>	<i>-0.62</i>	-1.96	<i>0.80</i>	<i>-0.51</i>
End-of-period Commercial Crude Oil and Other Liquids Inventories (million barrels)															
U.S. Commercial Inventory	1,321	1,453	1,422	1,344	1,302	<i>1,284</i>	<i>1,297</i>	<i>1,258</i>	<i>1,257</i>	<i>1,309</i>	<i>1,309</i>	<i>1,280</i>	1,344	<i>1,258</i>	<i>1,280</i>
OECD Commercial Inventory	2,963	3,201	3,166	3,026	2,945	<i>2,895</i>	<i>2,907</i>	<i>2,877</i>	<i>2,883</i>	<i>2,939</i>	<i>2,956</i>	<i>2,957</i>	3,026	<i>2,877</i>	<i>2,957</i>

(a) Supply includes production of crude oil (including lease condensates), natural gas plant liquids, biofuels, other liquids, and refinery processing gains.

(b) Includes lease condensate, natural gas plant liquids, other liquids, and refinery processing gain. Includes other unaccounted-for liquids.

 (c) Consumption of petroleum by the OECD countries is synonymous with "petroleum product supplied," defined in the glossary of the EIA *Petroleum Supply Monthly*,

DOE/EIA-0109. Consumption of petroleum by the non-OECD countries is "apparent consumption," which includes internal consumption, refinery fuel and loss, and bunkering.

- = no data available

OECD = Organization for Economic Cooperation and Development: Australia, Austria, Belgium, Canada, Chile, the Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Israel, Italy, Japan, Latvia, Lithuania, Luxembourg, Mexico, the Netherlands, New Zealand, Norway, Poland, Portugal, Slovakia, Slovenia, South Korea, Spain, Sweden, Switzerland, Turkey, the United Kingdom, the United States.

OPEC = Organization of the Petroleum Exporting Countries: Algeria, Angola, Congo (Brazzaville), Equatorial Guinea, Gabon, Iran, Iraq, Kuwait, Libya, Nigeria, Saudi Arabia, the United Arab Emirates, Venezuela.

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from Energy Information Administration international energy statistics.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 3b. Non-OPEC Petroleum and Other Liquids Production (million barrels per day)
U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
North America	27.87	24.44	25.16	25.76	25.21	<i>25.95</i>	<i>26.56</i>	<i>26.85</i>	<i>27.03</i>	<i>27.39</i>	<i>27.74</i>	<i>27.96</i>	25.81	<i>26.15</i>	<i>27.53</i>
Canada	5.65	4.92	4.95	5.55	5.65	<i>5.26</i>	<i>5.74</i>	<i>5.77</i>	<i>5.81</i>	<i>5.78</i>	<i>5.80</i>	<i>5.83</i>	5.27	<i>5.61</i>	<i>5.80</i>
Mexico	2.00	1.94	1.91	1.90	1.93	<i>1.95</i>	<i>1.92</i>	<i>1.89</i>	<i>1.83</i>	<i>1.80</i>	<i>1.77</i>	<i>1.73</i>	1.94	<i>1.92</i>	<i>1.78</i>
United States	20.22	17.58	18.30	18.31	17.63	<i>18.74</i>	<i>18.89</i>	<i>19.19</i>	<i>19.39</i>	<i>19.81</i>	<i>20.17</i>	<i>20.40</i>	18.60	<i>18.62</i>	<i>19.95</i>
Central and South America	6.01	6.05	6.63	5.89	5.61	<i>6.55</i>	<i>7.18</i>	<i>6.71</i>	<i>6.13</i>	<i>7.06</i>	<i>7.54</i>	<i>7.21</i>	6.15	<i>6.52</i>	<i>6.99</i>
Argentina	0.69	0.60	0.64	0.62	0.63	<i>0.69</i>	<i>0.70</i>	<i>0.69</i>	<i>0.71</i>	<i>0.76</i>	<i>0.75</i>	<i>0.73</i>	0.64	<i>0.68</i>	<i>0.74</i>
Brazil	3.44	3.89	4.29	3.52	3.23	<i>4.12</i>	<i>4.66</i>	<i>4.20</i>	<i>3.56</i>	<i>4.51</i>	<i>4.90</i>	<i>4.46</i>	3.79	<i>4.06</i>	<i>4.36</i>
Colombia	0.90	0.78	0.77	0.79	0.78	<i>0.79</i>	<i>0.80</i>	<i>0.80</i>	<i>0.84</i>	<i>0.76</i>	<i>0.77</i>	<i>0.80</i>	0.81	<i>0.79</i>	<i>0.79</i>
Ecuador	0.54	0.36	0.52	0.51	0.51	<i>0.52</i>	<i>0.52</i>	<i>0.53</i>	<i>0.53</i>	<i>0.53</i>	<i>0.53</i>	<i>0.53</i>	0.48	<i>0.52</i>	<i>0.53</i>
Other Central and S. America	0.45	0.42	0.41	0.45	0.47	<i>0.44</i>	<i>0.49</i>	<i>0.49</i>	<i>0.49</i>	<i>0.50</i>	<i>0.59</i>	<i>0.69</i>	0.43	<i>0.47</i>	<i>0.57</i>
Europe	4.44	4.34	4.16	4.30	4.38	<i>4.33</i>	<i>4.37</i>	<i>4.55</i>	<i>4.56</i>	<i>4.50</i>	<i>4.42</i>	<i>4.66</i>	4.31	<i>4.40</i>	<i>4.53</i>
Norway	2.05	2.00	1.96	2.02	2.11	<i>2.08</i>	<i>2.12</i>	<i>2.23</i>	<i>2.24</i>	<i>2.19</i>	<i>2.21</i>	<i>2.34</i>	2.01	<i>2.13</i>	<i>2.25</i>
United Kingdom	1.18	1.15	0.99	1.07	1.06	<i>1.01</i>	<i>1.00</i>	<i>1.06</i>	<i>1.06</i>	<i>1.04</i>	<i>0.94</i>	<i>1.04</i>	1.10	<i>1.03</i>	<i>1.02</i>
Eurasia	14.73	13.18	12.72	13.13	13.39	<i>13.68</i>	<i>13.73</i>	<i>13.88</i>	<i>14.06</i>	<i>14.65</i>	<i>14.80</i>	<i>14.94</i>	13.44	<i>13.67</i>	<i>14.62</i>
Azerbaijan	0.76	0.69	0.66	0.69	0.74	<i>0.71</i>	<i>0.71</i>	<i>0.75</i>	<i>0.77</i>	<i>0.79</i>	<i>0.76</i>	<i>0.79</i>	0.70	<i>0.73</i>	<i>0.78</i>
Kazakhstan	2.06	1.86	1.71	1.81	1.87	<i>1.89</i>	<i>1.88</i>	<i>1.93</i>	<i>1.95</i>	<i>2.00</i>	<i>1.96</i>	<i>2.01</i>	1.86	<i>1.89</i>	<i>1.98</i>
Russia	11.54	10.25	9.97	10.26	10.43	<i>10.73</i>	<i>10.77</i>	<i>10.82</i>	<i>10.96</i>	<i>11.49</i>	<i>11.70</i>	<i>11.75</i>	10.50	<i>10.69</i>	<i>11.48</i>
Turkmenistan	0.25	0.25	0.25	0.25	0.24	<i>0.24</i>	<i>0.24</i>	<i>0.24</i>	<i>0.23</i>	<i>0.23</i>	<i>0.23</i>	<i>0.23</i>	0.25	<i>0.24</i>	<i>0.23</i>
Other Eurasia	0.12	0.12	0.12	0.12	0.11	<i>0.12</i>	<i>0.12</i>	<i>0.14</i>	<i>0.15</i>	<i>0.16</i>	<i>0.16</i>	<i>0.16</i>	0.12	<i>0.12</i>	<i>0.16</i>
Middle East	3.16	3.13	3.09	3.13	3.16	<i>3.17</i>	<i>3.21</i>	<i>3.22</i>	<i>3.26</i>	<i>3.25</i>	<i>3.25</i>	<i>3.24</i>	3.13	<i>3.19</i>	<i>3.25</i>
Oman	1.01	0.95	0.92	0.95	0.96	<i>0.96</i>	<i>1.01</i>	<i>1.02</i>	<i>1.03</i>	<i>1.03</i>	<i>1.03</i>	<i>1.03</i>	0.96	<i>0.99</i>	<i>1.03</i>
Qatar	1.84	1.87	1.88	1.88	1.90	<i>1.91</i>	<i>1.92</i>	<i>1.92</i>	<i>1.93</i>	<i>1.93</i>	<i>1.93</i>	<i>1.93</i>	1.87	<i>1.91</i>	<i>1.93</i>
Asia and Oceania	9.44	9.16	9.21	9.18	9.34	<i>9.31</i>	<i>9.31</i>	<i>9.33</i>	<i>9.34</i>	<i>9.33</i>	<i>9.30</i>	<i>9.31</i>	9.25	<i>9.32</i>	<i>9.32</i>
Australia	0.49	0.50	0.50	0.49	0.48	<i>0.51</i>	<i>0.51</i>	<i>0.50</i>	<i>0.50</i>	<i>0.50</i>	<i>0.49</i>	<i>0.48</i>	0.49	<i>0.50</i>	<i>0.49</i>
China	4.96	4.91	4.95	4.90	5.05	<i>5.04</i>	<i>5.01</i>	<i>5.06</i>	<i>5.05</i>	<i>5.08</i>	<i>5.08</i>	<i>5.13</i>	4.93	<i>5.04</i>	<i>5.08</i>
India	0.96	0.90	0.92	0.92	0.92	<i>0.92</i>	<i>0.92</i>	<i>0.91</i>	<i>0.91</i>	<i>0.91</i>	<i>0.90</i>	<i>0.90</i>	0.92	<i>0.92</i>	<i>0.91</i>
Indonesia	0.91	0.89	0.87	0.88	0.89	<i>0.88</i>	<i>0.87</i>	<i>0.86</i>	<i>0.87</i>	<i>0.86</i>	<i>0.85</i>	<i>0.83</i>	0.89	<i>0.87</i>	<i>0.85</i>
Malaysia	0.71	0.60	0.63	0.64	0.65	<i>0.64</i>	<i>0.64</i>	<i>0.64</i>	<i>0.64</i>	<i>0.63</i>	<i>0.62</i>	<i>0.61</i>	0.65	<i>0.64</i>	<i>0.63</i>
Vietnam	0.25	0.24	0.23	0.23	0.23	<i>0.22</i>	<i>0.22</i>	<i>0.22</i>	<i>0.22</i>	<i>0.21</i>	<i>0.21</i>	<i>0.21</i>	0.23	<i>0.22</i>	<i>0.21</i>
Africa	1.48	1.44	1.42	1.40	1.39	<i>1.44</i>	<i>1.44</i>	<i>1.43</i>	<i>1.40</i>	<i>1.40</i>	<i>1.39</i>	<i>1.39</i>	1.43	<i>1.42</i>	<i>1.39</i>
Egypt	0.62	0.61	0.60	0.58	0.58	<i>0.64</i>	<i>0.64</i>	<i>0.64</i>	<i>0.61</i>	<i>0.61</i>	<i>0.61</i>	<i>0.61</i>	0.60	<i>0.62</i>	<i>0.61</i>
South Sudan	0.15	0.15	0.17	0.17	0.16	<i>0.17</i>	<i>0.18</i>	<i>0.18</i>	<i>0.18</i>	<i>0.18</i>	<i>0.18</i>	<i>0.18</i>	0.16	<i>0.17</i>	<i>0.18</i>
Total non-OPEC liquids	67.14	61.73	62.39	62.79	62.48	<i>64.43</i>	<i>65.78</i>	<i>65.97</i>	<i>65.77</i>	<i>67.57</i>	<i>68.44</i>	<i>68.71</i>	63.51	<i>64.68</i>	<i>67.63</i>
OPEC non-crude liquids	5.22	5.07	5.02	5.12	5.27	<i>5.26</i>	<i>5.33</i>	<i>5.38</i>	<i>5.59</i>	<i>5.46</i>	<i>5.49</i>	<i>5.53</i>	5.11	<i>5.31</i>	<i>5.52</i>
Non-OPEC + OPEC non-crude	72.36	66.81	67.41	67.91	67.75	<i>69.69</i>	<i>71.11</i>	<i>71.35</i>	<i>71.36</i>	<i>73.03</i>	<i>73.93</i>	<i>74.24</i>	68.62	<i>69.99</i>	<i>73.15</i>
Unplanned non-OPEC Production Outages	0.18	0.92	0.72	0.55	0.68	-	-	-	-	-	-	-	0.59	-	-

- = no data available

OPEC = Organization of the Petroleum Exporting Countries: Algeria, Angola, Congo (Brazzaville), Equatorial Guinea, Gabon, Iran, Iraq, Kuwait, Libya, Nigeria, Saudi Arabia, the United Arab Emirates, Venezuela.

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Supply includes production of crude oil (including lease condensates), natural gas plant liquids, biofuels, other liquids, and refinery processing gains.

Not all countries are shown in each region and sum of reported country volumes may not equal regional volumes.

Historical data: Latest data available from Energy Information Administration international energy statistics.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 3c. OPEC Crude Oil (excluding condensates) Production (million barrels per day)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Crude Oil															
Algeria	1.02	0.90	0.84	0.86	0.87	-	-	-	-	-	-	-	0.90	-	-
Angola	1.35	1.27	1.19	1.13	1.11	-	-	-	-	-	-	-	1.23	-	-
Congo (Brazzaville)	0.29	0.29	0.28	0.26	0.28	-	-	-	-	-	-	-	0.28	-	-
Equatorial Guinea	0.13	0.12	0.11	0.11	0.11	-	-	-	-	-	-	-	0.11	-	-
Gabon	0.19	0.18	0.15	0.17	0.16	-	-	-	-	-	-	-	0.17	-	-
Iran	2.02	1.97	1.90	1.95	2.18	-	-	-	-	-	-	-	1.96	-	-
Iraq	4.56	4.16	3.70	3.84	3.94	-	-	-	-	-	-	-	4.06	-	-
Kuwait	2.77	2.48	2.25	2.30	2.33	-	-	-	-	-	-	-	2.45	-	-
Libya	0.35	0.08	0.11	0.92	1.18	-	-	-	-	-	-	-	0.36	-	-
Nigeria	1.72	1.55	1.44	1.44	1.31	-	-	-	-	-	-	-	1.54	-	-
Saudi Arabia	9.80	9.28	8.77	9.01	8.49	-	-	-	-	-	-	-	9.21	-	-
United Arab Emirates	3.30	2.88	2.55	2.50	2.61	-	-	-	-	-	-	-	2.81	-	-
Venezuela	0.77	0.50	0.35	0.40	0.52	-	-	-	-	-	-	-	0.50	-	-
OPEC Total	28.28	25.65	23.63	24.88	25.08	25.64	27.97	28.75	28.67	28.67	28.67	28.67	25.60	26.87	28.67
Other Liquids (a)	5.22	5.07	5.02	5.12	5.27	5.26	5.33	5.38	5.59	5.46	5.49	5.53	5.11	5.31	5.52
Total OPEC Supply	33.50	30.72	28.65	30.00	30.35	30.90	33.30	34.12	34.26	34.13	34.16	34.20	30.71	32.18	34.19
Crude Oil Production Capacity															
Middle East	25.61	26.02	26.06	26.22	26.55	26.89	27.18	27.38	27.38	27.39	27.39	27.39	25.98	27.00	27.39
Other	5.82	5.60	5.48	6.33	6.73	6.63	6.47	6.14	6.05	6.05	6.05	6.05	5.81	6.49	6.05
OPEC Total	31.43	31.63	31.54	32.56	33.28	33.51	33.65	33.52	33.44	33.43	33.44	33.45	31.79	33.49	33.44
Surplus Crude Oil Production Capacity															
Middle East	3.15	5.27	6.90	6.62	7.00	6.82	5.10	4.68	4.68	4.69	4.69	4.69	5.49	5.89	4.69
Other	0.00	0.71	1.02	1.06	1.19	1.05	0.57	0.09	0.08	0.08	0.08	0.08	0.70	0.72	0.08
OPEC Total	3.15	5.98	7.92	7.68	8.19	7.87	5.67	4.77	4.76	4.77	4.77	4.78	6.19	6.61	4.77
Unplanned OPEC Production Outages	3.72	4.18	4.35	3.45	2.73	-	-	-	-	-	-	-	3.92	-	-

(a) Includes lease condensate, natural gas plant liquids, other liquids, refinery processing gain, and other unaccounted-for liquids.

OPEC = Organization of the Petroleum Exporting Countries: Iran, Iraq, Kuwait, Saudi Arabia, and the United Arab Emirates (Middle East); Algeria, Angola, Congo (Brazzaville), Equatorial Guinea, Gabon, Libya, Nigeria, and Venezuela (Other).

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Forecasts are not published for individual OPEC countries.

