



**CALIFORNIA
ENERGY COMMISSION**



California Energy Commission

STAFF REPORT

Quarterly Petroleum Supply and Pricing Report

January 2025 Through March 2025

July 2025 | CEC-200-2025-020

California Energy Commission

Andrea Bailey

Sunit Chawla

Kelsie Goff

Foua Moua

Bryan Neff

Jesten Ruiz

Eric Sanchez

Alexander Wong

Primary Authors

Bryan Neff

Project Manager

Max Solanki

Branch Manager

FUELS ANALYSIS BRANCH

Aleecia Gutierrez

Director

ENERGY ASSESSMENTS DIVISION

Drew Bohan

Executive Director

DISCLAIMER

Staff members of the California Energy Commission (CEC) prepared this report. As such, it does not necessarily represent the views of the CEC, its employees, or the State of California. The CEC, the State of California, its employees, contractors, and subcontractors make no warrant, express or implied, and assume no legal liability for the information in this report; nor does any party represent that the uses of this information will not infringe upon privately owned rights. This report has not been approved or disapproved by the CEC, nor has the Energy Commission passed upon the accuracy or adequacy of the information in this report.

ABSTRACT

California Public Resources Code Section 25358 requires the California Energy Commission (CEC) to prepare a report every quarter that summarizes and analyzes petroleum industry supply, production, transportation, delivery and distribution, demand, and prices. This report looks at information collected by the CEC through the Petroleum Industry Information Reporting Act of 1980 and the associated regulations for analyzing trends in liquid fuel production, storage, and distribution. CEC staff developed new metrics using these data to help better inform the California public on the operations of the liquid transportation fuels supply chain. In addition, staff analyzed other data sources to provide a more comprehensive discussion of California's liquid transportation fuel issues.

Topics included in this report:

- California, United States, and world crude oil prices
- Inventories of crude oil at California refineries
- Quantity of crude oil processed at California refineries
- Production of liquid transportation fuels
- Inventories of liquid transportation fuels
- Prices of liquid transportation fuels
- Import and export volumes of liquid transportation fuels for California

Keywords: California Energy Commission, transportation, gasoline, petroleum, diesel, liquid fuels

Please use the following citation for this report:

Neff, Bryan, Andrea Bailey, Sunit Chawla, Kelsie Goff, Foua Moua, Jesten Ruiz, Eric Sanchez, and Alexander Wong. 2025. *Quarterly Petroleum Supply and Pricing Report, January 2025 Through March 2025*. California Energy Commission. Publication Number: CEC-200-2025-020.

TABLE OF CONTENTS

	Page
Abstract	i
Table of Contents.....	ii
List of Figures.....	ii
List of Tables.....	iii
Executive Summary.....	1
CHAPTER 1: Crude Oil.....	3
Prices	3
Monthly Production	6
Inventory.....	7
Inputs	8
Imports	9
CHAPTER 2: Gasoline.....	12
Production	12
Inventory.....	13
Prices	14
Imports and Exports.....	16
CHAPTER 3: Diesel.....	19
Production	19
Inventory.....	20
Prices	21
Imports and Exports.....	23
CHAPTER 4: Annual Data	25
CHAPTER 5: Senate Bill X1-2	28
Monthly Refining Margin	28
Daily Spot Contracts	28
California Refinery Planned and Unplanned Maintenance	29
96-Hour Planned Imports.....	29
APPENDIX A: Glossary.....	1

LIST OF FIGURES

Figure 1: Daily Spot Crude Oil Prices	5
Figure 2: Monthly Crude Oil Production Report.....	7

Figure 3: California Refinery Crude Oil Inventories (With 10-Year High-Low Band).....	8
Figure 4: California Refinery Crude Oil Inputs (With 10-Year High-Low Band)	9
Figure 5 Crude Oil Imports	10
Figure 6: Crude Rail Lines of Southern California.....	11
Figure 7: CaRFG Production (With 10-Year High-Low Band).....	13
Figure 8: CaRFG and Blendstock Inventories (With 10-Year High-Low Band)	14
Figure 9: Regular Grade Gasoline Retail Prices: California vs. West Coast vs. United States	15
Figure 10: California Gasoline Retail Prices by Brand	16
Figure 11: California Gasoline Imports and Exports	18
Figure 12: Diesel Production (With 10-Year High-Low Band).....	20
Figure 13: Diesel Inventories (With 10-Year High-Low Band)	21
Figure 14: Diesel Prices: California vs. West Coast vs. United States	22
Figure 15: Diesel Retail Prices by Region	23
Figure 16: California’s Diesel Imports and Exports.....	24

LIST OF TABLES

Page

Table 1: Crude Oil Imports by Rail Lines of Southern California	Error! Bookmark not defined.
---	-------------------------------------

EXECUTIVE SUMMARY

This report describes the trends and relevant issues faced by California's liquid transportation fuels market. Using information from the Petroleum Industry Information Reporting Act of 1980 and associated data collection regulations, as well as from public and proprietary sources, California Energy Commission (CEC) staff details the flows of liquid fuels and volumes of the product that is being moved and produced in California. The following are key observations of market activity in the last quarter.

Crude oil prices exhibited wide changes due to international concerns, including trade tensions, proposed production increases by the Organization of Petroleum Exporting Countries, and potential sanctions on Iranian crude oil. These changes resulted in crude oil prices peaking in the middle of January before declining to the middle of March and ending the quarter on an upward trend. However, despite this volatility, California estimated refinery acquisition costs ended the first quarter lower than it started, \$75.08 per barrel compared to \$79.62 per barrel.

The seasonal trend in gasoline prices during the first quarter was overshadowed by two unplanned refinery outages: PBF Martinez starting February 1, and PBF Torrance starting March 13. The first outage led to the quarterly peak price February 24 of \$4.61 before declining until the second outage occurred. Prices ended the quarter on an upward trajectory, not having fully peaked from the second outage. Gasoline imports reached a new high in March, estimated at 5.3 million barrels. The average gasoline price for the first quarter was \$4.39, \$0.10 higher than the previous quarter. The combination of lower crude oil prices and higher gasoline prices increased refiner margins during the quarter, averaging \$0.43 per gallon in January and \$0.80 per gallon in February.

Diesel price was also affected by the refinery outages, peaking February 24 at \$4.88 per gallon. Diesel price ended the quarter at \$4.78 per gallon, just below the quarterly average of \$4.79 per gallon. Contrary to gasoline, diesel continued the trend of low imports and high exports.

CHAPTER 1:

Crude Oil

This chapter discusses crude oil market data changes for the quarter, including international and national prices, monthly production at California refineries, volume of crude oil stored at refineries, volume of crude oil used at refineries (referred to as “inputs”), and the movement of crude oil using data collected under Public Resources Code Section 25354 (a) and (f), and Public Resources Code Section 25357.

Prices

Figure 1 shows the daily West Coast spot crude oil prices for Brent North Sea (Brent), West Texas Intermediate (WTI), and the California estimated refinery acquisition cost (CA-RAC). Brent crude oil, an international benchmark, is the best surrogate price for foreign sources of crude oil processed at California refineries. WTI is included as it is the domestic benchmark. The CA-RAC is a weighted average of the prices of California (San Joaquin Valley) crude, Alaskan crude, and foreign crude. Since Oil Pricing Information Systems (OPIS) no longer publishes SJV crude oil prices, this quarterly report transitions to U.S. Energy Information Administration’s California Crude Oil First Purchase Price.¹ Going forward, this report will use the CA-FPP (First Purchase Price) in place of SJV crude oil. The new estimated refinery acquisition cost will be referred to as CA-RAC (FPP)

Crude oil prices for the Brent North Sea and West Texas Intermediate estimated refinery acquisition cost rose in the first half of January before trending downward into the first half of March. After bottoming out for the quarter, both crude indexes ramped upward through the end of the quarter.

Brent and WTI ended that quarter 15 percent lower than the previous year. The decrease in crude oil prices can be tied to declining oil demand from trade tensions, global conflicts, and expected increase in output from the Organization of Petroleum Exporting Countries (OPEC).²

1 U.S. Energy Information Administration. [“Petroleum & Other Liquids,”](https://www.eia.gov/dnav/pet/hist/LeafHandler.ashx?n=pets&s=f005006__3&f=m)
https://www.eia.gov/dnav/pet/hist/LeafHandler.ashx?n=pets&s=f005006__3&f=m.

2 Varghese, Sherin Elizabeth and Noel John. March 31, 2025. [“Softer Demand Outlook to Weigh on Oil, OPEC+ Walks a Tightrope,”](https://www.reuters.com/business/energy/softer-demand-outlook-weigh-oil-opec-walks-tightrope-2025-03-31/) Reuters, <https://www.reuters.com/business/energy/softer-demand-outlook-weigh-oil-opec-walks-tightrope-2025-03-31/>.

