



Short-Term Energy Outlook

Forecast highlights

Global liquid fuels

- The April *Short-Term Energy Outlook* (STEO) remains subject to heightened levels of uncertainty because responses to COVID-19 continue to evolve. Reduced economic activity related to the COVID-19 pandemic has caused changes in energy demand and supply during the past year and will continue to affect these patterns in the future. U.S. gross domestic product (GDP) declined by 3.5% in 2020 from 2019 levels. This STEO assumes U.S. GDP will grow by 5.6% in 2021 and by 4.2% in 2022. The U.S. macroeconomic assumptions in this outlook are based on forecasts by IHS Markit.
- For the 2021 summer driving season (April–September), the U.S. Energy Information Administration (EIA) forecasts U.S. regular gasoline retail prices will average \$2.78 per gallon (gal), up from an average of \$2.07/gal last summer ([Summer Fuels Outlook](#)). Higher forecast gasoline prices reflect higher forecast crude oil prices, higher wholesale gasoline refining margins, and higher U.S. consumption of motor gasoline. For all of 2021, we expect U.S. retail prices of regular-grade gasoline to average \$2.66/gal and retail prices for all grades to average \$2.78/gal, which would result in the average U.S. household spending about \$480 (31%) more on motor fuel in 2021 compared with 2020.
- EIA expects U.S. gasoline consumption to rise in response to growing levels of GDP and employment. In addition, as COVID-19 vaccines are more widely distributed, we expect that driving will increase, causing gasoline consumption to rise. We forecast that U.S. gasoline consumption in 2021 will average 8.6 million barrels per day (b/d), which is up from consumption in 2020 of 8.0 million b/d but down from consumption in 2019 of 9.3 million b/d.
- Brent crude oil spot prices averaged \$65 per barrel (b) in March, up \$3/b from February and up \$33/b from March 2020, the onset of the COVID-19 pandemic in the United States. Rising Brent prices in March continued to reflect expectations of rising oil demand as both COVID-19 vaccination rates and global economic activity have increased, combined with ongoing crude oil production limits from members of the Organization of the Petroleum Exporting Countries (OPEC) and partner countries (OPEC+). EIA forecasts that Brent prices will average \$65/b in the second quarter of 2021, \$61/b during the second half of 2021, and \$60/b in 2022.

- EIA expects global oil inventories to fall by 1.8 million b/d in the first half of 2021. Forecast increases in global oil supply will contribute to a mostly balanced market during the second half of 2021. However, the forecast depends heavily on future production decisions by OPEC+, the responsiveness of U.S. tight oil production to oil prices, and the pace of oil demand growth, among other factors.
- EIA expects OPEC crude oil production will rise from an average of 25.1 million b/d in the first quarter of 2021 to 25.8 million b/d in the second quarter. The increase is the result of the April 1 OPEC+ announcement to begin raising production targets in May. It also reflects Saudi Arabia unwinding voluntary cuts of 1.0 million b/d between May and July. We expect OPEC crude oil production will rise to almost 27.9 million b/d in the second half of 2021.
- EIA estimates that the world consumed 96.0 million b/d of petroleum and liquid fuels in March, an increase of 4.7 million b/d from March 2020. We forecast that global consumption of petroleum and liquid fuels will average 97.7 million b/d for all of 2021, which is up by 5.5 million b/d from 2020. We forecast that consumption will increase by 3.7 million b/d in 2022 to average 101.3 million b/d. We revised growth in global liquid fuels consumption in 2021 higher from last STEO. The higher forecast is primarily a result of higher global GDP growth forecasts from Oxford Economics, which increased 0.4 percentage points from the March STEO to 6.2% for 2021.
- According to [EIA's most recent data](#), U.S. domestic crude oil production averaged 11.1 million b/d in January 2021. We estimate that U.S. domestic crude oil production declined by 0.8 million b/d in February, mostly because of cold temperatures that affected much of the country, particularly Texas. We forecast crude oil production will average 10.9 million b/d in the second quarter of 2021 and increase to almost 11.4 million b/d by the fourth quarter of 2021. We expect U.S. crude oil production will average 11.9 million b/d in 2022. The forecast of rising U.S. crude oil production is the result of our expectation that West Texas Intermediate crude oil prices will remain above \$55/b through the forecast period.

Natural Gas

- In March, the U.S. benchmark Henry Hub natural gas spot price averaged \$2.62 per million British thermal units (MMBtu), which is down from the February average of \$5.35/MMBtu. The Henry Hub price declined primarily because the cold weather and related high demand and market disruptions that drove [prices to recent highs in February](#) abated in March. EIA expects Henry Hub spot prices will average \$2.73/MMBtu in the second quarter of 2021 and will average \$3.04/MMBtu for all of 2021, which is up from the 2020 average of \$2.03/MMBtu. We expect that continued growth in liquefied natural gas (LNG) exports, with only a slight corresponding increase in dry natural gas

production, will contribute to the average Henry Hub spot price rising to \$3.11/MMBtu in 2022.

- EIA expects that U.S. consumption of natural gas will average 82.9 billion cubic feet per day (Bcf/d) in 2021, down 0.4% from 2020. The decline in U.S. natural gas consumption is a result of less natural gas consumed for electric power generation because of higher natural gas prices compared with last year. In 2021, we expect residential and commercial natural gas consumption will rise by a total of 1.1 Bcf/d from 2020 and industrial consumption will rise by 1.4 Bcf/d from 2020. Rising consumption outside of the power sector results from expanding economic activity and colder temperatures in 2021 compared with 2020. We expect U.S. natural gas consumption will average 82.1 Bcf/d in 2022.
- EIA estimates that natural gas inventories ended March 2021 at nearly 1.8 Tcf, which is 2% lower than the five-year (2016–20) average. The winter of 2020–21 had more natural gas withdrawn from storage than the five-year average largely as a result of the cold February temperatures that occurred amid low natural gas production. We expect that rising natural gas production and lower natural gas consumption for power generation than in the past two summers will contribute to storage injections outpacing the five-year average in 2021. We forecast that natural gas inventories will end the 2021 injection season (end of October) at more than 3.7 Tcf, which is equal to the five-year average.
- EIA forecasts that U.S. production of dry natural gas will average 91.4 Bcf/d in 2021, which is about the same as the 2020 average. In our forecast, dry natural gas production falls to a low point of 90.8 Bcf/d in May 2021 before steadily increasing through most of the remainder of 2021, reaching a high of 92.4 Bcf/d in November 2021. The increase in production in 2021 reflects higher forecast natural gas prices as well as higher forecast crude oil prices, which we expect will contribute to more associated natural gas production, especially in the Permian region.

Electricity, coal, renewables, and emissions

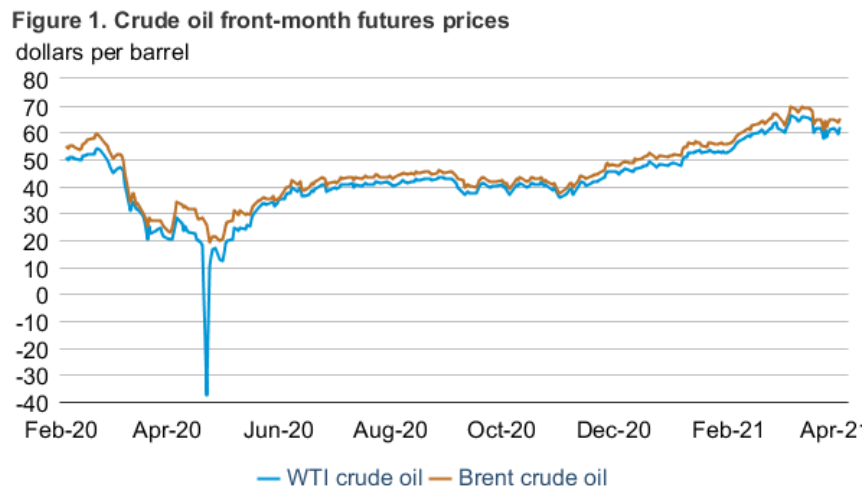
- EIA forecasts that electricity consumption in the United States will increase by 2.1% in 2021 after falling 3.8% in 2020. We forecast electricity sales to the industrial sector will grow by 4.2% in 2021. We forecast that retail electricity sales to the residential sector will grow by 2.3% in 2021. This increase is primarily a result of colder temperatures in the first quarter of 2021 compared with the same period in 2020. We expect retail sales of electricity to the commercial sector will increase by 0.7% in 2021. Much of the increased electricity consumption across the sectors reflects improving economic conditions in 2021. For 2022, we forecast that U.S. electricity consumption will grow by another 1.3%.

- EIA expects that the share of electric power generated with 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 declines in response to a 39% increase in the price of natural gas delivered to electricity generators from an average of \$2.39/MMBtu in 2020 to \$3.31/MMBtu in 2021. The higher expected natural gas prices cause the forecast share of generation from coal to rise from 20% in 2020 to 22% this year, and to 23% next year. New additions of solar and wind generating capacity contribute to our forecast that the share of U.S. generation from renewable energy sources will rise from 20% in 2020 to 21% in 2021 and to 22% in 2022. The nuclear share of U.S. generation declines from 21% in 2020 to 20% in 2021 and to 19% in 2022, reflecting the retirement of capacity at some nuclear power plants.
- EIA forecasts that planned additions to generating capacity from wind and solar energy in 2021 and 2022 will contribute to increasing electricity generation from those sources. We estimate that the U.S. electric power sector added 14.5 gigawatts (GW) of new wind capacity in 2020. We expect 16.1 GW of new capacity will be added in 2021 and 5.8 GW in 2022. U.S. utility-scale solar capacity rose by an estimated 10.4 GW in 2020. Our forecast for added utility-scale solar capacity is 15.8 GW in 2021 and 14.9 GW in 2022. In addition, about 5 GW of small-scale solar (projects with less than 1 megawatt of capacity) are added annually over the 2021–22 STEO forecast.
- EIA expects U.S. coal production to total 585 MMst in 2021, 46 MMst (9%) more than in 2020. In 2022, we expect coal production to grow by an additional 16 MMst (3%). We expect that coal used to generate electric power will increase by 13% to 495 MMst in 2021 and by 4% to 514 MMst in 2022. The increase in coal production in 2021 will be the largest on a percentage basis in the Interior region, owing to increased domestic electricity generation. In 2022, EIA expects it will be largest in the Appalachia region, partly as a result of metallurgical coal exports rising to 54 MMst next year, up 27% from 2020 levels.
- EIA estimates that U.S. energy-related carbon dioxide (CO₂) emissions decreased by 11% in 2020. This decline in emissions was the result of less energy consumption related to the economic contraction resulting from the COVID-19 pandemic. In 2021, we forecast energy-related CO₂ emissions will increase by about 5% 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 13% in 2021 and by 4% in 2022.

Petroleum and natural gas markets review

Crude oil

Prices: The front-month futures price for Brent crude oil settled at \$64.86 per barrel (b) on April 1, 2021, down from an intraday high of \$71.38/b on March 8 but up from \$63.69/b from March 1. The front-month futures price for West Texas Intermediate (WTI) crude oil for delivery at Cushing, Oklahoma, increased by 81 cents/b during the same period, settling at \$61.45/b on April 1 (**Figure 1**).



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

Monthly average Brent crude oil prices in March were the highest since late 2019. Crude oil prices in early March reached \$70/b following OPEC+’s March 4 announcement that it was extending production limits through April. However, prices subsequently declined, which partly reflected slowing global oil demand growth as COVID-19 cases increased, notably in Europe.

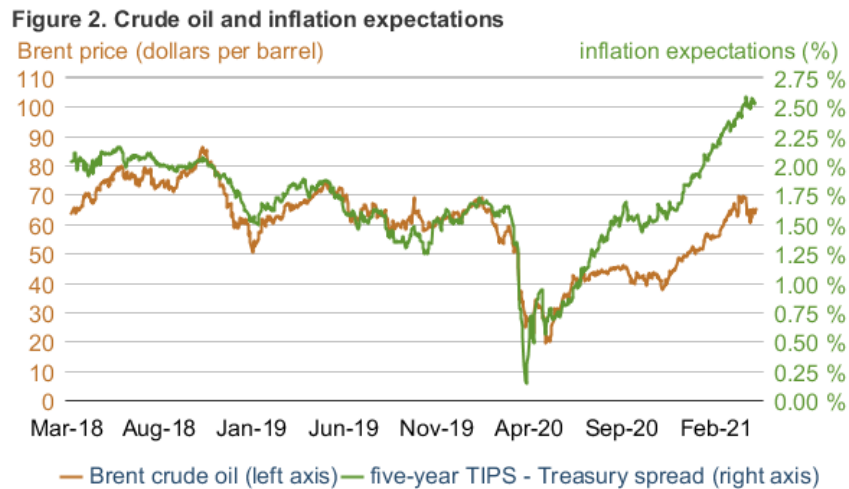
On April 1, [OPEC+ announced](#) it would ease existing limits on production beginning in May. This announcement was generally consistent with EIA’s assumption in last month’s STEO. However, Saudi Arabia also announced they would gradually relax its voluntary 1.0 million barrel per day (b/d) cut over the May–July period. If implemented as announced, Saudi Arabia’s increase would occur more slowly than we had previously assumed. We revised our forecast for second quarter 2021 OPEC crude oil production down by 0.5 million b/d from the March STEO.

With lower production from OPEC than in the March STEO, EIA expects markets will be somewhat tighter in the second quarter than previously forecast, contributing to some upward price pressures. We forecast that the Brent crude oil price will average \$65/b in the second quarter, when quarterly stock draws average 1.5 million b/d. Although that rate represents a significant draw in stocks, it is down slightly from the first quarter of 2021, when we estimated stock draws averaged 2.1 million b/d.

In the second half of 2021, EIA expects global oil markets to become much more balanced, with forecast global stock draws averaging 0.2 million b/d. From the second quarter to the third quarter, our forecast for global liquid fuels production grows by 3.2 million b/d. Of this increase, 1.9 million b/d is from OPEC. Additional supply growth in the forecast comes from Brazil, Canada, and the United States. We forecast global growth in oil demand between the second and third quarters will be 1.9 million b/d.

As global stock draws moderate, EIA expects upward price pressure on crude oil to ease. The higher crude oil price forecast reflects tighter markets through the second quarter, resulting from a slower relaxation of Saudi Arabia’s voluntary cuts than we had forecast. Stronger second-quarter inventory draws will leave global oil inventories during the second half of the year lower than previously expected. We forecast that the price of Brent crude oil will average \$61/b in the second half of the year, which is \$3/b higher than forecast in the March STEO. However, as recent increases in price volatility indicate, significant uncertainty remains both in market expectations and in our forecasts.

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. Economic responses to the COVID-19 pandemic resulted in a dramatic decline in demand for goods, significantly reducing 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 a monthly average of 0.7% in March 2020, reflecting low inflation expectations as a result of lower prices and economic contraction (**Figure 2**).

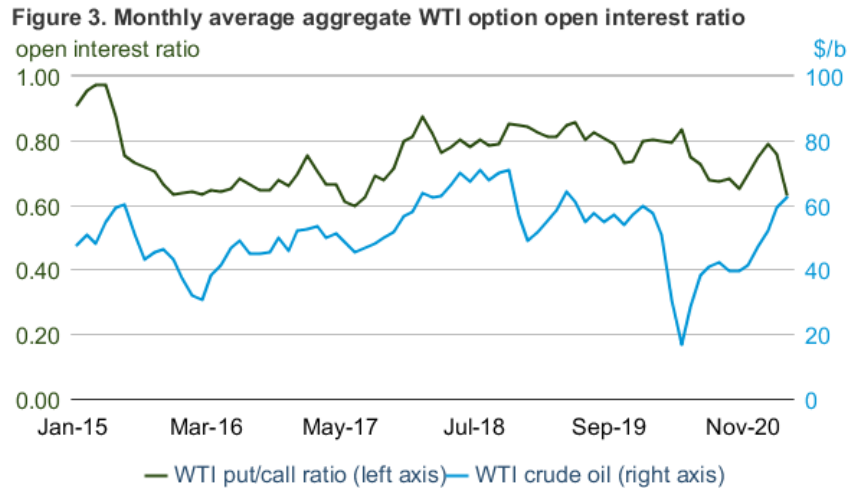


Source: Bloomberg L.P., Federal Reserve Bank of St. Louis
 Note: TIPS=Treasury Inflation Protected Securities

Increasing crude oil and other commodity prices over the summer of 2020 contributed to increasing inflation expectations through the end of August, and the TIPS-Treasury spread

increased from 0.8% in May to 1.6% in August. Since then, however, inflation expectations have increased at a faster pace than crude oil prices. Rising prices of non-energy commodities, combined with fiscal and monetary stimulus in response to the COVID-19 pandemic increased inflation expectations more rapidly than crude oil prices over the summer. In addition, reports of supply bottlenecks for various goods may have also contributed to higher inflation expectations. By December 2020, the TIPS-Treasury spread increased to 1.9%, before increasing higher than 2% in January 2021, averaging 2.3% in February and 2.5% in March. On March 16, the TIPS-treasury spread reached its widest point since July 2008. Improved demand outlooks because of the distribution of the COVID-19 vaccine as well as continued fiscal and monetary stimulus has further contributed to rising prices [across most commodities](#) and higher inflation expectations.

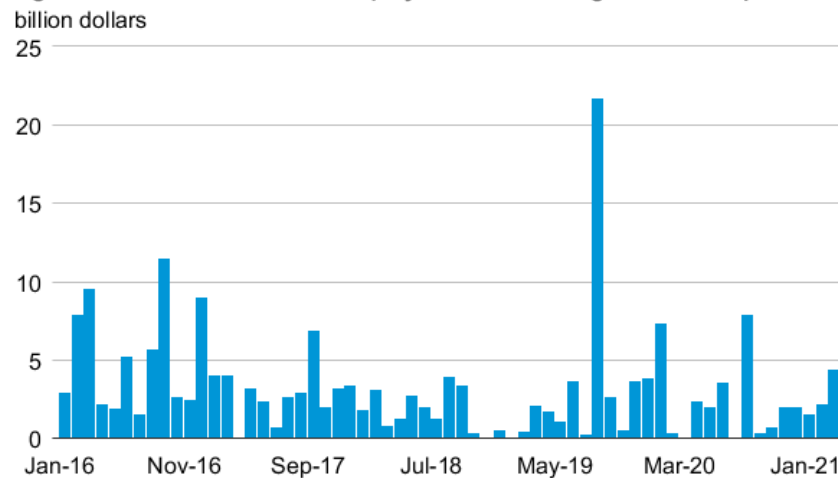
WTI options open interest ratio: The put-to-call WTI open interest ratio decreased in March, suggesting a change in market expectations around future crude oil prices, and potentially hedging against future crude oil price increases. The monthly aggregate put-to-call [open interest](#) ratio for WTI crude oil options decreased in March to 0.63, down from 0.75 in February and the lowest for any month since July 2017 (**Figure 3**). The decrease was driven by an increase in call option open interest compared with small changes in put options from February. The total number of call option contracts increased from 0.96 million contracts in February to 1.17 million contracts in March, while the number of put option contracts increased from 0.72 million in February to 0.75 million in March.



U.S. oil company debt and equity issuance: Since September 2020, debt and equity issuance has increased in all but one month, suggesting that increasing crude oil prices are encouraging U.S. crude oil producers to raise money to refinance debts, resume drilling activities, or purchase acreage. In March 2021, debt and equity issuance announcements among publicly traded independent U.S. exploration and production companies totaled \$4.4 billion, the highest since

August 2020 and higher than the five-year (2016–20) median of \$2.4 billion (**Figure 4**). In addition, low interest rates have lowered the cost of issuing debt and have likely contributed to the recent growth in debt and equity issuance. The [federal funds rate](#), which affects interest rates across the market, has been held at a [target](#) of 0.00%–0.25% since March 2020, according to the Federal Open Market Committee. In addition, the Moody’s seasoned AAA [corporate bond yield](#), which represents average bond yields for investment grade companies, averaged 2.70% in February, which is less than the 2011–20 average of 3.78%. Lastly, energy sector corporate bond yields for companies with a rating lower than investment grade are also at multi-year lows. Although primarily a result of higher crude oil prices, high capital availability for U.S. producers also supports EIA’s forecast for U.S. crude oil production to increase from 10.7 million b/d in first-quarter 2021 to 12.2 million b/d by fourth-quarter 2022.

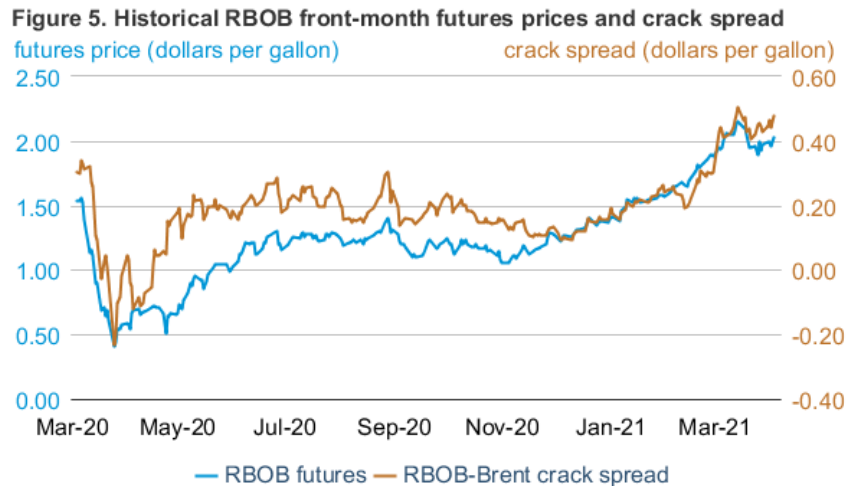
Figure 4. Announced debt and equity issuance among U.S. oil companies



eia Source: Evaluate Energy

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 \$2.02 per gallon (gal) on April 1, up 8 cents/gal from March 1 (**Figure 5**).



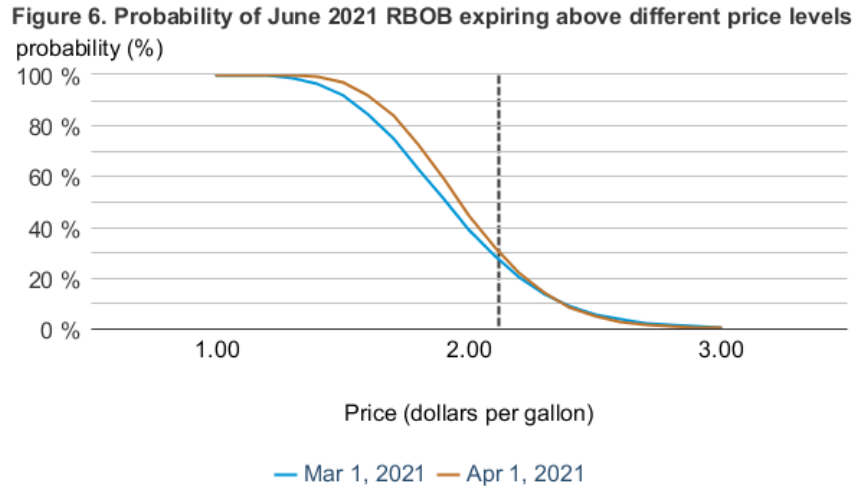
Source: CME Group, as compiled by Bloomberg L.P.
 Note: RBOB is the petroleum component of gasoline used in many parts of the country.

The RBOB–Brent crack spread (the difference between the price of RBOB and the price of Brent crude oil) increased by 5 cents/gal to settle at 48 cents/gal during the same period. On March 12, the crack spread closed at 50 cents/gal, the highest since August 31, 2017. The average RBOB–Brent crack spread increased by 19 cents/gal from February to reach 44 cents/gal in March. The increase reflected a decline in refinery production of gasoline, stemming from refinery shutdowns on the U.S. Gulf Coast early in the month as a result of [severely cold weather](#). The drop in refinery production caused gasoline inventories to end March at the lowest March level since 2014. In addition, higher gasoline crack spreads were the result of the seasonal shift to producing summer-grade gasoline, which is more expensive to produce.

EIA estimates that gasoline inventories decreased to 228.2 million barrels, a 3.4 million barrel draw from February (1.4%). The draw was a result of a combination of a decrease in production resulting from unplanned refinery outages that began during February’s cold spell in Texas and an increase in consumption. We estimate gasoline production of 9.2 million barrels per day (b/d) in March, 5% less than the five-year (2016–20) average for March. Meanwhile, we estimate gasoline consumption increased 0.5 million b/d (7%) from February. We forecast gasoline inventories to remain lower than the five-year average for the remainder of the year, which may support continued higher-than-usual crack spreads. We forecast that gasoline refining margins will average 45 cents/gal from April through September, the summer driving season, which is 5 cents/gal higher than the five-year average over this period.

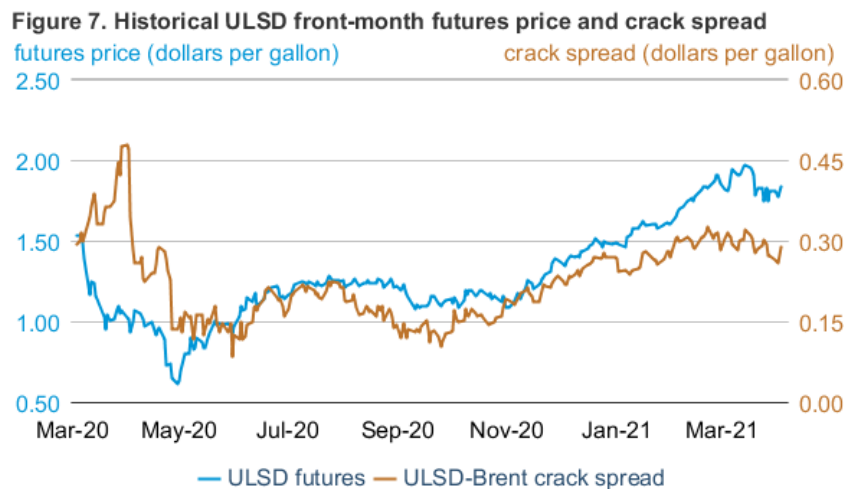
Market-derived probabilities: Based on futures and options prices, [the market-derived probability](#) of the June 2021 RBOB futures contract expiring higher than \$2.00/gal was 45% on April 1, and the probability of it expiring higher than \$2.10/gal was 32% (**Figure 6**). At the beginning of March, the market-derived probability of the June 2021 RBOB contract expiring at more than \$2.00/gal was 39%, and the probability of the same contract expiring at more than \$2.10/gal was 29%. In recent years, RBOB futures contracts have averaged about 90 cents/gal


less than the U.S. average regular retail gasoline price because the price of retail gasoline includes taxes, distribution, and marketing costs. Therefore, futures and options prices as of April 1 suggest about a 32% probability U.S. average retail gasoline prices could be at \$3.00/gal or higher following the expiry of the June RBOB contract.



 U.S. Energy Information Administration, CME Group, 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 \$1.83/gal on April 1, up 1 cent/gal from March 1 (**Figure 7**). The ULSD–Brent crack spread (the difference between the price of ULSD and the price of Brent crude oil) decreased 2 cents/gal and settled at 29 cents/gal during the same period.

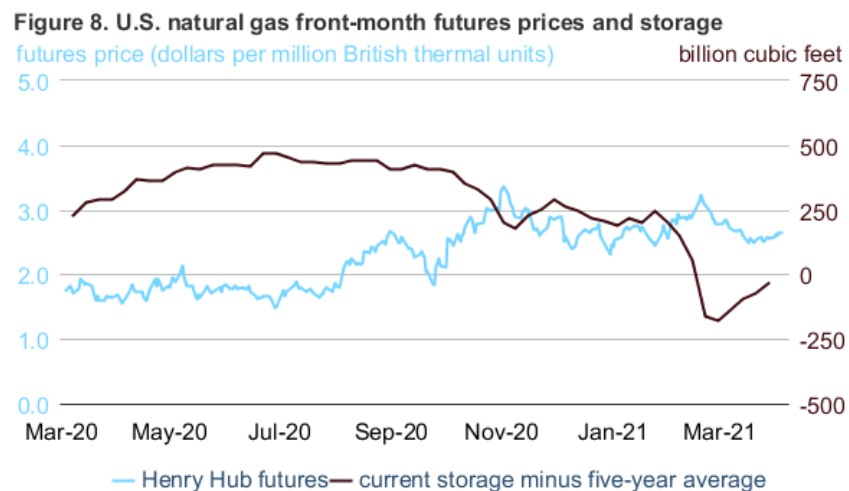


 Source: CME Group, as compiled by Bloomberg L.P.
Note: ULSD=ultra-low sulfur diesel

The continuation of below-average ULSD–Brent crack spreads was likely a result of higher production and the lowest U.S. distillate net exports since January 2010. The higher production and lower net exports contributed to our estimate that U.S. distillate inventories increased by 5.5 million barrels (4%) from February, and likely provided downward pressure on the crack spread. The average daily crack spread decreased to 29 cents/gal in March, 1 cent/gal lower than in February, and the lowest average daily crack spread for March since 2017.