Historical data: Latest data available from Energy Information Administration international energy statistics.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 3d. World Petroleum and Other Liquids Consumption (million barrels per day)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				2020	2021	2022
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4			
North America	23.64	19.44	22.12	22.45	22.20	<i>23.75</i>	<i>24.12</i>	<i>24.46</i>	<i>24.15</i>	<i>24.64</i>	<i>25.05</i>	<i>25.05</i>	21.91	<i>23.64</i>	<i>24.72</i>
Canada	2.33	1.88	2.16	2.05	2.03	<i>2.16</i>	<i>2.28</i>	<i>2.31</i>	<i>2.27</i>	<i>2.22</i>	<i>2.32</i>	<i>2.30</i>	2.10	<i>2.20</i>	<i>2.28</i>
Mexico	1.97	1.48	1.59	1.68	1.71	<i>1.85</i>	<i>1.86</i>	<i>1.88</i>	<i>1.81</i>	<i>1.83</i>	<i>1.82</i>	<i>1.83</i>	1.68	<i>1.83</i>	<i>1.83</i>
United States	19.33	16.08	18.36	18.71	18.45	<i>19.73</i>	<i>19.97</i>	<i>20.26</i>	<i>20.06</i>	<i>20.58</i>	<i>20.90</i>	<i>20.90</i>	18.12	<i>19.61</i>	<i>20.61</i>
Central and South America	6.14	5.61	6.04	6.32	6.14	<i>6.36</i>	<i>6.52</i>	<i>6.53</i>	<i>6.39</i>	<i>6.58</i>	<i>6.72</i>	<i>6.73</i>	6.03	<i>6.39</i>	<i>6.61</i>
Brazil	2.89	2.67	2.97	3.06	2.93	<i>3.05</i>	<i>3.17</i>	<i>3.16</i>	<i>3.04</i>	<i>3.15</i>	<i>3.26</i>	<i>3.26</i>	2.90	<i>3.08</i>	<i>3.18</i>
Europe	14.04	11.70	13.59	13.23	12.68	<i>13.48</i>	<i>14.14</i>	<i>14.11</i>	<i>13.78</i>	<i>13.96</i>	<i>14.33</i>	<i>14.04</i>	13.14	<i>13.61</i>	<i>14.03</i>
Eurasia	4.86	4.48	5.28	5.17	4.92	<i>5.00</i>	<i>5.39</i>	<i>5.23</i>	<i>5.05</i>	<i>5.13</i>	<i>5.54</i>	<i>5.39</i>	4.95	<i>5.14</i>	<i>5.28</i>
Russia	3.65	3.33	4.04	3.92	3.71	<i>3.82</i>	<i>4.14</i>	<i>3.97</i>	<i>3.80</i>	<i>3.92</i>	<i>4.25</i>	<i>4.10</i>	3.74	<i>3.91</i>	<i>4.02</i>
Middle East	7.91	7.43	8.44	8.06	7.90	<i>8.09</i>	<i>8.71</i>	<i>8.26</i>	<i>7.98</i>	<i>8.59</i>	<i>8.99</i>	<i>8.35</i>	7.96	<i>8.24</i>	<i>8.48</i>
Asia and Oceania	34.64	32.14	33.80	35.87	36.36	<i>35.84</i>	<i>35.81</i>	<i>37.22</i>	<i>38.04</i>	<i>37.64</i>	<i>37.01</i>	<i>38.14</i>	34.11	<i>36.31</i>	<i>37.71</i>
China	13.89	14.08	14.65	15.11	15.03	<i>15.59</i>	<i>15.30</i>	<i>15.59</i>	<i>15.89</i>	<i>16.11</i>	<i>15.78</i>	<i>16.02</i>	14.43	<i>15.38</i>	<i>15.95</i>
Japan	3.69	2.89	3.03	3.50	3.67	<i>3.00</i>	<i>3.12</i>	<i>3.45</i>	<i>3.64</i>	<i>2.98</i>	<i>3.06</i>	<i>3.37</i>	3.27	<i>3.31</i>	<i>3.26</i>
India	4.63	3.77	4.17	4.93	5.00	<i>4.46</i>	<i>4.54</i>	<i>4.92</i>	<i>5.16</i>	<i>5.25</i>	<i>4.91</i>	<i>5.23</i>	4.37	<i>4.73</i>	<i>5.14</i>
Africa	4.18	4.05	4.07	4.29	4.31	<i>4.34</i>	<i>4.27</i>	<i>4.46</i>	<i>4.47</i>	<i>4.48</i>	<i>4.41</i>	<i>4.59</i>	4.15	<i>4.35</i>	<i>4.49</i>
Total OECD Liquid Fuels Consumption	45.26	37.40	42.12	42.80	42.29	<i>43.90</i>	<i>45.11</i>	<i>45.96</i>	<i>45.51</i>	<i>45.29</i>	<i>46.20</i>	<i>46.37</i>	41.90	<i>44.33</i>	<i>45.85</i>
Total non-OECD Liquid Fuels Consumption	50.13	47.45	51.21	52.59	52.21	<i>52.96</i>	<i>53.85</i>	<i>54.31</i>	<i>54.36</i>	<i>55.72</i>	<i>55.85</i>	<i>55.92</i>	50.35	<i>53.34</i>	<i>55.47</i>
Total World Liquid Fuels Consumption	95.40	84.85	93.33	95.39	94.50	<i>96.86</i>	<i>98.96</i>	<i>100.27</i>	<i>99.86</i>	<i>101.01</i>	<i>102.05</i>	<i>102.29</i>	92.26	<i>97.67</i>	<i>101.31</i>
Real Gross Domestic Product (a)															
World Index, 2015 Q1 = 100	110.3	107.6	112.4	113.5	115.7	<i>117.1</i>	<i>118.7</i>	<i>119.6</i>	<i>122.4</i>	<i>123.1</i>	<i>123.8</i>	<i>124.3</i>	110.9	<i>117.8</i>	<i>123.4</i>
Percent change from prior year	-3.4	-6.2	-2.4	-1.8	4.9	<i>8.9</i>	<i>5.6</i>	<i>5.4</i>	<i>5.8</i>	<i>5.1</i>	<i>4.3</i>	<i>3.9</i>	-3.4	<i>6.2</i>	<i>4.8</i>
OECD Index, 2015 = 100	103.6	109.3	113.9	118.9	123.6	<i>128.6</i>	<i>133.6</i>	<i>138.6</i>	<i>143.6</i>	<i>148.6</i>	<i>153.6</i>	<i>158.6</i>	103.6	<i>109.3</i>	<i>113.9</i>
Percent change from prior year	-4.8	5.5	4.2	4.2	4.2	<i>4.2</i>	<i>4.2</i>	<i>4.2</i>	<i>4.2</i>	<i>4.2</i>	<i>4.2</i>	<i>4.2</i>	-4.8	<i>5.5</i>	<i>4.2</i>
Non-OECD Index, 2015 = 100	116.0	123.6	130.0	136.4	143.2	<i>150.4</i>	<i>157.6</i>	<i>164.8</i>	<i>172.0</i>	<i>179.2</i>	<i>186.4</i>	<i>193.6</i>	116.0	<i>123.6</i>	<i>130.0</i>
Percent change from prior year	-2.3	6.5	5.2	4.6	4.6	<i>4.6</i>	<i>4.6</i>	<i>4.6</i>	<i>4.6</i>	<i>4.6</i>	<i>4.6</i>	<i>4.6</i>	-2.3	<i>6.5</i>	<i>5.2</i>
Nominal U.S. Dollar Index (b)															
Index, 2015 Q1 = 100	111.7	115.9	111.5	108.3	106.8	<i>108.0</i>	<i>108.0</i>	<i>108.6</i>	<i>108.9</i>	<i>108.8</i>	<i>108.6</i>	<i>108.4</i>	111.9	<i>107.8</i>	<i>108.7</i>
Percent change from prior year	2.8	5.8	0.9	-1.9	-4.4	<i>-6.8</i>	<i>-3.1</i>	<i>0.3</i>	<i>2.0</i>	<i>0.8</i>	<i>0.6</i>	<i>-0.2</i>	1.9	<i>-3.6</i>	<i>0.8</i>

(a) GDP values for the individual countries in the indexes are converted to U.S. dollars at purchasing power parity and then summed to create values for the world, OECD, and non-OECD. Historical and forecast data are from Oxford Economics, and quarterly values are reindexed to 2015 Q1 by EIA.

(b) Data source is the Board of Governors of the U.S. Federal Reserve System Nominal Broad Trade-Weighted Dollar Index. An increase in the index indicates an appreciation of the U.S. dollar against a basket of currencies and a decrease in the index indicates a depreciation of the U.S. dollar against a basket of currencies. Historical and forecast data are from Oxford Economics, and quarterly values are reindexed to 2015 Q1 by EIA.

- = no data available

OECD = Organization for Economic Cooperation and Development: Australia, Austria, Belgium, Canada, Chile, the Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Israel, Italy, Japan, Latvia, Lithuania, Luxembourg, Mexico, the Netherlands, New Zealand, Norway, Poland, Portugal, Slovakia, Slovenia, South Korea, Spain, Sweden, Switzerland, Turkey, the United Kingdom, the United States.

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from Energy Information Administration international energy statistics.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 4a. U.S. Petroleum and Other Liquids Supply, Consumption, and Inventories
U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Supply (million barrels per day)															
Crude Oil Supply															
Domestic Production (a)	12.75	10.81	10.81	10.90	10.70	<i>11.04</i>	<i>11.17</i>	<i>11.38</i>	<i>11.55</i>	<i>11.67</i>	<i>11.88</i>	<i>12.05</i>	11.31	<i>11.08</i>	<i>11.79</i>
Alaska	0.48	0.41	0.44	0.46	0.46	<i>0.41</i>	<i>0.40</i>	<i>0.44</i>	<i>0.43</i>	<i>0.39</i>	<i>0.39</i>	<i>0.43</i>	0.45	<i>0.42</i>	<i>0.41</i>
Federal Gulf of Mexico (b)	1.96	1.69	1.45	1.52	1.81	<i>1.77</i>	<i>1.75</i>	<i>1.73</i>	<i>1.77</i>	<i>1.74</i>	<i>1.75</i>	<i>1.79</i>	1.66	<i>1.76</i>	<i>1.76</i>
Lower 48 States (excl GOM)	10.31	8.71	8.92	8.91	8.44	<i>8.87</i>	<i>9.02</i>	<i>9.21</i>	<i>9.35</i>	<i>9.54</i>	<i>9.73</i>	<i>9.84</i>	9.21	<i>8.89</i>	<i>9.62</i>
Crude Oil Net Imports (c)	2.90	3.08	2.31	2.51	2.87	<i>3.34</i>	<i>4.34</i>	<i>3.71</i>	<i>3.71</i>	<i>4.74</i>	<i>4.79</i>	<i>4.08</i>	2.70	<i>3.57</i>	<i>4.33</i>
SPR Net Withdrawals	0.00	-0.23	0.15	0.04	0.00	<i>0.19</i>	<i>0.00</i>	<i>0.05</i>	<i>0.05</i>	<i>0.05</i>	<i>0.03</i>	<i>0.11</i>	-0.01	<i>0.06</i>	<i>0.06</i>
Commercial Inventory Net Withdrawals	-0.55	-0.54	0.38	0.13	-0.18	<i>0.39</i>	<i>0.20</i>	<i>-0.02</i>	<i>-0.27</i>	<i>0.00</i>	<i>0.27</i>	<i>-0.02</i>	-0.14	<i>0.10</i>	<i>0.00</i>
Crude Oil Adjustment (d)	0.67	0.03	0.38	0.32	0.42	<i>0.40</i>	<i>0.23</i>	<i>0.16</i>	<i>0.22</i>	<i>0.22</i>	<i>0.23</i>	<i>0.16</i>	0.35	<i>0.30</i>	<i>0.21</i>
Total Crude Oil Input to Refineries	15.77	13.16	14.03	13.90	13.81	<i>15.38</i>	<i>15.94</i>	<i>15.28</i>	<i>15.27</i>	<i>16.68</i>	<i>17.20</i>	<i>16.38</i>	14.21	<i>15.11</i>	<i>16.39</i>
Other Supply															
Refinery Processing Gain	1.02	0.82	0.94	0.92	0.84	<i>1.09</i>	<i>1.08</i>	<i>1.05</i>	<i>1.06</i>	<i>1.10</i>	<i>1.15</i>	<i>1.15</i>	0.92	<i>1.02</i>	<i>1.11</i>
Natural Gas Plant Liquids Production	5.12	4.96	5.33	5.23	4.86	<i>5.32</i>	<i>5.34</i>	<i>5.46</i>	<i>5.48</i>	<i>5.70</i>	<i>5.80</i>	<i>5.85</i>	5.16	<i>5.24</i>	<i>5.71</i>
Renewables and Oxygenate Production (e)	1.11	0.80	1.03	1.07	1.03	<i>1.08</i>	<i>1.10</i>	<i>1.08</i>	<i>1.08</i>	<i>1.11</i>	<i>1.12</i>	<i>1.12</i>	1.01	<i>1.07</i>	<i>1.11</i>
Fuel Ethanol Production	1.02	0.70	0.92	0.97	0.90	<i>0.98</i>	<i>0.99</i>	<i>0.98</i>	<i>0.97</i>	<i>0.99</i>	<i>1.00</i>	<i>1.00</i>	0.91	<i>0.96</i>	<i>0.99</i>
Petroleum Products Adjustment (f)	0.22	0.19	0.20	0.19	0.19	<i>0.21</i>	<i>0.21</i>	<i>0.21</i>	<i>0.21</i>	<i>0.22</i>	<i>0.22</i>	<i>0.22</i>	0.20	<i>0.21</i>	<i>0.22</i>
Product Net Imports (c)	-4.03	-2.94	-3.12	-3.32	-2.94	<i>-3.13</i>	<i>-3.35</i>	<i>-3.27</i>	<i>-3.32</i>	<i>-3.66</i>	<i>-4.32</i>	<i>-4.16</i>	-3.35	<i>-3.18</i>	<i>-3.87</i>
Hydrocarbon Gas Liquids	-1.99	-1.86	-1.86	-2.03	-2.02	<i>-2.12</i>	<i>-2.18</i>	<i>-1.99</i>	<i>-2.04</i>	<i>-2.23</i>	<i>-2.27</i>	<i>-2.13</i>	-1.94	<i>-2.08</i>	<i>-2.17</i>
Unfinished Oils	0.31	0.25	0.34	0.19	0.14	<i>0.39</i>	<i>0.45</i>	<i>0.30</i>	<i>0.21</i>	<i>0.26</i>	<i>0.30</i>	<i>0.20</i>	0.27	<i>0.32</i>	<i>0.24</i>
Other HC/Oxygenates	-0.10	-0.05	-0.04	-0.04	-0.08	<i>-0.07</i>	<i>-0.06</i>	<i>-0.07</i>	<i>-0.08</i>	<i>-0.06</i>	<i>-0.06</i>	<i>-0.07</i>	-0.06	<i>-0.07</i>	<i>-0.07</i>
Motor Gasoline Blend Comp.	0.39	0.36	0.48	0.43	0.55	<i>0.62</i>	<i>0.51</i>	<i>0.15</i>	<i>0.53</i>	<i>0.75</i>	<i>0.43</i>	<i>0.22</i>	0.42	<i>0.46</i>	<i>0.48</i>
Finished Motor Gasoline	-0.72	-0.40	-0.58	-0.78	-0.66	<i>-0.59</i>	<i>-0.60</i>	<i>-0.58</i>	<i>-0.77</i>	<i>-0.64</i>	<i>-0.76</i>	<i>-0.78</i>	-0.62	<i>-0.61</i>	<i>-0.74</i>
Jet Fuel	-0.07	0.09	0.12	0.07	0.03	<i>0.06</i>	<i>0.00</i>	<i>0.06</i>	<i>-0.04</i>	<i>0.01</i>	<i>0.10</i>	<i>0.16</i>	0.05	<i>0.04</i>	<i>0.06</i>
Distillate Fuel Oil	-1.19	-0.86	-1.15	-0.74	-0.49	<i>-0.76</i>	<i>-0.85</i>	<i>-0.52</i>	<i>-0.55</i>	<i>-0.98</i>	<i>-1.28</i>	<i>-1.11</i>	-0.98	<i>-0.66</i>	<i>-0.98</i>
Residual Fuel Oil	-0.02	0.02	0.05	0.05	0.08	<i>0.03</i>	<i>-0.01</i>	<i>0.05</i>	<i>-0.03</i>	<i>-0.07</i>	<i>-0.06</i>	<i>0.04</i>	0.02	<i>0.04</i>	<i>-0.03</i>
Other Oils (g)	-0.65	-0.49	-0.49	-0.48	-0.49	<i>-0.69</i>	<i>-0.61</i>	<i>-0.66</i>	<i>-0.55</i>	<i>-0.68</i>	<i>-0.71</i>	<i>-0.70</i>	-0.52	<i>-0.61</i>	<i>-0.66</i>
Product Inventory Net Withdrawals	0.12	-0.91	-0.04	0.71	0.66	<i>-0.20</i>	<i>-0.34</i>	<i>0.45</i>	<i>0.28</i>	<i>-0.58</i>	<i>-0.28</i>	<i>0.34</i>	-0.03	<i>0.14</i>	<i>-0.06</i>
Total Supply	19.33	16.08	18.36	18.71	18.45	<i>19.73</i>	<i>19.97</i>	<i>20.26</i>	<i>20.06</i>	<i>20.58</i>	<i>20.90</i>	<i>20.90</i>	18.12	<i>19.61</i>	<i>20.61</i>
Consumption (million barrels per day)															
Hydrocarbon Gas Liquids	3.31	2.83	2.95	3.70	3.40	<i>3.16</i>	<i>3.01</i>	<i>3.69</i>	<i>3.84</i>	<i>3.31</i>	<i>3.35</i>	<i>3.88</i>	3.20	<i>3.32</i>	<i>3.59</i>
Unfinished Oils	0.14	0.11	0.01	0.03	0.05	<i>0.00</i>	<i>0.00</i>	<i>0.00</i>	<i>0.00</i>	<i>0.00</i>	<i>0.00</i>	<i>0.00</i>	0.07	<i>0.01</i>	<i>0.00</i>
Motor Gasoline	8.49	7.11	8.50	8.02	8.00	<i>9.04</i>	<i>9.12</i>	<i>8.80</i>	<i>8.50</i>	<i>9.24</i>	<i>9.24</i>	<i>8.90</i>	8.03	<i>8.74</i>	<i>8.97</i>
Fuel Ethanol blended into Motor Gasoline	0.85	0.72	0.87	0.84	0.82	<i>0.95</i>	<i>0.93</i>	<i>0.90</i>	<i>0.86</i>	<i>0.94</i>	<i>0.94</i>	<i>0.92</i>	0.82	<i>0.90</i>	<i>0.92</i>
Jet Fuel	1.56	0.69	0.97	1.09	1.13	<i>1.33</i>	<i>1.47</i>	<i>1.50</i>	<i>1.50</i>	<i>1.63</i>	<i>1.78</i>	<i>1.79</i>	1.08	<i>1.36</i>	<i>1.68</i>
Distillate Fuel Oil	3.97	3.51	3.70	3.92	3.97	<i>4.07</i>	<i>4.04</i>	<i>4.23</i>	<i>4.28</i>	<i>4.22</i>	<i>4.15</i>	<i>4.25</i>	3.78	<i>4.08</i>	<i>4.22</i>
Residual Fuel Oil	0.17	0.15	0.32	0.23	0.26	<i>0.21</i>	<i>0.28</i>	<i>0.24</i>	<i>0.24</i>	<i>0.21</i>	<i>0.26</i>	<i>0.26</i>	0.22	<i>0.25</i>	<i>0.24</i>
Other Oils (g)	1.68	1.68	1.91	1.71	1.63	<i>1.91</i>	<i>2.05</i>	<i>1.79</i>	<i>1.72</i>	<i>1.96</i>	<i>2.12</i>	<i>1.83</i>	1.75	<i>1.85</i>	<i>1.91</i>
Total Consumption	19.33	16.08	18.36	18.71	18.45	<i>19.73</i>	<i>19.97</i>	<i>20.26</i>	<i>20.06</i>	<i>20.58</i>	<i>20.90</i>	<i>20.90</i>	18.12	<i>19.61</i>	<i>20.61</i>
Total Petroleum and Other Liquids Net Imports	-1.13	0.14	-0.81	-0.81	-0.07	<i>0.20</i>	<i>0.99</i>	<i>0.44</i>	<i>0.40</i>	<i>1.08</i>	<i>0.48</i>	<i>-0.09</i>	-0.65	<i>0.39</i>	<i>0.47</i>
End-of-period Inventories (million barrels)															
Commercial Inventory															
Crude Oil (excluding SPR)	482.5	531.9	497.3	485.3	501.9	<i>466.1</i>	<i>447.3</i>	<i>449.4</i>	<i>473.5</i>	<i>473.2</i>	<i>447.9</i>	<i>449.5</i>	485.3	<i>449.4</i>	<i>449.5</i>
Hydrocarbon Gas Liquids	180.8	233.9	299.1	229.2	168.6	<i>204.0</i>	<i>244.0</i>	<i>198.7</i>	<i>156.7</i>	<i>205.2</i>	<i>246.2</i>	<i>204.8</i>	229.2	<i>198.7</i>	<i>204.8</i>
Unfinished Oils	100.1	91.9	81.4	78.2	93.3	<i>89.5</i>	<i>89.8</i>	<i>83.0</i>	<i>93.1</i>	<i>90.8</i>	<i>89.8</i>	<i>83.1</i>	78.2	<i>83.0</i>	<i>83.1</i>
Other HC/Oxygenates	33.6	26.2	25.2	29.9	29.1	<i>25.5</i>	<i>25.3</i>	<i>25.6</i>	<i>27.7</i>	<i>26.4</i>	<i>26.1</i>	<i>26.4</i>	29.9	<i>25.6</i>	<i>26.4</i>
Total Motor Gasoline	260.8	253.3	226.5	243.2	237.6	<i>232.5</i>	<i>226.4</i>	<i>234.2</i>	<i>241.7</i>	<i>245.6</i>	<i>233.2</i>	<i>249.4</i>	243.2	<i>234.2</i>	<i>249.4</i>
Finished Motor Gasoline	22.6	23.5	22.4	25.3	20.3	<i>23.4</i>	<i>22.2</i>	<i>24.4</i>	<i>24.1</i>	<i>23.9</i>	<i>23.1</i>	<i>26.2</i>	25.3	<i>24.4</i>	<i>26.2</i>
Motor Gasoline Blend Comp.	238.3	229.8	204.1	217.9	217.4	<i>209.2</i>	<i>204.1</i>	<i>209.8</i>	<i>217.6</i>	<i>221.8</i>	<i>210.1</i>	<i>223.2</i>	217.9	<i>209.8</i>	<i>223.2</i>
Jet Fuel	39.9	41.5	40.1	38.6	39.0	<i>41.8</i>	<i>43.8</i>	<i>40.5</i>	<i>39.9</i>	<i>40.7</i>	<i>43.0</i>	<i>39.9</i>	38.6	<i>40.5</i>	<i>39.9</i>
Distillate Fuel Oil	126.7	175.4	171.7	160.4	145.5	<i>135.3</i>	<i>138.5</i>	<i>140.9</i>	<i>130.2</i>	<i>134.7</i>	<i>141.5</i>	<i>142.4</i>	160.4	<i>140.9</i>	<i>142.4</i>
Residual Fuel Oil	34.4	39.6	32.1	30.2	30.9	<i>33.2</i>	<i>31.3</i>	<i>32.5</i>	<i>32.0</i>	<i>32.7</i>	<i>31.0</i>	<i>32.4</i>	30.2	<i>32.5</i>	<i>32.4</i>
Other Oils (g)	62.0	59.2	48.6	49.3	55.8	<i>56.3</i>	<i>50.7</i>	<i>53.0</i>	<i>62.0</i>	<i>59.8</i>	<i>50.5</i>	<i>52.0</i>	49.3	<i>53.0</i>	<i>52.0</i>
Total Commercial Inventory	1320.8	1452.8	1422.0	1344.3	1301.7	<i>1284.3</i>	<i>1297.1</i>	<i>1257.7</i>	<i>1256.8</i>	<i>1309.2</i>	<i>1309.3</i>	<i>1279.8</i>	1344.3	<i>1257.7</i>	<i>1279.8</i>
Crude Oil in SPR	635.0	656.0	642.2	638.1	637.8	<i>620.1</i>	<i>620.1</i>	<i>615.8</i>	<i>611.5</i>	<i>607.3</i>	<i>604.6</i>	<i>594.9</i>	638.1	<i>615.8</i>	<i>594.9</i>

(a) Includes lease condensate.