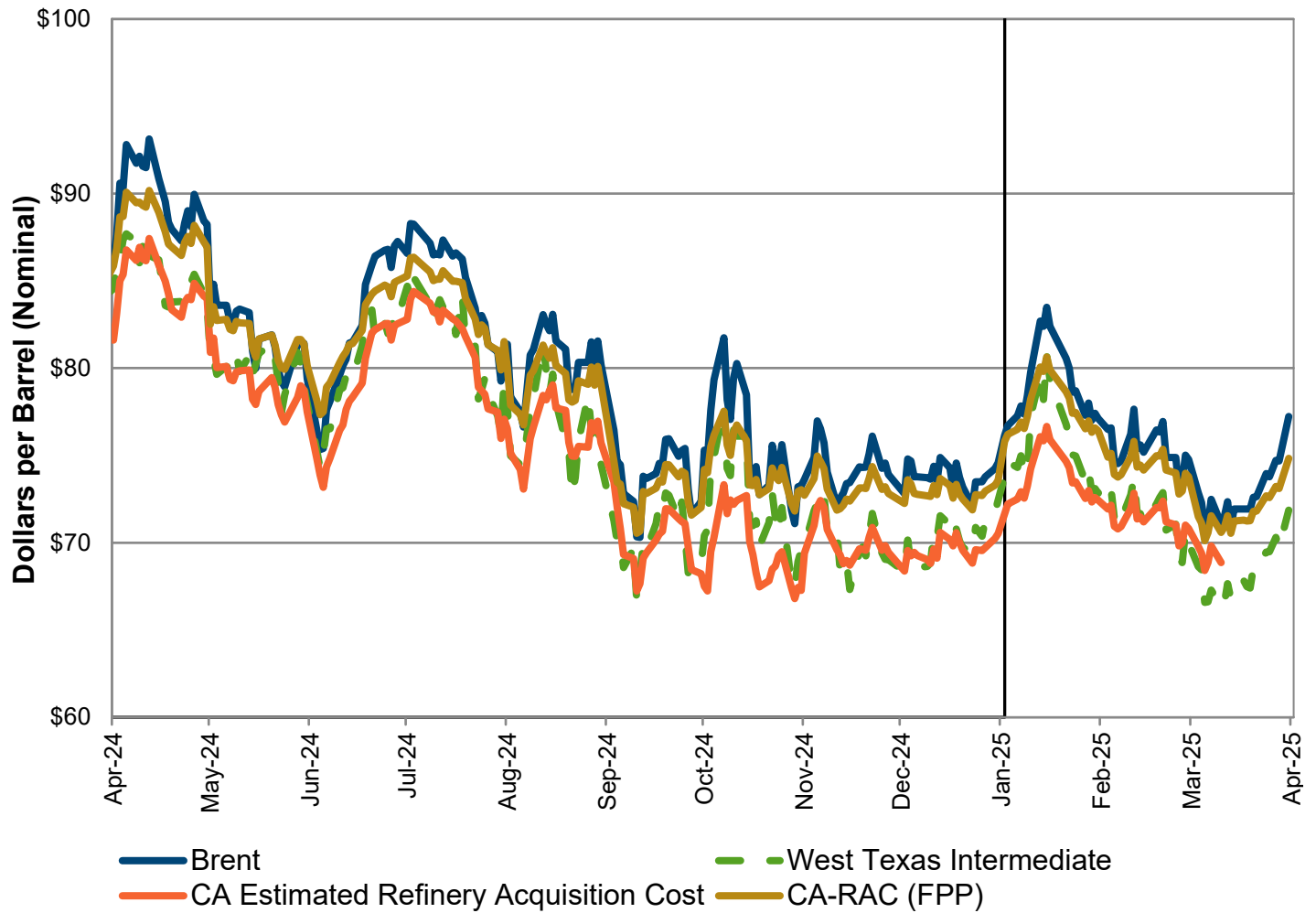
However, on March 13, U.S. sanctions on Iranian oil effectively lowered market supply and placed upward pressure on Brent and WTI prices.³

For the first quarter of 2025:

- The Brent price started the first quarter at \$76.14 per barrel and ended the first quarter at \$77.23, with a peak price of \$83.48 on January 15. Brent performed the strongest during the first month of the quarter, averaging \$78.96 for January. After peaking in the middle of January, Brent trended downward into March with a few price spikes in February. On March 13 it reached the minimum of \$70.82 before a continuous increase through the end of the quarter.
- Brent crude oil averaged \$75.68 for the first quarter, a \$1.02 increase from the previous quarter. Brent crude oil peak price was \$83.48 on January 15. WTI crude oil averaged \$71.74 in the first quarter, \$0.89 higher than the previous quarter. WTI crude oil peak price was \$80.73 on January 15.
- The WTI price started the first quarter at \$73.79 and ended at \$71.87 with a peak price of \$80.73 on January 15. The average difference between WTI and Brent crude was \$3.94 for the first quarter and ranged between \$2.08 and \$5.36.
- The CA-RAC (FPP) started the first quarter at \$75.81 and ended at \$74.84, with a peak price of \$80.61 on January 15. The average difference between CA-RAC (FPP) and Brent crude was \$1.08 for the first quarter and ranged between -\$0.73 and \$4.21. The CA-RAC (FPP) averaged \$74.55 for the first quarter, \$0.96 higher than the average of the previous quarter.

³ <https://www.state.gov/sanctions-on-irans-oil-minister-and-shadow-fleet-to-exert-maximum-pressure/>

Figure 1: Daily Spot Crude Oil Prices



Note: Black vertical line on graphs indicates end of previous quarter's data. Areas to the right indicate new data since last quarter. SJV Crude Oil Price no longer available March 2025. EIA California Crude Oil First Purchase Price will be used going forward.

Source: EIA, OPIS

Monthly Production

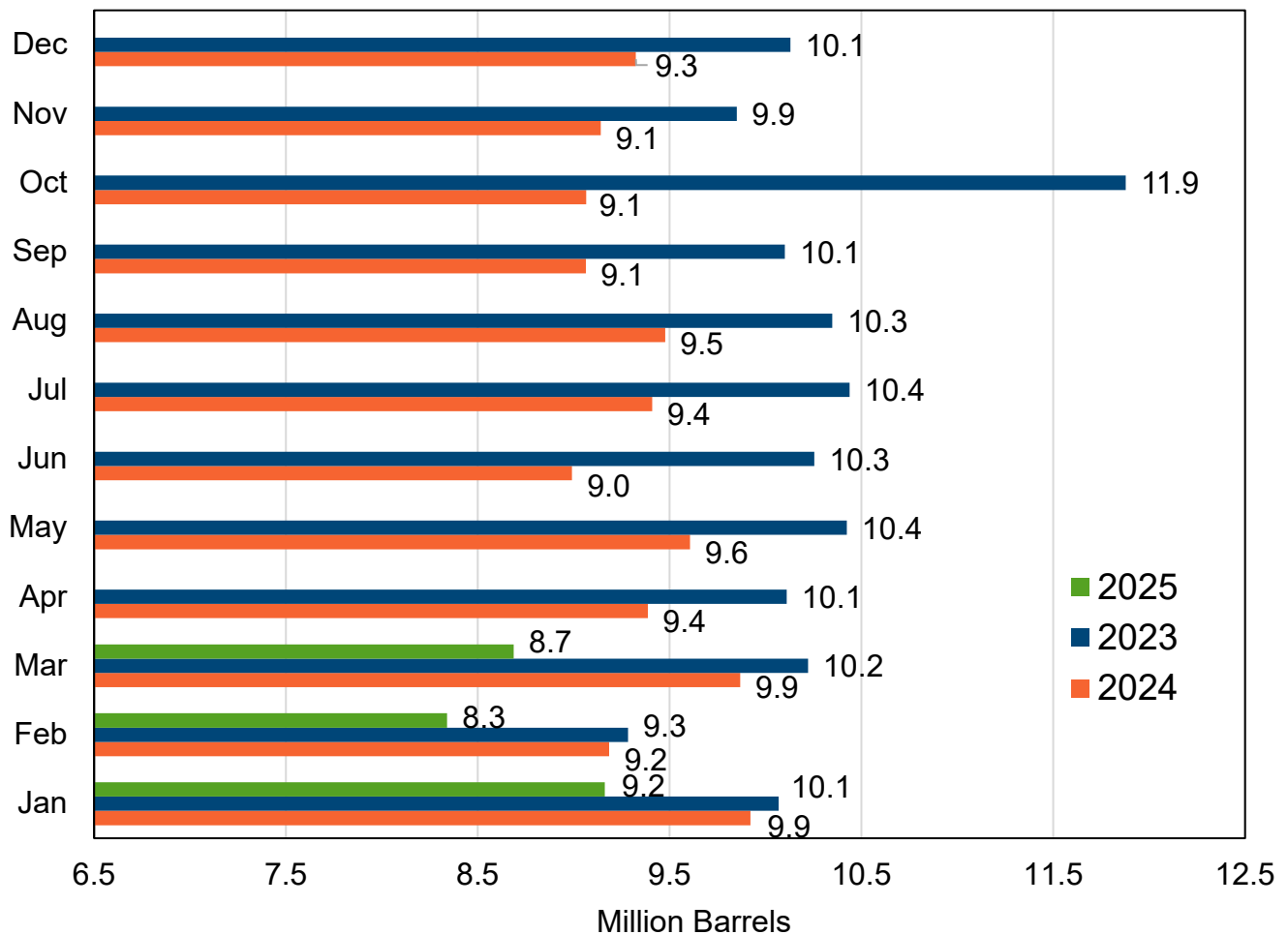
Figure 2 below shows the monthly crude oil production as reported by the State Oil and Gas Supervisor. Monthly production during the first quarter of 2025 was 9.2 million, 8.3 million, and 8.7 million barrels, for January, February, and March, respectively. Total production in the first quarter of 2025 was 26.2 million barrels, 2.8 million barrels lower compared to the first quarter of 2024 (29.0 million barrels). The year-over-year decreases observed in Figure 2 illustrate California's continued crude oil production decline. California crude oil production has been in steady decline since 1985.⁴ This decline is due to the geological properties of the crude, the age of the wells, and the associated production costs.⁵ While in-state production has declined, the percentage of crude oil from California oil fields processed by California refineries during 2024 has stayed similar to 2023, 23 percent.⁶