Natural Gas

Prices: The front-month natural gas futures contract for delivery at the Henry Hub settled at \$2.64 per million British thermal units (MMBtu) on April 1, 2021, which was down 14 cents/MMBtu from March 1, 2021 (**Figure 8**).



 Source: U.S. Energy Information Administration, CME Group, as compiled by Bloomberg L.P.

Natural gas futures prices averaged \$2.62/MMBtu in March, a decrease of 29 cents/MMBtu from the February average, which was the highest monthly average since January 2019. EIA estimates March natural gas withdrawals were 62.3 Bcf, 65% less than the five-year (2016–20) average for March. The low March withdrawals partly reflected a decrease in natural gas demand. We estimate that natural gas consumption in March decreased to 84.4 billion cubic feet per day (Bcf/d), down 24.6 Bcf/d (23%) from February’s record levels and the lowest consumption for March since 2017. We expect prices will rise from March levels and the Henry Hub spot price will average \$2.86/MMBtu for the final three quarters of 2021. We forecast higher prices will result from relatively low, albeit rising, U.S. natural gas production compared with previous years amid increases in U.S. natural gas exports.

Notable forecast changes

- EIA forecasts that Brent crude oil prices will average \$62/b in 2021 and \$60/b in 2022. The forecast for both years is \$2/b higher than in the March STEO. The higher forecast reflects larger draws from global oil inventories in 2021, particularly in the second quarter, than previously expected, which will reduce global oil inventory levels through the forecast period. The larger draws are the result of lower expected OPEC crude oil production in the second quarter of 2021.
- EIA forecasts U.S. crude oil production will average 11.0 million b/d in 2021 and 11.9 million b/d in 2022. Compared with the March STEO, those forecasts are 0.1 million b/d and 0.2 million b/d lower, respectively. We are forecasting lower production despite higher expected crude oil prices (about \$2/b higher in both 2021 and 2022) because we now forecast that rig activity in producing areas outside the Permian—such as Bakken, Eagle Ford, and Anadarko—will be lower than previously expected.
- This STEO incorporates [EIA's changes to its reporting of biofuels data](#). In [STEO Table 4a](#), renewables and oxygenate production includes pentanes plus, oxygenates (excluding fuel ethanol), and renewable fuels. Beginning with January 2021 data, 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. Additionally, we are now reporting product supplied (a proxy for consumption) of [renewable fuels excluding fuel ethanol](#). In [STEO Table 4a](#) consumption data, these data will be included in the “other oils” category.

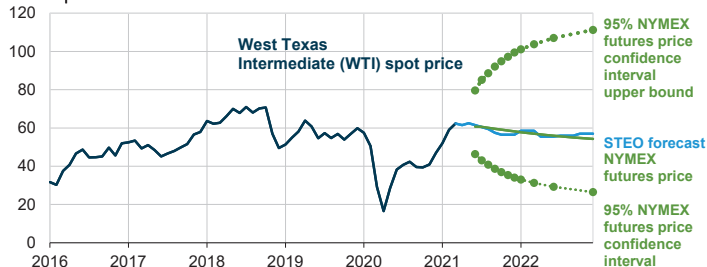
This report was prepared by the U.S. Energy Information Administration (EIA), the statistical and analytical agency within the U.S. Department of Energy. By law, EIA's data, analyses, and forecasts are independent of approval by any other officer or employee of the United States Government. The views 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



April 6, 2021

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

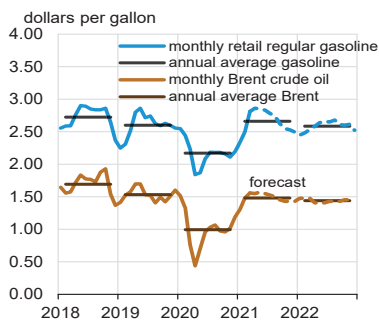


Note: Confidence interval derived from options market information for the five trading days ending Apr 1, 2021. Intervals not calculated for months with sparse trading in near-the-money options contracts.

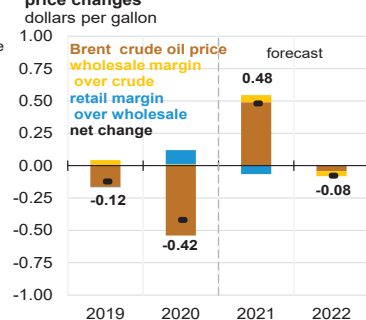
Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021, CME Group, and Bloomberg, L.P.



U.S. gasoline and crude oil prices



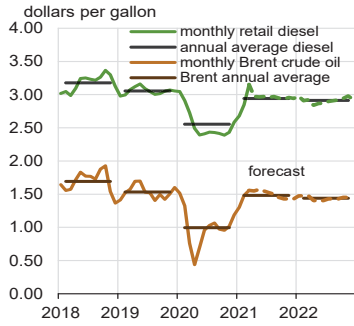
Components of annual gasoline price changes



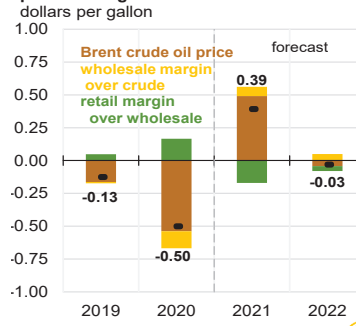
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. diesel and crude oil prices



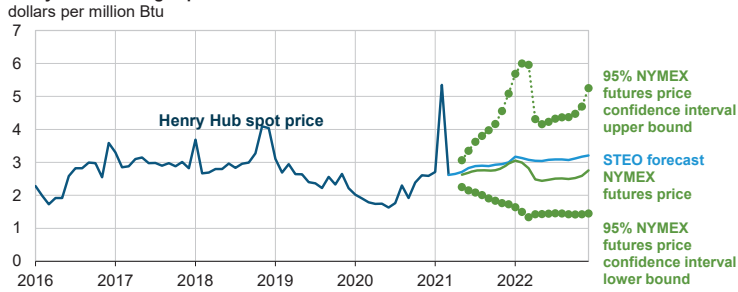
Components of annual diesel prices changes



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



Henry Hub natural gas price and NYMEX confidence intervals

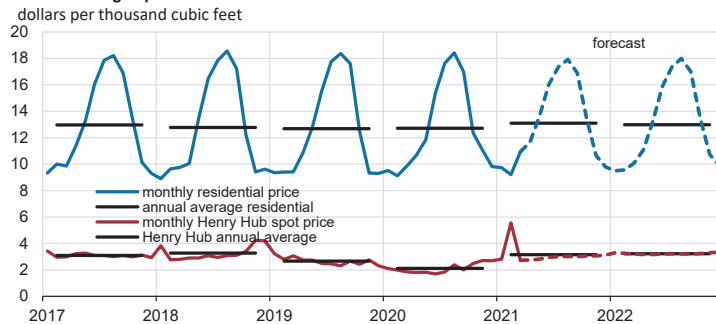


Note: Confidence interval derived from options market information for the five trading days ending Apr 1, 2021. Intervals not calculated for months with sparse trading in near-the-money options contracts.

Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021, and CME Group



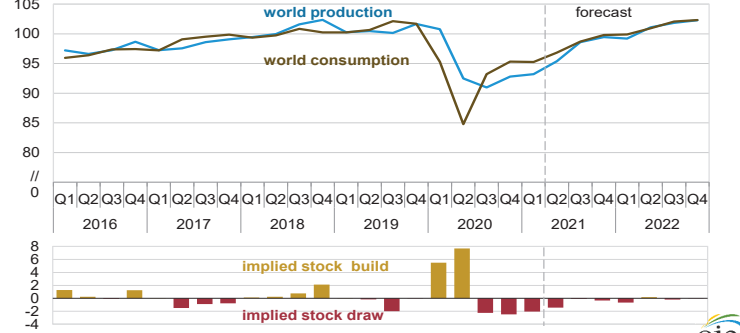
U.S. natural gas prices



Sources: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021, and Refinitiv



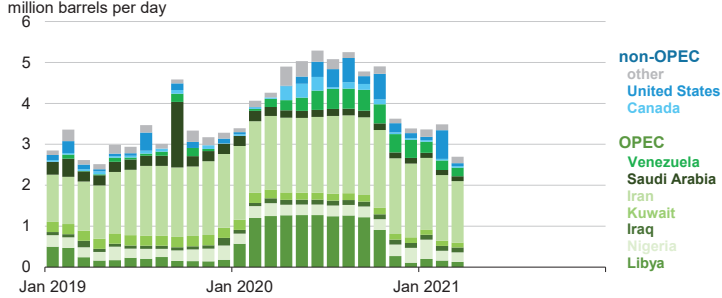
World liquid fuels production and consumption balance
million barrels per day



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



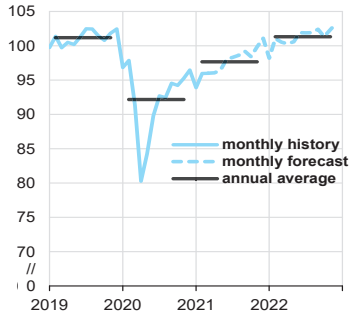
Estimated unplanned liquid fuels production outages among OPEC and non-OPEC producers
million barrels per day



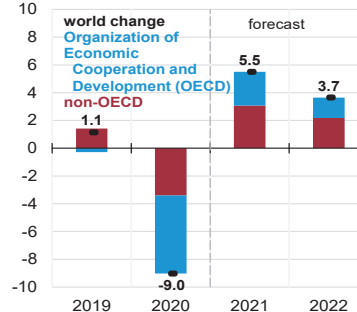
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



World liquid fuels consumption
million barrels per day



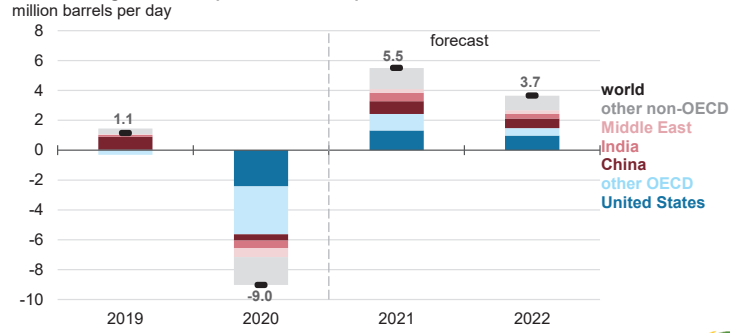
Components of annual change
million barrels per day



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



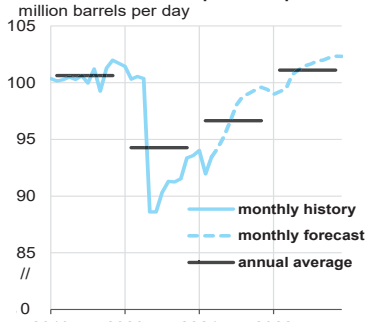
Annual change in world liquid fuels consumption



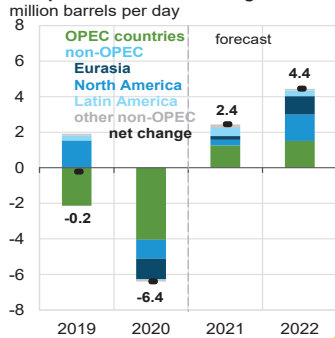
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



World crude oil and liquid fuels production



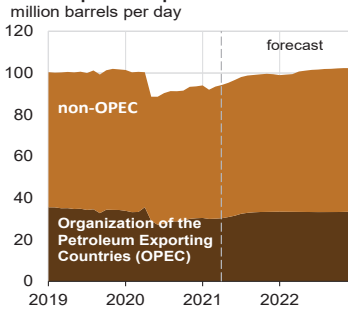
Components of annual change



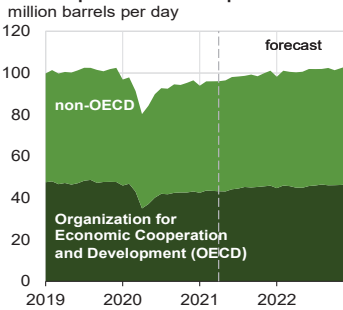
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



World liquid fuels production



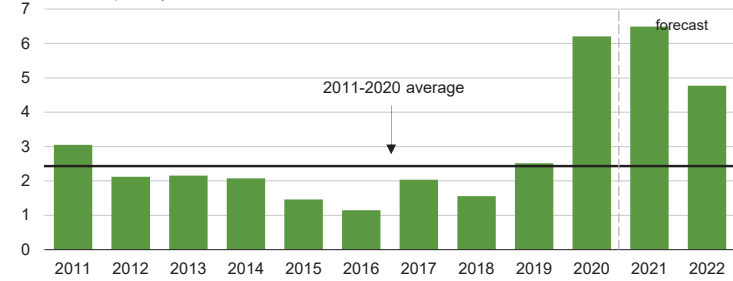
World liquid fuels consumption



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



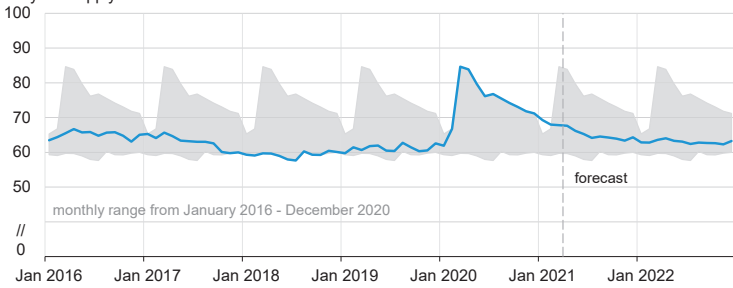
**Organization of the Petroleum Exporting Countries (OPEC)
surplus crude oil production capacity**
million barrels per day



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



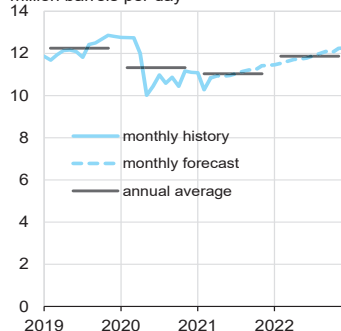
**Organization for Economic Cooperation and Development (OECD)
commercial inventories of crude oil and other liquids**
days of supply



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

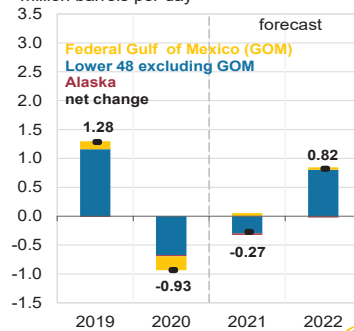


U.S. crude oil production
million barrels per day

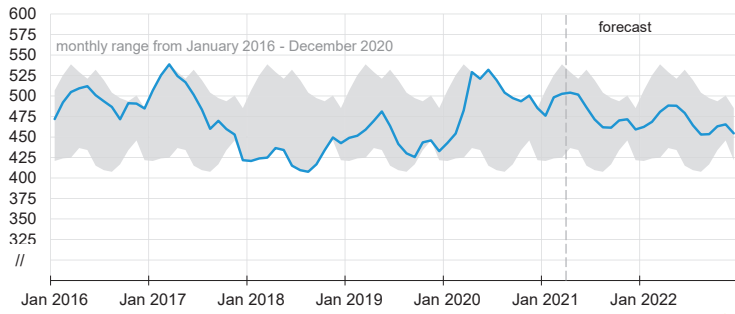


Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021

Components of annual change
million barrels per day



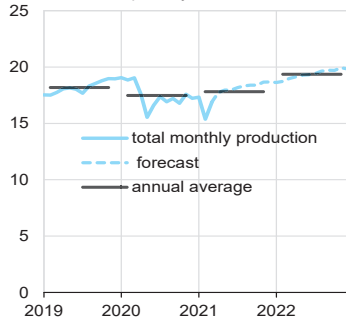
U.S. commercial crude oil inventories
million barrels



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



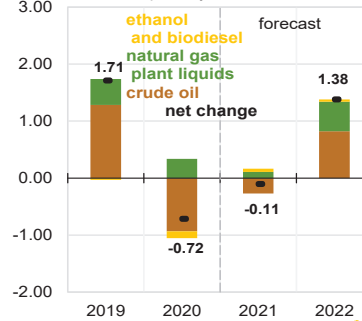
U.S. crude oil and liquid fuels production
million barrels per day



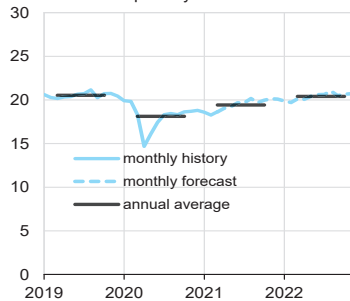
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



Components of annual change
million barrels per day



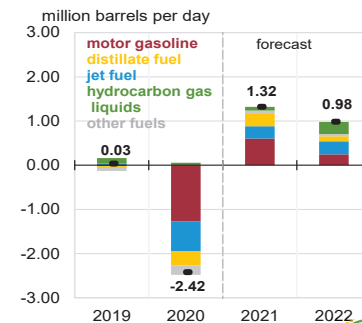
U.S. liquid fuels product supplied (consumption)
million barrels per day



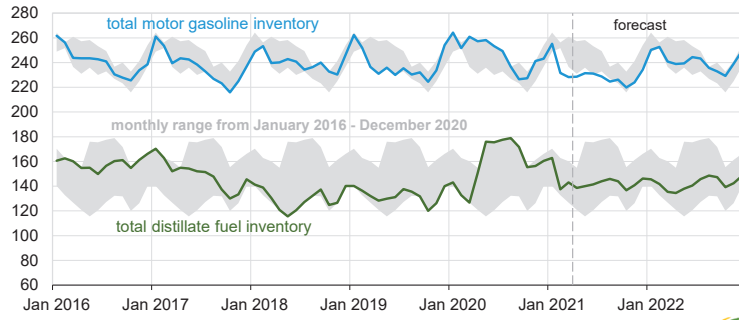
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



Components of annual change
million barrels per day



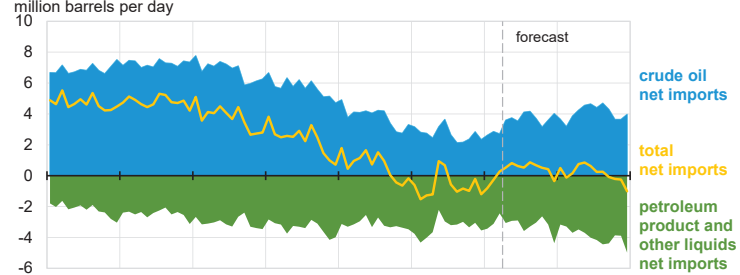
U.S. gasoline and distillate inventories
million barrels



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



U.S. net imports of crude oil and liquid fuels
million barrels per day

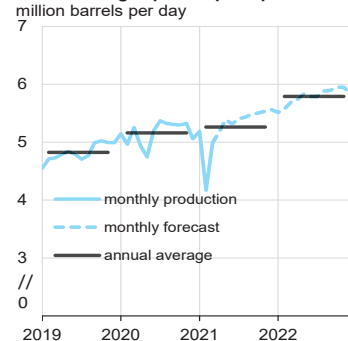


Note: Petroleum product and other liquids include: gasoline, distillate fuels, hydrocarbon gas liquids, jet fuel, residual fuel oil, unfinished oils, other hydrocarbons/oxygenates, and other oils.

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

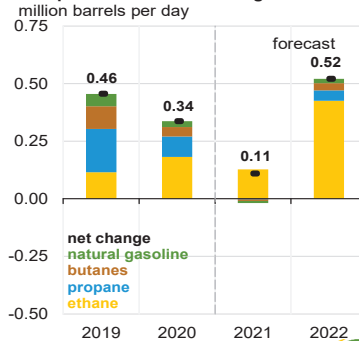


U.S. natural gas plant liquids production
million barrels per day

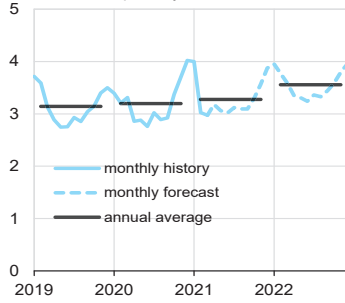


Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021

Components of annual change
million barrels per day



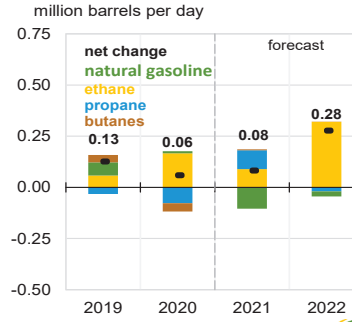
U.S. hydrocarbon gas liquids product supplied (consumption)
million barrels per day



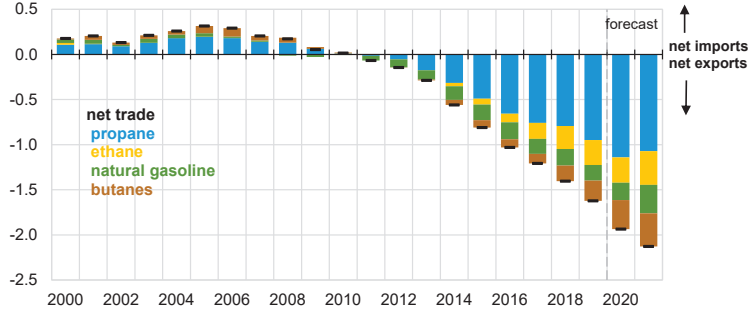
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



Components of annual change



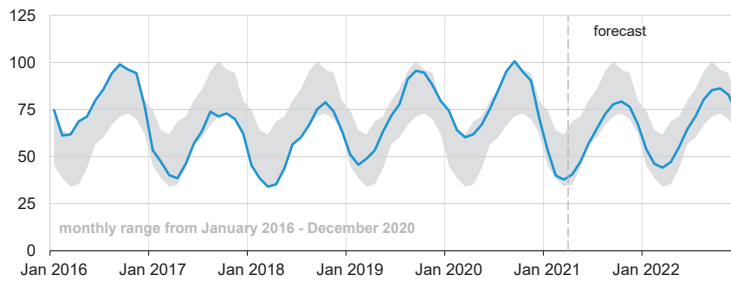
U.S. net trade of hydrocarbon gas liquids (HGL)
million barrels per day



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



U.S. commercial propane inventories
million barrels

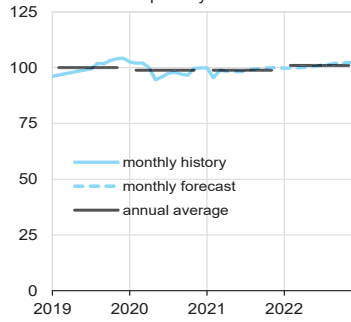


Note: Excludes propylene.

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



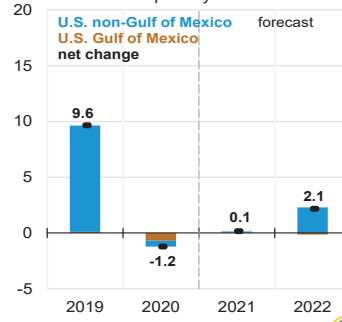
U.S. marketed natural gas production
billion cubic feet per day



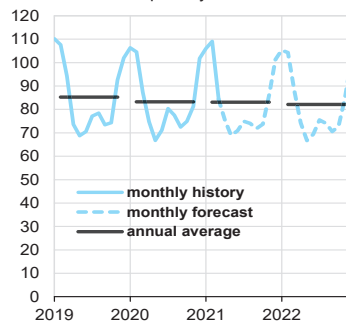
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



Components of annual change
billion cubic feet per day



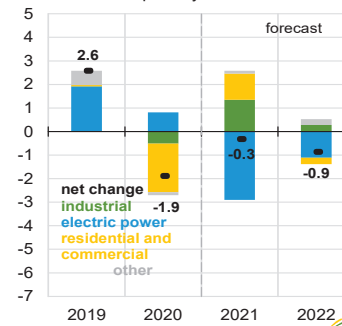
U.S. natural gas consumption
billion cubic feet per day



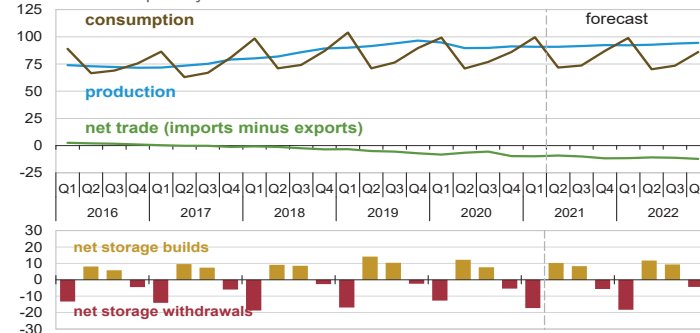
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



Components of annual change
billion cubic feet per day



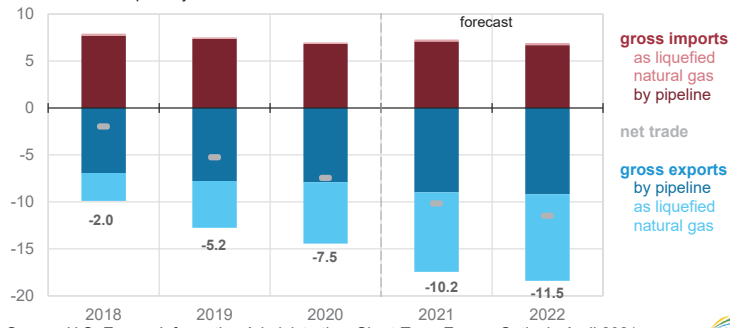
U.S. natural gas production, consumption, and net imports
billion cubic feet per day



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



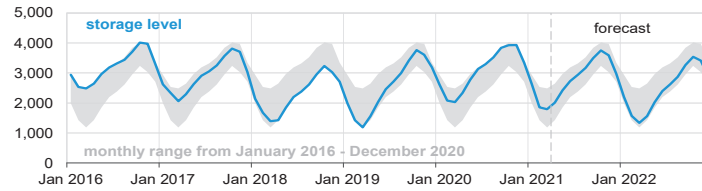
U.S. annual natural gas trade
billion cubic feet per day



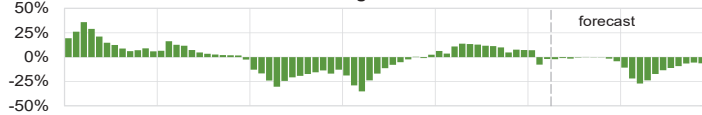
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



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



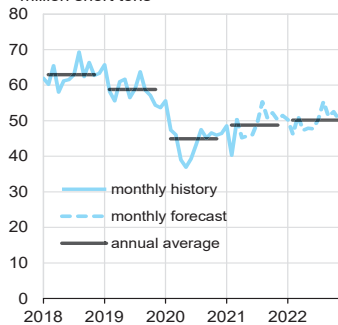
Percent deviation from 2016 - 2020 average



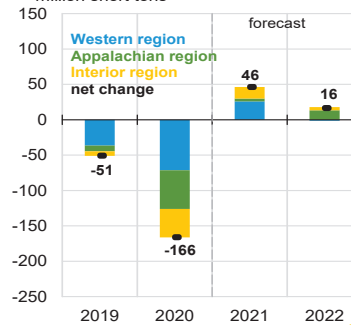
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. coal production
million short tons



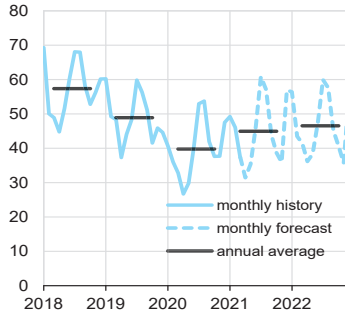
Components of annual change
million short tons