(b) Crude oil production from U.S. Federal leases in the Gulf of Mexico (GOM).

(c) Net imports equals gross imports minus gross exports.

(d) Crude oil adjustment balances supply and consumption and was previously referred to as "Unaccounted for Crude Oil."

(e) Renewables and oxygenate production includes pentanes plus, oxygenates (excluding fuel ethanol), and renewable fuels. Beginning in January 2021, renewable fuels includes biodiesel, renewable diesel, renewable jet fuel, renewable heating oil, renewable naphtha and gasoline, and other renewable fuels. For December 2020 and prior, renewable fuels includes only biodiesel.

(f) Petroleum products adjustment includes hydrogen/oxygenates/renewables/other hydrocarbons, motor gasoline blend components, and finished motor gasoline.

(g) For net imports and inventories "Other Oils" includes aviation gasoline blend components, finished aviation gasoline, k

Table 4b. U.S. Hydrocarbon Gas Liquids (HGL) and Petroleum Refinery Balances (million barrels per day, except inventories and utilization factor)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
HGL Production															
Natural Gas Processing Plants															
Ethane	1.93	1.92	2.14	2.06	1.87	2.16	2.12	2.25	2.37	2.47	2.52	2.60	2.01	2.10	2.49
Propane	1.72	1.61	1.68	1.70	1.62	1.69	1.70	1.71	1.67	1.72	1.73	1.74	1.68	1.68	1.72
Butanes	0.91	0.86	0.90	0.89	0.85	0.89	0.91	0.91	0.89	0.92	0.93	0.92	0.89	0.89	0.91
Natural Gasoline (Pentanes Plus)	0.56	0.57	0.62	0.58	0.53	0.58	0.61	0.59	0.55	0.60	0.62	0.59	0.58	0.58	0.59
Refinery and Blender Net Production															
Ethane/Ethylene	0.01	0.01	0.01	0.01	0.00	0.00	0.01	0.00	0.00	0.01	0.01	0.01	0.01	0.00	0.01
Propane	0.29	0.24	0.27	0.27	0.25	0.29	0.31	0.31	0.30	0.31	0.32	0.31	0.26	0.29	0.31
Propylene (refinery-grade)	0.25	0.26	0.26	0.29	0.27	0.28	0.28	0.28	0.28	0.29	0.28	0.28	0.26	0.28	0.28
Butanes/Butylenes	-0.08	0.18	0.13	-0.19	-0.09	0.24	0.20	-0.19	-0.08	0.26	0.19	-0.19	0.01	0.04	0.04
Renewable Fuels and Oxygenate Plant Net Production															
Natural Gasoline (Pentanes Plus)	-0.02	-0.01	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02	-0.02
HGL Net Imports															
Ethane	-0.30	-0.28	-0.27	-0.28	-0.35	-0.39	-0.38	-0.38	-0.43	-0.45	-0.45	-0.46	-0.28	-0.37	-0.45
Propane/Propylene	-1.12	-1.08	-1.08	-1.29	-1.11	-1.15	-1.20	-1.08	-1.08	-1.22	-1.24	-1.16	-1.14	-1.13	-1.18
Butanes/Butylenes	-0.30	-0.31	-0.36	-0.33	-0.35	-0.39	-0.40	-0.35	-0.35	-0.40	-0.40	-0.34	-0.32	-0.37	-0.37
Natural Gasoline (Pentanes Plus)	-0.27	-0.19	-0.16	-0.14	-0.22	-0.19	-0.20	-0.18	-0.19	-0.17	-0.18	-0.16	-0.19	-0.20	-0.17
HGL Refinery and Blender Net Inputs															
Butanes/Butylenes	0.46	0.25	0.32	0.47	0.39	0.29	0.31	0.49	0.39	0.29	0.33	0.51	0.37	0.37	0.38
Natural Gasoline (Pentanes Plus)	0.15	0.10	0.15	0.13	0.14	0.16	0.17	0.16	0.17	0.18	0.18	0.18	0.13	0.16	0.18
HGL Consumption															
Ethane/Ethylene	1.70	1.65	1.66	1.81	1.54	1.83	1.73	1.90	2.02	2.03	2.07	2.12	1.70	1.75	2.06
Propane	1.09	0.59	0.58	0.99	1.09	0.61	0.57	1.07	1.13	0.54	0.55	1.02	0.81	0.83	0.81
Propylene (refinery-grade)	0.26	0.27	0.27	0.30	0.29	0.30	0.29	0.30	0.30	0.30	0.30	0.30	0.28	0.29	0.30
Butanes/Butylenes	0.17	0.20	0.17	0.24	0.22	0.23	0.20	0.20	0.18	0.22	0.20	0.20	0.20	0.21	0.20
Natural Gasoline (Pentanes Plus)	0.09	0.13	0.26	0.35	0.26	0.21	0.22	0.24	0.21	0.21	0.23	0.24	0.21	0.23	0.22
HGL Inventories (million barrels)															
Ethane	52.6	49.5	62.5	74.9	65.8	65.9	63.5	65.1	57.4	56.9	56.0	59.0	59.9	65.1	57.3
Propane	60.3	75.3	100.7	70.4	39.3	58.7	78.9	65.9	43.1	65.5	87.7	74.4	70.4	65.9	74.4
Propylene (at refineries only)	1.4	1.5	1.5	1.5	1.1	1.5	1.8	1.8	1.7	1.9	2.1	1.9	1.5	1.8	1.9
Butanes/Butylenes	43.6	69.3	86.0	54.7	37.2	57.6	75.6	46.8	36.8	61.1	78.9	49.7	54.7	46.8	49.7
Natural Gasoline (Pentanes Plus)	24.0	35.7	38.6	32.9	22.8	23.0	22.7	21.4	18.9	20.0	20.9	20.1	32.9	21.4	20.1
Refinery and Blender Net Inputs															
Crude Oil	15.77	13.16	14.03	13.90	13.81	15.38	15.94	15.28	15.27	16.68	17.20	16.38	14.21	15.11	16.39
Hydrocarbon Gas Liquids	0.61	0.35	0.47	0.60	0.53	0.45	0.48	0.65	0.56	0.47	0.51	0.69	0.51	0.53	0.56
Other Hydrocarbons/Oxygenates	1.12	0.95	1.11	1.08	1.05	1.17	1.19	1.16	1.15	1.22	1.21	1.19	1.06	1.14	1.19
Unfinished Oils	0.05	0.23	0.44	0.20	-0.08	0.43	0.44	0.37	0.09	0.28	0.31	0.27	0.23	0.29	0.24
Motor Gasoline Blend Components	0.41	0.48	0.85	0.46	0.71	0.93	0.67	0.26	0.56	0.81	0.65	0.30	0.55	0.64	0.58
Aviation Gasoline Blend Components	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total Refinery and Blender Net Inputs	17.97	15.17	16.90	16.23	16.01	18.36	18.71	17.72	17.63	19.46	19.89	18.83	16.57	17.71	18.96
Refinery Processing Gain	1.02	0.82	0.94	0.92	0.84	1.09	1.08	1.05	1.06	1.10	1.15	1.15	0.92	1.02	1.11
Refinery and Blender Net Production															
Hydrocarbon Gas Liquids	0.47	0.69	0.67	0.36	0.44	0.82	0.79	0.40	0.50	0.86	0.80	0.41	0.55	0.62	0.64
Finished Motor Gasoline	9.30	7.52	9.14	8.98	8.74	9.85	9.80	9.56	9.36	9.95	10.06	9.88	8.74	9.49	9.81
Jet Fuel	1.63	0.62	0.83	1.00	1.10	1.30	1.49	1.41	1.53	1.64	1.71	1.59	1.02	1.33	1.62
Distillate Fuel	4.95	4.83	4.72	4.46	4.29	4.65	4.85	4.71	4.68	5.20	5.45	5.31	4.74	4.63	5.16
Residual Fuel	0.23	0.18	0.19	0.15	0.19	0.21	0.27	0.21	0.26	0.29	0.30	0.24	0.19	0.22	0.27
Other Oils (a)	2.41	2.14	2.28	2.19	2.09	2.61	2.60	2.48	2.36	2.62	2.72	2.54	2.26	2.44	2.56
Total Refinery and Blender Net Production	18.99	15.99	17.84	17.15	16.86	19.45	19.79	18.77	18.69	20.56	21.03	19.98	17.49	18.73	20.07
Refinery Distillation Inputs	16.36	13.65	14.55	14.32	14.25	15.82	16.30	15.67	15.60	16.86	17.40	16.63	14.72	15.52	16.63
Refinery Operable Distillation Capacity	18.98	18.75	18.55	18.39	18.11	18.09	18.09	18.09	18.09	18.09	18.09	18.09	18.66	18.09	18.09
Refinery Distillation Utilization Factor	0.86	0.73	0.78	0.78	0.79	0.87	0.90	0.87	0.86	0.93	0.96	0.92	0.79	0.86	0.92

(a) "Other Oils" includes aviation gasoline blend components, finished aviation gasoline, kerosene, petrochemical feedstocks, special naphthas, lubricants, waxes, petroleum coke, asphalt and road oil, still gas, and miscellaneous products.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Petroleum Supply Monthly*, DOE/EIA-0109; *Petroleum Supply Annual*, DOE/EIA-0340/2; *Weekly Petroleum Status Report*, DOE/EIA-0208.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 4c. U.S. Regional Motor Gasoline Prices and Inventories
 U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Prices (cents per gallon)															
Refiner Wholesale Price	153	104	137	133	180	213	207	182	174	185	186	174	133	196	180
Gasoline Regular Grade Retail Prices Including Taxes															
PADD 1	236	191	211	212	252	286	283	257	244	253	258	247	214	270	251
PADD 2	226	179	207	202	247	287	274	246	228	252	251	237	204	264	242
PADD 3	210	162	186	183	227	265	256	231	223	233	233	222	187	246	228
PADD 4	247	201	233	221	247	307	297	268	254	270	274	258	226	280	264
PADD 5	311	258	283	278	312	363	355	330	327	339	330	338	284	341	334
U.S. Average	241	194	218	215	256	296	289	262	251	265	265	256	218	277	259
Gasoline All Grades Including Taxes	251	203	227	224	265	305	301	275	264	278	278	270	227	287	273
End-of-period Inventories (million barrels)															
Total Gasoline Inventories															
PADD 1	71.0	73.0	61.6	68.5	65.1	60.9	58.0	59.6	65.2	67.8	62.7	68.8	68.5	59.6	68.8
PADD 2	60.2	52.6	46.2	50.9	50.7	50.0	50.0	50.1	53.4	52.0	50.5	51.0	50.9	50.1	51.0
PADD 3	84.8	90.5	79.7	83.7	81.9	84.6	81.4	85.5	85.1	88.6	83.0	89.7	83.7	85.5	89.7
PADD 4	9.2	7.7	7.6	8.7	8.6	7.6	7.5	8.0	7.9	7.9	7.6	8.2	8.7	8.0	8.2
PADD 5	35.6	29.4	31.5	31.4	31.4	29.4	29.5	31.1	30.0	29.4	29.3	31.7	31.4	31.1	31.7
U.S. Total	260.8	253.3	226.5	243.2	237.6	232.5	226.4	234.2	241.7	245.6	233.2	249.4	243.2	234.2	249.4
Finished Gasoline Inventories															
U.S. Total	22.6	23.5	22.4	25.3	20.3	23.4	22.2	24.4	24.1	23.9	23.1	26.2	25.3	24.4	26.2
Gasoline Blending Components Inventories															
U.S. Total	238.3	229.8	204.1	217.9	217.4	209.2	204.1	209.8	217.6	221.8	210.1	223.2	217.9	209.8	223.2

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Prices are not adjusted for inflation.

Regions refer to Petroleum Administration for Defense Districts (PADD).

See "Petroleum for Administration Defense District" in EIA's Energy Glossary (<http://www.eia.doe.gov/glossary/index.html>) for a list of States in each region.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Petroleum Marketing Monthly*, DOE/EIA-0380;

Petroleum Supply Monthly, DOE/EIA-0109; *Petroleum Supply Annual*, DOE/EIA-0340/2; and *Weekly Petroleum Status Report*, DOE/EIA-0208.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 5a. U.S. Natural Gas Supply, Consumption, and Inventories

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Supply (billion cubic feet per day)															
Total Marketed Production	102.27	96.83	97.55	98.70	97.55	99.36	99.76	100.44	100.30	100.68	101.58	102.10	98.83	99.29	101.17
Alaska	0.96	0.88	0.88	0.98	1.02	0.78	0.72	0.88	0.92	0.78	0.72	0.87	0.92	0.85	0.82
Federal GOM (a)	2.72	2.22	1.72	1.73	2.27	2.24	2.14	2.06	2.06	1.98	1.87	1.84	2.09	2.18	1.94
Lower 48 States (excl GOM)	98.58	93.74	94.95	95.99	94.27	96.33	96.89	97.50	97.32	97.92	98.98	99.39	95.81	96.26	98.41
Total Dry Gas Production	94.79	89.68	89.83	91.15	90.53	92.26	92.63	93.26	93.13	93.48	94.31	94.80	91.35	92.18	93.93
LNG Gross Imports	0.24	0.12	0.09	0.09	0.15	0.18	0.18	0.20	0.32	0.18	0.18	0.20	0.13	0.18	0.22
LNG Gross Exports	7.92	5.52	3.91	8.78	9.27	9.83	8.68	9.73	9.96	8.83	8.33	9.78	6.53	9.38	9.22
Pipeline Gross Imports	7.60	6.08	6.39	7.27	8.64	6.56	6.71	6.83	7.38	6.36	6.37	6.69	6.84	7.18	6.70
Pipeline Gross Exports	8.15	7.17	8.09	8.18	8.30	8.42	9.30	9.49	9.32	8.66	9.38	9.38	7.90	8.88	9.18
Supplemental Gaseous Fuels	0.19	0.17	0.15	0.18	0.18	0.17	0.18	0.18	0.18	0.18	0.18	0.18	0.17	0.18	0.18
Net Inventory Withdrawals	12.74	-12.24	-7.68	5.36	17.19	-9.69	-7.50	6.68	17.19	-11.70	-9.26	4.49	-0.46	1.62	0.12
Total Supply	99.49	71.12	76.78	87.09	99.12	71.24	74.22	87.92	98.90	71.01	74.08	87.19	83.61	83.07	82.74
Balancing Item (b)	-0.18	-0.29	0.05	-1.01	0.11	-0.53	-0.28	-0.15	-0.09	-0.02	0.63	-0.10	-0.36	-0.21	0.11
Total Primary Supply	99.31	70.84	76.83	86.08	99.22	70.70	73.94	87.78	98.81	70.99	74.72	87.09	83.25	82.85	82.85
Consumption (billion cubic feet per day)															
Residential	22.83	8.20	3.82	16.00	25.59	7.14	3.68	16.97	24.59	7.68	3.73	16.79	12.70	13.29	13.15
Commercial	13.93	5.82	4.36	10.31	14.81	6.67	4.73	10.87	14.83	6.24	4.65	10.79	8.60	9.25	9.11
Industrial	24.65	20.62	21.15	23.83	24.08	22.31	21.82	24.82	25.47	22.78	22.05	24.53	22.56	23.25	23.70
Electric Power (c)	29.55	29.05	40.10	28.19	26.65	27.07	36.34	27.39	26.05	26.86	36.86	27.15	31.74	29.39	29.25
Lease and Plant Fuel	5.17	4.90	4.93	4.99	4.93	5.02	5.04	5.08	5.07	5.09	5.14	5.16	5.00	5.02	5.12
Pipeline and Distribution Use	3.02	2.15	2.33	2.61	3.01	2.35	2.18	2.50	2.65	2.18	2.13	2.50	2.53	2.51	2.36
Vehicle Use	0.16	0.10	0.13	0.13	0.14	0.15	0.15	0.15	0.16	0.16	0.16	0.16	0.13	0.15	0.16
Total Consumption	99.31	70.84	76.83	86.08	99.22	70.70	73.94	87.78	98.81	70.99	74.72	87.09	83.25	82.85	82.85
End-of-period Inventories (billion cubic feet)															
Working Gas Inventory	2,030	3,133	3,840	3,341	1,801	2,682	3,372	2,757	1,210	2,275	3,126	2,714	3,341	2,757	2,714
East Region (d)	385	655	890	763	313	521	778	546	71	376	647	454	763	546	454
Midwest Region (d)	472	747	1,053	918	395	621	941	749	181	482	862	732	918	749	732
South Central Region (d)	857	1,221	1,313	1,155	760	1,037	1,076	975	609	904	1,000	959	1,155	975	959
Mountain Region (d)	92	177	235	195	113	177	224	184	124	170	234	212	195	184	212
Pacific Region (d)	200	308	318	282	197	302	329	280	201	318	360	333	282	280	333
Alaska	23	25	31	28	23	24	24	24	24	24	24	24	28	24	24

(a) Marketed production from U.S. Federal leases in the Gulf of Mexico.

(b) The balancing item represents the difference between the sum of the components of natural gas supply and the sum of components of natural gas demand.

(c) Natural gas used for electricity generation and (a limited amount of) useful thermal output by electric utilities and independent power producers.

(d) For a list of States in each inventory region refer to *Weekly Natural Gas Storage Report, Notes and Definitions* (<http://ir.eia.gov/hgs/notes.html>).

- = no data available

LNG: liquefied natural gas.