4 U.S. Energy Information Administration. ["Petroleum and Other Fluids,"](https://www.eia.gov/dnav/pet/hist/LeafHandler.ashx?n=PET&s=MCRFPCA1&f=A)
<https://www.eia.gov/dnav/pet/hist/LeafHandler.ashx?n=PET&s=MCRFPCA1&f=A>.

5 Geological properties of crude oil include but are not limited to density, sulfur content, viscosity, hydrocarbon makeup, dissolved gases, salinity, wax content, and trace metals.

6 California Energy Commission, ["Annual Oil Supplies to California Refineries,"](https://www.energy.ca.gov/data-reports/energy-almanac/californias-petroleum-market/annual-oil-supply-sources-california) <https://www.energy.ca.gov/data-reports/energy-almanac/californias-petroleum-market/annual-oil-supply-sources-california>.

Figure 2: Monthly Crude Oil Production Report



Source: [California Geologic Energy Management Division \(CalGEM\) WellSTAR data dashboard](https://www.conservation.ca.gov/calgem/Online_Data/Pages/WellSTAR-Data-Dashboard.aspx)
(https://www.conservation.ca.gov/calgem/Online_Data/Pages/WellSTAR-Data-Dashboard.aspx)

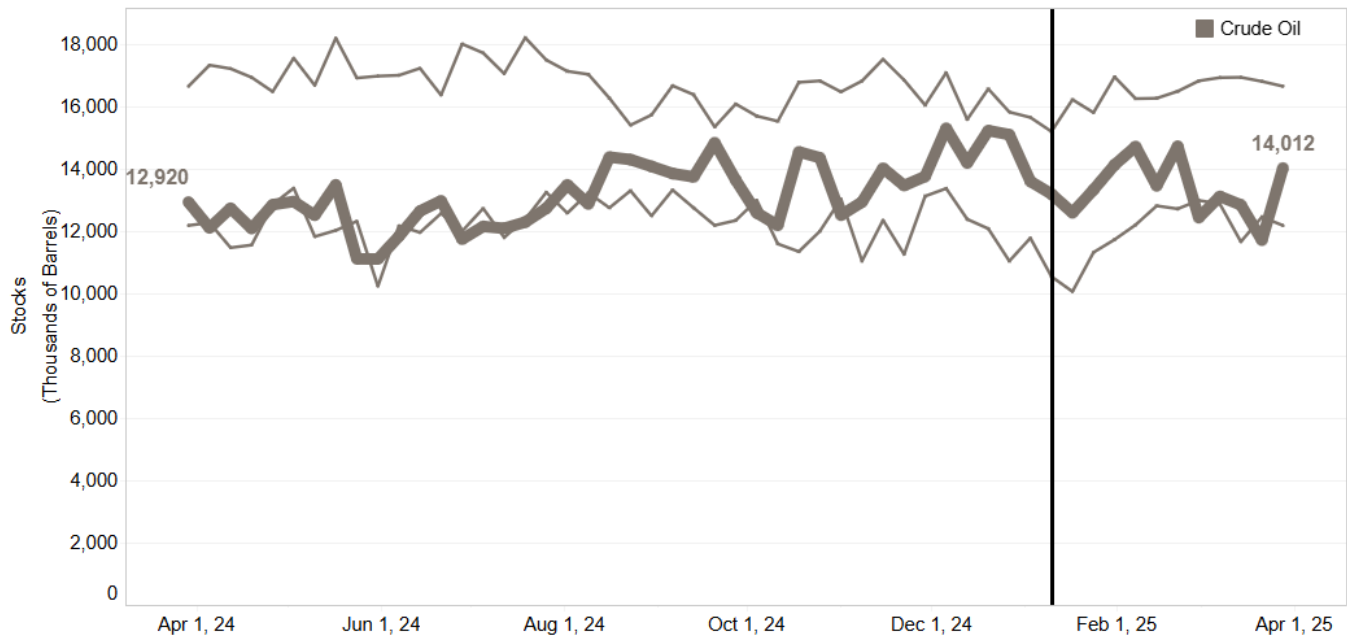
Inventory

Figure 3 shows the volume of crude oil inventories at California refineries. In the first quarter of 2025 (January–March), crude oil inventories started the period above the 10-year low. Inventories reached the quarterly high of 14.7 million barrels during week ending February 21, 3.0 million barrels higher than the quarterly low of 11.7 million barrels during week ending March 21. Crude oil inventories are likely to remain below the 10-year high due to reduced storage capacity following recent refinery conversions, including the P66 Rodeo conversion to renewables.

For the first quarter of 2025:

- Crude stocks started the quarter at 13.2 million barrels, 6.3 percent lower than the previous year (14.1 million barrels).
- Crude stocks ended the quarter at 14.0 million barrels, 8.5 percent higher than the previous year (12.9 million barrels).

Figure 3: California Refinery Crude Oil Inventories (With 10-Year High-Low Band)



Note: Inventory, input, and production charts include 10-year high-low bands. These bands provide a rolling average of the highs and lows and allow comparison of the current inventory, input, or production to the highs and lows of the historical trends.

Source: CEC Petroleum Industry Information Report Act (PIIRA) data — [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks), available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks>

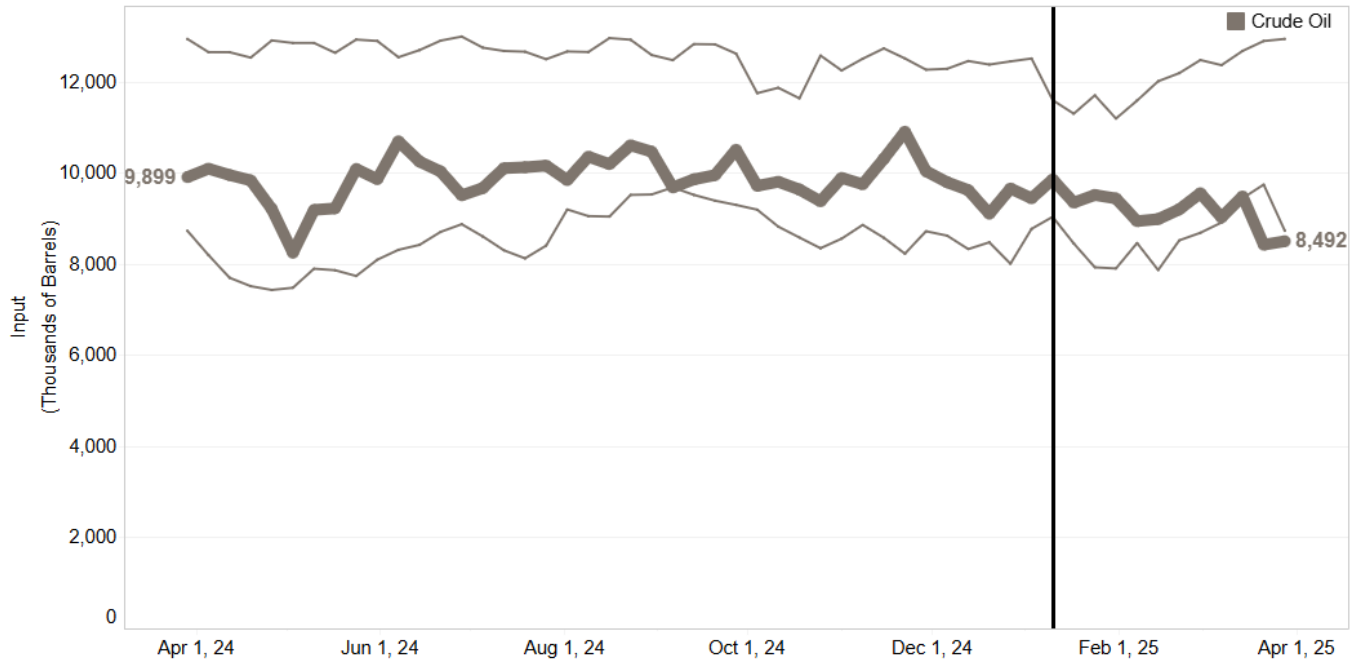
Inputs

Figure 4 shows the volume of crude oil used at refineries, referred to as “inputs.” Crude oil inputs started the quarter above the 10-year low and stayed within the historical range for most of the quarter. The quarterly low of 8.4 million barrels occurred the week of March 21, while the quarterly high of 9.8 million barrels occurred the first week of the quarter (January 10).