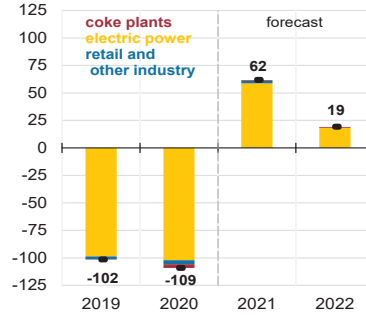
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. coal consumption
million short tons



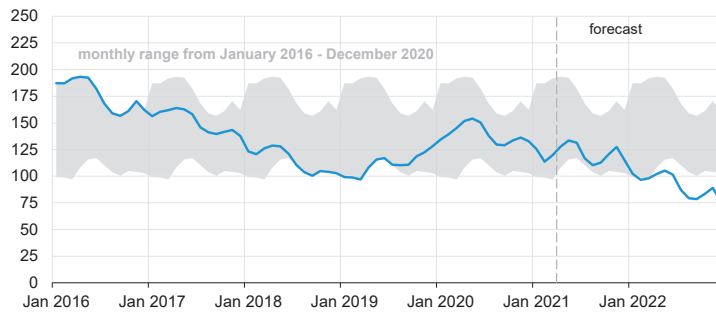
Components of annual change
million short tons



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



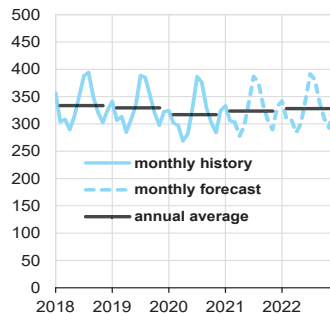
U.S. electric power coal inventories
million short tons



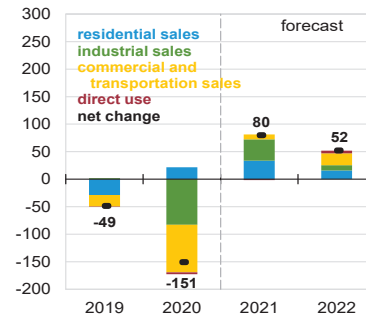
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. electricity consumption
billion kilowatthours



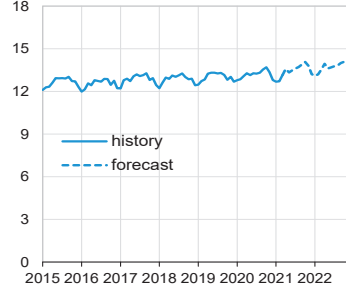
Components of annual change
billion kilowatthours



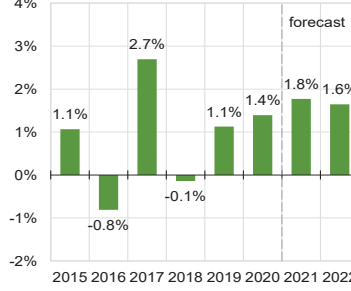
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. monthly residential electricity price
cents per kilowatthour



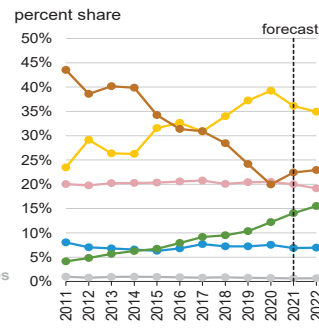
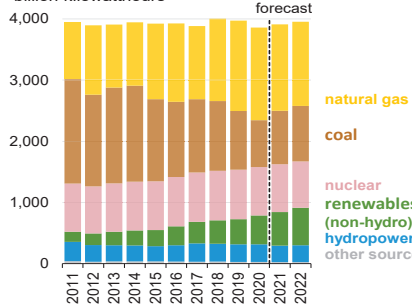
Annual growth in residential electricity prices
percent



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



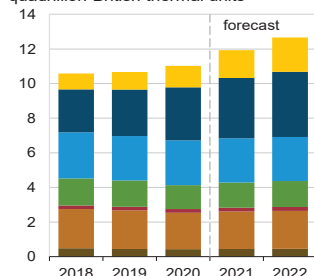
U.S. electricity generation by fuel, all sectors
billion kilowatthours



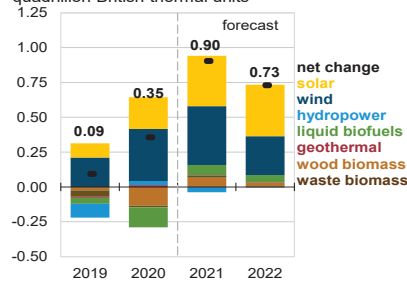
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



U.S. renewable energy supply
quadrillion British thermal units



Components of annual change
quadrillion British thermal units

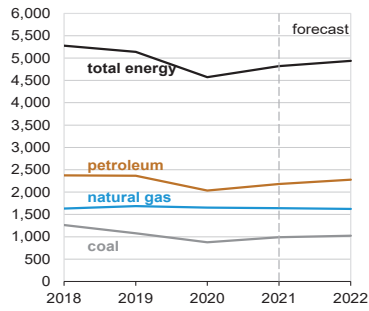


Note: Hydropower excludes pumped storage generation. Liquid biofuels include ethanol and biodiesel. Other biomass includes municipal waste from biogenic sources, landfill gas, and other non-wood waste.

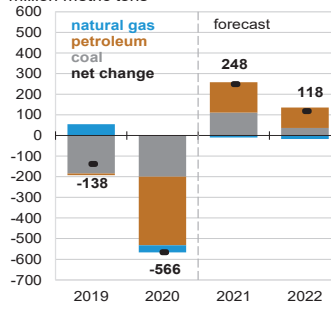
Source: U.S. Energy Information Administration, Short-Term Energy Outlook, April 2021



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



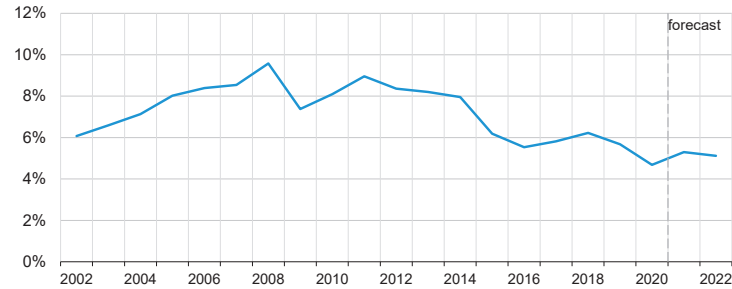
Components of annual change
million metric tons



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



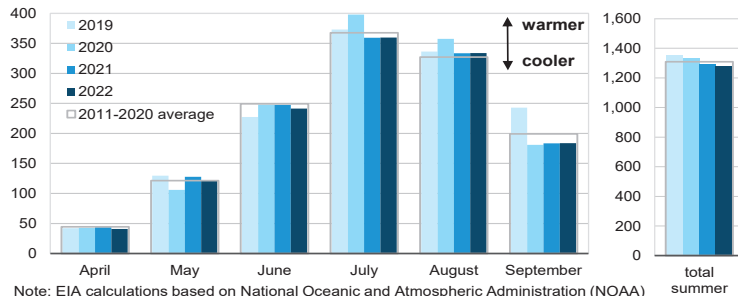
U.S. annual energy expenditures
share of gross domestic product



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



U.S. summer cooling degree days
population-weighted

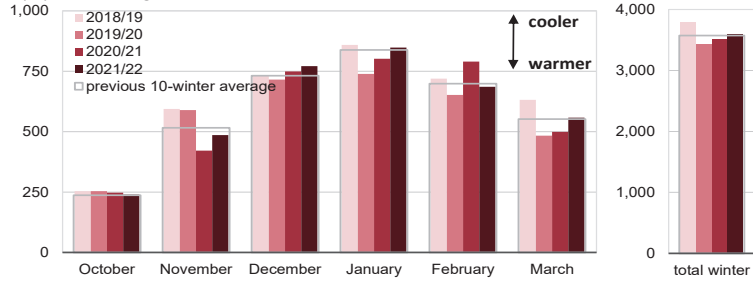


Note: EIA calculations based on National Oceanic and Atmospheric Administration (NOAA) data. Projections reflect NOAA's 14-16 month outlook.

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



U.S. winter heating degree days
population-weighted

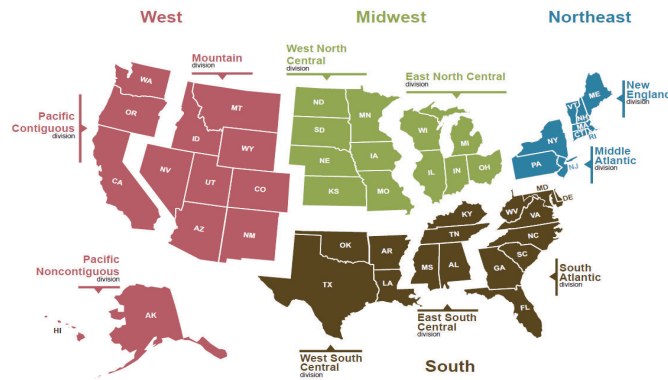


Note: EIA calculations based on National Oceanic and Atmospheric Administration (NOAA) data. Projections reflect NOAA's 14-16 month outlook.

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



U.S. Census regions and divisions



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



Table SF01. U.S. Motor Gasoline Summer Outlook

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

	2020			2021			Year-over-year Change (percent)		
	Q2	Q3	Season	Q2	Q3	Season	Q2	Q3	Season
Nominal Prices (dollars per gallon)									
WTI Crude Oil (Spot) ^a	0.67	0.97	0.82	1.47	<i>1.41</i>	<i>1.44</i>	<i>121.1</i>	<i>44.8</i>	<i>75.8</i>
Brent Crude Oil Price (Spot)	0.70	1.02	0.86	1.56	<i>1.49</i>	<i>1.52</i>	<i>121.3</i>	<i>45.9</i>	<i>76.6</i>
U.S. Refiner Average Crude Oil Cost	0.64	0.97	0.81	1.45	<i>1.39</i>	<i>1.42</i>	<i>126.3</i>	<i>42.7</i>	<i>75.9</i>
Wholesale Gasoline Price ^b	1.04	1.37	1.22	2.04	<i>1.91</i>	<i>1.97</i>	<i>95.8</i>	<i>39.2</i>	<i>61.4</i>
Wholesale Diesel Fuel Price ^b	0.97	1.24	1.11	1.91	<i>1.89</i>	<i>1.90</i>	<i>96.5</i>	<i>52.4</i>	<i>70.9</i>
Regular Gasoline Retail Price ^c	1.94	2.18	2.07	2.85	<i>2.72</i>	<i>2.78</i>	<i>46.5</i>	<i>24.5</i>	<i>34.0</i>
Diesel Fuel Retail Price ^c	2.43	2.43	2.43	2.97	<i>2.96</i>	<i>2.96</i>	<i>22.2</i>	<i>22.0</i>	<i>22.1</i>
Gasoline Consumption/Supply (million barrels per day)									
Total Consumption	7.110	8.504	7.811	8.749	<i>8.939</i>	<i>8.844</i>	<i>23.1</i>	<i>5.1</i>	<i>13.2</i>
Total Refinery and Blender Net Supply ^d	6.346	7.442	6.897	7.946	<i>8.143</i>	<i>8.045</i>	<i>25.2</i>	<i>9.4</i>	<i>16.6</i>
Fuel Ethanol Blending	0.722	0.872	0.797	0.882	<i>0.913</i>	<i>0.898</i>	<i>22.2</i>	<i>4.7</i>	<i>12.6</i>
Total Stock Withdrawal ^e	0.083	0.290	0.187	-0.032	<i>0.054</i>	<i>0.011</i>			
Net Imports ^e	-0.042	-0.101	-0.071	-0.047	<i>-0.172</i>	<i>-0.110</i>			
Refinery Utilization (percent)	72.8	78.5	75.7	85.3	<i>88.6</i>	<i>87.0</i>			
Total Gasoline Stocks (million barrels)									
Beginning	260.8	253.3	260.8	228.2	<i>231.2</i>	<i>228.2</i>			
Ending	253.3	226.5	226.5	231.2	<i>226.2</i>	<i>226.2</i>			
Economic Indicators									
Real GDP (annualized billion 2012 dollars)	17,303	18,597	17,950	19,321	<i>19,645</i>	<i>19,483</i>	<i>11.7</i>	<i>5.6</i>	<i>8.5</i>
Real Income (annualized billion 2012 dollars)	16,630	15,851	16,241	17,254	<i>15,691</i>	<i>16,472</i>	<i>3.8</i>	<i>-1.0</i>	<i>1.4</i>
Non-Farm Employment (million jobs)	133.7	140.9	137.3	145.0	<i>146.5</i>	<i>145.8</i>	<i>8.5</i>	<i>4.0</i>	<i>6.2</i>

^a Spot Price of West Texas Intermediate (WTI) crude oil.

^b Price product sold by refiners to resellers.

^c Average retail price including taxes.

^d Finished gasoline net production minus gasoline blend components net inputs minus fuel ethanol blending and supply adjustment.

^e Total stock withdrawal and net imports includes both finished gasoline and gasoline blend components.

GDP = gross domestic product.

Notes: Minor discrepancies with other Energy Information Administration (EIA) published historical data are due to rounding. Historical data are printed in bold. Forecasts are in italic. The forecasts were generated by simulation of the Short-Term Integrated Forecasting System.

Sources: Historical data: latest data available from: EIA, *Petroleum Supply Monthly*, DOE/EIA-0109; Monthly Energy Review, DOE/EIA-0035; U.S. Department of Commerce, Bureau of Economic Analysis (GDP and income); Refinitiv (WTI and Brent crude oil spot prices). Macroeconomic projections are based on IHS Markit Macroeconomic Forecast Model.