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Natural Gas Monthly*, DOE/EIA-0130; and *Electric Power Monthly*, Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 5b. U.S. Regional Natural Gas Prices (dollars per thousand cubic feet)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Wholesale/Spot															
Henry Hub Spot Price	1.98	1.77	2.07	2.63	3.70	2.97	3.03	3.08	3.20	2.95	2.98	3.04	2.11	3.19	3.05
Residential Retail															
New England	13.77	14.50	18.28	14.64	14.78	15.20	17.57	13.36	12.93	13.84	16.77	12.87	14.47	14.62	13.31
Middle Atlantic	10.77	11.85	17.85	11.77	10.41	12.54	16.94	10.96	10.06	12.41	17.07	11.14	11.76	11.21	11.19
E. N. Central	6.99	9.50	18.15	8.02	7.41	10.91	16.64	8.34	7.60	10.52	16.21	8.00	8.39	8.59	8.64
W. N. Central	6.85	9.89	17.26	8.66	7.59	10.90	17.09	9.13	7.87	10.72	16.82	8.90	8.48	8.90	9.06
S. Atlantic	12.12	15.52	24.15	14.20	12.12	17.41	22.96	12.61	11.22	16.35	22.47	12.35	14.23	13.62	13.05
E. S. Central	9.69	13.34	20.85	10.63	9.53	14.50	22.08	13.38	10.42	14.87	21.93	13.18	11.15	11.49	12.54
W. S. Central	8.52	14.22	20.83	11.67	9.32	14.10	20.58	11.69	8.78	14.20	20.13	11.29	11.40	11.64	11.24
Mountain	7.55	9.37	12.60	8.15	7.90	9.79	13.69	8.51	8.04	9.78	13.58	8.41	8.43	8.69	8.84
Pacific	13.41	14.47	14.50	13.70	14.32	14.66	15.06	13.77	13.87	14.52	15.22	14.11	13.82	14.30	14.22
U.S. Average	9.46	11.89	17.65	10.60	9.80	12.90	17.41	10.63	9.63	12.57	17.25	10.49	10.83	11.01	10.88
Commercial Retail															
New England	9.93	10.40	10.99	10.06	10.38	10.74	10.91	10.20	10.52	10.55	10.21	9.97	10.16	10.42	10.32
Middle Atlantic	7.91	7.00	6.78	7.53	7.87	7.69	7.06	7.48	7.84	7.62	7.12	7.57	7.50	7.62	7.63
E. N. Central	5.75	6.73	8.79	6.21	6.12	7.56	9.31	7.03	6.72	7.49	8.48	6.34	6.28	6.85	6.84
W. N. Central	5.43	6.53	8.12	6.55	6.38	7.29	8.87	7.20	7.02	7.49	8.71	6.85	6.14	6.94	7.15
S. Atlantic	8.51	9.21	9.55	8.88	8.79	9.74	9.99	8.80	8.36	9.09	9.33	8.29	8.87	9.09	8.57
E. S. Central	8.38	9.20	10.10	8.69	8.43	9.40	10.23	9.03	8.38	9.34	9.86	8.72	8.78	8.94	8.78
W. S. Central	5.99	7.18	8.13	7.46	7.01	7.49	8.57	7.91	7.05	7.49	7.91	7.17	6.92	7.55	7.28
Mountain	6.09	6.85	7.42	6.45	6.50	6.98	8.06	7.06	6.85	7.22	8.05	6.88	6.46	6.90	7.04
Pacific	9.58	9.30	9.59	9.70	10.50	10.39	10.34	9.49	9.32	9.09	9.48	9.06	9.57	10.14	9.22
U.S. Average	7.13	7.63	8.49	7.53	7.56	8.29	8.91	7.91	7.68	8.09	8.47	7.54	7.48	7.94	7.79
Industrial Retail															
New England	8.15	7.41	6.16	7.67	8.58	7.63	6.76	7.67	8.10	7.49	6.52	7.52	7.54	7.78	7.54
Middle Atlantic	7.43	6.76	7.00	7.61	7.70	7.24	7.32	7.50	8.05	7.74	7.55	7.88	7.28	7.50	7.89
E. N. Central	4.84	5.10	4.15	5.10	5.39	5.58	5.72	5.56	5.84	5.59	5.46	5.42	4.86	5.52	5.63
W. N. Central	3.97	3.30	3.15	4.13	5.54	4.34	4.45	4.93	5.19	4.47	4.31	4.78	3.68	4.87	4.72
S. Atlantic	4.15	3.70	3.72	4.56	5.05	4.74	4.89	5.09	5.27	4.66	4.57	4.83	4.06	4.95	4.86
E. S. Central	3.92	3.24	3.23	4.04	4.64	4.33	4.51	4.83	4.99	4.40	4.17	4.51	3.65	4.59	4.55
W. S. Central	2.19	1.92	2.19	2.89	5.75	3.06	3.32	3.30	3.35	3.14	3.17	3.21	2.31	3.73	3.22
Mountain	4.40	4.59	4.67	4.91	5.00	5.13	5.73	5.75	5.74	5.44	5.56	5.36	4.64	5.36	5.53
Pacific	7.46	6.28	6.18	7.23	8.30	7.27	7.22	7.10	7.09	6.53	6.72	6.72	6.86	7.45	6.78
U.S. Average	3.52	2.85	2.88	3.77	5.74	3.88	4.00	4.28	4.55	3.94	3.83	4.15	3.29	4.49	4.14

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Prices are not adjusted for inflation.

Regions refer to U.S. Census divisions.

See "Census division" in EIA's Energy Glossary (<http://www.eia.doe.gov/glossary/index.html>) for a list of States in each region.

Historical data: Latest data available from Energy Information Administration databases supporting the *Natural Gas Monthly*, DOE/EIA-0130.

Natural gas Henry Hub spot price from Reuter's News Service (<http://www.reuters.com>).

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 6. U.S. Coal Supply, Consumption, and Inventories

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Supply (million short tons)															
Production	149.1	115.2	135.8	139.0	138.7	<i>151.0</i>	<i>159.6</i>	<i>150.7</i>	<i>153.2</i>	<i>145.5</i>	<i>155.4</i>	<i>151.2</i>	539.1	<i>600.1</i>	<i>605.3</i>
Appalachia	39.7	29.3	33.9	35.5	34.8	<i>37.3</i>	<i>35.6</i>	<i>35.7</i>	<i>38.9</i>	<i>39.7</i>	<i>37.3</i>	<i>38.4</i>	138.3	<i>143.5</i>	<i>154.4</i>
Interior	25.8	19.2	23.2	22.3	22.4	<i>25.1</i>	<i>28.1</i>	<i>27.3</i>	<i>28.5</i>	<i>27.3</i>	<i>28.3</i>	<i>27.8</i>	90.4	<i>102.9</i>	<i>111.9</i>
Western	83.6	66.7	78.8	81.2	81.5	<i>88.6</i>	<i>95.9</i>	<i>87.7</i>	<i>85.8</i>	<i>78.5</i>	<i>89.7</i>	<i>85.0</i>	310.3	<i>353.7</i>	<i>339.0</i>
Primary Inventory Withdrawals	0.5	1.3	2.0	-0.9	0.3	<i>0.2</i>	<i>2.2</i>	<i>-2.1</i>	<i>-1.4</i>	<i>-2.2</i>	<i>-0.9</i>	<i>-5.4</i>	2.8	<i>0.6</i>	<i>-9.9</i>
Imports	1.3	1.1	1.3	1.3	1.1	<i>0.9</i>	<i>1.2</i>	<i>1.2</i>	<i>1.0</i>	<i>1.0</i>	<i>1.3</i>	<i>1.3</i>	5.1	<i>4.5</i>	<i>4.6</i>
Exports	20.0	14.8	15.3	19.1	20.7	<i>18.6</i>	<i>18.7</i>	<i>22.6</i>	<i>28.5</i>	<i>19.2</i>	<i>19.5</i>	<i>25.0</i>	69.1	<i>80.6</i>	<i>92.2</i>
Metallurgical Coal	11.7	9.0	10.2	11.3	10.3	<i>8.9</i>	<i>11.5</i>	<i>12.4</i>	<i>15.9</i>	<i>11.1</i>	<i>12.6</i>	<i>13.6</i>	42.1	<i>43.1</i>	<i>53.2</i>
Steam Coal	8.3	5.8	5.1	7.8	10.4	<i>9.7</i>	<i>7.2</i>	<i>10.2</i>	<i>12.5</i>	<i>8.1</i>	<i>6.8</i>	<i>11.5</i>	27.0	<i>37.5</i>	<i>39.0</i>
Total Primary Supply	130.9	102.9	123.8	120.3	119.5	<i>133.6</i>	<i>144.3</i>	<i>127.2</i>	<i>124.4</i>	<i>125.1</i>	<i>136.3</i>	<i>122.1</i>	477.9	<i>524.6</i>	<i>507.8</i>
Secondary Inventory Withdrawals	-16.6	-5.0	21.5	-3.3	20.3	<i>-12.5</i>	<i>15.6</i>	<i>-0.6</i>	<i>14.3</i>	<i>-7.1</i>	<i>18.4</i>	<i>1.8</i>	-3.5	<i>22.9</i>	<i>27.4</i>
Waste Coal (a)	1.9	1.5	2.0	2.3	2.0	<i>2.0</i>	<i>2.0</i>	<i>2.0</i>	<i>1.8</i>	<i>1.8</i>	<i>1.8</i>	<i>1.8</i>	7.7	<i>8.0</i>	<i>7.4</i>
Total Supply	116.2	99.4	147.3	119.3	141.8	<i>123.1</i>	<i>162.0</i>	<i>128.6</i>	<i>140.5</i>	<i>119.8</i>	<i>156.5</i>	<i>125.7</i>	482.1	<i>555.5</i>	<i>542.6</i>
Consumption (million short tons)															
Coke Plants	4.3	3.5	3.2	3.5	1.3	<i>2.6</i>	<i>4.2</i>	<i>6.2</i>	<i>3.4</i>	<i>3.1</i>	<i>3.7</i>	<i>5.3</i>	14.4	<i>14.2</i>	<i>15.5</i>
Electric Power Sector (b)	97.9	87.2	139.3	112.1	128.1	<i>113.7</i>	<i>151.0</i>	<i>115.3</i>	<i>129.9</i>	<i>109.8</i>	<i>146.1</i>	<i>113.4</i>	436.5	<i>508.2</i>	<i>499.2</i>
Retail and Other Industry	7.4	5.7	6.1	7.2	7.0	<i>6.8</i>	<i>6.8</i>	<i>7.1</i>	<i>7.2</i>	<i>6.9</i>	<i>6.8</i>	<i>7.0</i>	26.4	<i>27.8</i>	<i>27.9</i>
Residential and Commercial	0.3	0.1	0.1	0.2	0.2	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.1</i>	<i>0.2</i>	<i>0.2</i>	0.8	<i>0.8</i>	<i>0.7</i>
Other Industrial	7.1	5.6	5.9	7.0	6.8	<i>6.7</i>	<i>6.6</i>	<i>6.9</i>	<i>7.0</i>	<i>6.8</i>	<i>6.6</i>	<i>6.7</i>	25.6	<i>27.0</i>	<i>27.2</i>
Total Consumption	109.5	96.4	148.6	122.8	136.4	<i>123.1</i>	<i>162.0</i>	<i>128.6</i>	<i>140.5</i>	<i>119.8</i>	<i>156.5</i>	<i>125.7</i>	477.3	<i>550.1</i>	<i>542.6</i>
Discrepancy (c)	6.7	2.9	-1.3	-3.5	5.4	<i>0.0</i>	<i>0.0</i>	<i>0.0</i>	<i>0.0</i>	<i>0.0</i>	<i>0.0</i>	<i>0.0</i>	4.8	<i>5.4</i>	<i>0.0</i>
End-of-period Inventories (million short tons)															
Primary Inventories (d)	30.8	29.5	27.5	28.5	28.1	<i>27.9</i>	<i>25.8</i>	<i>27.9</i>	<i>29.3</i>	<i>31.5</i>	<i>32.5</i>	<i>37.8</i>	28.5	<i>27.9</i>	<i>37.8</i>
Secondary Inventories	150.6	155.6	134.2	137.5	117.1	<i>129.6</i>	<i>114.0</i>	<i>114.6</i>	<i>100.2</i>	<i>107.4</i>	<i>89.0</i>	<i>87.2</i>	137.5	<i>114.6</i>	<i>87.2</i>
Electric Power Sector	145.2	150.4	129.1	132.7	111.8	<i>124.2</i>	<i>108.4</i>	<i>109.2</i>	<i>95.1</i>	<i>102.1</i>	<i>83.6</i>	<i>82.0</i>	132.7	<i>109.2</i>	<i>82.0</i>
Retail and General Industry	3.0	3.0	2.9	2.8	3.8	<i>3.6</i>	<i>3.6</i>	<i>3.4</i>	<i>3.6</i>	<i>3.5</i>	<i>3.5</i>	<i>3.3</i>	2.8	<i>3.4</i>	<i>3.3</i>
Coke Plants	2.1	2.0	2.0	1.7	1.4	<i>1.7</i>	<i>1.8</i>	<i>1.9</i>	<i>1.3</i>	<i>1.7</i>	<i>1.8</i>	<i>1.8</i>	1.7	<i>1.9</i>	<i>1.8</i>
Commercial & Institutional	0.2	0.2	0.2	0.3	0.2	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	<i>0.2</i>	0.3	<i>0.2</i>	<i>0.2</i>
Coal Market Indicators															
Coal Miner Productivity															
(Tons per hour)	6.37	6.37	6.37	6.37	6.32	<i>6.32</i>	<i>6.32</i>	<i>6.32</i>	<i>6.30</i>	<i>6.30</i>	<i>6.30</i>	<i>6.30</i>	6.37	<i>6.32</i>	<i>6.30</i>
Total Raw Steel Production															
(Million short tons per day)	0.268	0.174	0.197	0.224	0.246	<i>0.256</i>	<i>0.270</i>	<i>0.304</i>	<i>0.289</i>	<i>0.251</i>	<i>0.251</i>	<i>0.260</i>	0.216	<i>0.269</i>	<i>0.263</i>
Cost of Coal to Electric Utilities															
(Dollars per million Btu)	1.93	1.91	1.93	1.92	1.91	<i>1.90</i>	<i>1.88</i>	<i>1.85</i>	<i>1.87</i>	<i>1.87</i>	<i>1.85</i>	<i>1.82</i>	1.92	<i>1.88</i>	<i>1.85</i>

(a) Waste coal includes waste coal and coal slurry reprocessed into briquettes.

(b) Coal used for electricity generation and (a limited amount of) useful thermal output by electric utilities and independent power producers.

(c) The discrepancy reflects an unaccounted-for shipper and receiver reporting difference, assumed to be zero in the forecast period.

(d) Primary stocks are held at the mines and distribution points.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Quarterly Coal Report*, DOE/EIA-0121; and *Electric Power Monthly*,

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 7a. U.S. Electricity Industry Overview

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Electricity Supply (billion kilowatthours)															
Electricity Generation	966	933	1,148	962	989	970	1,136	970	998	986	1,148	979	4,009	4,063	4,110
Electric Power Sector (a)	925	896	1,109	923	952	933	1,098	932	961	948	1,108	940	3,853	3,915	3,956
Industrial Sector (b)	38	34	36	36	34	33	34	34	34	34	37	35	143	135	140
Commercial Sector (b)	3	3	4	3	3	3	4	3	3	3	4	3	13	13	14
Net Imports	10	11	15	12	9	11	14	11	12	12	15	11	47	45	50
Total Supply	976	944	1,163	973	998	981	1,149	980	1,010	998	1,162	990	4,056	4,108	4,160
Losses and Unaccounted for (c)	53	67	71	63	51	68	57	54	45	67	57	54	254	229	225
Electricity Consumption (billion kilowatthours unless noted)															
Retail Sales	887	844	1,057	876	914	881	1,059	893	931	897	1,070	901	3,664	3,748	3,799
Residential Sector	340	334	453	334	379	342	442	340	381	347	446	344	1,462	1,503	1,518
Commercial Sector	314	293	360	309	305	307	366	317	313	314	370	319	1,276	1,294	1,316
Industrial Sector	231	216	242	231	229	231	250	235	235	235	252	236	920	945	959
Transportation Sector	2	1	2	2	2	2	2	2	2	2	2	2	7	6	6
Direct Use (d)	36	33	35	34	33	32	33	33	33	33	36	34	138	131	136
Total Consumption	923	877	1,092	910	947	913	1,093	926	964	931	1,105	935	3,802	3,879	3,935
Average residential electricity usage per customer (kWh)	2,496	2,451	3,326	2,451	2,740	2,472	3,199	2,455	2,726	2,477	3,187	2,456	10,723	10,867	10,847
End-of-period Fuel Inventories Held by Electric Power Sector															
Coal (mmst)	145.2	150.4	129.1	132.7	111.8	124.2	108.4	109.2	95.1	102.1	83.6	82.0	132.7	109.2	82.0
Residual Fuel (mmb)	8.3	8.5	8.2	8.3	8.0	8.2	8.3	8.6	8.1	8.1	8.2	8.6	8.3	8.6	8.6
Distillate Fuel (mmb)	16.5	16.5	17.0	16.8	15.9	15.9	15.8	16.1	16.0	15.9	15.9	16.2	16.8	16.1	16.2
Prices															
Power Generation Fuel Costs (dollars per million Btu)															
Coal	1.93	1.91	1.93	1.92	1.91	1.90	1.88	1.85	1.87	1.87	1.85	1.82	1.92	1.88	1.85
Natural Gas	2.39	2.08	2.26	2.87	7.34	3.10	3.08	3.28	3.62	3.04	3.01	3.24	2.39	4.09	3.21
Residual Fuel Oil	12.15	6.65	8.85	8.90	11.11	12.79	12.66	12.00	11.89	12.19	11.39	11.17	9.15	12.10	11.65
Distillate Fuel Oil	13.27	8.39	10.37	10.54	13.66	15.57	15.94	15.33	14.93	14.59	14.53	14.61	10.73	14.87	14.70
Retail Prices (cents per kilowatthour)															
Residential Sector	12.90	13.24	13.35	13.25	13.09	13.50	13.75	13.64	13.47	13.72	13.83	13.66	13.20	13.50	13.68
Commercial Sector	10.33	10.63	10.97	10.62	11.11	10.94	11.40	10.98	11.35	11.13	11.49	11.04	10.65	11.12	11.26
Industrial Sector	6.38	6.63	7.08	6.53	7.15	7.03	7.19	6.59	6.93	7.02	7.20	6.59	6.66	6.99	6.94
Wholesale Electricity Prices (dollars per megawatthour)															
ERCOT North hub	23.41	24.03	34.12	26.41	616.34	26.15	16.02	19.59	23.78	21.99	20.40	20.66	26.99	169.52	21.71
CAISO SP15 zone	28.64	19.21	61.94	42.80	44.74	30.59	47.93	37.24	38.20	36.19	39.13	34.75	38.15	40.13	37.07
ISO-NE Internal hub	24.61	20.25	27.20	34.03	55.26	29.56	31.92	36.47	48.71	27.74	29.11	32.86	26.52	38.30	34.60
NYISO Hudson Valley zone	21.82	18.13	24.38	27.05	44.74	28.98	33.28	30.67	35.72	28.10	30.79	28.24	22.85	34.42	30.72
PJM Western hub	22.47	20.79	28.24	26.44	35.09	32.07	33.84	31.07	32.76	31.01	33.49	30.52	24.49	33.02	31.94
Midcontinent ISO Illinois hub	24.43	23.00	29.35	24.94	44.97	31.09	33.11	30.74	31.33	31.24	33.39	30.72	25.43	34.98	31.67
SPP ISO South hub	20.06	19.54	26.27	24.34	250.31	26.35	31.31	26.52	26.61	26.65	30.97	26.78	22.55	83.62	27.75
SERC index, Into Southern	23.58	18.23	23.47	25.21	41.10	29.30	30.61	29.44	29.77	29.24	30.84	28.48	22.62	32.61	29.58
FRCC index, Florida Reliability	26.24	18.53	23.75	25.39	27.73	28.92	29.67	29.14	29.72	27.93	28.13	27.99	23.48	28.86	28.44
Northwest index, Mid-Columbia	22.77	14.49	33.56	31.00	34.56	36.30	41.54	34.41	37.45	34.03	36.71	33.79	25.46	36.70	35.50
Southwest index, Palo Verde	22.07	19.60	80.81	36.10	41.72	29.13	39.33	29.91	29.84	29.74	31.40	28.34	39.64	35.02	29.83

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

kWh = kilowatthours. Btu = British thermal units.