For the first quarter of 2025:

- Inputs started the first week of the quarter at 9.8 million barrels, 2.7 percent lower than the previous year (10.1 million barrels).
- Inputs ended the last week of the quarter at 8.5 million barrels, 14.2 percent lower compared to the same quarter of the previous year (9.9 million barrels).
- Average weekly input for the quarter was 9.2 million barrels, 1.3 percent higher compared to last year’s quarterly average of 9.1 million barrels per week.

Figure 4: California Refinery Crude Oil Inputs (With 10-Year High-Low Band)



Source: CEC PIIRA data – [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production), available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production>.

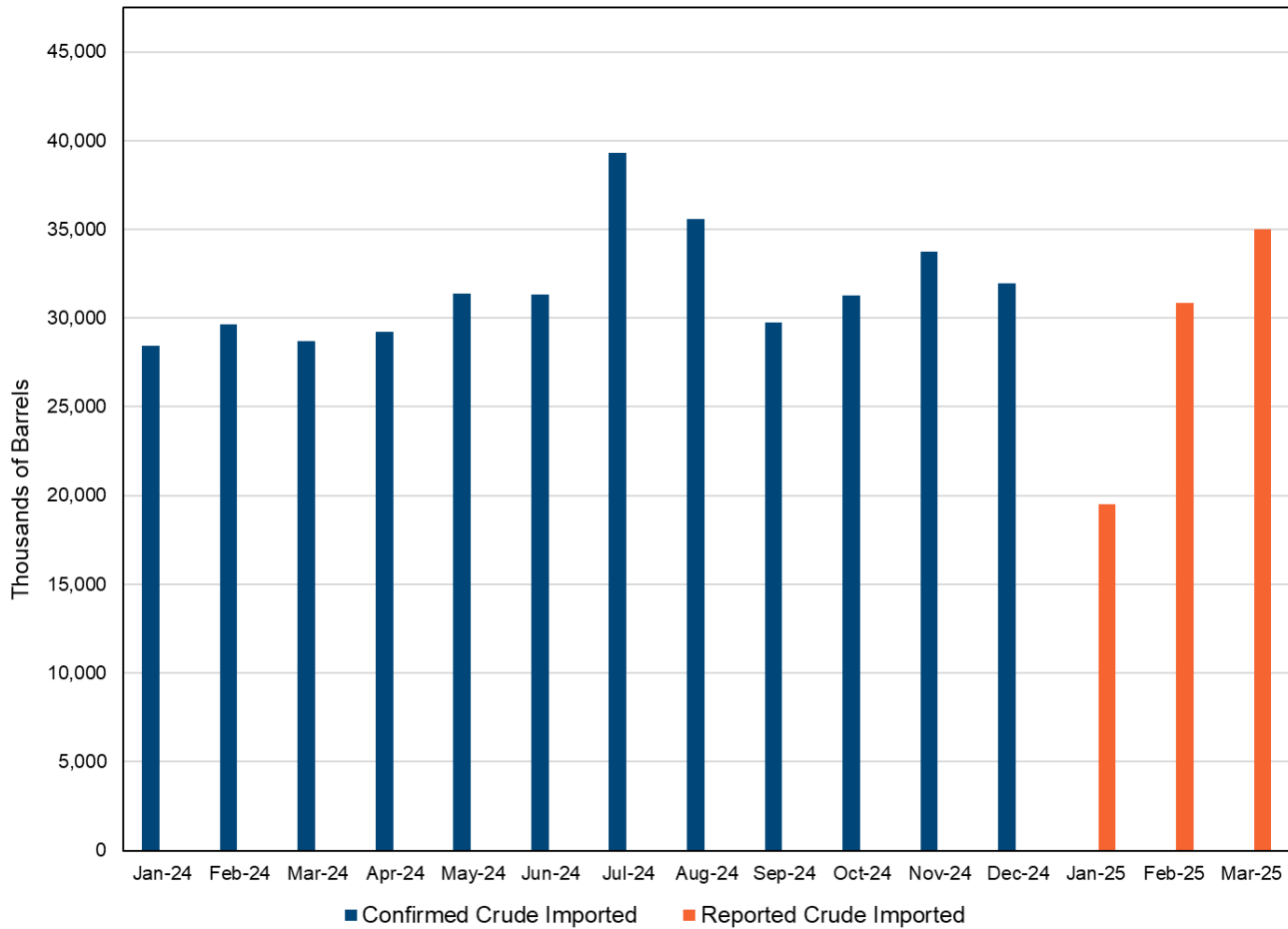
Imports

Figure 5 shows crude oil imports to California refineries. Imports include domestic and foreign sources received by marine and rail. Imports are shown as reported and confirmed. Reported imports are aggregated, or combined, reported raw data from a single form. Confirmed imports are data that have been cross-checked with additional sources of data and represent a more accurate estimate of imports.

For the first quarter of 2025:

- Reported crude oil imports decreased in January and increased in February and March. Imports in January 2025 were 19.5 million barrels, followed by 30.9 million and 35.0 million barrels in February and March 2025.
- Imports during the three-month period of January to March was greater than the total from the previous three months, increasing by 2.8 percent. From October 2024 to December 2024, California refineries imported 83.1 million barrels of crude oil compared to 85.4 million barrels from January to March 2025.
- Reported imports decreased 5.2 million barrels compared to January to March of the previous year, a 5.7 percent decrease.

Figure 5: Crude Oil Imports



Note: "Reported Crude Oil Imported" data are reported directly to the CEC through Form M700. "Confirmed Crude Oil Imported" is Form M700 data that are confirmed with Port Import/Export Reporting Service (PIERS), California State Lands Commission (SLC), and U.S. Energy Information Administration (EIA) data through May 31, 2024.

Source: CEC PIIRA data — California Imports, Exports, and Intrastate Movements Monthly Report, Form M700

Figure 6 shows the routes used to import crude oil into California by rail car. Crude-by-rail imports are driven by refinery orders, and the refineries that have recently ordered crude oil by rail are in Southern California. Crude oil is transferred from rail car to pipeline in Bakersfield to complete the journey to Southern California refineries. These rail lines are not exclusive to crude oil transport but are used to transport all commodities and ferry passengers.

Figure 6: Crude Rail Lines of Southern California



Source: California Department of Transportation, BNSF, CEC

A single rail tank car carries about 700 barrels. Nonfloating crude oil is denser than water, which requires it to have an American Petroleum Institute gravity of 10 or less.⁷ California does not import any nonfloating crude. Since the beginning of 2023, crude oil by rail originates in North Dakota and exclusively travels through Arizona as crude traveling through Nevada dropped to zero. Limited shipments by rail prevent publication of these data to maintain reporter confidentiality.

⁷ *American Petroleum Institute gravity* is a measurement of how heavy or light a petroleum liquid is compared to water.

CHAPTER 2:

Gasoline

This chapter discusses the volume of California reformulated gasoline (CaRFG) produced at California refineries, inventories of CaRFG and blendstocks, gasoline prices, and movement of gasoline using data collected under Public Resources Code Section 25354 (a), (h), and (i). Since 2011, CaRFG contains 10 percent ethanol, which is included in the production and inventory totals shown in this chapter.