Table 1. U.S. Energy Markets Summary

U.S. Energy Information Administration | Short-Term Energy Outlook - April 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	10.75	<i>10.93</i>	<i>11.13</i>	<i>11.35</i>	<i>11.54</i>	<i>11.74</i>	<i>11.99</i>	<i>12.18</i>	11.31	<i>11.04</i>	<i>11.86</i>
Dry Natural Gas Production (billion cubic feet per day)	94.79	89.68	89.83	91.18	90.82	<i>90.90</i>	<i>91.59</i>	<i>92.31</i>	<i>92.23</i>	<i>92.75</i>	<i>93.76</i>	<i>94.39</i>	91.36	<i>91.41</i>	<i>93.29</i>
Coal Production (million short tons)	149	115	136	139	139	<i>137</i>	<i>155</i>	<i>154</i>	<i>148</i>	<i>143</i>	<i>157</i>	<i>154</i>	539	<i>585</i>	<i>602</i>
Energy Consumption															
Liquid Fuels (million barrels per day)	19.33	16.08	18.36	18.71	18.51	<i>19.32</i>	<i>19.84</i>	<i>20.07</i>	<i>19.92</i>	<i>20.37</i>	<i>20.72</i>	<i>20.66</i>	18.12	<i>19.44</i>	<i>20.42</i>
Natural Gas (billion cubic feet per day)	99.31	70.84	76.83	86.08	99.53	<i>71.78</i>	<i>73.61</i>	<i>87.05</i>	<i>98.96</i>	<i>70.09</i>	<i>73.43</i>	<i>86.03</i>	83.26	<i>82.93</i>	<i>82.07</i>
Coal (b) (million short tons)	110	96	149	123	133	<i>113</i>	<i>162</i>	<i>132</i>	<i>141</i>	<i>122</i>	<i>163</i>	<i>132</i>	477	<i>539</i>	<i>558</i>
Electricity (billion kilowatt hours per day)	10.14	9.64	11.87	9.91	10.47	<i>10.06</i>	<i>11.94</i>	<i>10.08</i>	<i>10.63</i>	<i>10.21</i>	<i>12.09</i>	<i>10.19</i>	10.39	<i>10.64</i>	<i>10.78</i>
Renewables (c) (quadrillion Btu)	2.92	2.99	2.83	2.91	3.03	<i>3.33</i>	<i>3.08</i>	<i>3.15</i>	<i>3.26</i>	<i>3.56</i>	<i>3.27</i>	<i>3.29</i>	11.65	<i>12.58</i>	<i>13.37</i>
Total Energy Consumption (d) (quadrillion Btu)	25.11	20.64	23.43	23.80	24.65	<i>22.48</i>	<i>23.91</i>	<i>24.54</i>	<i>25.44</i>	<i>23.12</i>	<i>24.37</i>	<i>24.79</i>	92.97	<i>95.58</i>	<i>97.71</i>
Energy Prices															
Crude Oil West Texas Intermediate Spot (dollars per barrel)	45.34	27.96	40.89	42.50	58.09	<i>61.82</i>	<i>59.19</i>	<i>56.50</i>	<i>58.50</i>	<i>55.50</i>	<i>56.00</i>	<i>57.00</i>	39.17	<i>58.89</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>2.73</i>	<i>2.89</i>	<i>2.96</i>	<i>3.13</i>	<i>3.06</i>	<i>3.08</i>	<i>3.17</i>	2.03	<i>3.04</i>	<i>3.11</i>
Coal (dollars per million Btu)	1.93	1.91	1.93	1.91	1.92	<i>1.95</i>	<i>1.93</i>	<i>1.90</i>	<i>1.92</i>	<i>1.93</i>	<i>1.92</i>	<i>1.89</i>	1.92	<i>1.92</i>	<i>1.92</i>
Macroeconomic															
Real Gross Domestic Product (billion chained 2012 dollars - SAAR)	19,011	17,303	18,597	18,784	18,998	<i>19,321</i>	<i>19,645</i>	<i>19,883</i>	<i>20,076</i>	<i>20,228</i>	<i>20,355</i>	<i>20,471</i>	18,423	<i>19,462</i>	<i>20,283</i>
Percent change from prior year	0.3	-9.0	-2.8	-2.4	-0.1	<i>11.7</i>	<i>5.6</i>	<i>5.9</i>	<i>5.7</i>	<i>4.7</i>	<i>3.6</i>	<i>3.0</i>	-3.5	<i>5.6</i>	<i>4.2</i>
GDP Implicit Price Deflator (Index, 2012=100)	113.4	112.9	113.8	114.4	115.3	<i>115.8</i>	<i>116.4</i>	<i>117.0</i>	<i>117.4</i>	<i>118.1</i>	<i>118.8</i>	<i>119.5</i>	113.6	<i>116.1</i>	<i>118.4</i>
Percent change from prior year	1.7	0.6	1.1	1.3	1.7	<i>2.6</i>	<i>2.2</i>	<i>2.2</i>	<i>1.8</i>	<i>1.9</i>	<i>2.1</i>	<i>2.1</i>	1.2	<i>2.2</i>	<i>2.0</i>
Real Disposable Personal Income (billion chained 2012 dollars - SAAR)	15,061	16,630	15,851	15,437	16,641	<i>17,254</i>	<i>15,691</i>	<i>15,544</i>	<i>15,722</i>	<i>15,839</i>	<i>15,956</i>	<i>16,042</i>	15,745	<i>16,282</i>	<i>15,890</i>
Percent change from prior year	1.4	12.2	6.4	3.2	10.5	<i>3.8</i>	<i>-1.0</i>	<i>0.7</i>	<i>-5.5</i>	<i>-8.2</i>	<i>1.7</i>	<i>3.2</i>	5.8	<i>3.4</i>	<i>-2.4</i>
Manufacturing Production Index (Index, 2012=100)	104.4	89.3	100.1	103.0	104.4	<i>107.0</i>	<i>109.0</i>	<i>110.4</i>	<i>111.4</i>	<i>112.2</i>	<i>112.7</i>	<i>113.0</i>	99.2	<i>107.7</i>	<i>112.3</i>
Percent change from prior year	-2.0	-15.5	-5.5	-2.6	0.1	<i>19.8</i>	<i>8.9</i>	<i>7.1</i>	<i>6.6</i>	<i>4.9</i>	<i>3.4</i>	<i>2.3</i>	-6.4	<i>8.6</i>	<i>4.3</i>
Weather															
U.S. Heating Degree-Days	1,874	540	70	1,418	2,091	<i>460</i>	<i>69</i>	<i>1,496</i>	<i>2,091</i>	<i>483</i>	<i>69</i>	<i>1,494</i>	3,902	<i>4,116</i>	<i>4,137</i>
U.S. Cooling Degree-Days	71	397	937	122	47	<i>419</i>	<i>876</i>	<i>100</i>	<i>46</i>	<i>404</i>	<i>877</i>	<i>100</i>	1,526	<i>1,441</i>	<i>1,428</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 April 1, 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 - April 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>61.82</i>	<i>59.19</i>	<i>56.50</i>	<i>58.50</i>	<i>55.50</i>	<i>56.00</i>	<i>57.00</i>	39.17	<i>58.89</i>	<i>56.74</i>
Brent Spot Average	49.97	29.52	42.97	44.34	61.12	<i>65.32</i>	<i>62.69</i>	<i>60.00</i>	<i>62.00</i>	<i>59.00</i>	<i>60.00</i>	<i>61.00</i>	41.69	<i>62.28</i>	<i>60.49</i>
U.S. Imported Average	43.76	26.33	39.90	40.61	55.97	<i>59.85</i>	<i>57.24</i>	<i>54.50</i>	<i>56.25</i>	<i>53.25</i>	<i>53.50</i>	<i>54.50</i>	37.25	<i>56.96</i>	<i>54.26</i>
U.S. Refiner Average Acquisition Cost	47.48	26.88	40.79	42.07	56.75	<i>60.84</i>	<i>58.21</i>	<i>55.50</i>	<i>57.25</i>	<i>54.25</i>	<i>54.50</i>	<i>55.50</i>	39.75	<i>57.85</i>	<i>55.32</i>
U.S. Liquid Fuels (cents per gallon)															
Refiner Prices for Resale															
Gasoline	153	104	137	133	182	<i>204</i>	<i>191</i>	<i>173</i>	<i>174</i>	<i>182</i>	<i>186</i>	<i>176</i>	133	<i>188</i>	<i>179</i>
Diesel Fuel	160	97	124	133	175	<i>191</i>	<i>189</i>	<i>185</i>	<i>187</i>	<i>183</i>	<i>186</i>	<i>188</i>	129	<i>185</i>	<i>186</i>
Fuel Oil	160	87	113	121	166	<i>181</i>	<i>182</i>	<i>181</i>	<i>183</i>	<i>172</i>	<i>174</i>	<i>179</i>	125	<i>178</i>	<i>179</i>
Refiner Prices to End Users															
Jet Fuel	165	85	116	125	164	<i>179</i>	<i>180</i>	<i>178</i>	<i>185</i>	<i>180</i>	<i>183</i>	<i>186</i>	131	<i>176</i>	<i>184</i>
No. 6 Residual Fuel Oil (a)	176	93	116	119	147	<i>146</i>	<i>140</i>	<i>133</i>	<i>134</i>	<i>132</i>	<i>129</i>	<i>131</i>	125	<i>141</i>	<i>132</i>
Retail Prices Including Taxes															
Gasoline Regular Grade (b)	241	194	218	215	256	<i>285</i>	<i>272</i>	<i>252</i>	<i>249</i>	<i>263</i>	<i>265</i>	<i>258</i>	218	<i>266</i>	<i>259</i>
Gasoline All Grades (b)	251	203	227	224	265	<i>296</i>	<i>284</i>	<i>266</i>	<i>262</i>	<i>276</i>	<i>278</i>	<i>272</i>	227	<i>278</i>	<i>272</i>
On-highway Diesel Fuel	289	243	243	246	290	<i>297</i>	<i>296</i>	<i>294</i>	<i>294</i>	<i>286</i>	<i>291</i>	<i>295</i>	255	<i>294</i>	<i>291</i>
Heating Oil	280	200	214	230	269	<i>286</i>	<i>295</i>	<i>312</i>	<i>308</i>	<i>283</i>	<i>270</i>	<i>274</i>	244	<i>287</i>	<i>291</i>
Natural Gas															
Henry Hub Spot (dollars per thousand cubic feet)	1.98	1.77	2.07	2.63	3.70	<i>2.84</i>	<i>3.01</i>	<i>3.08</i>	<i>3.25</i>	<i>3.18</i>	<i>3.20</i>	<i>3.29</i>	2.11	<i>3.15</i>	<i>3.23</i>
Henry Hub Spot (dollars per million Btu)	1.91	1.71	2.00	2.53	3.56	<i>2.73</i>	<i>2.89</i>	<i>2.96</i>	<i>3.13</i>	<i>3.06</i>	<i>3.08</i>	<i>3.17</i>	2.03	<i>3.04</i>	<i>3.11</i>
U.S. Retail Prices (dollars per thousand cubic feet)															
Industrial Sector	3.52	2.85	2.88	3.77	4.82	<i>3.81</i>	<i>3.95</i>	<i>4.28</i>	<i>4.54</i>	<i>4.11</i>	<i>4.04</i>	<i>4.39</i>	3.29	<i>4.23</i>	<i>4.29</i>
Commercial Sector	7.13	7.63	8.49	7.53	7.60	<i>8.45</i>	<i>8.89</i>	<i>7.91</i>	<i>7.70</i>	<i>8.17</i>	<i>8.63</i>	<i>7.75</i>	7.48	<i>7.98</i>	<i>7.89</i>
Residential Sector	9.46	11.89	17.65	10.60	9.81	<i>13.10</i>	<i>17.36</i>	<i>10.61</i>	<i>9.67</i>	<i>12.65</i>	<i>17.42</i>	<i>10.71</i>	10.83	<i>11.04</i>	<i>11.00</i>
U.S. Electricity															
Power Generation Fuel Costs (dollars per million Btu)															
Coal	1.93	1.91	1.93	1.91	1.92	<i>1.95</i>	<i>1.93</i>	<i>1.90</i>	<i>1.92</i>	<i>1.93</i>	<i>1.92</i>	<i>1.89</i>	1.92	<i>1.92</i>	<i>1.92</i>
Natural Gas	2.39	2.08	2.26	2.87	4.01	<i>2.93</i>	<i>3.09</i>	<i>3.31</i>	<i>3.69</i>	<i>3.31</i>	<i>3.29</i>	<i>3.53</i>	2.39	<i>3.31</i>	<i>3.44</i>
Residual Fuel Oil (c)	12.15	6.65	8.85	8.90	10.04	<i>12.47</i>	<i>11.90</i>	<i>11.22</i>	<i>11.52</i>	<i>12.05</i>	<i>11.29</i>	<i>11.21</i>	9.15	<i>11.36</i>	<i>11.50</i>
Distillate Fuel Oil	13.27	8.39	10.37	10.54	13.34	<i>14.86</i>	<i>14.72</i>	<i>14.47</i>	<i>14.65</i>	<i>14.32</i>	<i>14.41</i>	<i>14.66</i>	10.73	<i>14.33</i>	<i>14.52</i>
Retail Prices (cents per kilowatt-hour)															
Industrial Sector	6.38	6.63	7.08	6.53	6.64	<i>6.72</i>	<i>7.09</i>	<i>6.56</i>	<i>6.48</i>	<i>6.74</i>	<i>7.12</i>	<i>6.56</i>	6.66	<i>6.76</i>	<i>6.73</i>
Commercial Sector	10.33	10.63	10.97	10.62	10.43	<i>10.88</i>	<i>11.34</i>	<i>10.91</i>	<i>10.60</i>	<i>10.98</i>	<i>11.36</i>	<i>10.96</i>	10.65	<i>10.91</i>	<i>10.99</i>
Residential Sector	12.90	13.24	13.35	13.25	12.83	<i>13.46</i>	<i>13.73</i>	<i>13.66</i>	<i>13.26</i>	<i>13.74</i>	<i>13.85</i>	<i>13.73</i>	13.20	<i>13.43</i>	<i>13.65</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 April 1, 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 - April 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	33.02	29.52	30.05	30.86	30.37	<i>30.64</i>	<i>31.49</i>	<i>31.94</i>	<i>32.19</i>	<i>32.51</i>	<i>32.79</i>	<i>33.32</i>	30.86	<i>31.12</i>	<i>32.71</i>
U.S. (50 States)	20.22	17.58	18.30	18.31	17.71	<i>18.56</i>	<i>18.94</i>	<i>19.23</i>	<i>19.47</i>	<i>19.93</i>	<i>20.30</i>	<i>20.57</i>	18.60	<i>18.61</i>	<i>20.07</i>
Canada	5.65	4.92	4.95	5.64	5.75	<i>5.27</i>	<i>5.76</i>	<i>5.79</i>	<i>5.83</i>	<i>5.80</i>	<i>5.83</i>	<i>5.85</i>	5.29	<i>5.65</i>	<i>5.83</i>
Mexico	2.00	1.94	1.91	1.90	1.93	<i>1.92</i>	<i>1.87</i>	<i>1.82</i>	<i>1.78</i>	<i>1.73</i>	<i>1.69</i>	<i>1.71</i>	1.94	<i>1.89</i>	<i>1.73</i>
Other OECD	5.15	5.08	4.89	5.01	4.98	<i>4.88</i>	<i>4.92</i>	<i>5.10</i>	<i>5.11</i>	<i>5.04</i>	<i>4.96</i>	<i>5.19</i>	5.03	<i>4.97</i>	<i>5.08</i>
Non-OECD	67.75	62.96	60.90	61.95	62.82	<i>64.74</i>	<i>67.12</i>	<i>67.50</i>	<i>67.02</i>	<i>68.59</i>	<i>69.06</i>	<i>68.96</i>	63.38	<i>65.56</i>	<i>68.42</i>
OPEC	33.48	30.58	28.45	29.82	30.18	<i>30.91</i>	<i>32.84</i>	<i>33.36</i>	<i>33.42</i>	<i>33.28</i>	<i>33.32</i>	<i>33.35</i>	30.57	<i>31.83</i>	<i>33.34</i>
Crude Oil Portion	28.28	25.64	23.61	24.87	25.08	<i>25.81</i>	<i>27.63</i>	<i>28.11</i>	<i>28.03</i>	<i>28.03</i>	<i>28.03</i>	<i>28.03</i>	25.59	<i>26.67</i>	<i>28.03</i>
Other Liquids (b)	5.20	4.94	4.84	4.95	5.10	<i>5.10</i>	<i>5.20</i>	<i>5.25</i>	<i>5.38</i>	<i>5.25</i>	<i>5.29</i>	<i>5.32</i>	4.98	<i>5.16</i>	<i>5.31</i>
Eurasia	14.73	13.17	12.71	13.13	13.38	<i>13.61</i>	<i>13.69</i>	<i>13.86</i>	<i>14.04</i>	<i>14.79</i>	<i>14.84</i>	<i>14.99</i>	13.43	<i>13.63</i>	<i>14.67</i>
China	4.96	4.91	4.95	4.90	5.00	<i>4.96</i>	<i>4.96</i>	<i>5.01</i>	<i>4.96</i>	<i>4.99</i>	<i>4.99</i>	<i>5.03</i>	4.93	<i>4.98</i>	<i>4.99</i>
Other Non-OECD	14.58	14.30	14.80	14.11	14.27	<i>15.26</i>	<i>15.64</i>	<i>15.28</i>	<i>14.60</i>	<i>15.54</i>	<i>15.91</i>	<i>15.59</i>	14.44	<i>15.12</i>	<i>15.41</i>
Total World Supply	100.78	92.48	90.96	92.81	93.19	<i>95.38</i>	<i>98.62</i>	<i>99.45</i>	<i>99.21</i>	<i>101.10</i>	<i>101.84</i>	<i>102.29</i>	94.24	<i>96.68</i>	<i>101.12</i>
Non-OPEC Supply	67.29	61.90	62.51	62.99	63.02	<i>64.47</i>	<i>65.78</i>	<i>66.09</i>	<i>65.80</i>	<i>67.82</i>	<i>68.53</i>	<i>68.93</i>	63.67	<i>64.85</i>	<i>67.78</i>
Consumption (million barrels per day) (c)															
OECD	45.27	37.43	42.11	42.83	43.16	<i>43.53</i>	<i>44.98</i>	<i>45.63</i>	<i>45.47</i>	<i>45.23</i>	<i>46.20</i>	<i>46.33</i>	41.91	<i>44.33</i>	<i>45.81</i>
U.S. (50 States)	19.33	16.08	18.36	18.71	18.51	<i>19.32</i>	<i>19.84</i>	<i>20.07</i>	<i>19.92</i>	<i>20.37</i>	<i>20.72</i>	<i>20.66</i>	18.12	<i>19.44</i>	<i>20.42</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	2.03	2.19	<i>2.19</i>	<i>2.29</i>	<i>2.29</i>	<i>2.28</i>	<i>2.24</i>	<i>2.34</i>	<i>2.32</i>	2.10	<i>2.24</i>	<i>2.30</i>
Europe	13.34	11.03	12.85	12.55	12.58	<i>12.86</i>	<i>13.50</i>	<i>13.36</i>	<i>13.16</i>	<i>13.34</i>	<i>13.74</i>	<i>13.44</i>	12.44	<i>13.08</i>	<i>13.42</i>
Japan	3.69	2.89	3.03	3.50	3.55	<i>2.94</i>	<i>3.06</i>	<i>3.41</i>	<i>3.63</i>	<i>2.97</i>	<i>3.05</i>	<i>3.37</i>	3.27	<i>3.24</i>	<i>3.25</i>
Other OECD	6.41	5.41	5.55	5.88	6.13	<i>6.04</i>	<i>6.10</i>	<i>6.31</i>	<i>6.28</i>	<i>6.13</i>	<i>6.17</i>	<i>6.34</i>	5.81	<i>6.14</i>	<i>6.23</i>
Non-OECD	50.03	47.35	51.11	52.49	52.10	<i>53.31</i>	<i>53.73</i>	<i>54.16</i>	<i>54.43</i>	<i>55.71</i>	<i>55.86</i>	<i>56.01</i>	50.25	<i>53.34</i>	<i>55.51</i>
Eurasia	4.86	4.48	5.28	5.17	4.92	<i>5.01</i>	<i>5.40</i>	<i>5.26</i>	<i>5.09</i>	<i>5.16</i>	<i>5.57</i>	<i>5.43</i>	4.95	<i>5.15</i>	<i>5.31</i>
Europe	0.71	0.69	0.71	0.72	0.72	<i>0.72</i>	<i>0.74</i>	<i>0.74</i>	<i>0.74</i>	<i>0.74</i>	<i>0.75</i>	<i>0.76</i>	0.71	<i>0.73</i>	<i>0.75</i>
China	13.79	13.98	14.55	15.01	14.95	<i>15.33</i>	<i>15.07</i>	<i>15.40</i>	<i>15.71</i>	<i>15.97</i>	<i>15.68</i>	<i>15.95</i>	14.33	<i>15.19</i>	<i>15.83</i>
Other Asia	13.16	11.64	12.60	13.61	13.89	<i>14.14</i>	<i>13.76</i>	<i>14.20</i>	<i>14.73</i>	<i>14.93</i>	<i>14.52</i>	<i>14.94</i>	12.75	<i>14.00</i>	<i>14.78</i>
Other Non-OECD	17.53	16.55	17.98	17.99	17.61	<i>18.11</i>	<i>18.77</i>	<i>18.56</i>	<i>18.16</i>	<i>18.90</i>	<i>19.35</i>	<i>18.94</i>	17.51	<i>18.27</i>	<i>18.84</i>
Total World Consumption	95.30	84.78	93.21	95.32	95.26	<i>96.84</i>	<i>98.71</i>	<i>99.79</i>	<i>99.90</i>	<i>100.93</i>	<i>102.06</i>	<i>102.34</i>	92.17	<i>97.67</i>	<i>101.32</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	0.57	<i>-0.11</i>	<i>-0.01</i>	<i>0.49</i>	<i>0.03</i>	<i>-0.53</i>	<i>0.05</i>	<i>0.43</i>	-0.18	<i>0.23</i>	<i>0.00</i>
Other OECD	-0.51	-1.16	0.06	0.67	0.48	<i>0.49</i>	<i>0.03</i>	<i>-0.05</i>	<i>0.21</i>	<i>0.11</i>	<i>0.05</i>	<i>-0.12</i>	-0.23	<i>0.24</i>	<i>0.06</i>
Other Stock Draws and Balance	-4.55	-4.85	1.72	0.95	1.01	<i>1.08</i>	<i>0.07</i>	<i>-0.10</i>	<i>0.44</i>	<i>0.25</i>	<i>0.12</i>	<i>-0.26</i>	-1.67	<i>0.51</i>	<i>0.13</i>
Total Stock Draw	-5.48	-7.70	2.26	2.51	2.07	<i>1.46</i>	<i>0.09</i>	<i>0.34</i>	<i>0.69</i>	<i>-0.17</i>	<i>0.22</i>	<i>0.05</i>	-2.08	<i>0.98</i>	<i>0.20</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	1,293	<i>1,316</i>	<i>1,323</i>	<i>1,282</i>	<i>1,283</i>	<i>1,335</i>	<i>1,333</i>	<i>1,304</i>	1,344	<i>1,282</i>	<i>1,304</i>
OECD Commercial Inventory	2,964	3,202	3,166	3,026	2,932	<i>2,909</i>	<i>2,913</i>	<i>2,877</i>	<i>2,859</i>	<i>2,901</i>	<i>2,894</i>	<i>2,876</i>	3,026	<i>2,877</i>	<i>2,876</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 April 1, 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 - April 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	25.17	25.85	25.39	<i>25.76</i>	<i>26.57</i>	<i>26.84</i>	<i>27.08</i>	<i>27.47</i>	<i>27.82</i>	<i>28.13</i>	25.83	<i>26.15</i>	<i>27.63</i>
Canada	5.65	4.92	4.95	5.64	5.75	<i>5.27</i>	<i>5.76</i>	<i>5.79</i>	<i>5.83</i>	<i>5.80</i>	<i>5.83</i>	<i>5.85</i>	5.29	<i>5.65</i>	<i>5.83</i>
Mexico	2.00	1.94	1.91	1.90	1.93	<i>1.92</i>	<i>1.87</i>	<i>1.82</i>	<i>1.78</i>	<i>1.73</i>	<i>1.69</i>	<i>1.71</i>	1.94	<i>1.89</i>	<i>1.73</i>
United States	20.22	17.58	18.30	18.31	17.71	<i>18.56</i>	<i>18.94</i>	<i>19.23</i>	<i>19.47</i>	<i>19.93</i>	<i>20.30</i>	<i>20.57</i>	18.60	<i>18.61</i>	<i>20.07</i>
Central and South America	6.05	6.08	6.61	5.90	5.83	<i>6.82</i>	<i>7.14</i>	<i>6.81</i>	<i>6.11</i>	<i>7.08</i>	<i>7.49</i>	<i>7.19</i>	6.16	<i>6.65</i>	<i>6.97</i>
Argentina	0.69	0.58	0.57	0.54	0.65	<i>0.71</i>	<i>0.70</i>	<i>0.69</i>	<i>0.74</i>	<i>0.76</i>	<i>0.75</i>	<i>0.73</i>	0.60	<i>0.69</i>	<i>0.75</i>
Brazil	3.43	3.89	4.29	3.52	3.31	<i>4.33</i>	<i>4.67</i>	<i>4.29</i>	<i>3.50</i>	<i>4.54</i>	<i>4.90</i>	<i>4.46</i>	3.78	<i>4.16</i>	<i>4.35</i>
Colombia	0.91	0.79	0.78	0.84	0.88	<i>0.78</i>	<i>0.75</i>	<i>0.81</i>	<i>0.84</i>	<i>0.75</i>	<i>0.72</i>	<i>0.78</i>	0.83	<i>0.80</i>	<i>0.77</i>
Ecuador	0.54	0.36	0.52	0.52	0.52	<i>0.53</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	0.47	0.46	0.46	0.49	0.47	<i>0.48</i>	<i>0.49</i>	<i>0.50</i>	<i>0.49</i>	<i>0.50</i>	<i>0.59</i>	<i>0.69</i>	0.47	<i>0.49</i>	<i>0.57</i>
Europe	4.51	4.43	4.23	4.37	4.42	<i>4.30</i>	<i>4.33</i>	<i>4.51</i>	<i>4.53</i>	<i>4.46</i>	<i>4.39</i>	<i>4.63</i>	4.38	<i>4.39</i>	<i>4.50</i>
Norway	2.05	2.00	1.96	2.02	2.15	<i>2.11</i>	<i>2.15</i>	<i>2.26</i>	<i>2.27</i>	<i>2.22</i>	<i>2.24</i>	<i>2.36</i>	2.01	<i>2.17</i>	<i>2.28</i>
United Kingdom	1.19	1.18	1.00	1.08	1.08	<i>1.00</i>	<i>1.00</i>	<i>1.05</i>	<i>1.06</i>	<i>1.04</i>	<i>0.94</i>	<i>1.04</i>	1.11	<i>1.03</i>	<i>1.02</i>
Eurasia	14.73	13.17	12.71	13.13	13.38	<i>13.61</i>	<i>13.69</i>	<i>13.86</i>	<i>14.04</i>	<i>14.79</i>	<i>14.84</i>	<i>14.99</i>	13.43	<i>13.63</i>	<i>14.67</i>
Azerbaijan	0.77	0.70	0.67	0.69	0.75	<i>0.73</i>	<i>0.73</i>	<i>0.77</i>	<i>0.79</i>	<i>0.80</i>	<i>0.78</i>	<i>0.81</i>	0.71	<i>0.75</i>	<i>0.80</i>
Kazakhstan	2.06	1.86	1.71	1.81	1.86	<i>1.87</i>	<i>1.85</i>	<i>1.90</i>	<i>1.92</i>	<i>2.00</i>	<i>1.96</i>	<i>2.02</i>	1.86	<i>1.87</i>	<i>1.98</i>
Russia	11.54	10.24	9.97	10.26	10.41	<i>10.65</i>	<i>10.74</i>	<i>10.82</i>	<i>10.99</i>	<i>11.64</i>	<i>11.75</i>	<i>11.82</i>	10.50	<i>10.66</i>	<i>11.55</i>
Turkmenistan	0.23	0.23	0.23	0.23	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>	0.23	<i>0.24</i>	<i>0.23</i>
Other Eurasia	0.14	0.14	0.14	0.14	0.12	<i>0.12</i>	<i>0.12</i>	<i>0.12</i>	<i>0.12</i>	<i>0.12</i>	<i>0.12</i>	<i>0.11</i>	0.14	<i>0.12</i>	<i>0.12</i>
Middle East	3.24	3.18	3.15	3.18	3.23	<i>3.23</i>	<i>3.32</i>	<i>3.32</i>	<i>3.37</i>	<i>3.37</i>	<i>3.37</i>	<i>3.37</i>	3.19	<i>3.28</i>	<i>3.37</i>
Oman	1.01	0.95	0.92	0.95	0.96	<i>0.95</i>	<i>1.04</i>	<i>1.04</i>	<i>1.05</i>	<i>1.05</i>	<i>1.05</i>	<i>1.05</i>	0.96	<i>1.00</i>	<i>1.05</i>
Qatar	2.06	2.06	2.06	2.06	2.10	<i>2.10</i>	<i>2.10</i>	<i>2.10</i>	<i>2.12</i>	<i>2.12</i>	<i>2.12</i>	<i>2.12</i>	2.06	<i>2.10</i>	<i>2.12</i>
Asia and Oceania	9.44	9.15	9.22	9.18	9.34	<i>9.31</i>	<i>9.30</i>	<i>9.31</i>	<i>9.28</i>	<i>9.28</i>	<i>9.25</i>	<i>9.26</i>	9.25	<i>9.32</i>	<i>9.27</i>
Australia	0.49	0.50	0.50	0.49	0.49	<i>0.51</i>	<i>0.51</i>	<i>0.50</i>	<i>0.49</i>	<i>0.49</i>	<i>0.48</i>	<i>0.47</i>	0.49	<i>0.50</i>	<i>0.48</i>
China	4.96	4.91	4.95	4.90	5.00	<i>4.96</i>	<i>4.96</i>	<i>5.01</i>	<i>4.96</i>	<i>4.99</i>	<i>4.99</i>	<i>5.03</i>	4.93	<i>4.98</i>	<i>4.99</i>
India	0.96	0.90	0.92	0.92	0.91	<i>0.90</i>	<i>0.90</i>	<i>0.89</i>	<i>0.89</i>	<i>0.89</i>	<i>0.89</i>	<i>0.88</i>	0.92	<i>0.90</i>	<i>0.89</i>
Indonesia	0.91	0.89	0.88	0.89	0.86	<i>0.85</i>	<i>0.85</i>	<i>0.83</i>	<i>0.84</i>	<i>0.83</i>	<i>0.82</i>	<i>0.81</i>	0.89	<i>0.85</i>	<i>0.83</i>
Malaysia	0.71	0.60	0.63	0.64	0.65	<i>0.65</i>	<i>0.64</i>	<i>0.63</i>	<i>0.64</i>	<i>0.63</i>	<i>0.63</i>	<i>0.62</i>	0.65	<i>0.64</i>	<i>0.63</i>
Vietnam	0.25	0.24	0.23	0.23	0.23	<i>0.23</i>	<i>0.23</i>	<i>0.22</i>	<i>0.22</i>	<i>0.22</i>	<i>0.21</i>	<i>0.21</i>	0.23	<i>0.23</i>	<i>0.21</i>
Africa	1.46	1.44	1.42	1.39	1.42	<i>1.44</i>	<i>1.43</i>	<i>1.43</i>	<i>1.37</i>	<i>1.37</i>	<i>1.37</i>	<i>1.37</i>	1.43	<i>1.43</i>	<i>1.37</i>
Egypt	0.62	0.61	0.59	0.57	0.60	<i>0.61</i>	<i>0.61</i>	<i>0.61</i>	<i>0.57</i>	<i>0.57</i>	<i>0.57</i>	<i>0.57</i>	0.60	<i>0.61</i>	<i>0.57</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	67.29	61.90	62.51	62.99	63.02	<i>64.47</i>	<i>65.78</i>	<i>66.09</i>	<i>65.80</i>	<i>67.82</i>	<i>68.53</i>	<i>68.93</i>	63.67	<i>64.85</i>	<i>67.78</i>
OPEC non-crude liquids	5.20	4.94	4.84	4.95	5.10	<i>5.10</i>	<i>5.20</i>	<i>5.25</i>	<i>5.38</i>	<i>5.25</i>	<i>5.29</i>	<i>5.32</i>	4.98	<i>5.16</i>	<i>5.31</i>
Non-OPEC + OPEC non-crude	72.49	66.84	67.35	67.94	68.11	<i>69.57</i>	<i>70.99</i>	<i>71.34</i>	<i>71.18</i>	<i>73.08</i>	<i>73.81</i>	<i>74.26</i>	68.65	<i>70.01</i>	<i>73.09</i>
Unplanned non-OPEC Production Outages	0.18	0.90	0.69	0.53	0.47	-	-	-	-	-	-	-	0.57	-	-

- = 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 April 1, 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 - April 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	1.36	1.26	1.17	1.12	1.09	-	-	-	-	-	-	-	1.23	-	-
Congo (Brazzaville)	0.29	0.29	0.28	0.26	0.27	-	-	-	-	-	-	-	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	1.19	-	-	-	-	-	-	-	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	0.53	-	-	-	-	-	-	-	0.50	-	-
OPEC Total	28.28	25.64	23.61	24.87	25.08	<i>25.81</i>	<i>27.63</i>	<i>28.11</i>	<i>28.03</i>	<i>28.03</i>	<i>28.03</i>	<i>28.03</i>	25.59	<i>26.67</i>	<i>28.03</i>
Other Liquids (a)	5.20	4.94	4.84	4.95	5.10	<i>5.10</i>	<i>5.20</i>	<i>5.25</i>	<i>5.38</i>	<i>5.25</i>	<i>5.29</i>	<i>5.32</i>	4.98	<i>5.16</i>	<i>5.31</i>
Total OPEC Supply	33.48	30.58	28.45	29.82	30.18	<i>30.91</i>	<i>32.84</i>	<i>33.36</i>	<i>33.42</i>	<i>33.28</i>	<i>33.32</i>	<i>33.35</i>	30.57	<i>31.83</i>	<i>33.34</i>
Crude Oil Production Capacity															
Middle East	25.61	26.02	26.06	26.22	26.55	<i>26.69</i>	<i>26.68</i>	<i>26.68</i>	<i>26.68</i>	<i>26.69</i>	<i>26.69</i>	<i>26.69</i>	25.98	<i>26.65</i>	<i>26.69</i>
Other	5.84	5.60	5.48	6.33	6.74	<i>6.56</i>	<i>6.53</i>	<i>6.20</i>	<i>6.11</i>	<i>6.11</i>	<i>6.11</i>	<i>6.11</i>	5.82	<i>6.51</i>	<i>6.11</i>
OPEC Total	31.45	31.63	31.54	32.56	33.29	<i>33.25</i>	<i>33.21</i>	<i>32.88</i>	<i>32.80</i>	<i>32.79</i>	<i>32.80</i>	<i>32.81</i>	31.79	<i>33.15</i>	<i>32.80</i>
Surplus Crude Oil Production Capacity															
Middle East	3.15	5.27	6.90	6.62	7.00	<i>6.66</i>	<i>5.03</i>	<i>4.68</i>	<i>4.68</i>	<i>4.69</i>	<i>4.69</i>	<i>4.69</i>	5.49	<i>5.83</i>	<i>4.69</i>
Other	0.02	0.72	1.04	1.07	1.21	<i>0.78</i>	<i>0.55</i>	<i>0.09</i>	<i>0.08</i>	<i>0.08</i>	<i>0.08</i>	<i>0.08</i>	0.71	<i>0.65</i>	<i>0.08</i>
OPEC Total	3.17	5.99	7.94	7.68	8.21	<i>7.44</i>	<i>5.58</i>	<i>4.77</i>	<i>4.76</i>	<i>4.77</i>	<i>4.77</i>	<i>4.78</i>	6.20	<i>6.49</i>	<i>4.77</i>
Unplanned OPEC Production Outages	3.72	4.18	4.35	3.45	2.70	-	-	-	-	-	-	-	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 April 1, 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 - April 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	22.43	22.54	<i>23.40</i>	<i>24.01</i>	<i>24.25</i>	<i>24.03</i>	<i>24.45</i>	<i>24.90</i>	<i>24.84</i>	21.91	<i>23.56</i>	<i>24.56</i>
Canada	2.33	1.88	2.16	2.03	2.19	<i>2.19</i>	<i>2.29</i>	<i>2.29</i>	<i>2.28</i>	<i>2.24</i>	<i>2.34</i>	<i>2.32</i>	2.10	<i>2.24</i>	<i>2.30</i>
Mexico	1.97	1.48	1.59	1.68	1.83	<i>1.88</i>	<i>1.87</i>	<i>1.89</i>	<i>1.82</i>	<i>1.84</i>	<i>1.83</i>	<i>1.84</i>	1.68	<i>1.87</i>	<i>1.83</i>
United States	19.33	16.08	18.36	18.71	18.51	<i>19.32</i>	<i>19.84</i>	<i>20.07</i>	<i>19.92</i>	<i>20.37</i>	<i>20.72</i>	<i>20.66</i>	18.12	<i>19.44</i>	<i>20.42</i>
Central and South America	6.14	5.61	6.04	6.33	6.14	<i>6.37</i>	<i>6.51</i>	<i>6.53</i>	<i>6.37</i>	<i>6.54</i>	<i>6.68</i>	<i>6.69</i>	6.03	<i>6.39</i>	<i>6.57</i>
Brazil	2.89	2.67	2.97	3.06	2.92	<i>3.07</i>	<i>3.17</i>	<i>3.17</i>	<i>3.04</i>	<i>3.13</i>	<i>3.23</i>	<i>3.24</i>	2.90	<i>3.08</i>	<i>3.16</i>
Europe	14.04	11.73	13.57	13.27	13.30	<i>13.58</i>	<i>14.23</i>	<i>14.10</i>	<i>13.90</i>	<i>14.08</i>	<i>14.49</i>	<i>14.19</i>	13.15	<i>13.81</i>	<i>14.17</i>
Eurasia	4.86	4.48	5.28	5.17	4.92	<i>5.01</i>	<i>5.40</i>	<i>5.26</i>	<i>5.09</i>	<i>5.16</i>	<i>5.57</i>	<i>5.43</i>	4.95	<i>5.15</i>	<i>5.31</i>
Russia	3.65	3.33	4.04	3.92	3.71	<i>3.82</i>	<i>4.15</i>	<i>4.00</i>	<i>3.85</i>	<i>3.95</i>	<i>4.29</i>	<i>4.14</i>	3.74	<i>3.92</i>	<i>4.06</i>
Middle East	7.91	7.43	8.44	8.06	7.84	<i>8.07</i>	<i>8.69</i>	<i>8.25</i>	<i>8.00</i>	<i>8.57</i>	<i>8.96</i>	<i>8.33</i>	7.96	<i>8.22</i>	<i>8.47</i>
Asia and Oceania	34.54	32.04	33.70	35.77	36.22	<i>36.08</i>	<i>35.61</i>	<i>36.95</i>	<i>38.04</i>	<i>37.67</i>	<i>37.08</i>	<i>38.27</i>	34.01	<i>36.21</i>	<i>37.76</i>
China	13.79	13.98	14.55	15.01	14.95	<i>15.33</i>	<i>15.07</i>	<i>15.40</i>	<i>15.71</i>	<i>15.97</i>	<i>15.68</i>	<i>15.95</i>	14.33	<i>15.19</i>	<i>15.83</i>
Japan	3.69	2.89	3.03	3.50	3.55	<i>2.94</i>	<i>3.06</i>	<i>3.41</i>	<i>3.63</i>	<i>2.97</i>	<i>3.05</i>	<i>3.37</i>	3.27	<i>3.24</i>	<i>3.25</i>
India	4.63	3.77	4.17	4.93	5.04	<i>5.05</i>	<i>4.70</i>	<i>4.97</i>	<i>5.28</i>	<i>5.35</i>	<i>5.00</i>	<i>5.33</i>	4.37	<i>4.94</i>	<i>5.24</i>
Africa	4.18	4.05	4.07	4.29	4.30	<i>4.33</i>	<i>4.25</i>	<i>4.45</i>	<i>4.46</i>	<i>4.47</i>	<i>4.39</i>	<i>4.58</i>	4.15	<i>4.33</i>	<i>4.47</i>
Total OECD Liquid Fuels Consumption	45.27	37.43	42.11	42.83	43.16	<i>43.53</i>	<i>44.98</i>	<i>45.63</i>	<i>45.47</i>	<i>45.23</i>	<i>46.20</i>	<i>46.33</i>	41.91	<i>44.33</i>	<i>45.81</i>
Total non-OECD Liquid Fuels Consumption	50.03	47.35	51.11	52.49	52.10	<i>53.31</i>	<i>53.73</i>	<i>54.16</i>	<i>54.43</i>	<i>55.71</i>	<i>55.86</i>	<i>56.01</i>	50.25	<i>53.34</i>	<i>55.51</i>
Total World Liquid Fuels Consumption	95.30	84.78	93.21	95.32	95.26	<i>96.84</i>	<i>98.71</i>	<i>99.79</i>	<i>99.90</i>	<i>100.93</i>	<i>102.06</i>	<i>102.34</i>	92.17	<i>97.67</i>	<i>101.32</i>
Real Gross Domestic Product (a)															
World Index, 2015 Q1 = 100	110.2	107.5	112.2	113.3	115.8	<i>117.1</i>	<i>118.4</i>	<i>119.3</i>	<i>122.0</i>	<i>122.6</i>	<i>123.2</i>	<i>123.7</i>	110.8	<i>117.6</i>	<i>122.9</i>
Percent change from prior year	-3.4	-6.2	-2.5	-1.9	5.1	<i>9.0</i>	<i>5.5</i>	<i>5.3</i>	<i>5.4</i>	<i>4.7</i>	<i>4.1</i>	<i>3.7</i>	-3.5	<i>6.2</i>	<i>4.5</i>
OECD Index, 2015 = 100	103.7	109.0	112.8	115.8	118.4	<i>122.0</i>	<i>123.2</i>	<i>123.7</i>	<i>123.7</i>	<i>123.7</i>	<i>123.7</i>	<i>123.7</i>	103.7	<i>109.0</i>	<i>112.8</i>
Percent change from prior year	-4.7	5.1	3.6	3.6	3.6	<i>3.6</i>	<i>3.6</i>	<i>3.6</i>	<i>3.6</i>	<i>3.6</i>	<i>3.6</i>	<i>3.6</i>	-4.7	<i>5.1</i>	<i>3.6</i>
Non-OECD Index, 2015 = 100	115.8	123.7	130.0	130.0	130.0	<i>130.0</i>	<i>130.0</i>	<i>130.0</i>	<i>130.0</i>	<i>130.0</i>	<i>130.0</i>	<i>130.0</i>	115.8	<i>123.7</i>	<i>130.0</i>
Percent change from prior year	-2.3	6.9	5.1	5.1	5.1	<i>5.1</i>	<i>5.1</i>	<i>5.1</i>	<i>5.1</i>	<i>5.1</i>	<i>5.1</i>	<i>5.1</i>	-2.3	<i>6.9</i>	<i>5.1</i>
Real U.S. Dollar Exchange Rate (b)															
Index, 2015 Q1 = 100	106.4	108.3	106.8	105.5	104.3	<i>104.6</i>	<i>104.3</i>	<i>104.1</i>	<i>103.8</i>	<i>103.7</i>	<i>103.5</i>	<i>103.3</i>	106.7	<i>104.3</i>	<i>103.6</i>
Percent change from prior year	0.9	2.0	0.3	-0.7	-2.0	<i>-3.3</i>	<i>-2.3</i>	<i>-1.3</i>	<i>-0.4</i>	<i>-0.9</i>	<i>-0.8</i>	<i>-0.8</i>	0.6	<i>-2.3</i>	<i>-0.7</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. GDP data are from Oxford Economics.