Prices are not adjusted for inflation.

- (a) Generation supplied by power plants with capacity of at least 1 megawatt operated by electric utilities and independent power producers.
- (b) Generation supplied by power plants with capacity of at least 1 megawatt operated by businesses in the commercial and industrial sectors, primarily for onsite use.
- (c) Includes transmission and distribution losses, data collection time-frame differences, and estimation error.
- (d) Direct Use represents commercial and industrial facility use of onsite net electricity generation; and electrical sales or transfers to adjacent or collocated facilities for which revenue information is not available. See Table 7.6 of the EIA *Monthly Energy Review*.

Historical data sources:

- (1) Electricity supply, consumption, fuel costs, and retail electricity prices: Latest data available from U.S. Energy Information Administration databases supporting the following reports: Electric Power Monthly, DOE/EIA-0226; and Electric Power Annual, DOE/EIA-0348
 - (2) Wholesale electricity prices (except for PJM RTO price): S&P Global Market Intelligence, SNL Energy Data
 - (3) PJM ISO Western Hub wholesale electricity prices: PJM Data Miner website
- Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 7b. U.S. Regional Electricity Retail Sales (billion kilowatthours)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Residential Sector															
New England	11.7	10.9	14.6	11.0	12.9	11.2	13.8	11.1	13.3	11.0	13.4	11.1	48.2	49.0	48.9
Middle Atlantic	32.2	30.6	43.5	30.9	36.1	30.6	40.4	31.4	36.6	30.6	40.0	31.4	137.1	138.5	138.7
E. N. Central	46.4	43.7	56.5	43.4	50.2	44.1	53.8	44.6	51.4	44.4	54.2	44.7	190.0	192.7	194.7
W. N. Central	27.6	23.7	30.0	24.5	29.9	24.6	29.6	25.7	33.1	26.4	31.7	27.1	105.8	109.9	118.4
S. Atlantic	84.3	86.3	114.7	85.3	95.2	90.6	113.0	85.7	95.0	89.9	112.9	86.6	370.6	384.6	384.4
E. S. Central	29.0	26.0	37.2	26.6	33.8	26.9	37.5	27.3	33.6	27.2	38.0	27.6	118.8	125.5	126.3
W. S. Central	48.8	52.9	76.4	48.5	56.8	53.4	77.2	50.5	54.1	55.7	78.5	51.5	226.5	237.8	239.8
Mountain	22.5	25.7	36.2	24.0	23.7	26.0	34.2	24.0	23.7	26.2	34.3	24.4	108.4	108.0	108.7
Pacific contiguous	36.7	33.2	43.0	38.6	39.0	33.4	41.6	37.7	39.4	34.0	41.7	37.9	151.5	151.7	152.9
AK and HI	1.3	1.1	1.2	1.3	1.3	1.1	1.2	1.3	1.3	1.1	1.2	1.3	4.9	4.9	4.9
Total	340.3	334.1	453.4	334.1	378.9	341.8	442.3	339.5	381.5	346.6	446.0	343.7	1,462.0	1,502.5	1,517.8
Commercial Sector															
New England	12.3	10.6	13.2	11.4	11.7	10.8	13.0	11.6	11.9	10.8	12.9	11.5	47.5	47.1	47.1
Middle Atlantic	35.9	31.0	38.9	33.2	34.6	33.7	39.4	34.8	36.2	34.8	39.9	35.0	138.9	142.5	145.9
E. N. Central	43.1	38.3	47.3	41.0	41.7	40.9	48.0	42.6	43.2	42.0	48.7	42.9	169.7	173.3	176.9
W. N. Central	24.7	21.6	26.3	23.4	24.0	21.5	26.5	23.8	24.8	22.3	27.3	24.5	96.0	95.9	98.8
S. Atlantic	72.0	70.0	85.7	72.4	70.8	74.9	87.8	74.3	73.3	76.7	88.8	74.9	300.2	307.7	313.8
E. S. Central	20.7	19.4	25.3	20.4	20.9	20.0	25.7	20.8	21.2	20.4	26.0	21.0	85.8	87.5	88.6
W. S. Central	44.3	44.6	55.0	45.4	42.4	46.0	56.8	47.3	43.0	47.5	57.5	48.0	189.4	192.6	196.1
Mountain	22.4	22.1	27.4	22.8	21.9	23.6	27.5	23.3	22.6	24.2	28.0	23.8	94.7	96.4	98.6
Pacific contiguous	37.0	33.9	39.8	37.6	35.2	34.4	39.3	36.9	35.2	34.4	38.9	36.4	148.3	145.8	144.9
AK and HI	1.4	1.2	1.3	1.3	1.3	1.3	1.4	1.4	1.4	1.4	1.5	1.5	5.2	5.4	5.7
Total	313.7	292.7	360.3	308.9	304.6	307.1	365.5	316.9	312.8	314.5	369.6	319.4	1,275.7	1,294.2	1,316.4
Industrial Sector															
New England	3.7	3.5	3.9	3.7	3.8	3.6	4.0	3.7	3.7	3.6	3.9	3.6	14.8	15.0	14.8
Middle Atlantic	18.0	16.2	18.6	17.6	17.6	17.0	19.0	17.8	18.1	17.3	19.2	17.9	70.4	71.5	72.5
E. N. Central	44.0	37.7	44.5	42.5	44.8	41.3	46.6	43.3	46.3	42.0	46.8	43.2	168.7	176.0	178.3
W. N. Central	21.7	20.3	23.2	22.1	23.0	22.8	24.4	22.8	24.1	23.5	24.9	23.1	87.3	93.0	95.5
S. Atlantic	32.8	31.0	34.2	33.6	33.4	33.4	35.3	34.0	34.0	33.6	35.3	33.7	131.7	136.1	136.7
E. S. Central	23.3	21.4	23.4	22.9	23.8	23.3	24.2	23.3	24.5	23.7	24.4	23.2	91.1	94.6	95.7
W. S. Central	46.6	44.9	47.9	48.7	44.1	46.5	49.5	50.0	45.9	48.0	50.8	51.0	188.1	190.1	195.6
Mountain	20.1	20.3	22.6	19.9	19.2	21.2	23.3	20.3	19.7	21.7	23.7	20.6	82.9	83.9	85.6
Pacific contiguous	19.2	19.7	22.1	19.0	18.1	20.6	22.5	19.0	18.1	20.4	22.3	18.7	80.1	80.2	79.4
AK and HI	1.2	1.0	1.2	1.2	1.1	1.1	1.2	1.2	1.1	1.1	1.2	1.2	4.5	4.5	4.5
Total	230.7	216.0	241.6	231.2	228.8	230.8	250.0	235.3	235.5	234.7	252.3	236.2	919.5	944.9	958.7
Total All Sectors (a)															
New England	27.8	25.1	31.9	26.3	28.5	25.6	30.8	26.5	29.1	25.5	30.3	26.4	111.0	111.5	111.2
Middle Atlantic	86.9	78.5	101.8	82.5	89.2	82.1	99.6	84.8	91.7	83.4	99.9	85.1	349.7	355.7	360.1
E. N. Central	133.7	119.7	148.4	127.0	136.9	126.4	148.5	130.6	141.0	128.6	149.9	131.0	528.8	542.4	550.5
W. N. Central	74.0	65.7	79.5	70.0	77.0	68.9	80.6	72.3	82.0	72.2	84.0	74.7	289.2	298.8	312.8
S. Atlantic	189.5	187.6	235.0	191.6	199.7	199.1	236.5	194.3	202.6	200.5	237.2	195.5	803.7	829.6	835.9
E. S. Central	73.0	66.8	85.9	69.9	78.5	70.2	87.4	71.4	79.3	71.2	88.4	71.7	295.7	307.6	310.6
W. S. Central	139.8	142.4	179.4	142.7	143.3	146.0	183.5	147.9	143.1	151.3	186.8	150.5	604.2	620.7	631.7
Mountain	65.0	68.2	86.3	66.7	64.8	70.9	85.1	67.7	66.0	72.1	86.1	68.7	286.2	288.5	293.0
Pacific contiguous	93.1	87.0	105.1	95.4	92.5	88.5	103.6	93.8	92.9	88.9	103.1	93.2	380.6	378.4	378.1
AK and HI	3.8	3.4	3.6	3.8	3.6	3.5	3.8	3.9	3.7	3.6	3.8	4.0	14.6	14.8	15.2
Total	886.6	844.3	1,056.9	875.9	914.0	881.3	1,059.4	893.2	931.5	897.3	1,069.5	900.9	3,663.7	3,748.0	3,799.2

(a) Total retail sales to all sectors includes residential, commercial, industrial, and transportation sector sales.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Retail Sales represents total retail electricity sales by electric utilities and power marketers.

Regions refer to U.S. Census divisions.

See "Census division" in EIA's Energy Glossary (<http://www.eia.doe.gov/glossary/index.html>) for a list of States in each region.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Electric Power Monthly*, DOE/EIA-0226; and *Electric*

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 7c. U.S. Regional Retail Electricity Prices (Cents per Kilowatthour)

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Residential Sector															
New England	21.76	21.32	20.95	20.80	21.38	21.74	21.97	22.29	23.21	23.61	23.65	23.62	21.20	21.83	23.51
Middle Atlantic	15.47	15.96	16.18	15.98	15.62	16.32	16.87	16.67	16.07	16.53	16.96	16.67	15.92	16.38	16.57
E. N. Central	13.14	13.75	13.33	13.75	13.38	14.15	13.76	14.08	13.72	14.45	13.97	14.27	13.48	13.82	14.08
W. N. Central	10.98	12.59	12.88	11.46	10.88	12.99	13.61	11.66	10.52	12.57	13.06	11.40	11.99	12.27	11.86
S. Atlantic	11.79	11.80	12.05	11.83	11.66	11.81	12.30	12.21	12.17	12.25	12.60	12.27	11.88	12.01	12.34
E. S. Central	11.24	11.56	11.28	11.41	11.18	11.82	11.65	11.76	11.52	12.01	11.69	11.81	11.36	11.58	11.74
W. S. Central	11.04	11.42	11.29	11.37	11.85	11.69	11.86	11.90	12.10	11.21	11.33	11.53	11.29	11.83	11.52
Mountain	11.42	12.08	12.19	11.64	11.53	12.21	12.41	11.86	11.77	12.41	12.52	11.93	11.88	12.05	12.20
Pacific	15.69	16.18	17.77	16.79	16.76	16.90	18.09	16.90	17.14	17.74	18.70	17.19	16.67	17.19	17.71
U.S. Average	12.90	13.24	13.35	13.25	13.09	13.50	13.75	13.64	13.47	13.72	13.83	13.66	13.20	13.50	13.68
Commercial Sector															
New England	16.24	15.67	15.98	15.67	16.28	16.04	16.68	16.48	17.14	16.78	17.25	16.86	15.90	16.38	17.02
Middle Atlantic	11.69	12.53	13.21	12.41	12.48	13.15	13.78	12.95	12.78	13.29	13.69	12.79	12.47	13.11	13.15
E. N. Central	9.95	10.37	10.19	10.29	10.40	10.69	10.56	10.67	10.63	10.81	10.62	10.72	10.19	10.58	10.69
W. N. Central	9.07	10.12	10.33	9.12	9.10	10.70	11.16	9.50	8.84	10.16	10.55	9.18	9.66	10.13	9.69
S. Atlantic	9.23	9.02	9.09	9.20	9.29	9.03	9.34	9.59	9.62	9.17	9.34	9.53	9.13	9.31	9.41
E. S. Central	10.75	10.83	10.60	10.67	10.96	11.16	11.00	11.06	11.21	11.28	11.09	11.16	10.70	11.04	11.18
W. S. Central	7.84	7.87	7.89	7.98	11.28	8.21	8.32	8.03	11.34	8.66	8.78	8.35	7.90	8.87	9.20
Mountain	9.00	9.82	10.09	9.31	9.11	9.95	10.30	9.40	9.13	9.93	10.24	9.38	9.58	9.73	9.70
Pacific	13.50	14.79	17.20	15.05	14.53	15.43	17.97	15.58	15.06	16.06	18.54	16.09	15.18	15.94	16.49
U.S. Average	10.33	10.63	10.97	10.62	11.11	10.94	11.40	10.98	11.35	11.13	11.49	11.04	10.65	11.12	11.26
Industrial Sector															
New England	12.29	12.22	12.41	12.12	13.49	13.10	12.97	12.53	13.86	13.34	13.13	12.65	12.26	13.02	13.25
Middle Atlantic	6.36	6.35	6.41	6.28	6.50	6.48	6.38	6.23	6.31	6.32	6.22	6.06	6.35	6.40	6.23
E. N. Central	6.51	6.78	6.75	6.62	6.92	7.09	6.88	6.76	6.91	7.14	6.93	6.80	6.66	6.91	6.94
W. N. Central	6.94	7.32	7.89	6.62	6.97	7.38	8.02	6.76	6.92	7.49	8.15	6.88	7.20	7.30	7.37
S. Atlantic	5.98	6.09	6.50	6.09	6.24	6.36	6.64	6.16	6.25	6.35	6.61	6.13	6.17	6.35	6.34
E. S. Central	5.45	5.51	5.70	5.52	5.75	5.72	5.80	5.56	5.68	5.71	5.78	5.54	5.54	5.71	5.68
W. S. Central	5.05	4.98	5.21	5.03	7.61	5.75	5.23	4.95	6.53	5.57	5.17	4.86	5.07	5.83	5.51
Mountain	5.73	6.15	6.91	5.94	6.24	6.61	7.02	6.00	6.27	6.67	7.02	6.03	6.21	6.49	6.52
Pacific	8.97	10.33	12.38	10.95	9.64	10.87	12.66	11.25	9.90	11.23	12.98	11.59	10.71	11.18	11.50
U.S. Average	6.38	6.63	7.08	6.53	7.15	7.03	7.19	6.59	6.93	7.02	7.20	6.59	6.66	6.99	6.94
All Sectors (a)															
New England	18.02	17.61	17.79	17.27	18.19	18.08	18.54	18.33	19.47	19.23	19.53	19.10	17.68	18.29	19.34
Middle Atlantic	11.98	12.58	13.23	12.42	12.56	12.94	13.62	12.92	12.82	13.03	13.57	12.81	12.58	13.03	13.07
E. N. Central	9.92	10.47	10.36	10.24	10.35	10.72	10.56	10.53	10.53	10.86	10.68	10.63	10.24	10.54	10.67
W. N. Central	9.15	10.15	10.58	9.15	9.16	10.42	11.11	9.41	8.96	10.17	10.78	9.27	9.77	10.04	9.80
S. Atlantic	9.80	9.82	10.16	9.82	9.91	9.85	10.35	10.15	10.24	10.08	10.48	10.16	9.91	10.08	10.25
E. S. Central	9.25	9.41	9.56	9.26	9.48	9.61	9.84	9.53	9.63	9.70	9.89	9.59	9.38	9.62	9.71
W. S. Central	8.03	8.28	8.63	8.12	10.37	8.70	8.97	8.31	10.08	8.62	8.87	8.26	8.29	9.07	8.94
Mountain	8.83	9.58	10.14	9.14	9.15	9.78	10.25	9.26	9.23	9.85	10.26	9.28	9.48	9.65	9.70
Pacific	13.41	14.30	16.41	14.92	14.50	14.91	16.85	15.22	14.92	15.58	17.38	15.62	14.82	15.42	15.92
U.S. Average	10.29	10.63	11.11	10.54	10.94	10.91	11.39	10.83	11.10	11.05	11.45	10.87	10.66	11.03	11.13

(a) Volume-weighted average of retail prices to residential, commercial, industrial, and transportation sectors.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Prices are not adjusted for inflation.

Regions refer to U.S. Census divisions.

See "Census division" in EIA's Energy Glossary (<http://www.eia.doe.gov/glossary/index.html>) for a list of States in each region.

Historical data: Latest data available from Energy Information Administration databases supporting the following reports: *Electric Power Monthly*, DOE/EIA-0226; and *Electric*

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 7d part 1. U.S. Regional Electricity Generation, Electric Power Sector (billion kilowatthours), continues on Table 7d part 2