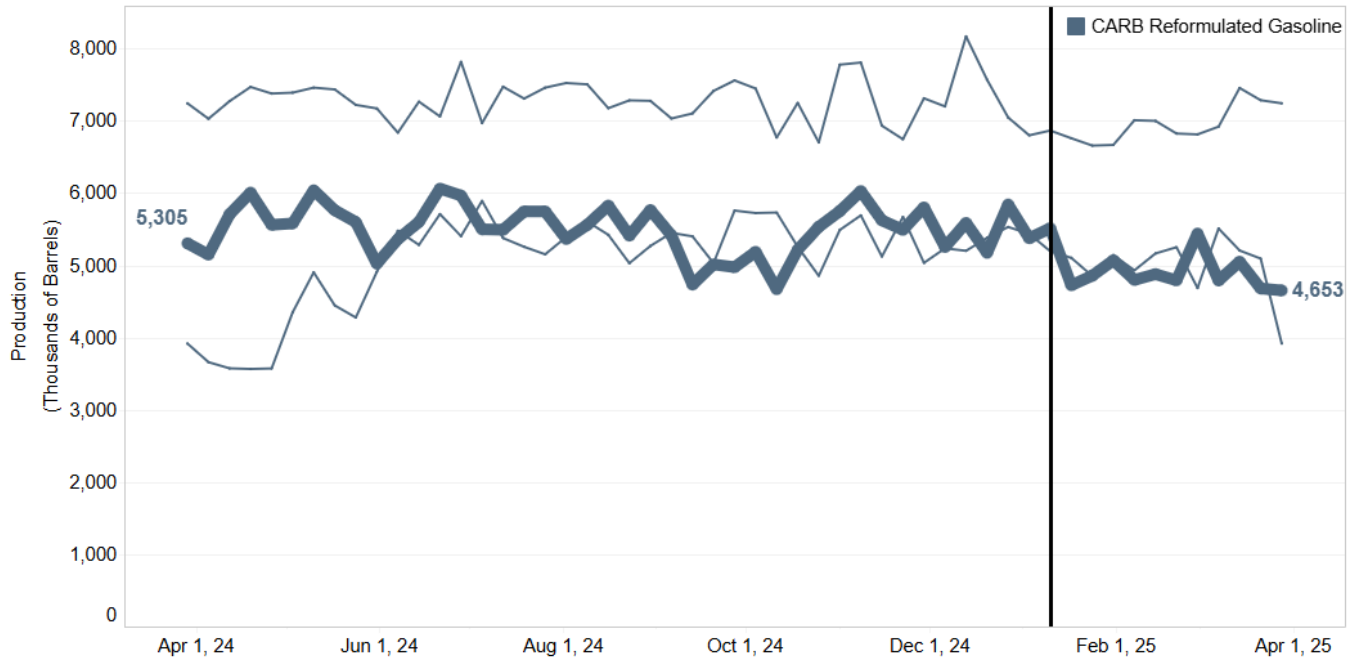
Production

Figure 7 shows CaRFG production for the previous year with the 10-year high-low band. CaRFG production fluctuated throughout the quarter, ending lower than it started, with peaks on January 10 and February 28, and lows on March 21 and March 28. Part of the reason for these lows is the Phillips 66 Rodeo facility conversion from conventional fuel production to renewable fuels in the first quarter of 2024, which has reduced refining capacity and lowered overall in-state gasoline production.

For the first quarter of 2025:

- CaRFG production peaked during the quarter at 5.4 million barrels the week ending February 28.
- The quarterly low of 4.7 million barrels occurred the week ending March 28.
- CaRFG production began the quarter at 5.5 million barrels, 5.6 percent less than the previous year's fourth quarter start of 5.8 million barrels.
- CaRFG production ended the quarter at 4.7 million barrels, 12.3 percent less than the previous year's first quarter close of 5.3 million barrels.

Figure 7: CaRFG Production (With 10-Year High-Low Band)



Source: CEC PIIRA data — [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production) available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production>

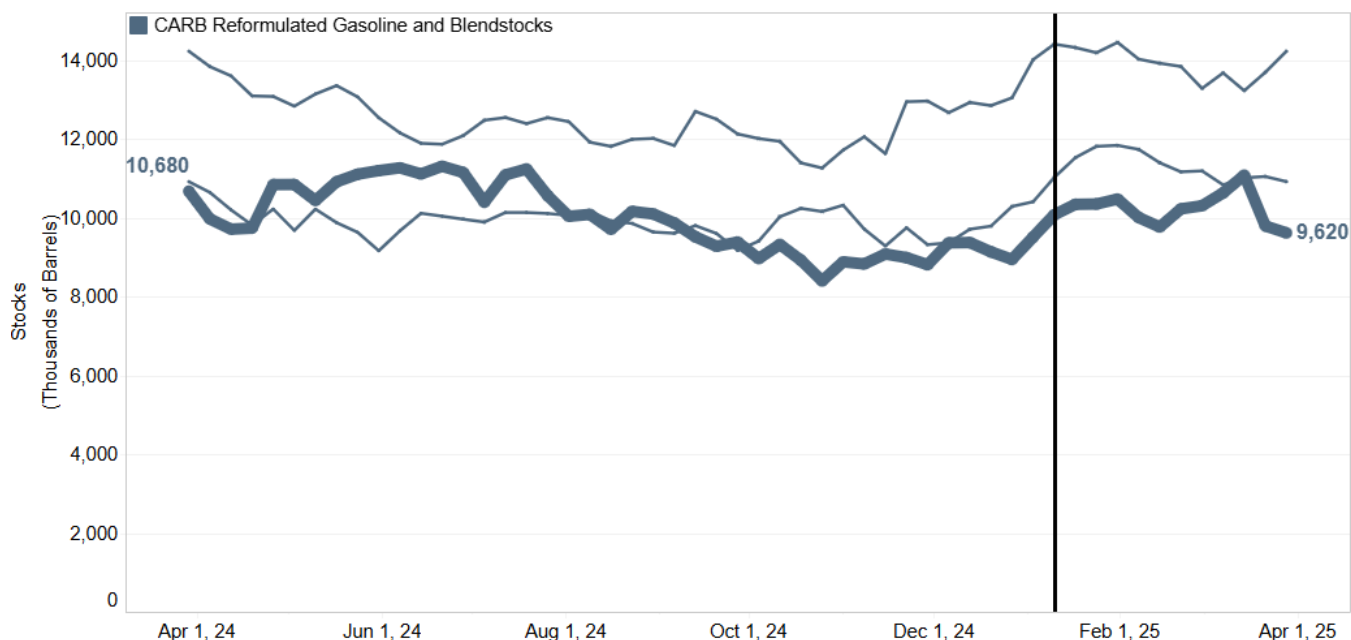
Inventory

Figure 8 shows the CaRFG and blendstock inventories for the previous year with the 10-year high-low band. At the start of the quarter, CaRFG and blendstock inventories were below the 10-year low. Inventories rose to a quarterly high of 11.1 million barrels the week ending March 14, 1.5 million barrels higher than the quarterly low (9.6 million barrels), which occurred the last week of the quarter (March 28).

For the first quarter of 2025:

- CaRFG and blendstock inventories experienced moderate fluctuations during the quarter.
- CaRFG and blendstock inventories ended the quarter lower (9.6 million barrels) than they began (10.1 million barrels).
- CaRFG and blendstock inventories were 1.1 million barrels lower than they were a year ago (10.7 million barrels).

Figure 8: CaRFG and Blendstock Inventories (With 10-Year High-Low Band)



Source: CEC PIIRA data — [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks), available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks>

Prices

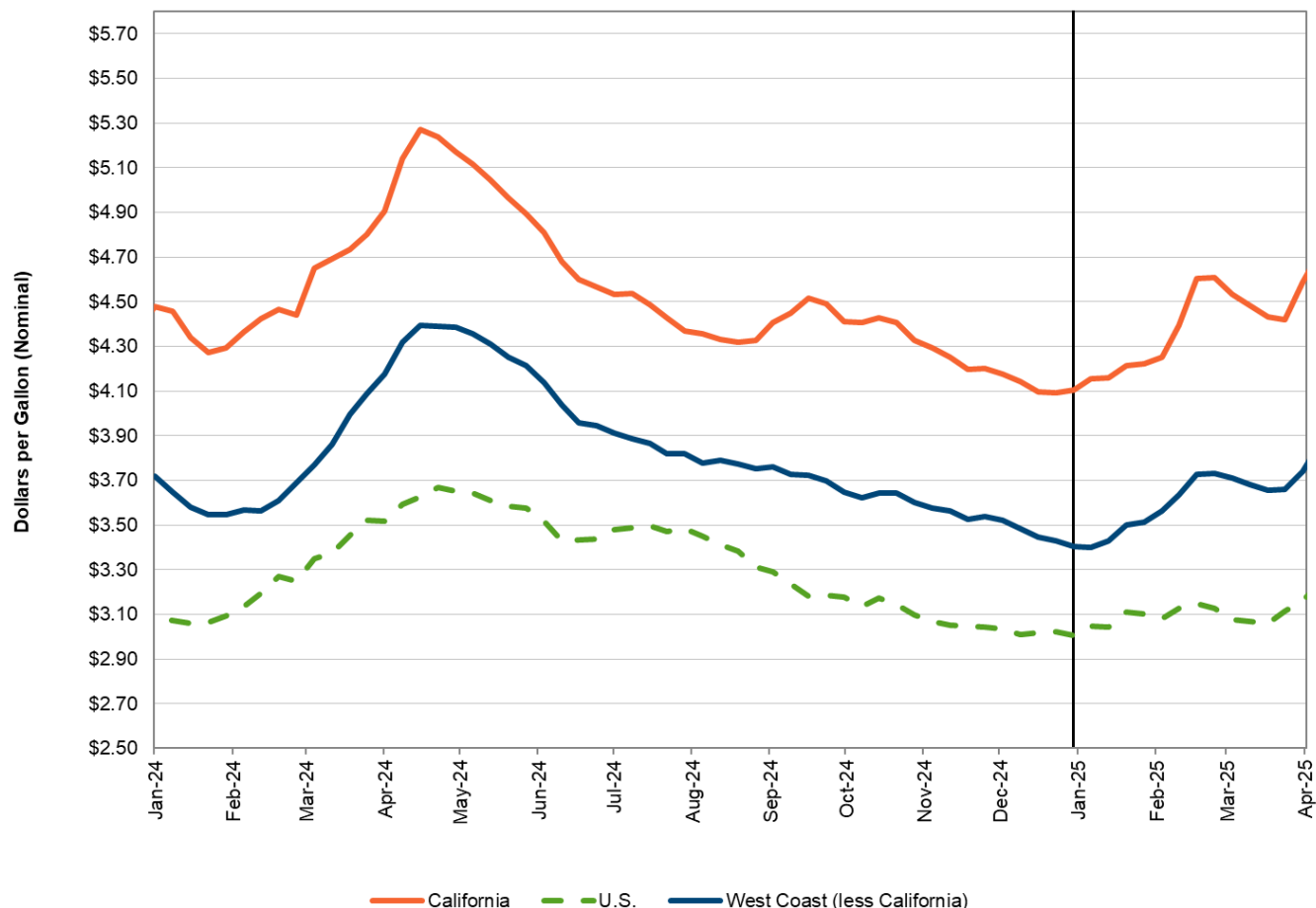
Figure 9 shows regular grade gasoline retail prices through the first quarter. Since CaRFG differs from gasoline sold nationally, all gasoline prices refer to regular grade regardless of specification. Gasoline prices increased during the first quarter in all regions similarly to first quarter of 2024. California and West Coast (less California) had a higher price increase than the U.S.