(b) Weighted geometric mean of real indices for various countries with weights equal to each country's share of world oil consumption in the base period. Exchange rate is measured in foreign currency per U.S. dollar. Exchange rate data are from Oxford Economics, and oil consumption data are from 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 April 1, 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 - April 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	10.75	<i>10.93</i>	<i>11.13</i>	<i>11.35</i>	<i>11.54</i>	<i>11.74</i>	<i>11.99</i>	<i>12.18</i>	11.31	<i>11.04</i>	<i>11.86</i>
Alaska	0.48	0.41	0.44	0.46	0.46	<i>0.38</i>	<i>0.41</i>	<i>0.43</i>	<i>0.43</i>	<i>0.36</i>	<i>0.40</i>	<i>0.40</i>	0.45	<i>0.42</i>	<i>0.40</i>
Federal Gulf of Mexico (b)	1.96	1.69	1.45	1.52	1.72	<i>1.76</i>	<i>1.68</i>	<i>1.68</i>	<i>1.74</i>	<i>1.76</i>	<i>1.74</i>	<i>1.77</i>	1.66	<i>1.71</i>	<i>1.75</i>
Lower 48 States (excl GOM)	10.31	8.71	8.92	8.91	8.57	<i>8.79</i>	<i>9.05</i>	<i>9.24</i>	<i>9.37</i>	<i>9.63</i>	<i>9.86</i>	<i>10.01</i>	9.21	<i>8.91</i>	<i>9.72</i>
Crude Oil Net Imports (c)	2.90	3.08	2.31	2.51	2.72	<i>3.62</i>	<i>4.00</i>	<i>3.59</i>	<i>3.58</i>	<i>4.48</i>	<i>4.47</i>	<i>3.75</i>	2.70	<i>3.49</i>	<i>4.07</i>
SPR Net Withdrawals	0.00	-0.23	0.15	0.04	0.01	<i>0.13</i>	<i>0.06</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	-0.19	<i>0.18</i>	<i>0.27</i>	<i>0.02</i>	<i>-0.24</i>	<i>0.01</i>	<i>0.28</i>	<i>-0.01</i>	-0.14	<i>0.07</i>	<i>0.01</i>
Crude Oil Adjustment (d)	0.67	0.03	0.38	0.31	0.50	<i>0.22</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>0.28</i>	<i>0.21</i>
Total Crude Oil Input to Refineries	15.77	13.16	14.03	13.90	13.79	<i>15.08</i>	<i>15.68</i>	<i>15.17</i>	<i>15.15</i>	<i>16.49</i>	<i>16.99</i>	<i>16.20</i>	14.21	<i>14.94</i>	<i>16.21</i>
Other Supply															
Refinery Processing Gain	1.02	0.82	0.94	0.92	0.94	<i>1.07</i>	<i>1.06</i>	<i>1.04</i>	<i>1.06</i>	<i>1.09</i>	<i>1.13</i>	<i>1.14</i>	0.92	<i>1.03</i>	<i>1.10</i>
Natural Gas Plant Liquids Production	5.12	4.96	5.33	5.23	4.80	<i>5.29</i>	<i>5.44</i>	<i>5.53</i>	<i>5.60</i>	<i>5.79</i>	<i>5.86</i>	<i>5.91</i>	5.16	<i>5.27</i>	<i>5.79</i>
Renewables and Oxygenate Production (e)	1.11	0.80	1.03	1.07	1.01	<i>1.06</i>	<i>1.09</i>	<i>1.09</i>	<i>1.07</i>	<i>1.10</i>	<i>1.10</i>	<i>1.11</i>	1.01	<i>1.06</i>	<i>1.10</i>
Fuel Ethanol Production	1.02	0.70	0.92	0.97	0.91	<i>0.95</i>	<i>0.99</i>	<i>0.98</i>	<i>0.97</i>	<i>0.99</i>	<i>0.99</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	0.20	<i>0.21</i>	<i>0.21</i>	<i>0.21</i>	<i>0.20</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	-2.99	<i>-2.96</i>	<i>-3.31</i>	<i>-3.40</i>	<i>-3.39</i>	<i>-3.73</i>	<i>-4.33</i>	<i>-4.25</i>	-3.35	<i>-3.17</i>	<i>-3.93</i>
Hydrocarbon Gas Liquids	-1.99	-1.86	-1.86	-2.03	-1.99	<i>-2.18</i>	<i>-2.19</i>	<i>-2.15</i>	<i>-2.16</i>	<i>-2.34</i>	<i>-2.33</i>	<i>-2.28</i>	-1.94	<i>-2.13</i>	<i>-2.28</i>
Unfinished Oils	0.31	0.25	0.34	0.19	0.24	<i>0.43</i>	<i>0.43</i>	<i>0.30</i>	<i>0.21</i>	<i>0.26</i>	<i>0.30</i>	<i>0.20</i>	0.27	<i>0.35</i>	<i>0.24</i>
Other HC/Oxygenates	-0.10	-0.05	-0.04	-0.04	-0.11	<i>-0.08</i>	<i>-0.07</i>	<i>-0.08</i>	<i>-0.09</i>	<i>-0.07</i>	<i>-0.07</i>	<i>-0.08</i>	-0.06	<i>-0.08</i>	<i>-0.07</i>
Motor Gasoline Blend Comp.	0.39	0.36	0.48	0.43	0.44	<i>0.71</i>	<i>0.52</i>	<i>0.15</i>	<i>0.52</i>	<i>0.75</i>	<i>0.44</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	-0.61	<i>-0.76</i>	<i>-0.69</i>	<i>-0.57</i>	<i>-0.76</i>	<i>-0.69</i>	<i>-0.81</i>	<i>-0.77</i>	-0.62	<i>-0.66</i>	<i>-0.76</i>
Jet Fuel	-0.07	0.09	0.12	0.07	0.03	<i>0.05</i>	<i>0.03</i>	<i>0.05</i>	<i>-0.05</i>	<i>0.00</i>	<i>0.10</i>	<i>0.16</i>	0.05	<i>0.04</i>	<i>0.05</i>
Distillate Fuel Oil	-1.19	-0.86	-1.15	-0.74	-0.43	<i>-0.62</i>	<i>-0.78</i>	<i>-0.52</i>	<i>-0.53</i>	<i>-0.95</i>	<i>-1.25</i>	<i>-1.10</i>	-0.98	<i>-0.59</i>	<i>-0.96</i>
Residual Fuel Oil	-0.02	0.02	0.05	0.05	0.09	<i>-0.02</i>	<i>0.00</i>	<i>0.05</i>	<i>-0.03</i>	<i>-0.07</i>	<i>-0.06</i>	<i>0.05</i>	0.02	<i>0.03</i>	<i>-0.03</i>
Other Oils (g)	-0.65	-0.49	-0.49	-0.48	-0.66	<i>-0.49</i>	<i>-0.55</i>	<i>-0.63</i>	<i>-0.50</i>	<i>-0.62</i>	<i>-0.65</i>	<i>-0.64</i>	-0.52	<i>-0.58</i>	<i>-0.60</i>
Product Inventory Net Withdrawals	0.12	-0.91	-0.04	0.71	0.76	<i>-0.43</i>	<i>-0.34</i>	<i>0.42</i>	<i>0.22</i>	<i>-0.59</i>	<i>-0.26</i>	<i>0.33</i>	-0.03	<i>0.10</i>	<i>-0.07</i>
Total Supply	19.33	16.08	18.36	18.71	18.51	<i>19.32</i>	<i>19.84</i>	<i>20.07</i>	<i>19.92</i>	<i>20.37</i>	<i>20.72</i>	<i>20.66</i>	18.12	<i>19.44</i>	<i>20.42</i>
Consumption (million barrels per day)															
Hydrocarbon Gas Liquids	3.31	2.83	2.95	3.70	3.34	<i>3.09</i>	<i>3.10</i>	<i>3.58</i>	<i>3.77</i>	<i>3.30</i>	<i>3.37</i>	<i>3.78</i>	3.20	<i>3.28</i>	<i>3.55</i>
Unfinished Oils	0.14	0.11	0.01	0.03	-0.03	<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	8.08	<i>8.75</i>	<i>8.94</i>	<i>8.78</i>	<i>8.47</i>	<i>9.11</i>	<i>9.12</i>	<i>8.84</i>	8.03	<i>8.64</i>	<i>8.89</i>
Fuel Ethanol blended into Motor Gasoline	0.85	0.72	0.87	0.84	0.83	<i>0.88</i>	<i>0.91</i>	<i>0.90</i>	<i>0.86</i>	<i>0.93</i>	<i>0.92</i>	<i>0.92</i>	0.82	<i>0.88</i>	<i>0.91</i>
Jet Fuel	1.56	0.69	0.97	1.09	1.13	<i>1.33</i>	<i>1.47</i>	<i>1.49</i>	<i>1.47</i>	<i>1.61</i>	<i>1.76</i>	<i>1.77</i>	1.08	<i>1.36</i>	<i>1.65</i>
Distillate Fuel Oil	3.97	3.51	3.70	3.92	4.04	<i>4.01</i>	<i>3.99</i>	<i>4.18</i>	<i>4.24</i>	<i>4.16</i>	<i>4.09</i>	<i>4.17</i>	3.78	<i>4.05</i>	<i>4.17</i>
Residual Fuel Oil	0.17	0.15	0.32	0.23	0.26	<i>0.23</i>	<i>0.28</i>	<i>0.25</i>	<i>0.23</i>	<i>0.21</i>	<i>0.25</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	1.69	<i>1.92</i>	<i>2.06</i>	<i>1.80</i>	<i>1.74</i>	<i>1.98</i>	<i>2.13</i>	<i>1.85</i>	1.75	<i>1.87</i>	<i>1.92</i>
Total Consumption	19.33	16.08	18.36	18.71	18.51	<i>19.32</i>	<i>19.84</i>	<i>20.07</i>	<i>19.92</i>	<i>20.37</i>	<i>20.72</i>	<i>20.66</i>	18.12	<i>19.44</i>	<i>20.42</i>
Total Petroleum and Other Liquids Net Imports	-1.13	0.14	-0.81	-0.81	-0.27	<i>0.66</i>	<i>0.69</i>	<i>0.19</i>	<i>0.19</i>	<i>0.75</i>	<i>0.14</i>	<i>-0.49</i>	-0.65	<i>0.32</i>	<i>0.14</i>
End-of-period Inventories (million barrels)															
Commercial Inventory															
Crude Oil (excluding SPR)	482.5	531.9	497.3	485.3	502.8	<i>486.1</i>	<i>461.4</i>	<i>459.3</i>	<i>480.6</i>	<i>479.3</i>	<i>453.5</i>	<i>454.4</i>	485.3	<i>459.3</i>	<i>454.4</i>
Hydrocarbon Gas Liquids	180.8	233.9	299.1	229.2	171.9	<i>211.2</i>	<i>251.7</i>	<i>209.4</i>	<i>172.7</i>	<i>221.6</i>	<i>259.9</i>	<i>218.8</i>	229.2	<i>209.4</i>	<i>218.8</i>
Unfinished Oils	100.1	91.9	81.4	78.2	93.3	<i>91.2</i>	<i>90.2</i>	<i>83.1</i>	<i>93.5</i>	<i>91.2</i>	<i>90.1</i>	<i>83.2</i>	78.2	<i>83.1</i>	<i>83.2</i>
Other HC/Oxygenates	33.6	26.2	25.2	29.9	27.3	<i>26.1</i>	<i>25.9</i>	<i>26.2</i>	<i>28.3</i>	<i>27.1</i>	<i>26.8</i>	<i>27.0</i>	29.9	<i>26.2</i>	<i>27.0</i>
Total Motor Gasoline	260.8	253.3	226.5	243.2	228.2	<i>231.2</i>	<i>226.2</i>	<i>234.2</i>	<i>240.7</i>	<i>244.3</i>	<i>232.8</i>	<i>249.3</i>	243.2	<i>234.2</i>	<i>249.3</i>
Finished Motor Gasoline	22.6	23.5	22.4	25.3	19.7	<i>23.2</i>	<i>22.2</i>	<i>24.4</i>	<i>24.0</i>	<i>23.7</i>	<i>23.0</i>	<i>26.1</i>	25.3	<i>24.4</i>	<i>26.1</i>
Motor Gasoline Blend Comp.	238.3	229.8	204.1	217.9	208.6	<i>208.0</i>	<i>204.0</i>	<i>209.8</i>	<i>216.7</i>	<i>220.6</i>	<i>209.8</i>	<i>223.1</i>	217.9	<i>209.8</i>	<i>223.1</i>
Jet Fuel	39.9	41.5	40.1	38.6	39.0	<i>40.1</i>	<i>42.4</i>	<i>39.5</i>	<i>39.1</i>	<i>40.0</i>	<i>42.4</i>	<i>39.3</i>	38.6	<i>39.5</i>	<i>39.3</i>
Distillate Fuel Oil	126.7	175.4	171.7	160.4	143.0	<i>141.5</i>	<i>144.0</i>	<i>146.2</i>	<i>135.4</i>	<i>140.4</i>	<i>147.3</i>	<i>148.2</i>	160.4	<i>146.2</i>	<i>148.2</i>
Residual Fuel Oil	34.4	39.6	32.1	30.2	32.4	<i>33.6</i>	<i>31.6</i>	<i>32.7</i>	<i>32.2</i>	<i>32.9</i>	<i>31.1</i>	<i>32.6</i>	30.2	<i>32.7</i>	<i>32.6</i>
Other Oils (g)	62.0	59.2	48.6	49.3	55.5	<i>54.6</i>	<i>49.2</i>	<i>51.6</i>	<i>60.8</i>	<i>58.6</i>	<i>49.4</i>	<i>50.9</i>	49.3	<i>51.6</i>	<i>50.9</i>
Total Commercial Inventory	1320.8	1452.8	1422.0	1344.3	1293.4	<i>1315.7</i>	<i>1322.6</i>	<i>1282.1</i>	<i>1283.3</i>	<i>1335.4</i>	<i>1333.3</i>	<i>1303.8</i>	1344.3	<i>1282.1</i>	<i>1303.8</i>
Crude Oil in SPR	635.0	656.0	642.2	638.1	637.5	<i>625.5</i>	<i>619.9</i>	<i>615.6</i>	<i>611.3</i>	<i>607.1</i>	<i>604.4</i>	<i>594.7</i>	638.1	<i>615.6</i>	<i>594.7</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, kerosene, petrochemical feedstocks, special naphthas, lubricants, waxes, petroleum coke, asphalt and road oil, still gas, and miscellaneous products; for consumption "Other Oils" also includes renewable fuels except fuel ethanol.

- = no data available

SPR: Strategic Petroleum Reserve

HC: Hydrocarbons

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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; 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 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 - April 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	1.82	2.17	2.23	2.33	2.50	2.55	2.56	2.64	2.01	2.14	2.56
Propane	1.72	1.61	1.68	1.70	1.63	1.67	1.69	1.71	1.67	1.72	1.74	1.75	1.68	1.67	1.72
Butanes	0.91	0.86	0.90	0.89	0.84	0.88	0.91	0.91	0.88	0.92	0.93	0.93	0.89	0.88	0.92
Natural Gasoline (Pentanes Plus)	0.56	0.57	0.62	0.58	0.52	0.58	0.61	0.58	0.55	0.60	0.62	0.59	0.58	0.57	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	0.24	0.31	0.31	0.30	0.30	0.32	0.32	0.31	0.26	0.29	0.31
Propylene (refinery-grade)	0.25	0.26	0.26	0.29	0.27	0.29	0.28	0.28	0.28	0.28	0.28	0.28	0.26	0.28	0.28
Butanes/Butylenes	-0.08	0.18	0.13	-0.19	-0.08	0.27	0.20	-0.19	-0.08	0.26	0.19	-0.19	0.01	0.05	0.05
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	-0.36	-0.37	-0.40	-0.44	-0.45	-0.45	-0.46	-0.28	-0.37	-0.45
Propane/Propylene	-1.12	-1.08	-1.08	-1.29	-1.04	-1.10	-1.08	-1.07	-1.04	-1.18	-1.15	-1.16	-1.14	-1.07	-1.13
Butanes/Butylenes	-0.30	-0.31	-0.36	-0.33	-0.33	-0.38	-0.40	-0.35	-0.35	-0.40	-0.40	-0.35	-0.32	-0.37	-0.38
Natural Gasoline (Pentanes Plus)	-0.27	-0.19	-0.16	-0.14	-0.27	-0.34	-0.33	-0.33	-0.33	-0.31	-0.33	-0.31	-0.19	-0.32	-0.32
HGL Refinery and Blender Net Inputs															
Butanes/Butylenes	0.46	0.25	0.32	0.47	0.39	0.27	0.31	0.49	0.39	0.28	0.32	0.50	0.37	0.36	0.37
Natural Gasoline (Pentanes Plus)	0.15	0.10	0.15	0.13	0.14	0.16	0.17	0.16	0.17	0.18	0.19	0.18	0.13	0.16	0.18
HGL Consumption															
Ethane/Ethylene	1.70	1.65	1.66	1.81	1.52	1.86	1.84	1.95	2.07	2.08	2.13	2.17	1.70	1.79	2.11
Propane	1.09	0.59	0.58	0.99	1.18	0.64	0.68	1.05	1.16	0.62	0.66	1.01	0.81	0.89	0.86
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	0.19	0.22	0.20	0.20	0.18	0.23	0.20	0.20	0.20	0.20	0.20
Natural Gasoline (Pentanes Plus)	0.09	0.13	0.26	0.35	0.16	0.07	0.09	0.09	0.06	0.07	0.09	0.09	0.21	0.10	0.08
HGL Inventories (million barrels)															
Ethane	52.6	49.5	62.5	74.9	64.3	61.7	60.6	63.4	59.9	63.4	62.0	64.1	59.9	62.5	62.3
Propane	60.3	75.3	100.7	70.4	37.8	56.9	77.8	67.2	44.1	64.6	85.3	73.4	70.4	67.2	73.4
Propylene (at refineries only)	1.4	1.5	1.5	1.5	1.3	1.7	2.0	1.9	1.7	1.9	2.1	2.0	1.5	1.9	2.0
Butanes/Butylenes	43.6	69.3	86.0	54.7	41.1	65.6	83.7	54.9	45.0	69.4	87.2	58.1	54.7	54.9	58.1
Natural Gasoline (Pentanes Plus)	24.0	35.7	38.6	32.9	26.7	26.2	25.6	24.2	21.4	22.3	22.9	22.0	32.9	24.2	22.0
Refinery and Blender Net Inputs															
Crude Oil	15.77	13.16	14.03	13.90	13.79	15.08	15.68	15.17	15.15	16.49	16.99	16.20	14.21	14.94	16.21
Hydrocarbon Gas Liquids	0.61	0.35	0.47	0.60	0.53	0.44	0.48	0.65	0.55	0.47	0.51	0.69	0.51	0.52	0.55
Other Hydrocarbons/Oxygenates	1.12	0.95	1.11	1.08	1.06	1.14	1.17	1.15	1.13	1.19	1.19	1.17	1.06	1.13	1.17
Unfinished Oils	0.05	0.23	0.44	0.20	0.10	0.45	0.44	0.37	0.09	0.28	0.31	0.27	0.23	0.34	0.24
Motor Gasoline Blend Components	0.41	0.48	0.85	0.46	0.69	0.86	0.67	0.26	0.56	0.81	0.65	0.30	0.55	0.62	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	16.17	17.97	18.44	17.60	17.49	19.24	19.65	18.63	16.57	17.55	18.76
Refinery Processing Gain	1.02	0.82	0.94	0.92	0.94	1.07	1.06	1.04	1.06	1.09	1.13	1.14	0.92	1.03	1.10
Refinery and Blender Net Production															
Hydrocarbon Gas Liquids	0.47	0.69	0.67	0.36	0.44	0.86	0.79	0.40	0.50	0.87	0.80	0.40	0.55	0.62	0.64
Finished Motor Gasoline	9.30	7.52	9.14	8.98	8.74	9.68	9.71	9.53	9.31	9.86	9.98	9.82	8.74	9.42	9.74
Jet Fuel	1.63	0.62	0.83	1.00	1.10	1.29	1.47	1.41	1.52	1.62	1.69	1.58	1.02	1.32	1.60
Distillate Fuel	4.95	4.83	4.72	4.46	4.24	4.55	4.72	4.65	4.63	5.11	5.35	5.23	4.74	4.54	5.08
Residual Fuel	0.23	0.18	0.19	0.15	0.19	0.26	0.26	0.20	0.25	0.29	0.29	0.23	0.19	0.23	0.27
Other Oils (a)	2.41	2.14	2.28	2.19	2.39	2.40	2.55	2.45	2.34	2.57	2.68	2.51	2.26	2.45	2.53
Total Refinery and Blender Net Production	18.99	15.99	17.84	17.15	17.11	19.04	19.50	18.65	18.55	20.33	20.79	19.76	17.49	18.58	19.86
Refinery Distillation Inputs	16.36	13.65	14.55	14.32	14.14	15.48	16.08	15.57	15.50	16.70	17.21	16.46	14.72	15.32	16.47
Refinery Operable Distillation Capacity	18.98	18.75	18.55	18.39	18.14	18.14	18.14	18.14	18.14	18.14	18.14	18.14	18.66	18.14	18.14
Refinery Distillation Utilization Factor	0.86	0.73	0.78	0.78	0.78	0.85	0.89	0.86	0.85	0.92	0.95	0.91	0.79	0.84	0.91

(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 April 1, 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 - April 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	182	204	191	173	174	182	186	176	133	188	179
Gasoline Regular Grade Retail Prices Including Taxes															
PADD 1	236	191	211	212	252	277	267	247	242	251	258	249	214	261	250
PADD 2	226	179	207	202	246	276	256	236	227	250	251	239	204	254	242
PADD 3	210	162	186	183	229	253	241	222	221	230	233	224	187	236	227
PADD 4	247	201	233	221	246	285	277	257	250	268	273	260	226	267	263
PADD 5	311	258	283	278	312	344	334	319	324	337	330	339	284	328	333
U.S. Average	241	194	218	215	256	285	272	252	249	263	265	258	218	266	259
Gasoline All Grades Including Taxes	251	203	227	224	265	296	284	266	262	276	278	272	227	278	272
End-of-period Inventories (million barrels)															
Total Gasoline Inventories															
PADD 1	71.0	73.0	61.6	68.5	59.7	61.0	58.1	59.6	64.8	67.3	62.6	68.7	68.5	59.6	68.7
PADD 2	60.2	52.6	46.2	50.9	49.4	52.8	50.6	50.2	53.3	52.5	50.9	51.2	50.9	50.2	51.2
PADD 3	84.8	90.5	79.7	83.7	79.5	79.9	80.5	85.3	84.8	87.2	82.2	89.4	83.7	85.3	89.4
PADD 4	9.2	7.7	7.6	8.7	8.5	8.0	7.5	8.0	7.9	7.9	7.7	8.2	8.7	8.0	8.2
PADD 5	35.6	29.4	31.5	31.4	31.1	29.5	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	228.2	231.2	226.2	234.2	240.7	244.3	232.8	249.3	243.2	234.2	249.3
Finished Gasoline Inventories															
U.S. Total	22.6	23.5	22.4	25.3	19.7	23.2	22.2	24.4	24.0	23.7	23.0	26.1	25.3	24.4	26.1
Gasoline Blending Components Inventories															
U.S. Total	238.3	229.8	204.1	217.9	208.6	208.0	204.0	209.8	216.7	220.6	209.8	223.1	217.9	209.8	223.1