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
United States															
Natural Gas	354.7	342.6	474.2	340.7	318.2	319.4	430.2	331.7	311.8	318.0	437.2	329.9	1,512.2	1,399.6	1,396.9
Coal	170.3	151.2	248.2	198.6	230.3	200.6	269.8	204.8	236.3	192.1	260.5	200.8	768.2	905.4	889.7
Nuclear	204.1	190.7	204.1	191.0	198.5	187.7	204.6	186.4	188.8	185.2	197.2	185.6	789.9	777.2	756.8
Renewable Energy Sources:	190.1	206.5	176.9	187.0	198.0	221.5	189.4	203.7	217.5	248.2	208.6	217.1	760.6	812.6	891.3
Conventional Hydropower	75.0	81.3	70.6	63.0	69.3	71.6	61.2	57.0	67.9	79.8	65.0	58.8	289.9	259.1	271.4
Wind	87.4	87.1	67.5	94.7	96.3	103.4	80.5	110.3	110.4	112.1	86.9	116.5	336.7	390.5	426.0
Solar (a)	16.7	27.3	27.6	18.5	21.4	34.6	35.5	24.0	28.3	44.7	44.7	29.6	90.1	115.6	147.3
Biomass	7.1	6.7	7.0	6.7	7.0	7.7	7.9	8.2	7.0	7.5	7.7	7.8	27.5	30.8	30.0
Geothermal	3.9	4.2	4.2	4.2	3.9	4.3	4.2	4.3	3.9	4.0	4.3	4.4	16.5	16.6	16.6
Pumped Storage Hydropower	-1.0	-1.2	-2.0	-1.2	-1.1	-1.4	-2.4	-1.2	-1.0	-1.3	-2.3	-1.1	-5.3	-6.0	-5.8
Petroleum (b)	4.0	3.9	4.5	4.0	5.2	3.4	4.0	4.2	4.7	3.6	4.2	4.9	16.5	16.8	17.3
Other Gases	1.0	0.4	0.8	0.9	0.7	0.4	0.7	0.9	0.7	0.5	0.7	0.9	3.1	2.7	2.8
Other Nonrenewable Fuels (c)	1.9	1.8	1.9	1.9	1.9	1.8	1.7	1.8	1.8	1.8	1.7	1.9	7.5	7.1	7.1
Total Generation	925.2	896.1	1,108.5	922.9	951.8	933.5	1,098.0	932.3	960.6	948.0	1,107.7	939.8	3,852.8	3,915.5	3,956.1
New England (ISO-NE)															
Natural Gas	10.8	10.0	16.1	10.8	12.1	10.3	17.2	12.2	9.4	11.6	17.6	11.4	47.7	51.7	50.0
Coal	0.1	0.0	0.0	0.1	0.5	0.0	0.0	0.1	0.4	0.0	0.0	0.1	0.2	0.6	0.5
Nuclear	7.3	4.9	7.3	6.1	7.1	7.3	7.2	5.6	7.0	6.2	7.2	7.2	25.6	27.2	27.7
Conventional hydropower	2.2	2.1	1.8	1.7	1.9	2.2	1.3	1.8	2.0	2.3	1.3	1.8	7.8	7.2	7.4
Nonhydro renewables (d)	2.6	2.7	2.4	2.6	2.8	3.1	2.7	3.2	3.3	3.3	2.8	3.3	10.3	11.7	12.6
Other energy sources (e)	0.3	0.3	0.4	0.4	0.4	0.4	0.2	0.4	0.4	0.3	0.3	0.4	1.4	1.4	1.4
Total generation	23.2	20.1	28.0	21.7	24.7	23.3	28.6	23.2	22.5	23.7	29.2	24.2	92.9	99.8	99.6
Net energy for load (f)	27.9	25.2	32.3	27.6	29.3	26.8	31.9	28.2	29.9	27.0	31.8	28.3	113.0	116.2	117.0
New York (NYISO)															
Natural Gas	12.4	11.4	20.6	12.8	12.8	13.1	20.3	15.9	14.9	14.9	21.1	16.2	57.1	62.1	67.2
Coal	0.1	0.0	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
Nuclear	10.7	9.2	9.0	9.6	9.3	7.8	7.1	6.8	6.5	7.0	6.7	7.0	38.5	31.0	27.3
Conventional hydropower	8.0	8.0	7.8	7.6	7.3	7.1	7.1	7.2	7.0	7.0	7.0	7.2	31.4	28.8	28.2
Nonhydro renewables (d)	2.0	1.9	1.7	2.1	1.9	2.0	1.8	2.2	2.0	2.3	2.1	2.6	7.6	8.0	9.0
Other energy sources (e)	0.2	0.1	0.1	0.2	0.4	0.1	0.1	0.1	0.4	0.1	0.1	0.1	0.6	0.8	0.8
Total generation	33.4	30.6	39.2	32.2	31.7	30.1	36.4	32.3	30.9	31.4	37.0	33.1	135.4	130.5	132.3
Net energy for load (f)	35.3	32.4	42.9	34.7	36.6	35.0	42.5	36.2	37.5	35.8	42.8	36.5	145.3	150.4	152.7
Mid-Atlantic (PJM)															
Natural Gas	78.4	69.9	97.6	69.9	72.5	72.7	86.2	73.2	79.0	79.3	95.7	78.4	315.8	304.6	332.5
Coal	33.7	29.7	46.8	38.1	50.5	41.4	52.6	40.4	56.2	33.8	49.1	37.0	148.3	184.8	176.1
Nuclear	68.9	67.1	70.9	68.9	68.4	64.8	72.4	62.4	59.0	59.2	62.9	57.7	275.7	268.0	238.9
Conventional hydropower	3.1	2.9	2.1	1.9	2.7	2.7	1.7	2.1	2.6	2.7	1.6	2.1	9.9	9.2	9.1
Nonhydro renewables (d)	10.4	10.2	7.5	10.9	11.1	12.0	8.9	12.1	12.1	13.0	9.5	12.8	39.1	44.1	47.4
Other energy sources (e)	0.6	0.5	0.4	0.7	1.0	0.3	0.0	0.8	1.2	0.4	0.2	0.9	2.2	2.2	2.6
Total generation	195.1	180.2	225.3	190.5	206.2	194.0	221.8	191.0	210.2	188.4	219.0	188.9	791.1	812.9	806.6
Net energy for load (f)	182.5	163.5	209.3	177.0	194.4	176.2	204.6	180.6	197.6	175.6	206.2	182.0	732.4	755.9	761.5
Southeast (SERC)															
Natural Gas	61.9	59.1	74.7	58.5	57.6	55.0	69.9	58.1	53.7	55.8	70.6	55.4	254.2	240.6	235.5
Coal	23.8	22.1	44.4	28.0	36.3	33.1	46.6	32.0	39.4	35.8	48.4	34.9	118.3	148.0	158.5
Nuclear	53.0	50.5	54.1	52.5	53.8	52.5	55.4	52.0	54.1	55.2	58.4	56.3	210.1	213.7	224.0
Conventional hydropower	11.1	10.2	8.8	8.6	9.8	7.9	6.8	7.8	10.2	7.6	6.7	7.8	38.7	32.3	32.3
Nonhydro renewables (d)	3.4	5.0	5.0	3.9	4.0	5.9	5.8	4.5	4.5	7.3	7.5	5.4	17.4	20.2	24.8
Other energy sources (e)	-0.1	-0.3	-0.6	-0.2	0.0	-0.4	-0.6	-0.2	0.0	-0.3	-0.7	-0.2	-1.1	-1.2	-1.1
Total generation	153.1	146.7	186.5	151.3	161.4	154.1	183.9	154.2	161.8	161.4	190.9	159.7	637.6	653.6	673.9
Net energy for load (f)	157.4	152.5	186.1	153.7	163.1	154.5	184.0	155.2	164.1	160.3	188.3	158.4	649.7	656.8	671.1
Florida (FRCC)															
Natural Gas	40.0	45.7	52.8	41.0	34.5	41.2	45.6	35.6	32.1	41.3	46.0	36.6	179.5	156.9	155.9
Coal	2.1	3.5	5.7	4.6	4.7	5.5	6.2	4.5	4.9	5.4	5.8	4.0	15.9	20.8	20.1
Nuclear	7.3	7.6	7.6	7.0	7.8	7.2	7.9	6.9	7.9	7.3	8.1	7.1	29.4	29.8	30.4
Conventional hydropower	0.1	0.1	0.0	0.0	0.1	0.0	0.0	0.0	0.1	0.0	0.0	0.0	0.2	0.2	0.2
Nonhydro renewables (d)	1.8	2.4	2.3	1.9	2.4	3.2	3.3	3.4	3.3	3.4	3.4	3.2	8.4	12.3	13.4
Other energy sources (e)	0.9	0.8	0.9	0.7	0.8	0.7	0.8	0.6	0.8	0.7	0.8	0.6	3.3	3.0	3.0
Total generation	52.1	60.0	69.3	55.2	50.3	57.7	63.8	51.0	49.0	58.2	64.1	51.6	236.7	222.9	222.9
Net energy for load (f)	50.2	54.3	72.0	56.3	50.7	57.9	66.6	52.2	48.4	58.4	66.9	52.5	232.8	227.4	226.2

(a) Solar generation from large-scale power plants with more than 1 megawatt of capacity. Excludes generation from small-scale solar photovoltaic systems.

(b) Residual fuel oil, distillate fuel oil, petroleum coke, and other petroleum liquids.

(c) Batteries, chemicals, hydrogen, pitch, purchased steam, sulfur, nonrenewable waste, and miscellaneous technologies.

(d) Wind, large-scale solar, biomass, and geothermal

(e) Pumped storage hydroelectric, petroleum, other gases, batteries, and other nonrenewable fuels. See notes (b) and (c).

(f) Regional generation from generating units operated by electric power sector, plus energy receipts from minus energy deliveries to U.S. balancing authorities outside region.

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Data reflect generation supplied by power plants with a combined capacity of at least 1 megawatt operated by electric utilities and independent power producers.

Historical data: Latest data available from U.S. Energy Information Administration databases supporting the following reports: *Electric Power Monthly*, DOE/EIA-0226; and *Electric Power Annual*, DOE/EIA-0348.

Table 7d part 2. U.S. Regional Electricity Generation, Electric Power Sector (billion kilowatthours), continued from Table 7d part 1
 U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Midwest (MISO)															
Natural Gas	43.9	43.2	53.4	37.7	34.5	35.0	46.8	36.1	37.0	38.0	51.6	38.2	178.3	152.4	164.7
Coal	51.0	41.1	68.5	57.8	69.7	56.7	76.2	61.1	70.8	55.9	72.2	58.5	218.4	263.8	257.4
Nuclear	26.6	22.9	24.4	21.2	23.6	22.1	24.1	24.1	23.8	22.2	23.8	23.0	95.1	93.9	92.8
Conventional hydropower	3.1	3.2	2.8	2.7	2.8	2.8	2.3	2.1	2.4	2.8	2.3	2.2	11.8	10.2	9.7
Nonhydro renewables (d)	20.8	20.1	16.2	24.2	24.3	24.6	19.0	27.7	26.0	25.9	20.2	28.7	81.3	95.6	100.8
Other energy sources (e)	1.4	1.3	1.3	1.2	1.8	0.9	1.0	1.4	1.3	1.1	1.1	2.0	5.2	5.1	5.5
Total generation	146.9	131.8	166.6	144.8	156.7	142.2	169.5	152.5	161.3	145.9	171.1	152.6	590.0	620.9	631.0
Net energy for load (f)	153.0	141.5	174.4	149.8	159.0	153.9	177.5	156.5	161.0	155.2	178.6	157.0	618.7	646.8	651.8
Central (Southwest Power Pool)															
Natural Gas	17.5	16.3	24.2	13.7	12.4	12.6	20.2	12.6	14.3	12.6	21.5	12.8	71.6	57.9	61.2
Coal	17.0	15.7	26.7	19.8	21.8	16.4	26.5	17.9	21.5	16.5	26.9	20.0	79.2	82.7	85.0
Nuclear	4.4	4.4	4.2	3.8	4.1	3.0	4.4	4.4	4.3	4.4	4.1	2.5	16.8	16.0	15.3
Conventional hydropower	5.9	6.0	5.1	4.8	5.3	4.9	4.2	3.3	3.6	4.3	4.0	3.2	21.8	17.7	15.0
Nonhydro renewables (d)	20.3	21.4	16.7	22.2	22.8	26.3	20.3	26.3	25.7	28.7	22.7	28.5	80.6	95.7	105.6
Other energy sources (e)	0.1	0.1	0.1	0.2	0.3	0.1	0.1	0.2	0.1	0.1	0.1	0.2	0.5	0.6	0.4
Total generation	65.2	63.9	77.0	64.4	66.7	63.4	75.8	64.7	69.4	66.6	79.3	67.2	270.5	270.6	282.5
Net energy for load (f)	62.8	63.7	74.7	60.9	64.7	60.5	72.6	60.0	66.8	63.2	76.1	62.4	262.1	257.8	268.5
Texas (ERCOT)															
Natural Gas	37.2	42.1	59.3	36.0	33.0	36.2	51.4	29.7	23.5	28.4	43.8	24.1	174.6	150.3	119.9
Coal	13.1	15.8	20.3	17.9	16.3	18.0	22.9	17.7	15.1	17.7	22.8	17.0	67.2	74.9	72.7
Nuclear	10.4	9.7	11.0	10.3	10.5	10.4	10.3	9.5	10.7	10.0	10.6	10.8	41.4	40.6	42.1
Conventional hydropower	0.3	0.3	0.3	0.2	0.3	0.3	0.2	0.1	0.2	0.2	0.2	0.1	1.1	0.8	0.7
Nonhydro renewables (d)	22.6	24.8	20.8	24.4	25.2	31.1	28.1	31.1	34.6	38.8	33.8	34.7	92.6	115.6	141.9
Other energy sources (e)	0.4	0.3	0.4	0.4	0.2	0.3	0.4	0.4	0.2	0.3	0.3	0.4	1.5	1.3	1.3
Total generation	84.1	93.1	112.1	89.1	85.6	96.2	113.2	88.5	84.4	95.4	111.4	87.2	378.4	383.6	378.4
Net energy for load (f)	84.1	93.1	112.1	89.1	85.6	96.2	113.2	88.5	84.4	95.4	111.4	87.2	378.4	383.6	378.4
Northwest															
Natural Gas	23.7	17.1	27.3	21.6	20.9	19.1	30.2	24.0	21.2	15.7	30.6	24.3	89.6	94.1	91.8
Coal	22.3	16.1	24.5	23.2	22.5	20.8	27.2	21.2	20.8	17.4	24.9	19.3	86.1	91.6	82.4
Nuclear	2.4	2.0	2.4	2.5	2.5	1.3	2.4	2.4	2.4	2.4	2.4	2.4	9.4	8.6	9.7
Conventional hydropower	35.0	38.7	32.4	29.9	34.3	34.6	29.0	27.6	33.3	41.7	31.5	28.2	136.0	125.4	134.8
Nonhydro renewables (d)	13.9	14.2	12.6	14.9	15.3	16.3	14.6	17.0	17.0	17.8	15.8	17.9	55.6	63.3	68.6
Other energy sources (e)	0.2	0.2	0.1	0.2	0.2	0.1	0.1	0.1	0.2	0.1	0.1	0.1	0.6	0.6	0.6
Total generation	97.5	88.3	99.4	92.2	95.6	92.2	103.6	92.2	94.9	95.2	105.5	92.3	377.4	383.7	387.9
Net energy for load (f)	89.9	81.7	93.6	87.7	88.9	84.6	95.0	89.5	90.2	86.2	95.2	89.7	353.0	358.0	361.3
Southwest															
Natural Gas	11.8	14.7	20.4	14.8	11.0	11.9	17.4	12.4	9.5	8.1	14.3	10.5	61.7	52.7	42.4
Coal	5.3	5.3	8.8	6.6	5.9	6.4	9.0	8.0	5.6	7.3	7.9	7.8	25.9	29.3	28.6
Nuclear	8.3	7.6	8.7	7.0	8.5	7.2	8.6	7.7	8.4	7.5	8.6	7.5	31.6	31.9	32.1
Conventional hydropower	2.7	4.0	3.7	2.5	2.5	3.6	3.7	2.5	2.8	4.0	3.9	2.6	12.8	12.2	13.4
Nonhydro renewables (d)	2.5	3.1	2.5	2.3	3.0	4.7	3.6	3.5	4.8	6.1	4.6	4.6	10.5	14.9	20.0
Other energy sources (e)	0.0	0.1	0.1	0.0	0.0	0.1	0.1	0.0	0.0	0.1	0.1	0.0	0.2	0.2	0.2
Total generation	30.5	34.8	44.2	33.1	30.8	33.9	42.4	34.0	31.1	33.0	39.5	33.0	142.7	141.2	136.6
Net energy for load (f)	19.8	25.3	32.7	21.3	19.1	24.3	31.7	21.1	19.7	24.8	31.7	21.2	99.2	96.3	97.4
California															
Natural Gas	16.7	12.6	27.0	23.6	16.6	11.8	24.3	21.3	16.4	11.6	23.8	21.1	79.9	74.0	72.8
Coal	1.4	1.2	2.1	2.0	1.8	1.8	2.2	1.5	1.1	1.7	2.1	1.8	6.7	7.2	6.7
Nuclear	4.8	4.9	4.5	2.1	2.9	4.2	4.7	4.7	4.6	3.8	4.4	4.0	16.3	16.4	16.7
Conventional hydropower	3.1	5.6	5.4	2.7	2.0	5.0	4.6	2.0	3.3	6.8	6.1	3.2	16.8	13.5	19.3
Nonhydro renewables (d)	14.3	18.9	18.1	14.4	15.5	20.3	19.5	15.2	16.0	21.3	20.5	16.1	65.8	70.4	73.9
Other energy sources (e)	0.0	0.1	0.1	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.1	0.2	0.1	0.2
Total generation	40.3	43.3	57.3	44.9	38.7	43.0	55.3	44.7	41.4	45.2	56.9	46.1	185.8	181.7	189.6
Net energy for load (f)	58.6	59.4	74.6	61.1	57.1	60.2	74.6	60.4	57.5	62.5	75.0	60.5	253.7	252.3	255.4

(a) Large-scale solar generation from power plants with more than 1 megawatt of capacity. Excludes generation from small-scale solar photovoltaic systems.
 (b) Residual fuel oil, distillate fuel oil, petroleum coke, and other petroleum liquids.
 (c) Batteries, chemicals, hydrogen, pitch, purchased steam, sulfur, nonrenewable waste, and miscellaneous technologies.
 (d) Wind, large-scale solar, biomass, and geothermal
 (e) Pumped storage hydroelectric, petroleum, other gases, batteries, and other nonrenewable fuels. See notes (b) and (c).
 (f) Regional generation from generating units operated by electric power sector, plus energy receipts from minus energy deliveries to U.S. balancing authorities outside region.
 Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.
 Data reflect generation supplied by power plants with a combined capacity of at least 1 megawatt operated by electric utilities and independent power producers.
Historical data: Latest data available from U.S. Energy Information Administration databases supporting the following reports: *Electric Power Monthly*, DOE/EIA-0226; and *Electric Power Annual*, DOE/EIA-0348.