For the first quarter of 2025:

- U.S. gasoline price increased a total of \$0.11 from January 6 of \$3.05 to \$3.16 on March 31. Prices dipped during this upward trend, decreasing from \$3.15 on February 17 to \$3.06 on March 17.
- California gasoline prices had the largest price increase during the first quarter from \$4.15 on January 6 to \$4.61 on February 24, increasing \$0.45 within seven weeks. The premium price of \$4.61, on February 24, was the highest price for the first quarter of 2025.
- Trends in California gasoline price were overshadowed by two unplanned refinery outages: PBF Martinez starting on February 1, and PBF Torrance starting on March 13.
- California gasoline averaged \$4.39 for the first quarter, while U.S. and West Coast (less California) average \$3.10 and \$3.61, respectively.

- West Coast (less California) retail prices averaged \$0.78 less than California prices and averaged \$0.51 more when compared to the U.S. prices. West Coast prices increased from \$3.40 on January 6 to \$3.74 on March 31.

**Figure 9: Regular Grade Gasoline Retail Prices:
California vs. West Coast vs. United States**



Source: U.S. EIA

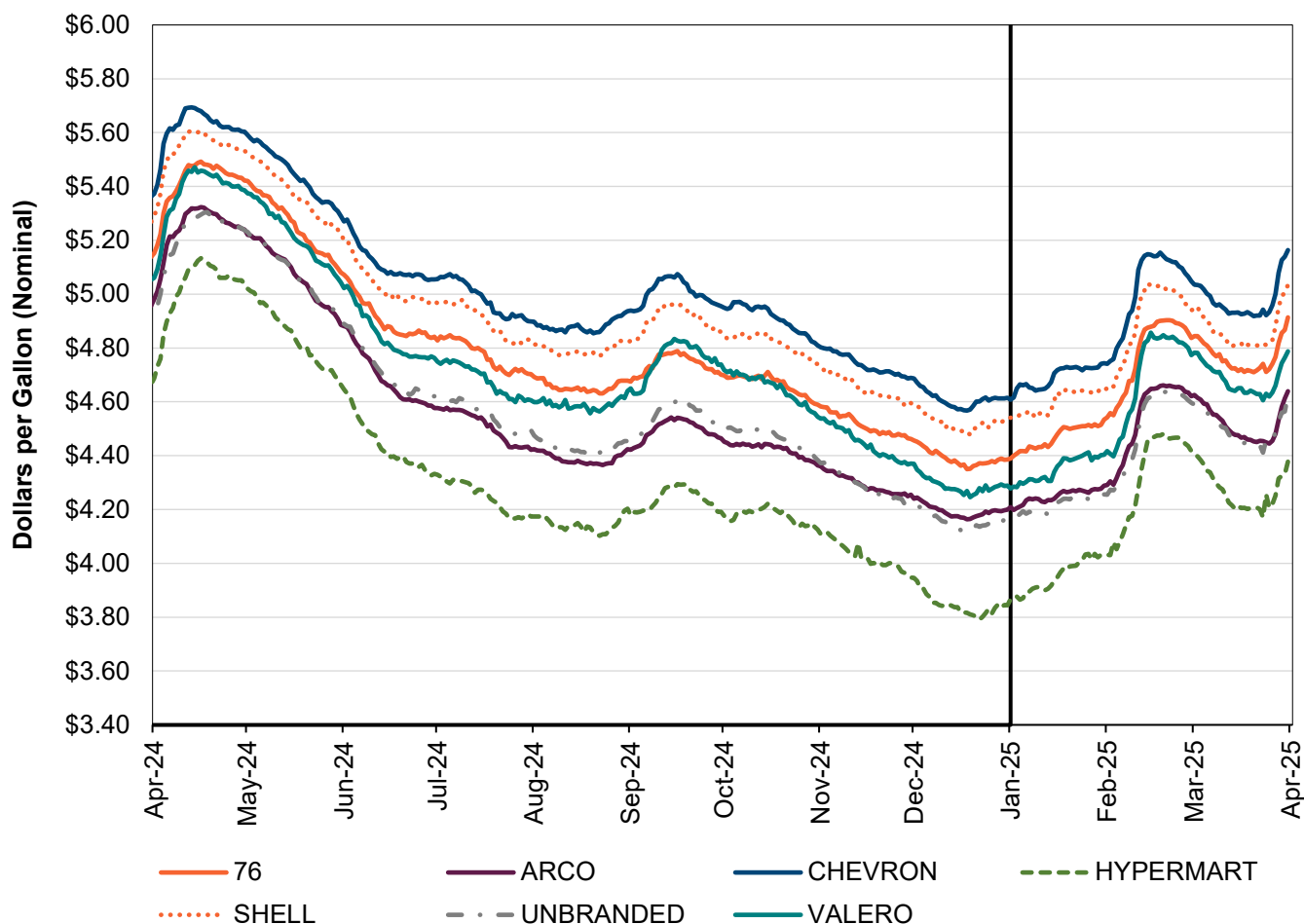
Figure 10 shows California regular grade gasoline retail prices by brand. Chevron continues to be the highest-priced brand and Shell the second highest. Hypermarts continue to offer the lowest prices, followed by ARCO and unbranded stations. A *hypermart station* (Costco, Safeway, and so forth) is defined as a station that is company-owned or company-operated by a supermarket or wholesale chain store that sells its own fuel at the same location.

For the first quarter of 2025:

- The highest average price during the first quarter at Chevron was \$5.16 on March 31, 2025. The lowest average price during the fourth quarter at Chevron was \$4.61 on January 1, 2025.

- The highest average price during the first quarter at hypermarkets was \$4.48 on February 19, 2025. The lowest average price during the first quarter at hypermarkets was \$3.87 on January 4, 2025.
- Price difference among various brands ranged between \$0.63 and \$0.81.
- The difference in monthly average price between Chevron and hypermarkets started the first quarter at \$0.74 and ended the fourth quarter at \$0.71.

Figure 10: California Gasoline Retail Prices by Brand



Source: CEC analysis of OPIS data

Imports and Exports

Figure 11 shows gasoline imports and exports from January 2024 through March 2025. These imports and exports include CaRFG and non-California specification gasoline. These totals do