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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 - April 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	98.73	98.18	<i>98.32</i>	<i>99.12</i>	<i>99.95</i>	<i>99.87</i>	<i>100.43</i>	<i>101.53</i>	<i>102.21</i>	98.84	<i>98.90</i>	<i>101.02</i>
Alaska	0.96	0.88	0.88	0.98	1.00	<i>0.75</i>	<i>0.73</i>	<i>0.88</i>	<i>0.92</i>	<i>0.75</i>	<i>0.72</i>	<i>0.85</i>	0.92	<i>0.84</i>	<i>0.81</i>
Federal GOM (a)	2.72	2.22	1.72	1.73	2.20	<i>2.22</i>	<i>2.08</i>	<i>2.03</i>	<i>2.07</i>	<i>2.02</i>	<i>1.94</i>	<i>1.93</i>	2.09	<i>2.13</i>	<i>1.99</i>
Lower 48 States (excl GOM)	98.58	93.74	94.95	96.02	94.99	<i>95.34</i>	<i>96.31</i>	<i>97.04</i>	<i>96.89</i>	<i>97.65</i>	<i>98.87</i>	<i>99.43</i>	95.82	<i>95.93</i>	<i>98.22</i>
Total Dry Gas Production	94.79	89.68	89.83	91.18	90.82	<i>90.90</i>	<i>91.59</i>	<i>92.31</i>	<i>92.23</i>	<i>92.75</i>	<i>93.76</i>	<i>94.39</i>	91.36	<i>91.41</i>	<i>93.29</i>
LNG Gross Imports	0.24	0.12	0.09	0.09	0.23	<i>0.18</i>	<i>0.18</i>	<i>0.20</i>	<i>0.32</i>	<i>0.18</i>	<i>0.18</i>	<i>0.20</i>	0.13	<i>0.20</i>	<i>0.22</i>
LNG Gross Exports	7.92	5.51	3.91	8.78	9.33	<i>7.59</i>	<i>7.66</i>	<i>9.26</i>	<i>9.96</i>	<i>8.83</i>	<i>8.33</i>	<i>9.78</i>	6.53	<i>8.46</i>	<i>9.22</i>
Pipeline Gross Imports	7.60	6.08	6.39	7.27	8.35	<i>6.48</i>	<i>6.68</i>	<i>6.82</i>	<i>7.38</i>	<i>6.36</i>	<i>6.36</i>	<i>6.69</i>	6.84	<i>7.08</i>	<i>6.69</i>
Pipeline Gross Exports	8.15	7.17	8.09	8.18	9.09	<i>8.21</i>	<i>9.19</i>	<i>9.44</i>	<i>9.30</i>	<i>8.64</i>	<i>9.37</i>	<i>9.38</i>	7.90	<i>8.98</i>	<i>9.17</i>
Supplemental Gaseous Fuels	0.19	0.17	0.15	0.18	0.17	<i>0.17</i>	<i>0.17</i>	<i>0.17</i>	<i>0.17</i>	<i>0.18</i>	<i>0.18</i>	<i>0.18</i>	0.17	<i>0.17</i>	<i>0.18</i>
Net Inventory Withdrawals	12.74	-12.24	-7.68	5.36	17.21	<i>-10.31</i>	<i>-8.31</i>	<i>5.60</i>	<i>18.28</i>	<i>-11.71</i>	<i>-9.37</i>	<i>4.30</i>	-0.46	<i>0.99</i>	<i>0.31</i>
Total Supply	99.49	71.13	76.78	87.12	98.37	<i>71.63</i>	<i>73.46</i>	<i>86.41</i>	<i>99.13</i>	<i>70.28</i>	<i>73.41</i>	<i>86.60</i>	83.62	<i>82.41</i>	<i>82.30</i>
Balancing Item (b)	-0.18	-0.29	0.05	-1.04	1.16	<i>0.15</i>	<i>0.14</i>	<i>0.65</i>	<i>-0.17</i>	<i>-0.19</i>	<i>0.02</i>	<i>-0.58</i>	-0.37	<i>0.52</i>	<i>-0.23</i>
Total Primary Supply	99.31	70.84	76.83	86.08	99.53	<i>71.78</i>	<i>73.61</i>	<i>87.05</i>	<i>98.96</i>	<i>70.09</i>	<i>73.43</i>	<i>86.03</i>	83.26	<i>82.93</i>	<i>82.07</i>
Consumption (billion cubic feet per day)															
Residential	22.83	8.20	3.82	16.00	25.40	<i>7.41</i>	<i>3.59</i>	<i>16.72</i>	<i>24.17</i>	<i>8.08</i>	<i>3.59</i>	<i>16.40</i>	12.70	<i>13.23</i>	<i>13.01</i>
Commercial	13.93	5.82	4.36	10.31	14.76	<i>6.48</i>	<i>4.71</i>	<i>10.87</i>	<i>14.92</i>	<i>6.23</i>	<i>4.64</i>	<i>10.80</i>	8.60	<i>9.18</i>	<i>9.12</i>
Industrial	24.65	20.62	21.15	23.83	24.52	<i>23.14</i>	<i>22.62</i>	<i>25.37</i>	<i>25.98</i>	<i>23.26</i>	<i>22.56</i>	<i>24.99</i>	22.56	<i>23.91</i>	<i>24.19</i>
Electric Power (c)	29.55	29.05	40.10	28.19	26.71	<i>27.32</i>	<i>35.17</i>	<i>26.07</i>	<i>25.54</i>	<i>24.77</i>	<i>34.88</i>	<i>25.60</i>	31.74	<i>28.83</i>	<i>27.72</i>
Lease and Plant Fuel	5.17	4.90	4.93	4.99	4.96	<i>4.97</i>	<i>5.01</i>	<i>5.05</i>	<i>5.05</i>	<i>5.08</i>	<i>5.13</i>	<i>5.17</i>	5.00	<i>5.00</i>	<i>5.11</i>
Pipeline and Distribution Use	3.02	2.15	2.33	2.61	3.03	<i>2.32</i>	<i>2.36</i>	<i>2.83</i>	<i>3.13</i>	<i>2.51</i>	<i>2.47</i>	<i>2.91</i>	2.53	<i>2.63</i>	<i>2.75</i>
Vehicle Use	0.16	0.10	0.13	0.13	0.14	<i>0.15</i>	<i>0.15</i>	<i>0.15</i>	<i>0.16</i>	<i>0.16</i>	<i>0.16</i>	<i>0.16</i>	0.13	<i>0.15</i>	<i>0.16</i>
Total Consumption	99.31	70.84	76.83	86.08	99.53	<i>71.78</i>	<i>73.61</i>	<i>87.05</i>	<i>98.96</i>	<i>70.09</i>	<i>73.43</i>	<i>86.03</i>	83.26	<i>82.93</i>	<i>82.07</i>
End-of-period Inventories (billion cubic feet)															
Working Gas Inventory	2,030	3,133	3,840	3,341	1,792	<i>2,730</i>	<i>3,495</i>	<i>2,980</i>	<i>1,334</i>	<i>2,400</i>	<i>3,262</i>	<i>2,866</i>	3,341	<i>2,980</i>	<i>2,866</i>
East Region (d)	385	655	890	763	303	<i>559</i>	<i>821</i>	<i>608</i>	<i>102</i>	<i>403</i>	<i>673</i>	<i>490</i>	763	<i>608</i>	<i>490</i>
Midwest Region (d)	472	747	1,053	918	396	<i>638</i>	<i>992</i>	<i>835</i>	<i>224</i>	<i>518</i>	<i>892</i>	<i>771</i>	918	<i>835</i>	<i>771</i>
South Central Region (d)	857	1,221	1,313	1,155	762	<i>1,062</i>	<i>1,134</i>	<i>1,071</i>	<i>675</i>	<i>978</i>	<i>1,089</i>	<i>1,044</i>	1,155	<i>1,071</i>	<i>1,044</i>
Mountain Region (d)	92	177	235	195	111	<i>159</i>	<i>203</i>	<i>167</i>	<i>113</i>	<i>162</i>	<i>227</i>	<i>207</i>	195	<i>167</i>	<i>207</i>
Pacific Region (d)	200	308	318	282	198	<i>291</i>	<i>323</i>	<i>276</i>	<i>199</i>	<i>316</i>	<i>360</i>	<i>333</i>	282	<i>276</i>	<i>333</i>
Alaska	23	25	31	28	22	<i>22</i>	<i>22</i>	<i>22</i>	<i>22</i>	<i>22</i>	<i>22</i>	<i>22</i>	28	<i>22</i>	<i>22</i>

(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 April 1, 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 - April 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	2.84	3.01	3.08	3.25	3.18	3.20	3.29	2.11	3.15	3.23
Residential Retail															
New England	13.77	14.50	18.28	14.64	14.79	15.13	17.49	13.38	12.98	13.92	16.93	13.11	14.47	14.58	13.42
Middle Atlantic	10.77	11.85	17.85	11.77	10.41	12.54	16.85	10.90	10.01	12.39	17.18	11.35	11.76	11.25	11.22
E. N. Central	6.99	9.50	18.15	8.02	7.60	11.10	16.68	8.41	7.73	10.70	16.46	8.25	8.39	8.76	8.81
W. N. Central	6.85	9.89	17.26	8.66	7.49	11.16	17.12	9.18	7.95	10.83	17.01	9.11	8.48	8.89	9.18
S. Atlantic	12.12	15.52	24.15	14.20	11.53	16.78	22.64	12.54	11.15	16.35	22.60	12.62	14.23	13.30	13.12
E. S. Central	9.69	13.34	20.85	10.63	9.81	15.58	22.17	13.47	10.55	15.05	22.23	13.53	11.15	11.86	12.67
W. S. Central	8.52	14.22	20.83	11.67	9.39	15.01	20.64	11.84	8.99	14.46	20.51	11.72	11.40	11.85	11.55
Mountain	7.55	9.37	12.60	8.15	7.77	9.92	13.62	8.42	7.96	9.79	13.69	8.61	8.43	8.68	8.88
Pacific	13.41	14.47	14.50	13.70	14.55	14.77	15.03	13.75	13.85	14.57	15.37	14.32	13.82	14.40	14.30
U.S. Average	9.46	11.89	17.65	10.60	9.81	13.10	17.36	10.61	9.67	12.65	17.42	10.71	10.83	11.04	11.00
Commercial Retail															
New England	9.93	10.40	10.99	10.06	10.15	10.41	10.68	10.09	10.43	10.55	10.33	10.16	10.16	10.22	10.35
Middle Atlantic	7.91	7.00	6.78	7.53	7.93	7.65	6.98	7.43	7.81	7.64	7.22	7.74	7.50	7.61	7.68
E. N. Central	5.75	6.73	8.79	6.21	6.22	7.97	9.36	7.12	6.85	7.66	8.73	6.59	6.28	6.98	7.02
W. N. Central	5.43	6.53	8.12	6.55	6.67	7.76	8.92	7.23	7.07	7.61	8.91	7.08	6.14	7.15	7.28
S. Atlantic	8.51	9.21	9.55	8.88	8.72	9.78	9.98	8.89	8.46	9.26	9.56	8.56	8.87	9.09	8.75
E. S. Central	8.38	9.20	10.10	8.69	8.77	9.87	10.36	9.08	8.40	9.41	10.02	8.93	8.78	9.19	8.88
W. S. Central	5.99	7.18	8.13	7.46	7.24	8.05	8.69	7.98	7.11	7.62	8.13	7.43	6.92	7.77	7.44
Mountain	6.09	6.85	7.42	6.45	6.47	7.04	8.05	7.04	6.85	7.26	8.16	7.05	6.46	6.90	7.12
Pacific	9.58	9.30	9.59	9.70	10.61	10.17	10.18	9.41	9.26	9.10	9.59	9.24	9.57	10.08	9.27
U.S. Average	7.13	7.63	8.49	7.53	7.60	8.45	8.89	7.91	7.70	8.17	8.63	7.75	7.48	7.98	7.89
Industrial Retail															
New England	8.15	7.41	6.16	7.67	8.58	7.72	6.75	7.69	8.14	7.62	6.73	7.75	7.54	7.82	7.68
Middle Atlantic	7.43	6.76	7.00	7.61	8.08	7.44	7.25	7.41	7.95	7.75	7.68	8.09	7.28	7.66	7.91
E. N. Central	4.84	5.10	4.15	5.10	5.79	5.81	5.70	5.58	5.88	5.74	5.68	5.66	4.86	5.72	5.77
W. N. Central	3.97	3.30	3.15	4.13	4.80	4.39	4.39	4.90	5.18	4.60	4.50	5.01	3.68	4.65	4.85
S. Atlantic	4.15	3.70	3.72	4.56	5.60	4.82	4.83	5.11	5.31	4.85	4.80	5.06	4.06	5.12	5.03
E. S. Central	3.92	3.24	3.23	4.04	5.21	4.46	4.45	4.85	5.03	4.60	4.42	4.77	3.65	4.77	4.73
W. S. Central	2.19	1.92	2.19	2.89	3.87	2.89	3.26	3.29	3.37	3.34	3.38	3.45	2.31	3.33	3.38
Mountain	4.40	4.59	4.67	4.91	5.06	5.36	5.83	5.80	5.77	5.53	5.70	5.54	4.64	5.48	5.64
Pacific	7.46	6.28	6.18	7.23	8.24	7.13	7.08	7.04	7.06	6.59	6.88	6.94	6.86	7.38	6.88
U.S. Average	3.52	2.85	2.88	3.77	4.82	3.81	3.95	4.28	4.54	4.11	4.04	4.39	3.29	4.23	4.29

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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 - April 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	139.1	<i>136.8</i>	<i>155.4</i>	<i>153.9</i>	<i>147.8</i>	<i>142.9</i>	<i>156.9</i>	<i>154.2</i>	539.1	<i>585.3</i>	<i>601.7</i>
Appalachia	39.7	29.3	33.9	35.5	34.9	<i>36.1</i>	<i>35.1</i>	<i>36.4</i>	<i>38.2</i>	<i>39.5</i>	<i>38.3</i>	<i>40.0</i>	138.3	<i>142.6</i>	<i>155.9</i>
Interior	25.8	19.2	23.2	22.3	22.4	<i>25.9</i>	<i>29.4</i>	<i>28.9</i>	<i>28.4</i>	<i>27.0</i>	<i>28.1</i>	<i>27.6</i>	90.4	<i>106.6</i>	<i>111.0</i>
Western	83.6	66.7	78.8	81.2	81.7	<i>74.8</i>	<i>90.9</i>	<i>88.6</i>	<i>81.2</i>	<i>76.4</i>	<i>90.5</i>	<i>86.6</i>	310.3	<i>336.1</i>	<i>334.8</i>
Primary Inventory Withdrawals	0.5	1.3	2.0	-0.9	0.4	<i>2.1</i>	<i>2.6</i>	<i>-0.7</i>	<i>-0.7</i>	<i>-0.6</i>	<i>-0.4</i>	<i>-3.7</i>	2.8	<i>4.4</i>	<i>-5.4</i>
Imports	1.3	1.1	1.3	1.3	1.2	<i>1.1</i>	<i>1.3</i>	<i>1.3</i>	<i>1.0</i>	<i>1.0</i>	<i>1.3</i>	<i>1.3</i>	5.1	<i>4.9</i>	<i>4.6</i>
Exports	20.0	14.8	15.3	19.1	20.6	<i>16.8</i>	<i>18.1</i>	<i>22.9</i>	<i>26.1</i>	<i>19.3</i>	<i>19.7</i>	<i>24.0</i>	69.1	<i>78.5</i>	<i>89.1</i>
Metallurgical Coal	11.7	9.0	10.2	11.3	11.8	<i>10.7</i>	<i>12.5</i>	<i>13.6</i>	<i>15.4</i>	<i>11.7</i>	<i>12.9</i>	<i>13.6</i>	42.1	<i>48.5</i>	<i>53.7</i>
Steam Coal	8.3	5.8	5.1	7.8	8.8	<i>6.2</i>	<i>5.7</i>	<i>9.4</i>	<i>10.7</i>	<i>7.5</i>	<i>6.7</i>	<i>10.4</i>	27.0	<i>30.0</i>	<i>35.4</i>
Total Primary Supply	130.9	102.9	123.8	120.3	120.1	<i>123.1</i>	<i>141.2</i>	<i>131.5</i>	<i>122.1</i>	<i>124.0</i>	<i>138.1</i>	<i>127.8</i>	477.9	<i>516.0</i>	<i>511.9</i>
Secondary Inventory Withdrawals	-16.6	-5.0	21.5	-4.3	13.2	<i>-12.0</i>	<i>18.5</i>	<i>-2.0</i>	<i>17.2</i>	<i>-3.8</i>	<i>22.8</i>	<i>2.7</i>	-4.5	<i>17.8</i>	<i>38.9</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	118.3	135.4	<i>113.2</i>	<i>161.8</i>	<i>131.5</i>	<i>141.1</i>	<i>122.1</i>	<i>162.7</i>	<i>132.3</i>	481.1	<i>541.8</i>	<i>558.2</i>
Consumption (million short tons)															
Coke Plants	4.3	3.5	3.2	3.7	2.6	<i>3.2</i>	<i>3.9</i>	<i>5.6</i>	<i>3.5</i>	<i>3.3</i>	<i>3.8</i>	<i>5.4</i>	14.5	<i>15.3</i>	<i>16.0</i>
Electric Power Sector (b)	97.9	87.2	139.3	112.1	122.9	<i>102.9</i>	<i>150.9</i>	<i>118.6</i>	<i>130.3</i>	<i>111.7</i>	<i>151.9</i>	<i>119.8</i>	436.5	<i>495.3</i>	<i>513.7</i>
Retail and Other Industry	7.4	5.7	6.1	7.1	7.1	<i>7.0</i>	<i>7.0</i>	<i>7.3</i>	<i>7.3</i>	<i>7.1</i>	<i>6.9</i>	<i>7.1</i>	26.3	<i>28.4</i>	<i>28.4</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>0.2</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	6.9	6.9	<i>6.8</i>	<i>6.8</i>	<i>7.1</i>	<i>7.1</i>	<i>6.9</i>	<i>6.8</i>	<i>6.9</i>	25.5	<i>27.6</i>	<i>27.7</i>
Total Consumption	109.5	96.4	148.6	122.8	132.6	<i>113.2</i>	<i>161.8</i>	<i>131.5</i>	<i>141.1</i>	<i>122.1</i>	<i>162.7</i>	<i>132.3</i>	477.3	<i>539.0</i>	<i>558.2</i>
Discrepancy (c)	6.7	2.9	-1.3	-4.6	2.8	<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>	3.8	<i>2.8</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>26.0</i>	<i>23.4</i>	<i>24.1</i>	<i>24.8</i>	<i>25.4</i>	<i>25.8</i>	<i>29.5</i>	28.5	<i>24.1</i>	<i>29.5</i>
Secondary Inventories	150.6	155.6	134.2	138.5	125.2	<i>137.2</i>	<i>118.7</i>	<i>120.7</i>	<i>103.5</i>	<i>107.3</i>	<i>84.5</i>	<i>81.8</i>	138.5	<i>120.7</i>	<i>81.8</i>
Electric Power Sector	145.2	150.4	129.1	132.7	119.7	<i>131.4</i>	<i>112.8</i>	<i>115.0</i>	<i>97.9</i>	<i>101.5</i>	<i>78.6</i>	<i>76.1</i>	132.7	<i>115.0</i>	<i>76.1</i>
Retail and General Industry	3.0	3.0	2.9	3.5	3.8	<i>3.7</i>	<i>3.8</i>	<i>3.6</i>	<i>3.9</i>	<i>3.9</i>	<i>3.9</i>	<i>3.7</i>	3.5	<i>3.6</i>	<i>3.7</i>
Coke Plants	2.1	2.0	2.0	2.1	1.5	<i>1.9</i>	<i>2.0</i>	<i>1.9</i>	<i>1.5</i>	<i>1.8</i>	<i>1.9</i>	<i>1.9</i>	2.1	<i>1.9</i>	<i>1.9</i>
Commercial & Institutional	0.2	0.2	0.2	0.2	0.2	<i>0.2</i>	<i>0.2</i>	<i>0.1</i>	<i>0.1</i>	<i>0.1</i>	<i>0.1</i>	<i>0.1</i>	0.2	<i>0.1</i>	<i>0.1</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	0.245	<i>0.252</i>	<i>0.269</i>	<i>0.306</i>	<i>0.295</i>	<i>0.264</i>	<i>0.259</i>	<i>0.267</i>	0.216	<i>0.268</i>	<i>0.271</i>
Cost of Coal to Electric Utilities															
(Dollars per million Btu)	1.93	1.91	1.93	1.91	1.92	<i>1.95</i>	<i>1.93</i>	<i>1.90</i>	<i>1.92</i>	<i>1.93</i>	<i>1.92</i>	<i>1.89</i>	1.92	<i>1.92</i>	<i>1.92</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 April 1, 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 - April 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	978	971	1,140	970	990	983	1,155	981	4,009	4,059	4,110
Electric Power Sector (a)	925	896	1,109	923	939	932	1,101	932	951	944	1,113	941	3,853	3,904	3,949
Industrial Sector (b)	38	34	36	36	35	35	36	36	36	36	38	37	143	141	147
Commercial Sector (b)	3	3	4	3	3	3	4	3	3	3	4	3	13	13	14
Net Imports	10	11	15	11	12	13	15	11	12	12	14	11	47	51	50
Total Supply	976	944	1,163	973	990	983	1,155	981	1,002	996	1,170	992	4,056	4,109	4,160
Losses and Unaccounted for (c)	53	67	71	61	47	68	57	54	45	67	58	54	252	226	225
Electricity Consumption (billion kilowatthours unless noted)															
Retail Sales	887	844	1,057	876	908	881	1,063	892	922	894	1,075	900	3,664	3,745	3,792
Residential Sector	340	334	453	334	372	340	445	339	373	345	450	343	1,462	1,496	1,511
Commercial Sector	314	293	360	309	303	305	363	314	309	310	369	318	1,276	1,285	1,306
Industrial Sector	231	216	242	231	233	235	253	237	238	238	254	238	920	958	968
Transportation Sector	2	1	2	2	2	2	2	2	2	2	2	2	7	6	6
Direct Use (d)	36	33	35	36	34	34	35	36	35	35	37	37	140	138	143
Total Consumption	923	877	1,092	912	942	915	1,098	928	957	929	1,112	937	3,804	3,883	3,935
Average residential electricity usage per customer (kWh)	2,527	2,480	3,366	2,481	2,717	2,483	3,255	2,480	2,699	2,494	3,252	2,478	10,854	10,935	10,923
End-of-period Fuel Inventories Held by Electric Power Sector															
Coal (mmst)	145.2	150.4	129.1	132.7	119.7	131.4	112.8	115.0	97.9	101.5	78.6	76.1	132.7	115.0	76.1
Residual Fuel (mmb)	8.3	8.5	8.2	8.3	8.3	8.5	8.6	9.0	8.4	8.3	8.4	8.8	8.3	9.0	8.8
Distillate Fuel (mmb)	16.5	16.5	17.0	16.8	16.7	16.6	16.5	16.8	16.6	16.4	16.4	16.7	16.8	16.8	16.7
Prices															
Power Generation Fuel Costs (dollars per million Btu)															
Coal	1.93	1.91	1.93	1.91	1.92	1.95	1.93	1.90	1.92	1.93	1.92	1.89	1.92	1.92	1.92
Natural Gas	2.39	2.08	2.26	2.87	4.01	2.93	3.09	3.31	3.69	3.31	3.29	3.53	2.39	3.31	3.44
Residual Fuel Oil	12.15	6.65	8.85	8.90	10.04	12.47	11.90	11.22	11.52	12.05	11.29	11.21	9.15	11.36	11.50
Distillate Fuel Oil	13.27	8.39	10.37	10.54	13.34	14.86	14.72	14.47	14.65	14.32	14.41	14.66	10.73	14.33	14.52
Retail Prices (cents per kilowatthour)															
Residential Sector	12.90	13.24	13.35	13.25	12.83	13.46	13.73	13.66	13.26	13.74	13.85	13.73	13.20	13.43	13.65
Commercial Sector	10.33	10.63	10.97	10.62	10.43	10.88	11.34	10.91	10.60	10.98	11.36	10.96	10.65	10.91	10.99
Industrial Sector	6.38	6.63	7.08	6.53	6.64	6.72	7.09	6.56	6.48	6.74	7.12	6.56	6.66	6.76	6.73
Wholesale Electricity Prices (dollars per megawatthour)															
ERCOT North hub	23.41	24.03	34.12	26.41	616.34	25.91	30.08	27.97	28.02	27.17	29.43	26.72	26.99	175.07	27.83
CAISO SP15 zone	28.64	19.21	61.94	42.80	44.74	35.01	40.32	35.95	36.15	33.09	45.51	35.68	38.15	39.00	37.61
ISO-NE Internal hub	24.61	20.25	27.20	34.03	55.26	28.53	31.77	38.33	46.99	29.11	31.12	33.66	26.52	38.47	35.22
NYISO Hudson Valley zone	21.82	18.13	24.38	27.05	44.74	25.86	31.04	32.14	35.18	30.05	32.55	29.96	22.85	33.44	31.94
PJM Western hub	22.47	20.79	28.24	26.44	35.09	28.01	32.35	28.86	31.80	29.66	33.12	29.56	24.49	31.08	31.03
Midcontinent ISO Illinois hub	24.43	23.00	29.35	24.94	44.97	28.25	30.90	28.53	30.24	30.06	32.38	29.43	25.43	33.16	30.53
SPP ISO South hub	20.06	19.54	26.27	24.34	250.31	24.65	29.94	26.30	26.73	27.19	32.55	27.32	22.55	82.80	28.45
SERC index, Into Southern	23.58	18.23	23.47	25.21	41.10	26.68	29.38	27.71	28.16	28.07	30.17	27.76	22.62	31.22	28.54
FRCC index, Florida Reliability	26.24	18.53	23.75	25.39	27.73	26.04	27.70	28.61	28.21	27.50	28.84	28.73	23.48	27.52	28.32
Northwest index, Mid-Columbia	22.77	14.49	33.56	31.00	34.56	25.18	26.46	27.55	26.61	23.01	30.46	27.20	25.46	28.44	26.82
Southwest index, Palo Verde	22.07	19.60	80.81	36.10	41.72	28.99	30.12	29.05	29.51	26.41	33.52	29.04	39.64	32.47	29.62

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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 - April 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	12.8	10.9	13.7	11.2	13.1	11.2	13.6	11.1	48.2	48.6	48.9
Middle Atlantic	32.2	30.6	43.5	30.9	35.7	30.3	40.5	31.4	36.1	30.8	40.5	31.4	137.1	137.9	138.7
E. N. Central	46.4	43.7	56.5	43.4	49.5	43.7	54.9	44.7	50.4	44.5	55.1	44.9	190.0	192.8	194.9
W. N. Central	27.6	23.7	30.0	24.5	29.1	24.2	30.7	25.9	31.8	26.5	32.6	27.0	105.8	109.9	117.9
S. Atlantic	84.3	86.3	114.7	85.3	93.9	88.0	113.1	85.4	93.5	89.4	113.8	86.3	370.6	380.4	382.9
E. S. Central	29.0	26.0	37.2	26.6	33.1	26.8	38.1	27.3	33.1	27.5	38.4	27.5	118.8	125.3	126.5
W. S. Central	48.8	52.9	76.4	48.5	55.5	55.2	77.5	50.3	53.2	54.8	78.7	51.3	226.5	238.5	237.9
Mountain	22.5	25.7	36.2	24.0	23.5	25.9	34.3	24.0	23.4	25.9	34.7	24.4	108.4	107.7	108.5
Pacific contiguous	36.7	33.2	43.0	38.6	37.3	33.4	41.3	37.7	37.7	33.5	41.4	37.8	151.5	149.6	150.4
AK and HI	1.3	1.1	1.2	1.3	1.2	1.1	1.2	1.3	1.2	1.1	1.2	1.3	4.9	4.9	4.9
Total	340.3	334.1	453.4	334.1	371.6	339.6	445.2	339.2	373.5	345.1	450.0	342.8	1,462.0	1,495.6	1,511.4
Commercial Sector															
New England	12.3	10.6	13.2	11.4	11.9	10.7	12.8	11.5	12.0	10.7	12.9	11.5	47.5	46.9	47.1
Middle Atlantic	35.9	31.0	38.9	33.2	34.2	33.6	38.8	34.2	35.5	34.6	39.8	35.0	138.9	140.8	144.9
E. N. Central	43.1	38.3	47.3	41.0	41.4	40.6	47.8	42.1	42.6	41.5	48.8	42.9	169.7	172.0	175.8
W. N. Central	24.7	21.6	26.3	23.4	23.9	22.0	26.8	23.8	24.6	22.6	27.6	24.4	96.0	96.5	99.2
S. Atlantic	72.0	70.0	85.7	72.4	70.4	73.4	87.1	73.4	72.2	74.8	88.4	74.4	300.2	304.4	309.8
E. S. Central	20.7	19.4	25.3	20.4	20.4	20.3	25.9	20.7	20.7	20.5	26.1	20.9	85.8	87.3	88.2
W. S. Central	44.3	44.6	55.0	45.4	42.8	45.9	56.5	47.0	43.4	46.5	57.5	47.8	189.4	192.2	195.1
Mountain	22.4	22.1	27.4	22.8	21.9	23.0	27.2	23.1	22.5	23.5	27.8	23.6	94.7	95.3	97.4
Pacific contiguous	37.0	33.9	39.8	37.6	34.3	33.9	39.0	36.7	34.1	33.7	38.7	36.3	148.3	143.9	142.9
AK and HI	1.4	1.2	1.3	1.3	1.3	1.4	1.5	1.5	1.4	1.4	1.4	1.4	5.2	5.6	5.6
Total	313.7	292.7	360.3	308.9	302.6	304.7	363.4	314.0	309.0	309.8	369.1	318.2	1,275.7	1,284.8	1,306.1
Industrial Sector															
New England	3.7	3.5	3.9	3.7	3.7	3.6	4.0	3.7	3.7	3.6	3.9	3.6	14.8	15.1	14.8
Middle Atlantic	18.0	16.2	18.6	17.6	18.1	17.7	19.2	17.9	18.4	17.8	19.4	18.0	70.4	72.9	73.6
E. N. Central	44.0	37.7	44.5	42.5	44.4	41.8	47.3	43.8	45.6	42.1	47.3	43.6	168.7	177.2	178.6
W. N. Central	21.7	20.3	23.2	22.1	22.8	23.4	24.9	23.0	23.8	23.9	25.2	23.3	87.3	94.1	96.1
S. Atlantic	32.8	31.0	34.2	33.6	33.0	33.6	35.7	34.2	33.3	33.6	35.6	34.0	131.7	136.6	136.5
E. S. Central	23.3	21.4	23.4	22.9	23.5	23.9	24.7	23.5	24.1	24.0	24.7	23.5	91.1	95.6	96.2
W. S. Central	46.6	44.9	47.9	48.7	48.1	48.8	50.3	50.4	49.9	49.9	51.3	51.3	188.1	197.6	202.3
Mountain	20.1	20.3	22.6	19.9	19.4	21.3	23.4	20.3	19.8	21.7	23.7	20.6	82.9	84.4	85.9
Pacific contiguous	19.2	19.7	22.1	19.0	18.6	20.3	22.4	19.0	18.4	20.1	22.1	18.7	80.1	80.3	79.3
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	4.6
Total	230.7	216.0	241.6	231.2	232.6	235.4	253.1	237.1	238.2	237.8	254.3	237.8	919.5	958.3	968.1
Total All Sectors (a)															
New England	27.8	25.1	31.9	26.3	28.5	25.4	30.7	26.5	28.8	25.6	30.5	26.3	111.0	111.0	111.3
Middle Atlantic	86.9	78.5	101.8	82.5	88.9	82.3	99.3	84.3	90.9	84.0	100.4	85.1	349.7	354.8	360.4
E. N. Central	133.7	119.7	148.4	127.0	135.4	126.2	150.1	130.8	138.9	128.2	151.3	131.5	528.8	542.5	549.9
W. N. Central	74.0	65.7	79.5	70.0	75.9	69.6	82.4	72.7	80.2	73.0	85.5	74.6	289.2	300.5	313.3
S. Atlantic	189.5	187.6	235.0	191.6	197.5	195.3	236.2	193.4	199.3	198.0	238.1	194.9	803.7	822.4	830.4
E. S. Central	73.0	66.8	85.9	69.9	77.0	71.0	88.6	71.6	77.8	72.0	89.2	71.9	295.7	308.2	310.9
W. S. Central	139.8	142.4	179.4	142.7	146.5	149.9	184.3	147.8	146.4	151.2	187.5	150.4	604.2	628.5	635.6
Mountain	65.0	68.2	86.3	66.7	64.8	70.3	84.9	67.5	65.8	71.2	86.3	68.6	286.2	287.5	291.8
Pacific contiguous	93.1	87.0	105.1	95.4	90.3	87.8	102.9	93.5	90.5	87.4	102.4	93.0	380.6	374.6	373.3
AK and HI	3.8	3.4	3.6	3.8	3.6	3.6	3.8	4.0	3.7	3.6	3.8	3.9	14.6	15.0	15.1
Total	886.6	844.3	1,056.9	875.9	908.5	881.3	1,063.3	891.9	922.3	894.3	1,075.0	900.4	3,663.7	3,745.1	3,791.9