Table 8a. U.S. Renewable Energy Consumption (Quadrillion Btu)
 U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Electric Power Sector															
Geothermal	0.035	0.037	0.037	0.038	0.035	<i>0.038</i>	<i>0.038</i>	<i>0.038</i>	<i>0.035</i>	<i>0.036</i>	<i>0.038</i>	<i>0.039</i>	0.147	<i>0.148</i>	<i>0.148</i>
Hydroelectric Power (a)	0.668	0.724	0.629	0.561	0.622	<i>0.694</i>	<i>0.599</i>	<i>0.559</i>	<i>0.691</i>	<i>0.694</i>	<i>0.597</i>	<i>0.556</i>	2.581	<i>2.474</i>	<i>2.538</i>
Solar (b)	0.152	0.248	0.252	0.168	0.195	<i>0.315</i>	<i>0.324</i>	<i>0.218</i>	<i>0.257</i>	<i>0.407</i>	<i>0.407</i>	<i>0.269</i>	0.820	<i>1.052</i>	<i>1.341</i>
Waste Biomass (c)	0.063	0.058	0.059	0.059	0.059	<i>0.066</i>	<i>0.063</i>	<i>0.061</i>	<i>0.056</i>	<i>0.065</i>	<i>0.063</i>	<i>0.061</i>	0.238	<i>0.249</i>	<i>0.245</i>
Wood Biomass	0.049	0.043	0.048	0.046	0.050	<i>0.052</i>	<i>0.059</i>	<i>0.066</i>	<i>0.052</i>	<i>0.051</i>	<i>0.055</i>	<i>0.061</i>	0.185	<i>0.227</i>	<i>0.219</i>
Wind	0.796	0.793	0.615	0.862	0.877	<i>0.941</i>	<i>0.733</i>	<i>1.004</i>	<i>1.005</i>	<i>1.020</i>	<i>0.791</i>	<i>1.061</i>	3.065	<i>3.555</i>	<i>3.878</i>
Subtotal	1.761	1.904	1.639	1.733	1.837	<i>2.106</i>	<i>1.815</i>	<i>1.947</i>	<i>2.097</i>	<i>2.273</i>	<i>1.952</i>	<i>2.046</i>	7.037	<i>7.705</i>	<i>8.368</i>
Industrial Sector															
Biofuel Losses and Co-products (d)	0.197	0.135	0.179	0.188	0.170	<i>0.188</i>	<i>0.192</i>	<i>0.189</i>	<i>0.184</i>	<i>0.190</i>	<i>0.193</i>	<i>0.194</i>	0.698	<i>0.739</i>	<i>0.761</i>
Geothermal	0.001	0.001	0.001	0.001	0.001	<i>0.001</i>	<i>0.001</i>	<i>0.001</i>	<i>0.001</i>	<i>0.001</i>	<i>0.001</i>	<i>0.001</i>	0.004	<i>0.004</i>	<i>0.004</i>
Hydroelectric Power (a)	0.003	0.002	0.002	0.002	0.002	<i>0.003</i>	<i>0.002</i>	<i>0.002</i>	<i>0.002</i>	<i>0.003</i>	<i>0.002</i>	<i>0.002</i>	0.009	<i>0.009</i>	<i>0.009</i>
Solar (b)	0.007	0.010	0.010	0.007	0.007	<i>0.011</i>	<i>0.011</i>	<i>0.008</i>	<i>0.008</i>	<i>0.012</i>	<i>0.012</i>	<i>0.009</i>	0.033	<i>0.037</i>	<i>0.041</i>
Waste Biomass (c)	0.041	0.039	0.036	0.041	0.041	<i>0.039</i>	<i>0.038</i>	<i>0.040</i>	<i>0.040</i>	<i>0.039</i>	<i>0.038</i>	<i>0.040</i>	0.156	<i>0.158</i>	<i>0.157</i>
Wood Biomass	0.349	0.340	0.336	0.352	0.338	<i>0.339</i>	<i>0.352</i>	<i>0.355</i>	<i>0.346</i>	<i>0.343</i>	<i>0.355</i>	<i>0.358</i>	1.376	<i>1.385</i>	<i>1.402</i>
Subtotal	0.594	0.520	0.558	0.588	0.556	<i>0.574</i>	<i>0.590</i>	<i>0.592</i>	<i>0.577</i>	<i>0.581</i>	<i>0.594</i>	<i>0.599</i>	2.261	<i>2.312</i>	<i>2.351</i>
Commercial Sector															
Geothermal	0.006	0.006	0.006	0.006	0.006	<i>0.006</i>	<i>0.006</i>	<i>0.006</i>	<i>0.006</i>	<i>0.006</i>	<i>0.006</i>	<i>0.006</i>	0.024	<i>0.024</i>	<i>0.024</i>
Solar (b)	0.025	0.037	0.037	0.025	0.029	<i>0.043</i>	<i>0.043</i>	<i>0.030</i>	<i>0.035</i>	<i>0.050</i>	<i>0.051</i>	<i>0.035</i>	0.123	<i>0.146</i>	<i>0.171</i>
Waste Biomass (c)	0.010	0.008	0.009	0.009	0.009	<i>0.009</i>	<i>0.009</i>	<i>0.009</i>	<i>0.009</i>	<i>0.009</i>	<i>0.009</i>	<i>0.009</i>	0.036	<i>0.036</i>	<i>0.036</i>
Wood Biomass	0.021	0.021	0.021	0.021	0.020	<i>0.020</i>	<i>0.021</i>	<i>0.021</i>	<i>0.020</i>	<i>0.020</i>	<i>0.021</i>	<i>0.021</i>	0.083	<i>0.082</i>	<i>0.082</i>
Subtotal	0.068	0.077	0.078	0.067	0.070	<i>0.084</i>	<i>0.086</i>	<i>0.072</i>	<i>0.076</i>	<i>0.092</i>	<i>0.093</i>	<i>0.077</i>	0.290	<i>0.313</i>	<i>0.338</i>
Residential Sector															
Geothermal	0.010	0.010	0.010	0.010	0.010	<i>0.010</i>	<i>0.010</i>	<i>0.010</i>	<i>0.010</i>	<i>0.010</i>	<i>0.010</i>	<i>0.010</i>	0.040	<i>0.040</i>	<i>0.040</i>
Solar (e)	0.058	0.086	0.086	0.061	0.067	<i>0.102</i>	<i>0.102</i>	<i>0.071</i>	<i>0.076</i>	<i>0.115</i>	<i>0.115</i>	<i>0.079</i>	0.291	<i>0.341</i>	<i>0.385</i>
Wood Biomass	0.114	0.114	0.115	0.115	0.112	<i>0.114</i>	<i>0.115</i>	<i>0.115</i>	<i>0.112</i>	<i>0.114</i>	<i>0.115</i>	<i>0.115</i>	0.458	<i>0.456</i>	<i>0.456</i>
Subtotal	0.181	0.210	0.211	0.186	0.188	<i>0.225</i>	<i>0.227</i>	<i>0.196</i>	<i>0.198</i>	<i>0.239</i>	<i>0.240</i>	<i>0.204</i>	0.788	<i>0.837</i>	<i>0.881</i>
Transportation Sector															
Biomass-based Diesel (f)	0.061	0.064	0.073	0.076	0.057	<i>0.074</i>	<i>0.073</i>	<i>0.079</i>	<i>0.085</i>	<i>0.087</i>	<i>0.092</i>	<i>0.095</i>	0.275	<i>0.284</i>	<i>0.359</i>
Ethanol (f)	0.257	0.220	0.267	0.258	0.244	<i>0.288</i>	<i>0.286</i>	<i>0.276</i>	<i>0.259</i>	<i>0.286</i>	<i>0.287</i>	<i>0.283</i>	1.002	<i>1.093</i>	<i>1.116</i>
Subtotal	0.318	0.284	0.340	0.334	0.301	<i>0.362</i>	<i>0.359</i>	<i>0.355</i>	<i>0.343</i>	<i>0.373</i>	<i>0.379</i>	<i>0.378</i>	1.277	<i>1.377</i>	<i>1.474</i>
All Sectors Total															
Biomass-based Diesel (f)	0.061	0.064	0.073	0.076	0.057	<i>0.074</i>	<i>0.073</i>	<i>0.079</i>	<i>0.085</i>	<i>0.087</i>	<i>0.092</i>	<i>0.095</i>	0.275	<i>0.284</i>	<i>0.359</i>
Biofuel Losses and Co-products (d)	0.197	0.135	0.179	0.188	0.170	<i>0.188</i>	<i>0.192</i>	<i>0.189</i>	<i>0.184</i>	<i>0.190</i>	<i>0.193</i>	<i>0.194</i>	0.698	<i>0.739</i>	<i>0.761</i>
Ethanol (f)	0.267	0.228	0.278	0.268	0.254	<i>0.299</i>	<i>0.297</i>	<i>0.286</i>	<i>0.269</i>	<i>0.297</i>	<i>0.298</i>	<i>0.294</i>	1.041	<i>1.135</i>	<i>1.159</i>
Geothermal	0.052	0.054	0.054	0.055	0.051	<i>0.055</i>	<i>0.054</i>	<i>0.055</i>	<i>0.052</i>	<i>0.053</i>	<i>0.055</i>	<i>0.056</i>	0.214	<i>0.215</i>	<i>0.215</i>
Hydroelectric Power (a)	0.671	0.727	0.632	0.563	0.624	<i>0.697</i>	<i>0.602</i>	<i>0.562</i>	<i>0.694</i>	<i>0.697</i>	<i>0.600</i>	<i>0.558</i>	2.592	<i>2.485</i>	<i>2.549</i>
Solar (b)(e)	0.238	0.374	0.377	0.257	0.295	<i>0.471</i>	<i>0.480</i>	<i>0.327</i>	<i>0.377</i>	<i>0.584</i>	<i>0.585</i>	<i>0.392</i>	1.246	<i>1.573</i>	<i>1.938</i>
Waste Biomass (c)	0.113	0.105	0.104	0.108	0.108	<i>0.113</i>	<i>0.110</i>	<i>0.111</i>	<i>0.104</i>	<i>0.113</i>	<i>0.110</i>	<i>0.110</i>	0.430	<i>0.442</i>	<i>0.437</i>
Wood Biomass	0.532	0.517	0.519	0.533	0.520	<i>0.526</i>	<i>0.547</i>	<i>0.557</i>	<i>0.530</i>	<i>0.528</i>	<i>0.547</i>	<i>0.554</i>	2.101	<i>2.150</i>	<i>2.158</i>
Wind	0.796	0.793	0.615	0.862	0.877	<i>0.941</i>	<i>0.733</i>	<i>1.004</i>	<i>1.005</i>	<i>1.020</i>	<i>0.791</i>	<i>1.061</i>	3.065	<i>3.555</i>	<i>3.878</i>
Total Consumption	2.923	2.995	2.826	2.907	2.952	<i>3.352</i>	<i>3.078</i>	<i>3.162</i>	<i>3.291</i>	<i>3.558</i>	<i>3.259</i>	<i>3.305</i>	11.652	<i>12.544</i>	<i>13.413</i>

- (a) Conventional hydroelectric power only. Hydroelectricity generated by pumped storage is not included in renewable energy.
- (b) Solar consumption in the electric power, commercial, and industrial sectors includes energy produced from large scale (>1 MW) solar thermal and photovoltaic generators and small-scale (<1 MW)
- (c) Municipal solid waste from biogenic sources, landfill gas, sludge waste, agricultural byproducts, and other biomass.
- (d) Losses and co-products from the production of fuel ethanol and biomass-based diesel
- (e) Solar consumption in the residential sector includes energy from small-scale (<1 MW) solar photovoltaic systems. Also includes solar heating consumption in all sectors.
- (f) Fuel ethanol and biomass-based diesel consumption in the transportation sector includes production, stock change, and imports less exports. Some biomass-based diesel may be consumed in

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from EIA databases supporting the following reports: *Electric Power Monthly*, DOE/EIA-0226 and *Renewable Energy Annual*, DOE/EIA-0603; *Petroleum*

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 8b. U.S. Renewable Electricity Generation and Capacity
 U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Renewable Energy Electric Generating Capacity (megawatts, end of period)															
Electric Power Sector (a)															
Biomass	6,605	6,603	6,553	6,552	6,542	6,398	6,397	6,441	6,444	6,447	6,447	6,447	6,552	6,441	6,447
Waste	3,932	3,930	3,856	3,855	3,845	3,843	3,842	3,886	3,889	3,892	3,892	3,892	3,855	3,886	3,892
Wood	2,673	2,673	2,697	2,697	2,697	2,554	2,554	2,554	2,554	2,554	2,554	2,554	2,697	2,554	2,554
Conventional Hydroelectric	79,520	79,514	79,660	79,663	79,664	79,733	79,736	79,781	79,795	79,809	79,850	79,854	79,663	79,781	79,854
Geothermal	2,502	2,520	2,520	2,520	2,520	2,520	2,520	2,562	2,562	2,562	2,562	2,562	2,520	2,562	2,562
Large-Scale Solar (b)	39,126	41,216	43,013	47,575	50,238	53,489	56,678	63,077	65,091	70,573	72,388	79,669	47,575	63,077	79,669
Wind	106,205	107,768	109,295	118,262	121,148	126,519	128,415	134,261	134,971	136,842	137,422	139,583	118,262	134,261	139,583
Other Sectors (c)															
Biomass	6,395	6,395	6,391	6,405	6,383	6,392	6,372	6,372	6,372	6,372	6,364	6,364	6,405	6,372	6,364
Waste	781	781	777	791	788	792	792	792	792	792	792	792	791	792	792
Wood	5,615	5,615	5,615	5,615	5,595	5,600	5,580	5,580	5,580	5,580	5,572	5,572	5,615	5,580	5,572
Conventional Hydroelectric	289	289	289	289	289	289	287	287	287	287	287	287	289	287	287
Large-Scale Solar (b)	441	468	473	480	482	498	511	545	548	548	548	548	480	545	548
Small-Scale Solar (d)	24,355	25,255	26,264	27,724	28,888	29,950	31,073	32,198	33,375	34,504	35,640	36,751	27,724	32,198	36,751
Residential Sector	15,071	15,689	16,373	17,238	18,076	18,731	19,412	20,076	20,776	21,446	22,148	22,811	17,238	20,076	22,811
Commercial Sector	7,425	7,642	7,910	8,430	8,725	9,071	9,450	9,847	10,260	10,654	11,027	11,412	8,430	9,847	11,412
Industrial Sector	1,859	1,924	1,981	2,056	2,088	2,148	2,211	2,275	2,340	2,403	2,465	2,528	2,056	2,275	2,528
Wind	113	339	348	348	348	348	348	598	598	598	598	598	348	598	598
Renewable Electricity Generation (billion kilowatthours)															
Electric Power Sector (a)															
Biomass	7.1	6.7	7.0	6.7	7.0	7.7	7.9	8.2	7.0	7.5	7.7	7.8	27.5	30.8	30.0
Waste	4.1	4.0	4.0	3.9	4.0	4.4	4.3	4.1	3.8	4.4	4.2	4.1	16.1	16.8	16.5
Wood	3.0	2.7	3.0	2.7	3.1	3.2	3.6	4.1	3.2	3.1	3.4	3.7	11.4	14.1	13.5
Conventional Hydroelectric	75.0	81.3	70.6	63.0	69.3	71.6	61.2	57.0	67.9	79.8	65.0	58.8	289.9	259.1	271.4
Geothermal	3.9	4.2	4.2	4.2	3.9	4.3	4.2	4.3	3.9	4.0	4.3	4.4	16.5	16.6	16.6
Large-Scale Solar (b)	16.7	27.3	27.6	18.5	21.4	34.6	35.5	24.0	28.3	44.7	44.7	29.6	90.1	115.6	147.3
Wind	87.4	87.1	67.5	94.7	96.3	103.4	80.5	110.3	110.4	112.1	86.9	116.5	336.7	390.5	426.0
Other Sectors (c)															
Biomass	7.4	7.1	7.0	7.1	7.0	7.1	7.0	7.1	7.0	7.1	7.0	7.1	28.6	28.2	28.2
Waste	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	0.7	2.7	2.7	2.7
Wood	6.7	6.4	6.4	6.4	6.3	6.4	6.4	6.4	6.3	6.4	6.4	6.4	25.8	25.4	25.4
Conventional Hydroelectric	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	1.2	1.2	1.2
Large-Scale Solar (b)	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.8	0.9	0.9
Small-Scale Solar (d)	8.4	12.4	12.3	8.7	9.8	14.7	14.8	10.2	11.4	17.0	17.1	11.7	41.7	49.5	57.3
Residential Sector	5.0	7.5	7.5	5.4	5.9	9.0	9.1	6.3	6.9	10.4	10.5	7.2	25.4	30.3	35.0
Commercial Sector	2.7	3.8	3.8	2.6	3.1	4.5	4.6	3.2	3.6	5.3	5.3	3.7	12.9	15.3	17.9
Industrial Sector	0.7	1.0	1.0	0.7	0.8	1.1	1.2	0.8	0.9	1.3	1.3	0.9	3.5	3.9	4.4
Wind	0.1	0.1	0.2	0.4	0.3	0.2	0.2	0.3	0.4	0.4	0.4	0.4	0.8	1.0	1.5

(a) Power plants larger than or equal to one megawatt in size that are operated by electric utilities or independent power producers.

(b) Solar thermal and photovoltaic generating units at power plants larger than or equal to 1 megawatt.

(c) Businesses or individual households not primarily engaged in electric power production for sale to the public, whose generating capacity is at least one megawatt (except for small-scale solar photovoltaic data, which consists of systems smaller than 1 megawatt).

(d) Solar photovoltaic systems smaller than one megawatt.

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from EIA databases supporting the Electric Power Monthly, DOE/EIA-0226.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System.

Table 9a. U.S. Macroeconomic Indicators and CO2 Emissions
 U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Macroeconomic															
Real Gross Domestic Product (billion chained 2012 dollars - SAAR)	19,011	17,303	18,597	18,794	19,088	19,503	19,849	20,231	20,451	20,601	20,689	20,773	18,426	19,668	20,629
Real Personal Consumption Expend. (billion chained 2012 dollars - SAAR)	13,118	11,860	12,925	12,999	13,334	13,624	13,834	14,023	14,178	14,297	14,395	14,488	12,726	13,704	14,339
Real Private Fixed Investment (billion chained 2012 dollars - SAAR)	3,375	3,096	3,315	3,459	3,543	3,586	3,640	3,684	3,717	3,743	3,762	3,781	3,311	3,613	3,751
Business Inventory Change (billion chained 2012 dollars - SAAR)	-52	-298	-1	60	-90	-18	83	228	254	248	219	180	-73	51	225
Real Government Expenditures (billion chained 2012 dollars - SAAR)	3,348	3,369	3,327	3,320	3,372	3,451	3,448	3,456	3,456	3,457	3,447	3,442	3,341	3,432	3,450
Real Exports of Goods & Services (billion chained 2012 dollars - SAAR)	2,495	1,927	2,167	2,279	2,272	2,331	2,374	2,426	2,475	2,518	2,558	2,595	2,217	2,351	2,536
Real Imports of Goods & Services (billion chained 2012 dollars - SAAR)	3,283	2,702	3,186	3,400	3,448	3,581	3,624	3,656	3,693	3,724	3,756	3,781	3,143	3,577	3,739
Real Disposable Personal Income (billion chained 2012 dollars - SAAR)	15,061	16,630	15,851	15,434	17,391	16,138	15,898	15,719	15,892	16,005	16,094	16,145	15,744	16,286	16,034
Non-Farm Employment (millions)	151.9	133.7	140.9	142.6	143.4	145.3	148.4	150.2	151.2	152.0	152.6	153.2	142.3	146.8	152.2
Civilian Unemployment Rate (percent)	3.8	13.1	8.8	6.8	6.2	5.8	4.9	4.2	4.0	3.7	3.6	3.5	8.1	5.2	3.7
Housing Starts (millions - SAAR)	1.49	1.09	1.44	1.58	1.60	1.59	1.56	1.54	1.50	1.46	1.43	1.39	1.40	1.57	1.44
Industrial Production Indices (Index, 2012=100)															
Total Industrial Production	107.7	93.7	102.5	104.9	105.2	106.7	108.5	111.3	113.1	114.3	114.9	115.3	102.2	107.9	114.4
Manufacturing	104.4	89.3	100.1	103.1	103.4	105.0	107.0	109.7	111.4	112.4	112.7	113.0	99.2	106.3	112.4
Food	116.5	107.9	113.6	116.0	117.6	119.1	119.3	119.4	119.6	119.8	120.1	120.5	113.5	118.9	120.0
Paper	94.7	87.2	87.0	91.8	91.0	92.3	93.2	94.0	94.5	95.0	95.0	95.1	90.2	92.7	94.9
Petroleum and Coal Products	105.0	82.7	89.9	93.1	96.5	99.4	100.1	101.0	101.7	102.2	102.3	102.2	92.6	99.3	102.1
Chemicals	99.8	93.7	96.4	99.8	95.7	101.5	106.6	108.7	109.2	109.5	109.6	110.0	97.4	103.1	109.6
Nonmetallic Mineral Products	122.2	106.3	113.7	117.8	117.2	118.8	120.3	120.7	120.9	120.9	120.9	121.2	115.0	119.3	121.0
Primary Metals	94.4	69.6	79.3	87.7	89.3	91.6	92.6	94.1	94.5	95.0	94.3	93.9	82.8	91.9	94.4
Coal-weighted Manufacturing (a)	106.5	94.1	100.9	105.3	102.3	105.0	106.6	108.2	109.2	109.8	109.9	110.3	101.7	105.5	109.8
Distillate-weighted Manufacturing (a)	98.8	85.6	92.5	95.8	96.9	98.7	99.8	100.8	101.2	101.4	101.3	101.2	93.2	99.1	101.2
Electricity-weighted Manufacturing (a)	105.1	89.4	98.4	103.0	101.4	104.3	105.9	107.4	108.3	109.1	109.1	109.2	99.0	104.8	108.9
Natural Gas-weighted Manufacturing (a)	107.8	94.0	100.3	105.4	101.4	105.5	107.3	108.8	109.7	110.5	110.5	110.8	101.9	105.8	110.3
Price Indexes															
Consumer Price Index (all urban consumers) (index, 1982-1984=1.00)	2.59	2.56	2.59	2.61	2.63	2.66	2.66	2.67	2.68	2.69	2.70	2.72	2.59	2.66	2.70
Producer Price Index: All Commodities (index, 1982=1.00)	1.97	1.88	1.94	1.99	2.10	2.12	2.12	2.11	2.12	2.13	2.13	2.13	1.94	2.11	2.13
Producer Price Index: Petroleum (index, 1982=1.00)	1.71	1.05	1.47	1.50	1.89	2.11	2.10	1.94	1.86	1.89	1.89	1.84	1.43	2.01	1.87
GDP Implicit Price Deflator (index, 2012=100)	113.4	112.9	113.8	114.4	115.6	116.5	117.0	117.5	118.0	118.6	119.2	119.8	113.6	116.6	118.9
Miscellaneous															
Vehicle Miles Traveled (b) (million miles/day)	7,762	6,880	8,262	8,009	7,683	9,000	8,990	8,831	8,233	9,286	9,249	9,030	7,730	8,630	8,952
Air Travel Capacity (Available ton-miles/day, thousands)	630	363	478	537	523	567	605	650	649	708	725	697	502	587	695
Aircraft Utilization (Revenue ton-miles/day, thousands)	328	152	208	238	230	285	347	381	405	452	460	437	231	311	439
Airline Ticket Price Index (index, 1982-1984=100)	250.8	203.7	200.6	215.1	198.4	220.1	201.1	209.2	208.4	226.7	227.7	244.6	217.5	207.2	226.8
Raw Steel Production (million short tons per day)	0.268	0.174	0.197	0.224	0.246	0.256	0.270	0.304	0.289	0.251	0.251	0.260	0.216	0.269	0.263
Carbon Dioxide (CO2) Emissions (million metric tons)															
Petroleum	553	442	518	522	515	553	568	572	558	577	589	588	2,035	2,207	2,312
Natural Gas	490	349	383	429	485	349	368	438	483	350	372	434	1,651	1,640	1,640
Coal	201	177	271	224	247	224	296	238	255	219	286	232	873	1,006	993
Total Energy (c)	1,247	971	1,174	1,178	1,250	1,128	1,235	1,251	1,299	1,149	1,250	1,257	4,571	4,864	4,955

(a) Fuel share weights of individual sector indices based on EIA *Manufacturing Energy Consumption Survey*.