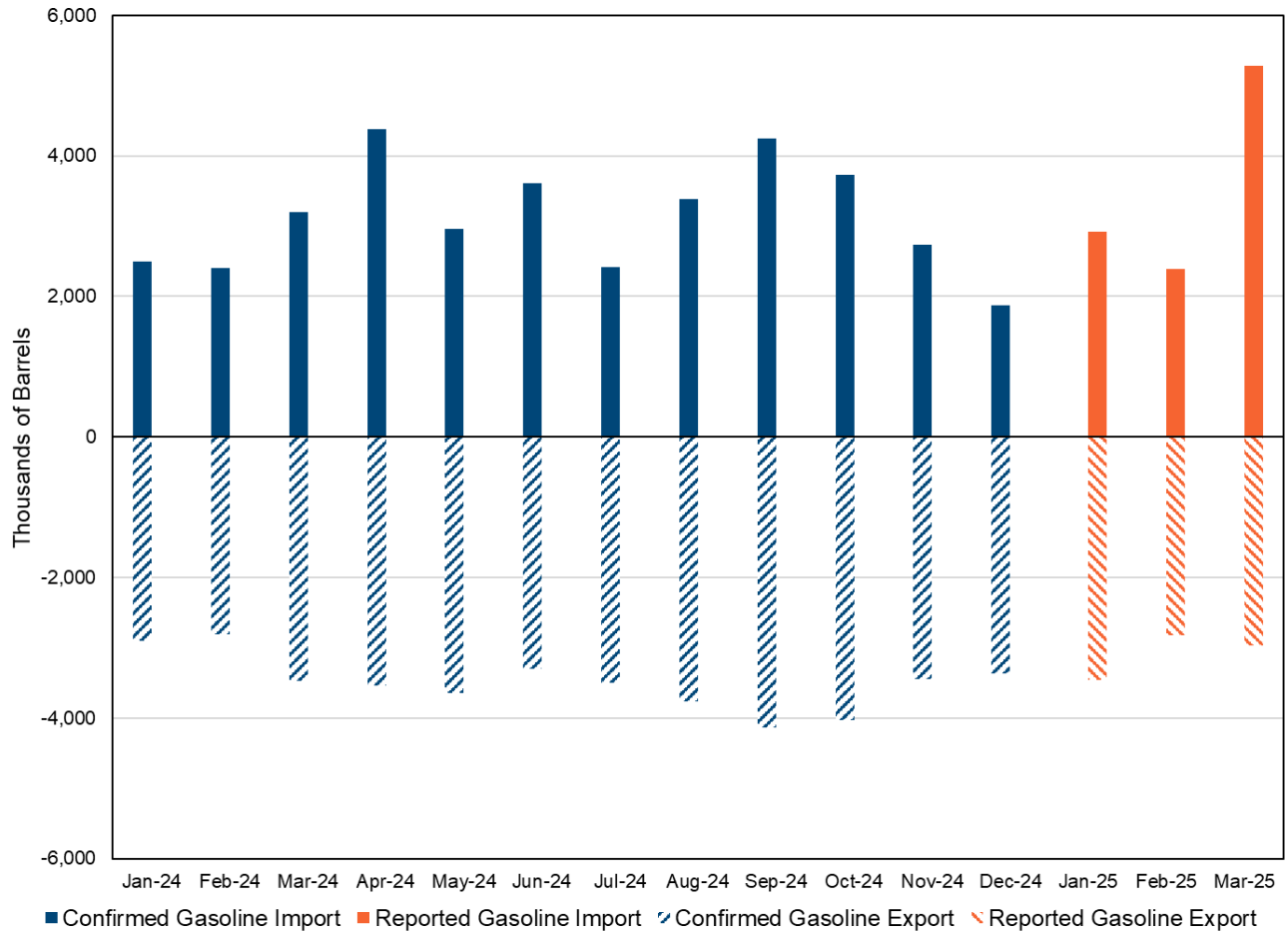
not include ethanol.⁸ Imports are shown as reported and confirmed. Reported imports are aggregated reported raw data from a single reporting source. Confirmed imports are data that have been cross-checked with additional sources of data and represent a more accurate estimate of imports. During the first quarter of 2025, gasoline imports increased in January and March with a slight decrease in February.

For the first quarter of 2025:

- The volume of gasoline imports over the first quarter was higher than the previous quarter. Imports during January 2025 to March 2025 totaled 10.6 million barrels, while October 2024 to December 2024 saw 8.3 million barrels of imports.
- The largest year-over-year monthly difference was in March. In March 2024, imports to California totaled 3.9 million barrels, while imports totaled 5.3 million barrels in October 2025. This is a year-over-year increase of 36.0 percent.
- Gasoline exports decreased over the first quarter compared to the previous three months. California entities exported 9.5 million barrels from October to December 2024 compared to 9.2 million barrels from January to March 2025.
- Gasoline exports are the same compared to 2024. From January to March 2024, California entities exported 9.2 million barrels compared to the 9.2 million barrels in 2025, showing a consistent demand for the first quarter.

⁸ California Energy Commission. February 2023. [Petroleum Watch: Ethanol Imports](https://www.energy.ca.gov/sites/default/files/2023-03/2023-02_Petroleum_Watch_ada.pdf),
https://www.energy.ca.gov/sites/default/files/2023-03/2023-02_Petroleum_Watch_ada.pdf.

Figure 11: California Gasoline Imports and Exports



Note: "Reported Gasoline" data are reported directly to the CEC through Form M700. "Confirmed Gasoline" is Form 700 data that are confirmed with Port Import/Export Reporting Service (PIERS), California State Lands Commission (SLC), and Energy Information Administration (EIA) data through May 31, 2024.

Source: CEC PIIRA data — California Imports, Exports, and Intrastate Movements Monthly Report, Form M700

CHAPTER 3:

Diesel

This chapter discusses the volume of diesel produced at California refineries, inventories of diesel, diesel prices, and movements of diesel using data collected under Public Resources Code Section 25354 (a), (h), and (i). California regulates the amount of sulfur allowed in diesel fuel, and this regulation applies to essentially all diesel fuel supplied, sold, or offered for sale in California.⁹ Therefore, ultra-low-sulfur diesel, No. 2 diesel, and any other diesel products produced and sold in California are referred to in this chapter as “diesel.” The category “other diesel” includes renewable diesel, non-California Air Resource Board specification diesel, and high-sulfur diesel. Production of biodiesel specification B100 cannot be sufficiently aggregated to meet confidentiality requirements and is therefore not included in this report.

Production

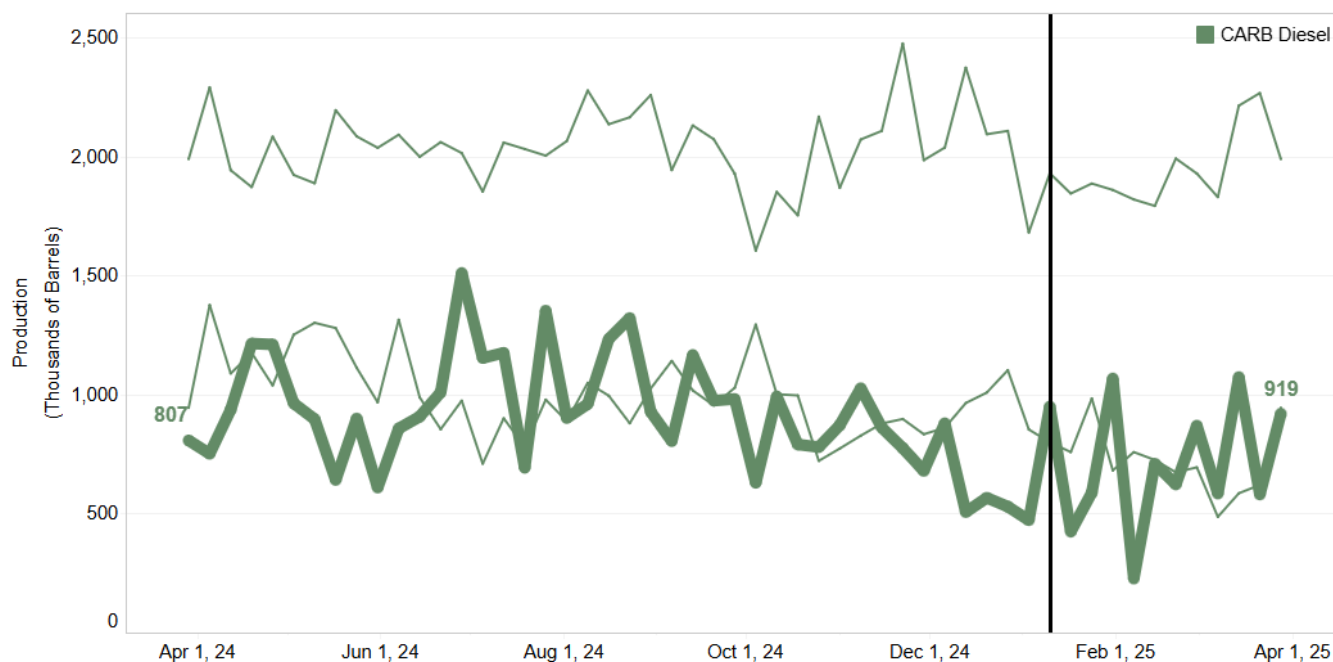
Figure 12 shows diesel production for the previous year with the 10-year high-low band. Diesel production started the quarter above the 10-year low at 949,000 barrels. Production fluctuated significantly throughout the fourth quarter, ending at 919,000 barrels. The permanent idling of Marathon Martinez in August 2020 and the completion of Phillips 66 Rodeo’s conversion from conventional fuel production to renewable fuels in the first quarter of 2024 reduced refining capacity and lowered overall diesel production. Renewable diesel production is not collected nor included in these figures, which substantially increases the amount of fuel available for diesel powered vehicles.

For the first quarter of 2025:

- Diesel production fell to a low of 227,000 barrels for week ending February 7.
- Diesel production experienced a high of 1.1 million barrels for week ending March 14.
- Diesel production was 919,000 barrels at the end of the quarter, a 13.9 percent increase compared to the end of the same quarter last year (807,000 barrels).

⁹ California Air Resources Board. [“Diesel Fuel: About,”](https://ww2.arb.ca.gov/our-work/programs/diesel-fuel/about) <https://ww2.arb.ca.gov/our-work/programs/diesel-fuel/about>.