(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 April 1, 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 - April 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	21.36	21.64	21.92	22.26	23.18	23.49	23.62	23.67	21.20	21.79	23.48
Middle Atlantic	15.47	15.96	16.18	15.98	15.63	16.40	16.83	16.58	16.00	16.59	16.99	16.71	15.92	16.37	16.58
E. N. Central	13.14	13.75	13.33	13.75	13.26	14.01	13.68	14.04	13.55	14.24	13.87	14.23	13.48	13.73	13.95
W. N. Central	10.98	12.59	12.88	11.46	11.02	13.07	13.49	11.65	10.74	12.74	13.13	11.53	11.99	12.31	12.03
S. Atlantic	11.79	11.80	12.05	11.83	11.52	11.80	12.27	12.18	11.98	12.16	12.53	12.24	11.88	11.96	12.25
E. S. Central	11.24	11.56	11.28	11.41	11.04	11.67	11.53	11.71	11.32	11.80	11.58	11.78	11.36	11.47	11.61
W. S. Central	11.04	11.42	11.29	11.38	10.79	11.60	11.87	12.04	11.26	11.47	11.55	11.75	11.29	11.59	11.51
Mountain	11.42	12.08	12.19	11.64	11.48	12.21	12.38	11.81	11.65	12.30	12.41	11.84	11.88	12.02	12.09
Pacific	15.69	16.18	17.77	16.79	16.40	17.02	18.34	17.17	17.08	18.00	18.99	17.45	16.67	17.26	17.90
U.S. Average	12.90	13.24	13.35	13.25	12.83	13.46	13.73	13.66	13.26	13.74	13.85	13.73	13.20	13.43	13.65
Commercial Sector															
New England	16.24	15.67	15.98	15.67	16.03	15.85	16.59	16.43	16.85	16.57	17.16	16.85	15.90	16.24	16.87
Middle Atlantic	11.69	12.53	13.21	12.40	12.05	12.93	13.65	12.84	12.30	13.11	13.69	12.86	12.47	12.89	13.01
E. N. Central	9.95	10.37	10.19	10.29	10.11	10.63	10.51	10.60	10.28	10.70	10.58	10.68	10.19	10.47	10.56
W. N. Central	9.07	10.12	10.33	9.11	9.27	10.73	11.12	9.50	9.06	10.35	10.68	9.32	9.66	10.17	9.87
S. Atlantic	9.23	9.02	9.09	9.20	9.07	9.01	9.30	9.54	9.34	9.11	9.29	9.50	9.13	9.24	9.31
E. S. Central	10.75	10.83	10.60	10.67	10.77	10.95	10.89	11.00	10.97	11.06	10.98	11.11	10.70	10.90	11.03
W. S. Central	7.84	7.87	7.89	7.98	8.06	8.28	8.29	7.92	7.94	8.34	8.41	8.13	7.90	8.15	8.22
Mountain	9.00	9.82	10.09	9.30	9.06	9.97	10.30	9.37	9.04	9.89	10.18	9.34	9.58	9.71	9.65
Pacific	13.50	14.79	17.20	15.05	13.99	15.26	17.91	15.48	14.32	15.59	18.11	15.74	15.18	15.73	16.01
U.S. Average	10.33	10.63	10.97	10.62	10.43	10.88	11.34	10.91	10.60	10.98	11.36	10.96	10.65	10.91	10.99
Industrial Sector															
New England	12.29	12.22	12.41	12.00	12.79	12.60	12.77	12.33	13.11	12.82	12.93	12.46	12.23	12.63	12.83
Middle Atlantic	6.36	6.35	6.41	6.29	6.44	6.36	6.35	6.20	6.24	6.26	6.22	6.06	6.35	6.34	6.20
E. N. Central	6.51	6.78	6.75	6.62	6.71	6.91	6.83	6.71	6.68	6.99	6.90	6.78	6.66	6.79	6.83
W. N. Central	6.94	7.32	7.89	6.62	7.07	7.34	7.97	6.73	7.03	7.48	8.13	6.86	7.20	7.30	7.39
S. Atlantic	5.98	6.09	6.50	6.09	6.06	6.30	6.60	6.15	6.04	6.32	6.62	6.14	6.17	6.28	6.29
E. S. Central	5.45	5.51	5.70	5.52	5.62	5.63	5.77	5.54	5.52	5.64	5.76	5.53	5.54	5.64	5.61
W. S. Central	5.05	4.98	5.21	5.03	5.64	4.84	5.05	4.91	4.94	4.74	4.94	4.80	5.07	5.10	4.85
Mountain	5.73	6.15	6.91	5.94	5.98	6.37	6.87	5.96	6.00	6.39	6.92	6.00	6.21	6.32	6.35
Pacific	8.97	10.33	12.38	10.94	9.62	10.86	12.57	11.24	9.87	11.18	13.00	11.59	10.71	11.14	11.48
U.S. Average	6.38	6.63	7.08	6.53	6.64	6.72	7.09	6.56	6.48	6.74	7.12	6.56	6.66	6.76	6.73
All Sectors (a)															
New England	18.02	17.61	17.79	17.43	17.97	17.84	18.44	18.28	19.21	19.03	19.47	19.08	17.72	18.15	19.21
Middle Atlantic	11.98	12.58	13.23	12.43	12.34	12.80	13.53	12.82	12.54	12.93	13.58	12.84	12.58	12.89	12.99
E. N. Central	9.92	10.47	10.36	10.24	10.14	10.56	10.51	10.47	10.28	10.71	10.62	10.59	10.24	10.42	10.55
W. N. Central	9.15	10.15	10.58	9.15	9.28	10.41	11.06	9.39	9.12	10.28	10.86	9.35	9.77	10.05	9.92
S. Atlantic	9.80	9.82	10.16	9.82	9.73	9.80	10.31	10.10	10.03	10.02	10.44	10.13	9.92	10.00	10.17
E. S. Central	9.25	9.41	9.56	9.26	9.31	9.44	9.74	9.47	9.44	9.53	9.79	9.54	9.38	9.50	9.59
W. S. Central	8.03	8.28	8.63	8.13	8.30	8.38	8.91	8.30	8.12	8.29	8.78	8.23	8.29	8.50	8.38
Mountain	8.83	9.58	10.14	9.14	9.02	9.70	10.19	9.21	9.05	9.70	10.18	9.23	9.48	9.58	9.59
Pacific	13.41	14.30	16.41	14.93	14.08	14.90	16.90	15.28	14.55	15.48	17.35	15.59	14.82	15.35	15.79
U.S. Average	10.29	10.63	11.11	10.56	10.44	10.77	11.33	10.80	10.61	10.92	11.40	10.85	10.67	10.85	10.96

(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 April 1, 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 - April 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	325.1	333.8	429.3	322.1	312.7	311.6	431.3	322.8	1,512.2	1,410.3	1,378.3
Coal	170.3	151.2	248.2	198.6	215.1	179.3	269.5	211.6	230.0	193.8	270.9	211.3	768.2	875.5	905.9
Nuclear	204.1	190.7	204.1	191.0	199.2	188.5	205.4	188.2	189.0	185.3	197.0	184.6	789.9	781.2	755.9
Renewable Energy Sources:	190.1	206.5	176.9	187.0	195.0	226.2	192.4	203.8	213.8	248.9	209.8	215.8	760.6	817.5	888.3
Conventional Hydropower	75.0	81.3	70.6	63.0	69.8	76.3	64.0	58.3	69.4	81.3	65.4	59.2	289.9	268.3	275.3
Wind	87.4	87.1	67.5	94.7	90.6	102.7	80.3	109.5	103.3	109.1	85.9	115.3	336.7	383.1	413.7
Solar (a)	16.7	27.3	27.6	18.5	21.5	35.2	36.5	24.6	28.5	45.5	46.3	29.6	90.1	117.7	149.8
Biomass	7.1	6.7	7.0	6.7	9.0	7.8	7.5	7.3	8.3	8.8	7.8	7.5	27.5	31.6	32.5
Geothermal	3.9	4.2	4.2	4.2	4.1	4.2	4.2	4.2	4.3	4.3	4.3	4.2	16.5	16.7	17.0
Pumped Storage Hydropower	-1.0	-1.2	-2.0	-1.2	-1.2	-1.2	-2.1	-1.1	-0.9	-1.3	-2.2	-1.1	-5.3	-5.6	-5.4
Petroleum (b)	4.0	3.9	4.5	4.0	3.6	3.8	4.0	4.2	3.6	4.1	4.3	4.3	16.5	15.5	16.3
Other Gases	1.0	0.4	0.8	0.9	0.8	0.3	0.7	0.9	0.9	0.3	0.7	0.9	3.1	2.7	2.7
Other Nonrenewable Fuels (c)	1.9	1.8	1.9	1.9	1.8	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	939.4	932.4	1,100.8	931.6	950.8	944.5	1,113.4	940.5	3,852.8	3,904.2	3,949.3
New England (ISO-NE)															
Natural Gas	10.8	10.0	16.1	10.8	10.9	9.8	16.5	12.1	10.9	11.9	17.6	11.9	47.7	49.3	52.3
Coal	0.1	0.0	0.0	0.1	0.5	0.0	0.0	0.1	0.5	0.0	0.0	0.1	0.2	0.6	0.6
Nuclear	7.3	4.9	7.3	6.1	7.2	7.1	7.2	5.6	7.0	6.2	7.2	7.2	25.6	27.1	27.7
Conventional hydropower	2.2	2.1	1.8	1.7	2.0	2.3	1.3	1.8	2.0	2.3	1.3	1.8	7.8	7.3	7.4
Nonhydro renewables (d)	2.6	2.7	2.4	2.6	3.2	3.1	2.6	3.2	3.4	3.3	2.8	3.3	10.3	12.1	12.8
Other energy sources (e)	0.3	0.3	0.4	0.4	0.5	0.4	0.3	0.4	0.4	0.4	0.4	0.4	1.4	1.6	1.6
Total generation	23.2	20.1	28.0	21.7	24.3	22.6	27.9	23.2	24.2	24.1	29.3	24.8	92.9	98.0	102.3
Net energy for load (f)	27.9	25.2	32.3	27.6	29.1	26.9	31.8	28.2	29.8	27.1	32.0	28.4	113.0	116.0	117.4
New York (NYISO)															
Natural Gas	12.4	11.4	20.6	12.8	13.3	16.1	20.7	13.5	17.4	15.9	21.8	15.4	57.1	63.6	70.5
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	9.4	7.5	7.1	6.8	6.5	7.0	6.7	7.0	38.5	30.8	27.2
Conventional hydropower	8.0	8.0	7.8	7.6	7.7	7.5	7.4	7.4	7.2	7.1	7.1	7.2	31.4	30.0	28.5
Nonhydro renewables (d)	2.0	1.9	1.7	2.1	2.2	2.2	1.8	2.2	2.3	2.4	2.1	2.7	7.6	8.3	9.5
Other energy sources (e)	0.2	0.1	0.1	0.2	0.3	0.2	0.1	0.1	0.3	0.1	0.1	0.1	0.6	0.7	0.7
Total generation	33.4	30.6	39.2	32.2	33.0	33.4	37.1	30.0	33.7	32.5	37.8	32.4	135.4	133.5	136.4
Net energy for load (f)	35.3	32.4	42.9	34.7	36.3	35.2	42.4	36.2	37.3	36.0	43.1	36.7	145.3	150.3	153.2
Mid-Atlantic (PJM)															
Natural Gas	78.4	69.9	97.6	69.9	73.2	78.5	89.3	69.0	74.0	77.4	95.0	76.7	315.8	309.9	323.0
Coal	33.7	29.7	46.8	38.1	44.5	33.7	50.0	47.2	53.2	40.2	50.7	42.0	148.3	175.4	186.2
Nuclear	68.9	67.1	70.9	68.9	68.2	65.9	72.5	62.4	59.1	59.3	62.9	57.8	275.7	268.9	239.1
Conventional hydropower	3.1	2.9	2.1	1.9	2.7	2.7	1.6	2.1	2.6	2.7	1.6	2.1	9.9	9.1	9.1
Nonhydro renewables (d)	10.4	10.2	7.5	10.9	11.5	12.2	8.9	12.2	12.3	13.1	9.5	12.9	39.1	44.7	47.8
Other energy sources (e)	0.6	0.5	0.4	0.7	0.5	0.2	0.1	0.8	0.7	0.4	0.3	1.0	2.2	1.7	2.3
Total generation	195.1	180.2	225.3	190.5	200.5	193.2	222.4	193.6	201.8	193.0	220.1	192.5	791.1	809.8	807.4
Net energy for load (f)	182.5	163.5	209.3	177.1	190.3	172.3	205.4	181.0	196.2	176.0	208.2	183.1	732.4	748.9	763.4
Southeast (SERC)															
Natural Gas	61.9	59.1	74.7	58.5	63.0	58.7	70.7	59.1	60.9	55.8	69.0	54.2	254.2	251.5	239.9
Coal	23.8	22.1	44.4	28.0	31.1	28.9	49.8	32.1	37.8	32.8	52.3	36.9	118.3	142.0	159.8
Nuclear	53.0	50.5	54.1	52.5	54.2	52.3	55.4	53.6	54.1	55.2	58.4	55.7	210.1	215.4	223.4
Conventional hydropower	11.1	10.2	8.8	8.6	9.2	7.3	6.6	7.8	10.1	7.6	6.7	7.8	38.7	30.9	32.2
Nonhydro renewables (d)	3.4	5.0	5.0	3.9	4.4	5.9	6.0	4.5	4.9	7.3	7.8	5.4	17.4	20.7	25.4
Other energy sources (e)	-0.1	-0.3	-0.6	-0.2	-0.1	-0.3	-0.6	-0.2	-0.1	-0.4	-0.8	-0.2	-1.1	-1.3	-1.5
Total generation	153.1	146.7	186.5	151.3	161.8	152.7	187.8	156.9	167.8	158.2	193.4	159.8	637.6	659.2	679.2
Net energy for load (f)	157.5	152.6	186.1	153.6	159.9	158.8	188.6	157.5	164.4	160.6	190.4	158.9	649.8	664.8	674.3
Florida (FRCC)															
Natural Gas	40.0	45.7	52.8	41.0	32.9	40.8	45.8	35.7	33.1	40.5	45.3	35.5	179.5	155.2	154.5
Coal	2.1	3.5	5.7	4.6	4.4	7.1	6.2	5.1	4.0	7.0	6.6	5.0	15.9	22.9	22.6
Nuclear	7.3	7.6	7.6	7.0	7.9	7.1	7.9	6.9	7.9	7.3	8.1	7.2	29.4	29.7	30.4
Conventional hydropower	0.1	0.1	0.0	0.0	0.0	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	2.8	3.5	3.0	2.6	3.2	4.7	3.4	2.7	8.4	11.9	14.0
Other energy sources (e)	0.9	0.8	0.9	0.7	0.9	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	48.9	59.3	63.8	50.9	49.0	60.3	64.2	51.1	236.7	222.9	224.6
Net energy for load (f)	50.1	54.3	71.9	56.4	49.0	57.6	66.6	52.2	48.3	58.6	67.2	52.7	232.7	225.3	226.8

(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 April 1, 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 - April 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	33.4	39.0	45.3	34.8	34.0	37.5	50.8	38.3	178.3	152.4	160.6
Coal	51.0	41.1	68.5	57.8	66.0	51.5	78.5	61.9	69.2	53.3	75.1	59.0	218.4	258.0	256.6
Nuclear	26.6	22.9	24.4	21.2	23.6	21.9	24.8	24.2	23.9	22.3	23.5	22.7	95.1	94.4	92.4
Conventional hydropower	3.1	3.2	2.8	2.7	3.0	3.1	2.4	2.2	2.4	2.8	2.3	2.2	11.8	10.7	9.8
Nonhydro renewables (d)	20.8	20.1	16.2	24.2	22.4	24.5	19.1	27.6	24.0	25.8	20.4	28.5	81.3	93.6	98.7
Other energy sources (e)	1.4	1.3	1.3	1.2	0.8	1.2	0.9	1.4	1.0	1.4	1.1	1.4	5.2	4.3	4.9
Total generation	146.9	131.8	166.6	144.8	149.1	141.2	171.1	152.0	154.6	143.0	173.2	152.1	590.0	613.4	622.9
Net energy for load (f)	153.0	141.5	174.4	149.8	156.2	153.0	178.0	156.1	159.4	154.7	180.0	157.6	618.8	643.3	651.8
Central (Southwest Power Pool)															
Natural Gas	17.5	16.3	24.2	13.7	13.8	11.9	21.2	12.7	13.6	12.2	22.0	12.9	71.6	59.6	60.7
Coal	17.0	15.7	26.7	19.8	22.7	15.3	26.3	18.1	23.4	16.8	27.7	20.3	79.2	82.5	88.1
Nuclear	4.4	4.4	4.2	3.8	4.2	3.2	4.4	4.4	4.3	4.4	4.1	2.7	16.8	16.2	15.4
Conventional hydropower	5.9	6.0	5.1	4.8	5.3	5.1	4.3	3.3	3.6	4.3	4.0	3.2	21.8	18.0	15.0
Nonhydro renewables (d)	20.3	21.4	16.7	22.2	21.6	26.2	20.7	26.5	24.4	28.2	22.9	28.5	80.6	95.0	104.0
Other energy sources (e)	0.1	0.1	0.1	0.2	0.2	0.1	0.1	0.2	0.2	0.1	0.1	0.2	0.5	0.4	0.5
Total generation	65.2	63.9	77.0	64.4	67.7	61.8	77.1	65.2	69.4	66.0	80.7	67.6	270.5	271.7	283.7
Net energy for load (f)	62.8	63.7	74.8	60.9	63.0	60.5	74.4	60.6	65.1	64.1	77.8	62.7	262.2	258.4	269.7
Texas (ERCOT)															
Natural Gas	37.2	42.1	59.3	36.0	35.4	34.3	47.1	27.1	24.8	26.3	41.1	23.4	174.6	143.9	115.5
Coal	13.1	15.8	20.3	17.9	16.2	18.2	22.9	17.4	14.9	18.3	22.9	17.3	67.2	74.6	73.4
Nuclear	10.4	9.7	11.0	10.3	10.5	10.2	10.3	9.6	10.7	10.0	10.6	10.3	41.4	40.6	41.6
Conventional hydropower	0.3	0.3	0.3	0.2	0.2	0.2	0.2	0.1	0.2	0.2	0.2	0.1	1.1	0.7	0.7
Nonhydro renewables (d)	22.6	24.8	20.8	24.4	22.8	31.2	28.6	30.6	31.2	37.7	34.4	33.7	92.6	113.3	137.0
Other energy sources (e)	0.4	0.3	0.4	0.4	0.4	0.3	0.4	0.4	0.4	0.3	0.4	0.4	1.5	1.5	1.4
Total generation	84.1	93.1	112.1	89.1	85.6	94.4	109.5	85.2	82.1	92.9	109.5	85.1	378.4	374.7	369.6
Net energy for load (f)	84.1	93.1	112.1	89.1	85.6	94.4	109.5	85.2	82.1	92.9	109.5	85.1	378.4	374.7	369.6
Northwest															
Natural Gas	23.7	17.1	27.3	21.6	22.4	18.8	28.6	22.5	18.4	12.7	25.6	20.5	89.6	92.2	77.3
Coal	22.3	16.1	24.5	23.2	21.8	17.4	25.5	21.8	20.3	18.4	26.3	23.4	86.1	86.5	88.3
Nuclear	2.4	2.0	2.4	2.5	2.5	1.2	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	34.1	37.9	30.5	27.8	34.1	42.6	31.5	28.2	136.0	130.2	136.5
Nonhydro renewables (d)	13.9	14.2	12.6	14.9	15.7	16.5	14.5	17.1	17.7	18.2	15.9	18.3	55.6	63.8	70.2
Other energy sources (e)	0.2	0.2	0.1	0.2	0.1	0.2	0.1	0.2	0.1	0.1	0.1	0.2	0.6	0.6	0.5
Total generation	97.5	88.3	99.4	92.2	96.5	91.8	101.7	91.9	93.0	94.6	101.9	93.0	377.4	381.9	382.5
Net energy for load (f)	91.0	82.1	92.5	87.7	89.3	84.8	94.6	89.4	88.9	85.1	95.1	89.8	353.4	358.1	358.9
Southwest															
Natural Gas	11.8	14.7	20.4	14.8	10.6	13.2	20.0	14.4	9.2	9.1	19.6	12.7	61.7	58.2	50.6
Coal	5.3	5.3	8.8	6.6	6.1	5.3	7.5	5.5	5.2	5.2	6.7	4.9	25.9	24.4	22.0
Nuclear	8.3	7.6	8.7	7.0	8.6	7.6	8.6	7.7	8.4	7.5	8.6	7.7	31.6	32.4	32.2
Conventional hydropower	2.7	4.0	3.7	2.5	2.7	3.9	3.8	2.6	2.9	4.0	3.9	2.6	12.8	13.0	13.5
Nonhydro renewables (d)	2.5	3.1	2.5	2.3	3.2	4.0	3.2	3.4	4.6	4.8	4.1	4.1	10.5	13.8	17.6
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	31.1	34.1	43.4	33.5	30.2	30.8	43.1	32.0	142.7	142.0	136.1
Net energy for load (f)	19.7	23.9	32.5	21.1	19.3	24.2	31.4	20.8	19.1	24.2	31.6	20.9	97.1	95.8	95.9
California															
Natural Gas	16.7	12.6	27.0	23.6	15.8	12.0	23.5	20.5	15.6	11.6	22.8	20.7	79.9	71.8	70.8
Coal	1.4	1.2	2.1	2.0	1.4	1.4	2.1	1.9	1.2	1.3	2.1	1.9	6.7	6.9	6.6
Nuclear	4.8	4.9	4.5	2.1	3.0	4.7	4.7	4.7	4.6	3.8	4.4	4.0	16.3	17.0	16.8
Conventional hydropower	3.1	5.6	5.4	2.7	2.4	6.0	5.5	2.7	3.8	7.2	6.4	3.4	16.8	16.6	20.9
Nonhydro renewables (d)	14.3	18.9	18.1	14.4	15.1	20.2	19.4	15.3	16.1	21.5	20.5	16.1	65.8	70.1	74.2
Other energy sources (e)	0.0	0.1	0.1	0.1	-0.1	0.1	0.1	0.1	0.1	0.1	0.2	0.1	0.2	0.2	0.5
Total generation	40.3	43.3	57.3	44.9	37.6	44.5	55.3	45.2	41.4	45.6	56.5	46.3	185.8	182.6	189.8
Net energy for load (f)	57.6	60.5	75.9	61.4	56.6	61.3	74.3	60.4	56.5	61.6	74.7	60.6	255.3	252.6	253.4