(b) Total highway travel includes gasoline and diesel fuel vehicles.

(c) Includes electric power sector use of geothermal energy and non-biomass waste.

- = no data available

SAAR = Seasonally-adjusted annual rate

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Historical data: Latest data available from U.S. Department of Commerce, Bureau of Economic Analysis; Federal Reserve System, Statistical release G17; Federal Highway Administration; and Federal Minor discrepancies with published historical data are due to independent rounding.

Forecasts: EIA Short-Term Integrated Forecasting System. U.S. macroeconomic forecasts are based on the IHS Markit model of the U.S. Economy.

Table 9b. U.S. Regional Macroeconomic Data

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Real Gross State Product (Billion \$2009)															
New England	993	901	969	981	998	1,019	1,036	1,055	1,064	1,072	1,076	1,079	961	1,027	1,073
Middle Atlantic	2,774	2,486	2,669	2,695	2,737	2,805	2,856	2,914	2,947	2,971	2,987	2,997	2,656	2,828	2,976
E. N. Central	2,502	2,266	2,458	2,480	2,521	2,575	2,616	2,663	2,686	2,702	2,710	2,716	2,427	2,594	2,703
W. N. Central	1,188	1,084	1,168	1,184	1,202	1,225	1,243	1,264	1,276	1,283	1,288	1,291	1,156	1,233	1,284
S. Atlantic	3,388	3,114	3,337	3,369	3,417	3,486	3,544	3,609	3,646	3,672	3,686	3,701	3,302	3,514	3,677
E. S. Central	828	742	809	820	832	848	861	875	883	888	891	895	800	854	889
W. S. Central	2,317	2,125	2,267	2,303	2,338	2,389	2,433	2,484	2,516	2,536	2,551	2,565	2,253	2,411	2,542
Mountain	1,283	1,177	1,265	1,280	1,303	1,331	1,356	1,381	1,398	1,408	1,413	1,420	1,251	1,343	1,410
Pacific	3,769	3,436	3,684	3,714	3,770	3,857	3,937	4,021	4,070	4,103	4,121	4,142	3,651	3,896	4,109
Industrial Output, Manufacturing (Index, Year 2012=100)															
New England	97.1	82.9	92.3	95.4	95.5	97.0	98.8	101.3	102.7	103.6	103.7	103.9	91.9	98.1	103.5
Middle Atlantic	96.2	79.7	90.8	93.6	93.6	95.3	97.4	100.1	101.6	102.7	103.0	103.3	90.1	96.6	102.7
E. N. Central	104.7	84.9	99.8	102.7	103.0	104.5	106.4	109.4	111.2	112.2	112.6	112.9	98.0	105.8	112.2
W. N. Central	103.8	90.4	100.0	102.7	103.5	105.1	106.9	109.5	110.9	111.6	112.0	112.2	99.2	106.2	111.7
S. Atlantic	109.1	94.3	105.1	108.7	108.7	110.3	112.5	115.4	117.0	118.0	118.2	118.3	104.3	111.7	117.9
E. S. Central	108.6	89.1	104.8	108.5	109.3	110.9	112.7	115.1	116.3	117.0	117.2	117.4	102.7	112.0	117.0
W. S. Central	100.1	88.2	95.3	97.7	98.2	99.8	102.0	104.8	106.6	107.8	108.3	108.6	95.3	101.2	107.8
Mountain	115.6	102.9	113.6	117.0	117.8	119.4	121.5	124.5	126.3	127.2	127.5	127.6	112.3	120.8	127.2
Pacific	102.9	89.1	97.5	99.5	99.3	100.5	102.7	105.5	107.5	109.0	109.5	110.0	97.2	102.0	109.0
Real Personal Income (Billion \$2009)															
New England	891	980	932	905	1,010	947	935	926	937	944	949	952	927	955	945
Middle Atlantic	2,313	2,517	2,429	2,325	2,592	2,435	2,402	2,380	2,408	2,426	2,440	2,446	2,396	2,452	2,430
E. N. Central	2,455	2,698	2,578	2,515	2,814	2,625	2,592	2,563	2,587	2,605	2,619	2,625	2,562	2,649	2,609
W. N. Central	1,159	1,259	1,180	1,185	1,298	1,228	1,215	1,205	1,215	1,223	1,229	1,233	1,196	1,236	1,225
S. Atlantic	3,265	3,506	3,411	3,347	3,731	3,499	3,463	3,433	3,469	3,494	3,515	3,530	3,382	3,532	3,502
E. S. Central	910	990	937	928	1,051	976	963	950	960	965	970	972	941	985	967
W. S. Central	2,037	2,201	2,099	2,066	2,304	2,172	2,145	2,128	2,157	2,176	2,191	2,201	2,101	2,187	2,181
Mountain	1,211	1,316	1,257	1,239	1,377	1,295	1,282	1,272	1,286	1,296	1,303	1,310	1,256	1,306	1,299
Pacific	2,832	3,039	2,977	2,910	3,212	3,014	2,985	2,970	3,005	3,030	3,049	3,062	2,939	3,045	3,036
Households (Thousands)															
New England	5,897	5,858	5,961	5,952	5,952	5,960	5,976	5,990	5,998	6,007	6,018	6,029	5,952	5,990	6,029
Middle Atlantic	16,163	16,049	16,333	16,310	16,312	16,329	16,366	16,405	16,429	16,453	16,476	16,502	16,310	16,405	16,502
E. N. Central	18,866	18,752	19,098	19,077	19,085	19,116	19,170	19,228	19,265	19,290	19,314	19,343	19,077	19,228	19,343
W. N. Central	8,647	8,603	8,768	8,773	8,785	8,804	8,833	8,863	8,883	8,905	8,926	8,943	8,773	8,863	8,943
S. Atlantic	25,672	25,565	26,084	26,122	26,186	26,271	26,388	26,510	26,601	26,696	26,784	26,869	26,122	26,510	26,869
E. S. Central	7,660	7,622	7,769	7,775	7,786	7,804	7,831	7,859	7,878	7,898	7,917	7,934	7,775	7,859	7,934
W. S. Central	14,889	14,831	15,138	15,168	15,209	15,262	15,334	15,407	15,465	15,522	15,579	15,632	15,168	15,407	15,632
Mountain	9,465	9,439	9,644	9,673	9,711	9,756	9,813	9,872	9,919	9,962	10,004	10,043	9,673	9,872	10,043
Pacific	18,782	18,678	19,034	19,039	19,057	19,089	19,145	19,204	19,247	19,287	19,331	19,370	19,039	19,204	19,370
Total Non-farm Employment (Millions)															
New England	7.6	6.4	6.9	7.0	7.0	7.1	7.3	7.4	7.4	7.5	7.5	7.5	6.9	7.2	7.5
Middle Atlantic	20.1	16.8	18.0	18.3	18.4	18.7	19.2	19.4	19.6	19.8	19.9	20.0	18.3	18.9	19.8
E. N. Central	22.3	19.4	20.8	21.0	21.1	21.4	21.8	22.0	22.1	22.2	22.3	22.4	20.9	21.6	22.3
W. N. Central	10.8	9.8	10.2	10.3	10.4	10.5	10.7	10.8	10.8	10.8	10.9	10.9	10.3	10.6	10.9
S. Atlantic	29.3	26.3	27.6	27.9	28.1	28.4	29.0	29.4	29.5	29.7	29.8	29.9	27.8	28.7	29.7
E. S. Central	8.3	7.5	7.9	8.1	8.1	8.2	8.3	8.4	8.4	8.4	8.4	8.4	8.0	8.2	8.4
W. S. Central	17.9	16.3	16.8	17.1	17.2	17.4	17.8	18.0	18.1	18.2	18.3	18.3	17.0	17.6	18.2
Mountain	11.2	10.1	10.6	10.7	10.8	10.9	11.2	11.3	11.4	11.4	11.5	11.5	10.6	11.0	11.4
Pacific	24.0	21.0	21.8	22.0	22.1	22.5	23.0	23.4	23.6	23.8	23.9	24.0	22.2	22.7	23.8

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Regions refer to U.S. Census divisions.

 See "Census division" in EIA's Energy Glossary (<http://www.eia.doe.gov/glossary/index.html>) for a list of States in each region.

Historical data: Latest data available from U.S. Department of Commerce, Bureau of Economic Analysis; Federal Reserve System, Statistical release G17.

Minor discrepancies with published historical data are due to independent rounding.

Forecasts: U.S. macroeconomic forecasts are based on the IHS Markit model of the U.S. Economy.

Table 9c. U.S. Regional Weather Data

U.S. Energy Information Administration | Short-Term Energy Outlook - June 2021

	2020				2021				2022				Year		
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	2020	2021	2022
Heating Degree Days															
New England	2,743	975	115	2,002	3,014	803	127	2,139	3,101	844	131	2,139	5,834	6,084	6,215
Middle Atlantic	2,471	838	85	1,832	2,820	658	77	1,954	2,869	672	79	1,954	5,226	5,509	5,573
E. N. Central	2,786	846	126	2,099	3,088	736	119	2,230	3,149	725	119	2,230	5,856	6,173	6,223
W. N. Central	3,035	799	167	2,311	3,224	756	152	2,435	3,248	706	155	2,435	6,312	6,566	6,543
South Atlantic	1,106	252	17	874	1,337	218	11	934	1,366	186	11	933	2,249	2,501	2,496
E. S. Central	1,485	338	20	1,230	1,794	320	18	1,276	1,804	246	18	1,276	3,072	3,408	3,344
W. S. Central	970	102	8	738	1,297	126	4	776	1,149	83	4	775	1,818	2,204	2,011
Mountain	2,205	670	125	1,765	2,289	665	141	1,831	2,208	694	147	1,830	4,766	4,926	4,879
Pacific	1,539	526	64	1,088	1,562	487	93	1,224	1,519	583	94	1,225	3,217	3,366	3,420
U.S. Average	1,874	541	70	1,418	2,098	480	72	1,511	2,091	479	73	1,509	3,902	4,161	4,153
Heating Degree Days, Prior 10-year Average															
New England	3,152	823	105	2,128	3,134	856	107	2,100	3,101	855	112	2,126	6,207	6,197	6,194
Middle Atlantic	2,948	644	69	1,944	2,913	678	71	1,911	2,887	684	73	1,931	5,606	5,573	5,576
E. N. Central	3,197	698	102	2,197	3,156	731	105	2,170	3,133	730	102	2,196	6,194	6,161	6,161
W. N. Central	3,287	702	132	2,379	3,247	728	133	2,367	3,218	729	131	2,396	6,500	6,475	6,475
South Atlantic	1,459	169	10	952	1,393	180	11	914	1,377	187	11	917	2,589	2,498	2,492
E. S. Central	1,850	214	15	1,277	1,772	232	16	1,249	1,764	244	15	1,252	3,356	3,269	3,275
W. S. Central	1,199	83	3	794	1,140	86	3	786	1,145	94	3	782	2,078	2,015	2,024
Mountain	2,192	718	135	1,844	2,181	701	134	1,842	2,172	682	134	1,829	4,889	4,857	4,818
Pacific	1,456	580	85	1,162	1,462	553	81	1,148	1,455	523	80	1,139	3,284	3,243	3,198
U.S. Average	2,149	472	64	1,509	2,108	482	65	1,484	2,090	478	64	1,490	4,194	4,138	4,123
Cooling Degree Days															
New England	0	100	539	0	0	115	435	2	0	88	406	2	639	552	495
Middle Atlantic	0	157	682	4	0	180	559	5	0	161	541	5	843	744	707
E. N. Central	2	218	607	2	2	220	541	8	0	220	544	8	828	770	772
W. N. Central	6	294	662	3	8	255	680	11	3	263	671	11	966	954	948
South Atlantic	196	619	1,232	302	154	669	1,186	246	132	667	1,172	246	2,349	2,255	2,217
E. S. Central	72	420	1,057	79	40	481	1,060	72	29	521	1,065	72	1,628	1,653	1,687
W. S. Central	174	839	1,502	210	91	792	1,528	214	91	870	1,521	214	2,725	2,625	2,696
Mountain	11	466	1,088	120	11	443	946	79	19	428	932	79	1,684	1,478	1,457
Pacific	24	196	716	125	23	160	587	59	27	169	587	59	1,062	830	842
U.S. Average	71	395	935	122	50	398	871	99	46	407	864	99	1,524	1,418	1,416
Cooling Degree Days, Prior 10-year Average															
New England	0	83	471	1	0	80	473	1	0	84	469	1	554	555	555
Middle Atlantic	0	170	609	6	0	163	610	6	0	162	601	7	785	779	770
E. N. Central	3	240	579	8	3	234	572	7	3	234	562	7	829	816	807
W. N. Central	7	296	696	11	7	294	686	10	7	293	675	10	1,010	998	986
South Atlantic	127	696	1,202	247	143	680	1,195	261	147	674	1,191	266	2,272	2,279	2,278
E. S. Central	36	557	1,082	72	42	532	1,064	74	43	522	1,061	78	1,747	1,712	1,705
W. S. Central	100	892	1,576	207	114	880	1,567	210	113	855	1,541	213	2,774	2,771	2,723
Mountain	24	432	939	81	24	444	954	86	24	453	949	86	1,476	1,509	1,512
Pacific	31	185	624	78	31	193	647	85	31	198	652	85	917	956	966
U.S. Average	47	420	892	100	52	415	894	105	53	413	888	106	1,459	1,466	1,460

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday June 3 2021.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Regional degree days for each period are calculated by EIA as contemporaneous period population-weighted averages of state degree day data published by the National See *Change in Regional and U.S. Degree-Day Calculations* (http://www.eia.gov/forecasts/steo/special/pdf/2012_sp_04.pdf) for more information.

The approximate break between historical and forecast values is shown with historical data printed in bold; estimates and forecasts in italics.

Regions refer to U.S. Census divisions. See "Census division" in EIA's Energy Glossary (<http://www.eia.gov/tools/glossary/>) for a list of states in each region.

Historical data: Latest data available from U.S. Department of Commerce, National Oceanic and Atmospheric Association (NOAA).

Forecasts: Based on forecasts by the NOAA Climate Prediction Center (<http://www.cpc.ncep.noaa.gov/pacdir/DDdir/NHOME3.shtml>).

Appendix to the June 2021 Short-Term Energy Outlook

This appendix is prepared in fulfillment of section 1245(d)(4)(A) of the National Defense Authorization Act (NDAA) for Fiscal Year 2012, as amended. The law requires the U.S. Energy Information Administration (EIA), the statistical and analytical agency within the U.S. Department of Energy, to submit to Congress a report on the availability and price of petroleum and petroleum products produced in countries other than Iran in the two-month period preceding the submission of the report. By law, EIA's data, analyses, and forecasts are independent of approval by any other officer or employee of the U.S. Government. The data in this appendix, therefore, should not be construed as representing those of the U.S. Department of Energy or other federal agencies.

EIA consulted with the U.S. Department of the Treasury, the U.S. Department of State, and the intelligence community in the process of developing the NDAA report, which was previously published as a stand-alone report. Detailed background and contextual information not repeated here can be found in [early editions of the NDAA report](#).

This appendix is published in the *Short-Term Energy Outlook* in even numbered months.

Table a1. Summary of Estimated Petroleum and Other Liquids Quantities

	Apr 2021	May 2021	Apr 2021 - May 2021 Average	Apr 2020 - May 2020 Average	2018 - 2020 Average
Global Petroleum and Other Liquids (million barrels per day)					
Global Petroleum and Other Liquids Production (a)	94.0	95.0	94.5	94.3	98.6
Global Petroleum and Other Liquids Consumption (b)	96.2	96.2	96.2	82.4	97.7
Biofuels Production (c)	2.6	2.9	2.7	2.4	2.6
Biofuels Consumption (c)	2.5	2.6	2.6	2.4	2.6
Iran Liquid Fuels Production	3.5	3.5	3.5	3.0	3.6
Iran Liquid Fuels Consumption	1.5	1.6	1.5	1.4	1.8
Petroleum and Petroleum Products Produced and Consumed in Countries Other Than Iran (million barrels per day)					
Production (d)	87.9	88.6	88.3	88.9	92.3
Consumption (d)	92.2	92.1	92.1	78.6	93.4
Production minus Consumption	-4.4	-3.4	-3.9	10.3	-1.1
World Inventory Net Withdrawals Including Iran	2.3	1.2	1.7	-12.0	-0.8
Estimated OECD Inventory Level (e) (million barrels)	2910	2903	2906	3156	2942
Surplus Production Capacity (million barrels per day)					
OPEC Surplus Crude Oil Production Capacity (f)	8.5	8.1	8.3	4.4	3.4

Note: The term "petroleum and other liquids" encompasses crude oil, lease condensate, natural gas liquids, biofuels, coal-to-liquids, gas-to-liquids, and refinery processing gains, which are important to consider in concert due to the inter-related supply, demand, and price dynamics of petroleum, petroleum products, and related fuels.

(a) Production includes crude oil (including lease condensates), natural gas liquids, other liquids, and refinery processing gains.

(b) Consumption of petroleum by the OECD countries is synonymous with "products supplied," defined in the glossary of the EIA Petroleum Supply Monthly, DOE/EIA-0109. Consumption of petroleum by the non-OECD countries is "apparent consumption," which includes internal consumption, refinery fuel, and loss, and bunkering.

(c) Biofuels production and consumption are based on EIA estimates as published in the International Energy Statistics. Biofuels production in the third quarter tends to be at its highest level in the year as ethanol production in Brazil reaches its seasonal peak and is typically lowest in the first quarter as seasonal production falls in the South/South-Central region of Brazil.

(d) Global production of petroleum and petroleum products outside of Iran is derived by subtracting biofuels production and Iran liquid fuels production from global liquid fuels production. The same method is used to calculate global consumption outside of Iran.

(e) Estimated inventory level is for OECD countries only.

(f) EIA defines surplus oil production capacity as potential oil production that could be brought online within 30 days and sustained for at least 90 days, consistent with sound business practices. This does not include oil production increases that could not be sustained without degrading the future production capacity of a field.

Source: U.S. Energy Information Administration.

Table a2. Crude Oil and Petroleum Product Price Data

Item	Apr 2021	May 2021	Apr 2021 - May	Apr 2020 - May	2018 - 2020
			2021 Average	2020 Average	Average
Brent Front Month Futures Price (\$ per barrel)	65.33	68.31	66.78	22.47	59.69
WTI Front Month Futures Price (\$ per barrel)	61.69	65.16	63.38	23.74	53.76
Dubai Front Month Futures Price (\$ per barrel)	63.28	66.44	64.82	30.09	59.01
Brent 1st - 13th Month Futures Spread (\$ per barrel)	4.20	4.19	4.20	3.71	1.01
WTI 1st - 13th Month Futures Spread (\$ per barrel)	4.00	4.63	4.31	3.75	0.57
RBOB Front Month Futures Price (\$ per gallon)	2.01	2.13	2.07	0.79	1.61
Heating Oil Front Month Futures Price (\$ per gallon)	1.86	2.02	1.94	1.02	1.76
RBOB - Brent Futures Crack Spread (\$ per gallon)	0.45	0.50	0.48	0.25	0.19
Heating Oil - Brent Futures Crack Spread (\$ per gallon)	0.30	0.39	0.35	0.49	0.34

(a) Brent refers to Brent crude oil traded on the Intercontinental Exchange (ICE).

(b) WTI refers to West Texas Intermediate crude oil traded on the New York Mercantile Exchange (NYMEX), owned by Chicago Mercantile Exchange (CME) Group.

(c) RBOB refers to *reformulated blendstock for oxygenate blending* traded on the NYMEX.

Source: U.S. Energy Information Administration, based on Chicago Mercantile Exchange (CME), Intercontinental Exchange (ICE), and Dubai Mercantile Exchange (DME).