(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 April 1, 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 - April 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	0.036	<i>0.038</i>	<i>0.038</i>	<i>0.037</i>	<i>0.038</i>	<i>0.038</i>	<i>0.038</i>	<i>0.037</i>	0.147	<i>0.149</i>	<i>0.152</i>
Hydroelectric Power (a)	0.667	0.724	0.629	0.561	0.691	<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>2.543</i>	<i>2.538</i>
Solar (b)	0.152	0.248	0.252	0.168	0.196	<i>0.320</i>	<i>0.332</i>	<i>0.224</i>	<i>0.259</i>	<i>0.414</i>	<i>0.421</i>	<i>0.269</i>	0.820	<i>1.072</i>	<i>1.364</i>
Waste Biomass (c)	0.063	0.058	0.059	0.059	0.069	<i>0.063</i>	<i>0.061</i>	<i>0.061</i>	<i>0.066</i>	<i>0.065</i>	<i>0.063</i>	<i>0.063</i>	0.238	<i>0.254</i>	<i>0.257</i>
Wood Biomass	0.049	0.043	0.048	0.046	0.070	<i>0.057</i>	<i>0.056</i>	<i>0.052</i>	<i>0.062</i>	<i>0.071</i>	<i>0.058</i>	<i>0.054</i>	0.185	<i>0.234</i>	<i>0.245</i>
Wind	0.796	0.793	0.615	0.862	0.825	<i>0.935</i>	<i>0.731</i>	<i>0.997</i>	<i>0.940</i>	<i>0.993</i>	<i>0.782</i>	<i>1.050</i>	3.065	<i>3.487</i>	<i>3.766</i>
Subtotal	1.761	1.904	1.639	1.733	1.887	<i>2.106</i>	<i>1.816</i>	<i>1.930</i>	<i>2.057</i>	<i>2.276</i>	<i>1.960</i>	<i>2.029</i>	7.037	<i>7.739</i>	<i>8.322</i>
Industrial Sector															
Biofuel Losses and Co-products (d)	0.197	0.135	0.179	0.188	0.172	<i>0.182</i>	<i>0.191</i>	<i>0.190</i>	<i>0.184</i>	<i>0.189</i>	<i>0.192</i>	<i>0.194</i>	0.698	<i>0.735</i>	<i>0.759</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	0.003	<i>0.003</i>	<i>0.002</i>	<i>0.002</i>	<i>0.003</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	0.040	<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>0.157</i>	<i>0.156</i>
Wood Biomass	0.349	0.340	0.336	0.352	0.341	<i>0.341</i>	<i>0.355</i>	<i>0.358</i>	<i>0.349</i>	<i>0.346</i>	<i>0.358</i>	<i>0.360</i>	1.376	<i>1.394</i>	<i>1.412</i>
Subtotal	0.594	0.520	0.558	0.588	0.561	<i>0.570</i>	<i>0.591</i>	<i>0.596</i>	<i>0.581</i>	<i>0.582</i>	<i>0.595</i>	<i>0.602</i>	2.261	<i>2.317</i>	<i>2.359</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	0.030	<i>0.044</i>	<i>0.044</i>	<i>0.031</i>	<i>0.035</i>	<i>0.051</i>	<i>0.051</i>	<i>0.035</i>	0.123	<i>0.149</i>	<i>0.173</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	0.071	<i>0.085</i>	<i>0.087</i>	<i>0.073</i>	<i>0.077</i>	<i>0.093</i>	<i>0.094</i>	<i>0.078</i>	0.290	<i>0.316</i>	<i>0.341</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	0.069	<i>0.104</i>	<i>0.105</i>	<i>0.072</i>	<i>0.078</i>	<i>0.119</i>	<i>0.120</i>	<i>0.082</i>	0.291	<i>0.351</i>	<i>0.399</i>
Wood Biomass	0.114	0.114	0.115	0.115	0.114	<i>0.114</i>	<i>0.115</i>	<i>0.115</i>	<i>0.114</i>	<i>0.114</i>	<i>0.115</i>	<i>0.115</i>	0.458	<i>0.458</i>	<i>0.458</i>
Subtotal	0.181	0.210	0.211	0.186	0.192	<i>0.228</i>	<i>0.230</i>	<i>0.197</i>	<i>0.202</i>	<i>0.242</i>	<i>0.244</i>	<i>0.207</i>	0.788	<i>0.848</i>	<i>0.896</i>
Transportation Sector															
Biomass-based Diesel (f)	0.061	0.064	0.073	0.076	0.067	<i>0.074</i>	<i>0.073</i>	<i>0.079</i>	<i>0.081</i>	<i>0.084</i>	<i>0.089</i>	<i>0.092</i>	0.275	<i>0.293</i>	<i>0.346</i>
Ethanol (f)	0.257	0.220	0.267	0.258	0.249	<i>0.268</i>	<i>0.280</i>	<i>0.275</i>	<i>0.258</i>	<i>0.282</i>	<i>0.283</i>	<i>0.282</i>	1.002	<i>1.072</i>	<i>1.105</i>
Subtotal	0.318	0.284	0.340	0.334	0.316	<i>0.342</i>	<i>0.354</i>	<i>0.354</i>	<i>0.339</i>	<i>0.366</i>	<i>0.372</i>	<i>0.374</i>	1.277	<i>1.365</i>	<i>1.451</i>
All Sectors Total															
Biomass-based Diesel (f)	0.061	0.064	0.073	0.076	0.067	<i>0.074</i>	<i>0.073</i>	<i>0.079</i>	<i>0.081</i>	<i>0.084</i>	<i>0.089</i>	<i>0.092</i>	0.275	<i>0.293</i>	<i>0.346</i>
Biofuel Losses and Co-products (d)	0.197	0.135	0.179	0.188	0.172	<i>0.182</i>	<i>0.191</i>	<i>0.190</i>	<i>0.184</i>	<i>0.189</i>	<i>0.192</i>	<i>0.194</i>	0.698	<i>0.735</i>	<i>0.759</i>
Ethanol (f)	0.267	0.228	0.278	0.268	0.259	<i>0.278</i>	<i>0.291</i>	<i>0.285</i>	<i>0.268</i>	<i>0.293</i>	<i>0.294</i>	<i>0.293</i>	1.041	<i>1.113</i>	<i>1.147</i>
Geothermal	0.052	0.054	0.054	0.055	0.053	<i>0.055</i>	<i>0.054</i>	<i>0.054</i>	<i>0.055</i>	<i>0.055</i>	<i>0.055</i>	<i>0.054</i>	0.214	<i>0.216</i>	<i>0.219</i>
Hydroelectric Power (a)	0.670	0.727	0.631	0.563	0.694	<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>2.554</i>	<i>2.549</i>
Solar (b)(e)	0.238	0.374	0.377	0.257	0.302	<i>0.479</i>	<i>0.493</i>	<i>0.335</i>	<i>0.381</i>	<i>0.596</i>	<i>0.604</i>	<i>0.395</i>	1.246	<i>1.608</i>	<i>1.977</i>
Waste Biomass (c)	0.113	0.105	0.104	0.108	0.119	<i>0.110</i>	<i>0.107</i>	<i>0.110</i>	<i>0.115</i>	<i>0.113</i>	<i>0.110</i>	<i>0.111</i>	0.430	<i>0.446</i>	<i>0.449</i>
Wood Biomass	0.532	0.517	0.519	0.533	0.545	<i>0.531</i>	<i>0.546</i>	<i>0.546</i>	<i>0.545</i>	<i>0.551</i>	<i>0.552</i>	<i>0.549</i>	2.101	<i>2.168</i>	<i>2.197</i>
Wind	0.796	0.793	0.615	0.862	0.825	<i>0.935</i>	<i>0.731</i>	<i>0.997</i>	<i>0.940</i>	<i>0.993</i>	<i>0.782</i>	<i>1.050</i>	3.065	<i>3.487</i>	<i>3.766</i>
Total Consumption	2.923	2.995	2.826	2.907	3.027	<i>3.330</i>	<i>3.077</i>	<i>3.150</i>	<i>3.255</i>	<i>3.559</i>	<i>3.265</i>	<i>3.289</i>	11.652	<i>12.584</i>	<i>13.368</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 April 1, 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 - April 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	6,616	6,611	6,575	6,574	6,572	6,430	6,430	6,474	6,477	6,478	6,478	6,478	6,574	6,474	6,478
Waste	3,943	3,938	3,864	3,863	3,861	3,862	3,862	3,906	3,909	3,910	3,910	3,910	3,863	3,906	3,910
Wood	2,673	2,673	2,711	2,711	2,711	2,568	2,568	2,568	2,568	2,568	2,568	2,568	2,711	2,568	2,568
Conventional Hydroelectric	79,506	79,510	79,663	79,668	79,730	79,737	79,740	79,790	79,804	79,819	79,859	79,863	79,668	79,790	79,863
Geothermal	2,502	2,534	2,534	2,534	2,534	2,534	2,534	2,576	2,576	2,576	2,576	2,576	2,534	2,576	2,576
Large-Scale Solar (b)	39,082	41,311	42,957	47,457	50,346	53,209	56,650	63,306	64,846	70,140	71,943	78,194	47,457	63,306	78,194
Wind	106,052	107,615	109,142	117,948	125,227	127,875	129,146	134,056	135,117	136,989	137,069	139,838	117,948	134,056	139,838
Other Sectors (c)															
Biomass	6,405	6,405	6,404	6,418	6,410	6,391	6,391	6,391	6,391	6,391	6,384	6,384	6,418	6,391	6,384
Waste	788	788	787	801	801	803	803	803	803	803	803	803	801	803	803
Wood	5,616	5,616	5,616	5,616	5,609	5,589	5,589	5,589	5,589	5,589	5,581	5,581	5,616	5,589	5,581
Conventional Hydroelectric	289	289	289	289	289	289	287	287	287	287	287	287	289	287	287
Large-Scale Solar (b)	436	448	453	460	475	479	494	512	514	514	514	514	460	512	514
Small-Scale Solar (d)	24,355	25,255	26,264	27,724	29,111	30,418	31,689	32,942	34,205	35,411	36,620	37,870	27,724	32,942	37,870
Residential Sector	15,071	15,689	16,373	17,238	18,110	18,938	19,743	20,524	21,335	22,111	22,917	23,752	17,238	20,524	23,752
Commercial Sector	7,425	7,642	7,910	8,430	8,895	9,310	9,711	10,119	10,508	10,875	11,218	11,572	8,430	10,119	11,572
Industrial Sector	1,859	1,924	1,981	2,056	2,106	2,171	2,235	2,300	2,363	2,425	2,485	2,546	2,056	2,300	2,546
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	9.0	7.8	7.5	7.3	8.3	8.8	7.8	7.5	27.5	31.6	32.5
Waste	4.1	4.0	4.0	3.9	4.7	4.3	4.1	4.1	4.4	4.4	4.3	4.2	16.1	17.2	17.3
Wood	3.0	2.7	3.0	2.7	4.3	3.5	3.4	3.2	3.8	4.4	3.6	3.3	11.4	14.5	15.1
Conventional Hydroelectric	75.0	81.3	70.6	63.0	69.8	76.3	64.0	58.3	69.4	81.3	65.4	59.2	289.9	268.3	275.3
Geothermal	3.9	4.2	4.2	4.2	4.1	4.2	4.2	4.2	4.3	4.3	4.3	4.2	16.5	16.7	17.0
Large-Scale Solar (b)	16.7	27.3	27.6	18.5	21.5	35.2	36.5	24.6	28.5	45.5	46.3	29.6	90.1	117.7	149.8
Wind	87.4	87.1	67.5	94.7	90.6	102.7	80.3	109.5	103.3	109.1	85.9	115.3	336.7	383.1	413.7
Other Sectors (c)															
Biomass	7.4	7.1	7.0	7.1	7.2	7.1	7.0	7.1	7.2	7.1	7.0	7.1	28.6	28.4	28.4
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	6.5	6.4	6.4	6.4	6.5	6.4	6.4	6.4	25.8	25.7	25.7
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	0.1	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.8	0.8	0.8
Small-Scale Solar (d)	8.4	12.4	12.3	8.7	10.0	15.0	15.2	10.5	11.8	17.5	17.6	12.1	41.7	50.7	58.9
Residential Sector	5.0	7.5	7.5	5.4	6.1	9.2	9.3	6.4	7.1	10.8	10.8	7.5	25.4	31.1	36.2
Commercial Sector	2.7	3.8	3.8	2.6	3.1	4.6	4.7	3.2	3.7	5.4	5.4	3.7	12.9	15.7	18.3
Industrial Sector	0.7	1.0	1.0	0.7	0.8	1.2	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 April 1, 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 - April 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	18,784	18,998	19,321	19,645	19,883	20,076	20,228	20,355	20,471	18,423	19,462	20,283
Real Personal Consumption Expend. (billion chained 2012 dollars - SAAR)	13,118	11,860	12,925	13,000	13,170	13,349	13,569	13,772	13,932	14,082	14,193	14,304	12,726	13,465	14,128
Real Private Fixed Investment (billion chained 2012 dollars - SAAR)	3,375	3,096	3,315	3,463	3,548	3,597	3,643	3,669	3,688	3,704	3,723	3,741	3,312	3,614	3,714
Business Inventory Change (billion chained 2012 dollars - SAAR)	-52	-298	-1	46	7	50	142	185	192	180	163	143	-76	96	170
Real Government Expenditures (billion chained 2012 dollars - SAAR)	3,348	3,369	3,327	3,318	3,387	3,445	3,446	3,440	3,446	3,426	3,426	3,420	3,340	3,430	3,429
Real Exports of Goods & Services (billion chained 2012 dollars - SAAR)	2,495	1,927	2,167	2,276	2,312	2,358	2,403	2,459	2,508	2,548	2,582	2,614	2,216	2,383	2,563
Real Imports of Goods & Services (billion chained 2012 dollars - SAAR)	3,283	2,702	3,186	3,399	3,492	3,571	3,641	3,724	3,770	3,789	3,807	3,827	3,143	3,607	3,798
Real Disposable Personal Income (billion chained 2012 dollars - SAAR)	15,061	16,630	15,851	15,437	16,641	17,254	15,691	15,544	15,722	15,839	15,956	16,042	15,745	16,282	15,890
Non-Farm Employment (millions)	151.9	133.7	140.9	142.6	143.1	145.0	146.5	147.8	149.1	150.2	151.2	152.0	142.3	145.6	150.6
Civilian Unemployment Rate (percent)	3.8	13.1	8.8	6.8	6.2	5.7	5.3	4.9	4.5	4.2	3.9	3.7	8.1	5.5	4.1
Housing Starts (millions - SAAR)	1.48	1.08	1.43	1.58	1.54	1.61	1.54	1.48	1.43	1.39	1.36	1.32	1.40	1.54	1.38
Industrial Production Indices (Index, 2012=100)															
Total Industrial Production	107.7	93.7	102.5	104.8	106.5	108.7	110.7	112.2	113.4	114.4	115.0	115.4	102.2	109.5	114.6
Manufacturing	104.4	89.3	100.1	103.0	104.4	107.0	109.0	110.4	111.4	112.2	112.7	113.0	99.2	107.7	112.3
Food	116.5	107.9	113.6	116.0	118.2	119.9	120.1	120.1	120.2	120.5	120.8	121.2	113.5	119.6	120.7
Paper	94.7	87.2	87.0	91.8	92.4	93.9	95.0	95.6	96.0	96.5	96.7	96.8	90.2	94.2	96.5
Petroleum and Coal Products	105.0	82.7	89.9	93.2	94.0	95.8	97.3	98.1	98.7	99.2	99.3	99.2	92.7	96.3	99.1
Chemicals	99.8	93.7	96.4	99.6	100.1	108.9	113.4	115.1	115.6	115.8	115.9	116.2	97.4	109.4	115.9
Nonmetallic Mineral Products	122.2	106.3	113.7	117.8	117.7	120.9	122.4	123.0	123.0	122.8	122.5	122.2	115.0	121.0	122.6
Primary Metals	94.4	69.6	79.3	87.7	90.9	93.7	95.1	94.9	95.0	95.5	95.1	94.5	82.7	93.7	95.0
Coal-weighted Manufacturing (a)	106.5	94.1	100.9	105.2	104.9	108.5	110.1	110.9	111.5	112.1	112.3	112.5	101.7	108.6	112.1
Distillate-weighted Manufacturing (a)	98.8	85.6	92.5	95.9	97.3	99.6	100.9	101.4	101.7	101.9	101.8	101.5	93.2	99.8	101.7
Electricity-weighted Manufacturing (a)	105.1	89.4	98.4	103.0	103.5	107.1	108.6	109.2	109.8	110.5	110.6	110.6	99.0	107.1	110.4
Natural Gas-weighted Manufacturing (a)	107.8	94.0	100.3	105.3	104.2	108.8	110.4	111.0	111.7	112.5	112.7	112.8	101.9	108.6	112.4
Price Indexes															
Consumer Price Index (all urban consumers) (index, 1982-1984=1.00)	2.59	2.56	2.59	2.61	2.63	2.65	2.65	2.66	2.67	2.68	2.70	2.71	2.59	2.65	2.69
Producer Price Index: All Commodities (index, 1982=1.00)	1.97	1.88	1.94	1.98	2.06	2.08	2.08	2.07	2.08	2.09	2.09	2.09	1.94	2.07	2.09
Producer Price Index: Petroleum (index, 1982=1.00)	1.71	1.05	1.47	1.50	1.85	2.02	1.95	1.84	1.84	1.87	1.88	1.85	1.43	1.92	1.86
GDP Implicit Price Deflator (index, 2012=100)	113.4	112.9	113.8	114.4	115.3	115.8	116.4	117.0	117.4	118.1	118.8	119.5	113.6	116.1	118.4
Miscellaneous															
Vehicle Miles Traveled (b) (million miles/day)	7,760	6,881	8,263	8,006	7,633	8,592	8,801	8,749	8,112	9,117	9,118	8,902	7,730	8,448	8,815
Air Travel Capacity (Available ton-miles/day, thousands)	628	362	475	533	603	580	609	651	648	706	723	695	500	611	693
Aircraft Utilization (Revenue ton-miles/day, thousands)	328	152	208	238	285	304	354	382	404	451	459	436	231	331	437
Airline Ticket Price Index (index, 1982-1984=100)	250.8	203.7	200.6	215.1	195.0	183.5	173.7	183.9	187.8	204.5	209.2	226.9	217.5	184.1	207.1
Raw Steel Production (million short tons per day)	0.268	0.174	0.197	0.224	0.245	0.252	0.269	0.306	0.295	0.264	0.259	0.267	0.216	0.268	0.271
Carbon Dioxide (CO2) Emissions (million metric tons)															
Petroleum	552	442	518	521	516	540	559	565	549	568	581	580	2,033	2,180	2,279
Natural Gas	490	349	383	429	486	354	367	434	484	346	366	429	1,651	1,641	1,624
Coal	202	178	272	225	242	207	296	243	258	224	298	244	876	988	1,024
Total Energy (c)	1,247	971	1,175	1,178	1,246	1,104	1,224	1,245	1,294	1,141	1,247	1,256	4,571	4,820	4,938

(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 April 1, 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 - April 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	977	987	1,003	1,019	1,030	1,040	1,047	1,054	1,059	960	1,010	1,050
Middle Atlantic	2,774	2,486	2,669	2,707	2,734	2,788	2,835	2,878	2,913	2,940	2,963	2,981	2,659	2,809	2,949
E. N. Central	2,502	2,266	2,458	2,475	2,498	2,541	2,580	2,609	2,628	2,645	2,658	2,668	2,425	2,557	2,650
W. N. Central	1,188	1,084	1,168	1,175	1,185	1,202	1,221	1,233	1,243	1,252	1,259	1,264	1,154	1,210	1,254
S. Atlantic	3,388	3,114	3,337	3,367	3,404	3,458	3,513	3,551	3,584	3,608	3,628	3,649	3,301	3,481	3,617
E. S. Central	828	742	809	816	827	840	853	862	869	875	879	883	799	845	876
W. S. Central	2,317	2,125	2,267	2,300	2,331	2,370	2,412	2,441	2,464	2,483	2,501	2,518	2,252	2,388	2,492
Mountain	1,283	1,177	1,265	1,278	1,293	1,314	1,336	1,351	1,364	1,372	1,380	1,388	1,251	1,323	1,376
Pacific	3,769	3,436	3,684	3,722	3,770	3,838	3,909	3,961	4,005	4,040	4,068	4,096	3,653	3,870	4,052
Industrial Output, Manufacturing (Index, Year 2012=100)															
New England	97.6	83.5	92.7	96.0	97.3	99.9	101.9	103.1	103.7	104.4	104.6	104.8	92.5	100.5	104.4
Middle Atlantic	97.1	80.3	91.2	93.4	94.6	97.0	99.0	100.6	101.7	102.9	103.4	103.9	90.5	97.8	103.0
E. N. Central	105.1	86.1	99.5	102.2	103.5	106.4	108.3	109.9	111.0	111.9	112.4	112.8	98.2	107.0	112.0
W. N. Central	103.7	90.3	100.7	103.5	104.9	107.4	109.1	110.5	111.3	111.9	112.4	112.7	99.5	108.0	112.1
S. Atlantic	109.2	94.4	105.2	108.7	110.3	112.8	115.0	116.5	117.5	118.4	118.7	118.9	104.4	113.6	118.4
E. S. Central	109.0	90.1	104.4	107.8	109.5	112.0	113.9	115.2	115.7	116.6	117.0	117.1	102.8	112.6	116.6
W. S. Central	99.8	87.8	95.7	98.4	99.8	102.1	104.2	105.7	106.9	108.0	108.5	108.9	95.4	103.0	108.1
Mountain	114.7	102.7	114.2	117.9	119.4	122.2	124.2	125.4	126.3	126.9	127.2	127.4	112.4	122.8	127.0
Pacific	102.4	86.8	95.7	97.7	98.8	101.2	103.4	104.8	106.1	107.3	107.9	108.5	95.6	102.0	107.4
Real Personal Income (Billion \$2009)															
New England	890	978	934	901	961	996	914	907	918	926	932	937	926	945	928
Middle Atlantic	2,305	2,509	2,418	2,338	2,493	2,589	2,361	2,345	2,376	2,397	2,416	2,428	2,392	2,447	2,404
E. N. Central	2,453	2,695	2,569	2,499	2,680	2,796	2,540	2,515	2,540	2,559	2,576	2,588	2,554	2,633	2,566
W. N. Central	1,158	1,259	1,186	1,174	1,247	1,289	1,193	1,183	1,193	1,200	1,208	1,213	1,194	1,228	1,204
S. Atlantic	3,272	3,511	3,406	3,345	3,575	3,698	3,416	3,393	3,429	3,453	3,479	3,500	3,383	3,520	3,465
E. S. Central	909	989	934	921	994	1,036	947	938	947	953	959	963	938	979	955
W. S. Central	2,037	2,201	2,109	2,071	2,214	2,291	2,113	2,099	2,127	2,145	2,163	2,179	2,104	2,179	2,153
Mountain	1,216	1,322	1,263	1,238	1,321	1,370	1,263	1,254	1,268	1,277	1,287	1,295	1,260	1,302	1,282
Pacific	2,833	3,042	2,979	2,931	3,119	3,179	2,951	2,930	2,966	2,992	3,018	3,038	2,946	3,045	3,004
Households (Thousands)															
New England	5,896	5,877	5,900	5,924	5,938	5,952	5,964	5,973	5,984	5,995	6,006	6,016	5,924	5,973	6,016
Middle Atlantic	16,161	16,102	16,164	16,234	16,278	16,318	16,347	16,368	16,395	16,423	16,449	16,477	16,234	16,368	16,477
E. N. Central	18,864	18,814	18,901	18,988	19,045	19,102	19,147	19,184	19,224	19,253	19,281	19,312	18,988	19,184	19,312
W. N. Central	8,646	8,631	8,677	8,732	8,766	8,798	8,822	8,843	8,864	8,888	8,910	8,929	8,732	8,843	8,929
S. Atlantic	25,669	25,649	25,815	26,000	26,131	26,252	26,355	26,448	26,543	26,643	26,736	26,825	26,000	26,448	26,825
E. S. Central	7,659	7,647	7,689	7,738	7,769	7,798	7,821	7,841	7,861	7,883	7,903	7,921	7,738	7,841	7,921
W. S. Central	14,887	14,880	14,981	15,097	15,177	15,251	15,316	15,372	15,432	15,493	15,553	15,609	15,097	15,372	15,609
Mountain	9,464	9,470	9,544	9,628	9,690	9,749	9,801	9,849	9,897	9,943	9,987	10,026	9,628	9,849	10,026
Pacific	18,779	18,739	18,838	18,950	19,017	19,076	19,124	19,164	19,211	19,256	19,304	19,344	18,950	19,164	19,344
Total Non-farm Employment (Millions)															
New England	7.5	6.4	6.8	6.9	6.9	7.0	7.1	7.2	7.3	7.3	7.4	7.4	6.9	7.1	7.4
Middle Atlantic	20.1	16.8	18.0	18.3	18.3	18.6	18.9	19.1	19.3	19.6	19.7	19.9	18.3	18.7	19.6
E. N. Central	22.3	19.3	20.6	20.8	20.8	21.1	21.3	21.5	21.7	21.9	22.0	22.1	20.7	21.2	21.9
W. N. Central	10.8	9.8	10.2	10.3	10.3	10.4	10.5	10.5	10.6	10.7	10.7	10.8	10.3	10.4	10.7
S. Atlantic	29.4	26.4	27.6	28.0	28.2	28.5	28.8	29.0	29.2	29.4	29.5	29.7	27.8	28.6	29.4
E. S. Central	8.3	7.5	7.9	8.0	8.1	8.2	8.2	8.2	8.3	8.3	8.3	8.4	8.0	8.2	8.3
W. S. Central	17.9	16.4	16.9	17.2	17.3	17.5	17.7	17.8	17.9	18.0	18.1	18.2	17.1	17.6	18.1
Mountain	11.2	10.2	10.6	10.8	10.8	10.9	11.0	11.1	11.2	11.3	11.3	11.4	10.7	11.0	11.3
Pacific	24.0	20.9	21.8	22.1	22.2	22.6	22.9	23.1	23.4	23.6	23.8	24.0	22.2	22.7	23.7

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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 - April 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	2,732	973	115	1,996	2,997	841	126	2,100	3,076	859	126	2,100	5,815	6,063	6,160
Middle Atlantic	2,472	837	85	1,835	2,820	662	77	1,927	2,873	686	77	1,927	5,229	5,486	5,563
E. N. Central	2,787	847	125	2,099	3,084	685	109	2,232	3,151	729	109	2,232	5,858	6,110	6,221
W. N. Central	3,038	799	167	2,314	3,215	645	143	2,433	3,247	706	143	2,433	6,318	6,435	6,529
South Atlantic	1,107	251	17	874	1,348	181	10	913	1,370	189	10	911	2,249	2,452	2,481
E. S. Central	1,482	338	20	1,228	1,783	228	16	1,262	1,812	246	16	1,262	3,068	3,289	3,337
W. S. Central	968	102	8	736	1,282	66	4	764	1,147	81	4	763	1,814	2,116	1,996
Mountain	2,207	671	126	1,768	2,292	635	138	1,818	2,188	680	138	1,817	4,771	4,884	4,824
Pacific	1,540	525	65	1,085	1,530	582	89	1,209	1,524	594	90	1,210	3,214	3,411	3,417
U.S. Average	1,874	540	70	1,418	2,091	460	69	1,496	2,091	483	69	1,494	3,902	4,116	4,137
Heating Degree Days, Prior 10-year Average															
New England	3,152	823	105	2,128	3,133	856	107	2,099	3,099	859	112	2,121	6,207	6,195	6,190
Middle Atlantic	2,948	644	69	1,944	2,913	677	72	1,912	2,887	684	73	1,929	5,606	5,573	5,574
E. N. Central	3,197	698	102	2,197	3,157	731	104	2,170	3,133	725	101	2,196	6,194	6,162	6,155
W. N. Central	3,287	702	132	2,379	3,247	728	133	2,367	3,217	718	130	2,397	6,500	6,475	6,462
South Atlantic	1,459	169	10	952	1,393	180	11	914	1,378	184	11	915	2,589	2,498	2,487
E. S. Central	1,850	214	15	1,277	1,772	232	16	1,249	1,763	235	14	1,251	3,356	3,268	3,263
W. S. Central	1,199	83	3	794	1,140	86	3	786	1,143	88	3	781	2,078	2,015	2,015
Mountain	2,192	718	135	1,844	2,181	701	134	1,843	2,172	679	134	1,828	4,889	4,858	4,814
Pacific	1,456	580	85	1,162	1,462	553	81	1,147	1,452	532	80	1,137	3,284	3,243	3,202
U.S. Average	2,149	472	64	1,509	2,108	482	65	1,484	2,090	476	64	1,488	4,194	4,138	4,119
Cooling Degree Days															
New England	0	102	543	0	0	89	421	2	0	82	421	2	645	513	506
Middle Atlantic	0	156	680	4	0	161	556	5	0	152	556	5	841	723	714
E. N. Central	2	217	610	2	0	234	567	7	0	215	567	7	831	808	790
W. N. Central	6	295	662	3	0	290	711	11	3	263	711	11	967	1,013	988
South Atlantic	197	620	1,234	302	150	663	1,184	249	133	665	1,185	249	2,352	2,246	2,232
E. S. Central	72	422	1,059	79	21	534	1,086	75	28	515	1,086	74	1,632	1,715	1,704
W. S. Central	175	843	1,501	210	81	926	1,533	215	89	870	1,533	215	2,730	2,755	2,707
Mountain	10	468	1,085	117	14	450	948	79	20	434	949	79	1,680	1,491	1,482
Pacific	24	197	721	127	25	167	579	59	27	165	579	59	1,069	830	829
U.S. Average	71	397	937	122	47	419	876	100	46	404	877	100	1,526	1,441	1,428
Cooling Degree Days, Prior 10-year Average															
New England	0	83	471	1	0	80	474	1	0	82	468	1	554	555	551
Middle Atlantic	0	170	609	6	0	163	609	6	0	160	601	7	785	779	767
E. N. Central	3	240	579	8	3	234	572	7	3	236	565	7	829	816	811
W. N. Central	7	296	696	11	7	294	686	10	7	297	678	10	1,010	998	992
South Atlantic	127	696	1,202	247	143	680	1,196	261	147	673	1,191	266	2,272	2,280	2,278
E. S. Central	36	557	1,082	72	42	532	1,064	74	42	528	1,064	78	1,747	1,713	1,711
W. S. Central	100	892	1,576	207	114	881	1,567	210	112	869	1,542	213	2,774	2,772	2,736
Mountain	24	432	939	81	24	445	954	86	24	454	949	86	1,476	1,509	1,513
Pacific	31	185	624	78	31	193	647	86	31	199	651	85	917	957	966
U.S. Average	47	420	892	100	52	415	894	105	53	415	889	107	1,459	1,466	1,463

- = no data available

Notes: EIA completed modeling and analysis for this report on Thursday April 1, 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 April 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

	Feb-21	Mar-21	Feb 2021 - Mar 2021 Average	Feb 2020 - Mar 2020 Average	2018 - 2020 Average
Global Petroleum and Other Liquids (million barrels per day)					
Global Petroleum and Other Liquids Production (a)	92.0	93.5	92.8	100.4	98.6
Global Petroleum and Other Liquids Consumption (b)	96.0	96.0	96.0	94.5	97.8
Biofuels Production (c)	1.9	2.0	1.9	2.0	2.5
Biofuels Consumption (c)	2.2	2.2	2.2	2.2	2.3
Iran Liquid Fuels Production	3.1	3.1	3.1	3.0	3.5
Iran Liquid Fuels Consumption	1.9	1.9	1.9	2.0	1.8
Petroleum and Petroleum Products Produced and Consumed in Countries Other Than Iran (million barrels per day)					
Production (d)	87.0	88.3	87.7	95.4	92.6
Consumption (d)	91.9	91.9	91.9	90.3	93.7
Production minus Consumption	-4.9	-3.6	-4.2	5.1	-1.1
World Inventory Net Withdrawals Including Iran	4.0	2.5	3.2	-5.9	-0.8
Estimated OECD Inventory Level (e) (million barrels)	2,951	2,932	2,941	2,918	2,942
Surplus Production Capacity (million barrels per day)					
OPEC Surplus Crude Oil Production Capacity (f)	8.5	8.5	8.5	3.2	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	February	March	February 2021-	February 2020-	2018–2020
	2021	2021	March 2021 Average	March 2020 Average	
Brent Front Month Futures Price (\$ per barrel)	62.28	65.70	64.15	42.05	59.69
WTI Front Month Futures Price (\$ per barrel)	59.06	62.36	60.87	50.54	53.76
Dubai Front Month Futures Price (\$ per barrel)	61.11	64.39	62.91	43.32	59.01
Brent 1st - 13th Month Futures Spread (\$ per barrel)	5.13	5.23	5.18	20.63	1.01
WTI 1st - 13th Month Futures Spread (\$ per barrel)	5.15	5.29	5.23	-0.19	0.57
RBOB Front Month Futures Price (\$ per gallon)	1.74	2.01	1.89	1.54	1.61
Heating Oil Front Month Futures Price (\$ per gallon)	1.79	1.86	1.82	1.62	1.76
RBOB - Brent Futures Crack Spread (\$ per gallon)	0.26	0.44	0.36	0.54	0.19
Heating Oil - Brent Futures Crack Spread (\$ per gallon)	0.30	0.29	0.30	0.62	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).