Figure 12: Diesel Production (With 10-Year High-Low Band)



Source: CEC PIIRA data – [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production) available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-inputs-and-production>

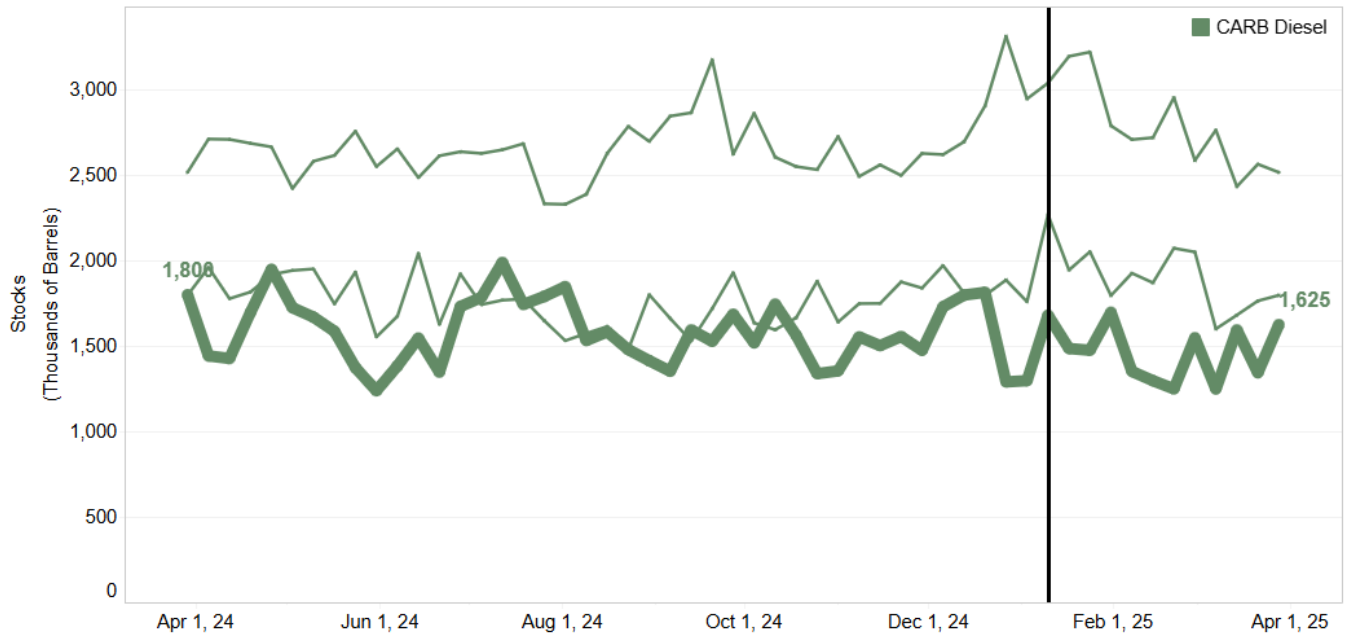
Inventory

Figure 13 shows diesel inventories for the previous year with the 10-year high-low band. At the start of the quarter, diesel inventories were below the 10-year low at 1.7 million barrels. Inventories fluctuated significantly but remained below the 10-year low throughout the quarter.

For the first quarter of 2025:

- Diesel inventories fluctuated below the 10-year low. Part of the reason for these lows is the Phillips 66 Rodeo facility conversion from conventional fuel production to renewable fuels that occurred in the first quarter of 2024.
- January 31 marked the first quarter high at 1.7 million barrels, while March 7 marked the low at 1.2 million barrels.
- At the end of the quarter, diesel inventories stood at 1.6 million barrels, a decrease of roughly 175,000 barrels compared to the same time last year (1.8 million barrels).

Figure 13: Diesel Inventories (With 10-Year High-Low Band)



Source: CEC PIIRA data — [Weekly Fuels Watch](https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks), available at <https://www.energy.ca.gov/data-reports/reports/weekly-fuels-watch/refinery-stocks>

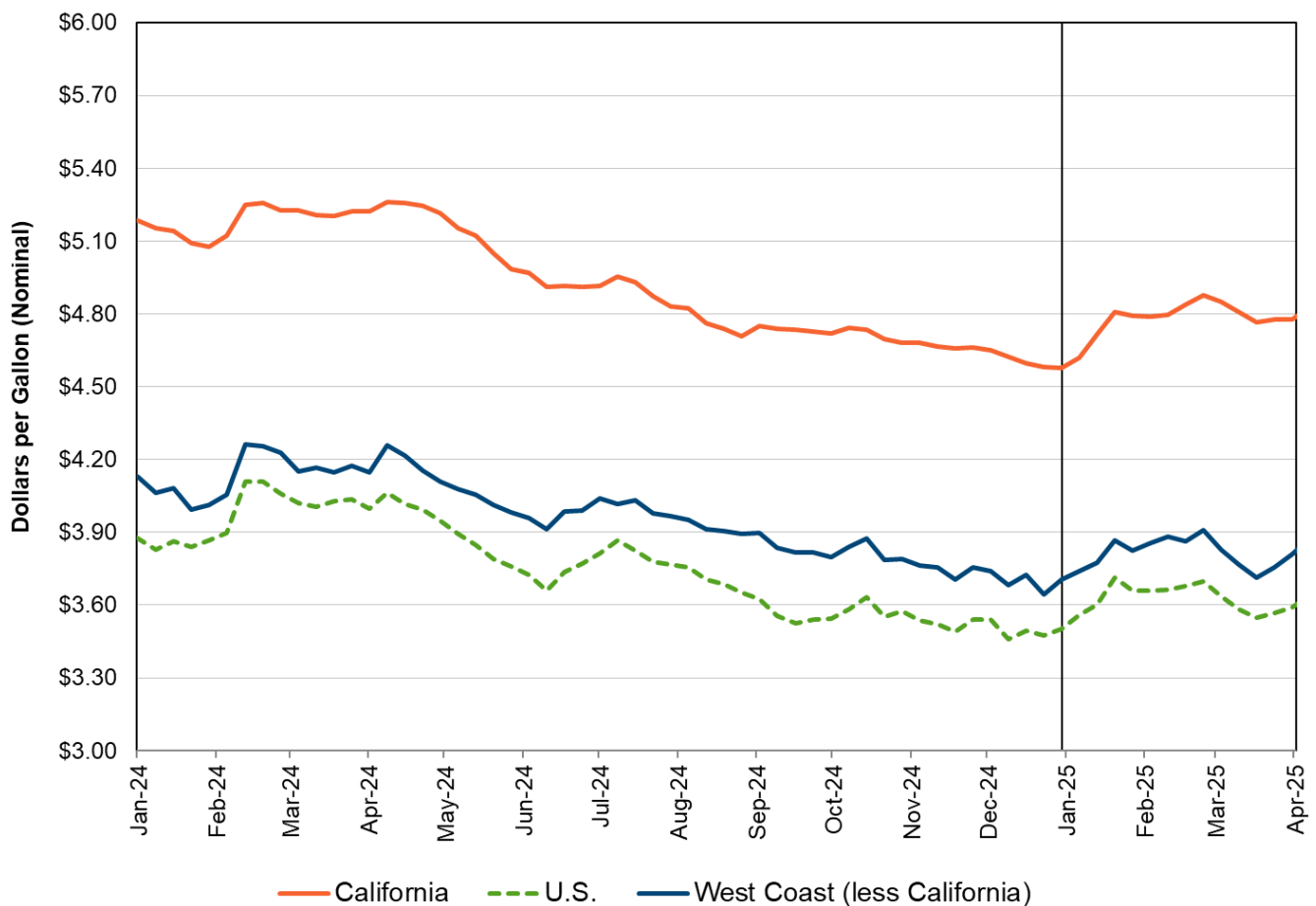
Prices

Figure 14 shows diesel retail prices for the first quarter. Diesel prices for all regions during the first quarter followed the same trend with small price changes. California diesel price was still the highest of the three regions, averaging \$0.97 above West Coast (less California) price.

For the first quarter of 2025:

- California diesel prices started the first quarter at \$4.62 per gallon, peaked on February 24 at \$4.88 per gallon, and ended the quarter at \$4.78 per gallon.
- California diesel prices averaged \$4.79 during the first quarter of 2025. The price difference between California and the U.S. remained high, averaging \$1.16 for the quarter, while the difference averaged \$1.17 for 2024.
- U.S. diesel prices averaged \$0.10 more during the first quarter of 2025 at \$3.63 compared to \$3.53 during the fourth quarter of 2024. The highest price during the quarter was \$3.72 on January 20.
- West Coast (less California) price averaged \$3.81 during the quarter with a high price of \$3.91 on February 24 and a low price of \$3.72 on March 17.

Figure 14: Diesel Prices: California vs. West Coast vs. United States



Source: U.S. EIA — Diesel (On-Highway) Ultra-Low-Sulfur (15 ppm and under).

Figure 15 shows diesel retail prices by region. Central California had the lowest diesel price of three regions last fourth quarter and carried over onto the first quarter of 2025. Northern and southern regions swap one another for the top diesel prices in California.

For the first quarter of 2025:

- Southern diesel price started the first quarter with the highest prices for all regions at \$4.84 between January 1 to February 16. Prices decreased after February 16, averaging \$0.10 less than Northern prices of \$4.88 for the remainder of the quarter.
- Northern California diesel prices averaged \$4.94 throughout 2024 and continued to remain at a premium of \$4.81 compared to \$4.80 for Southern California and \$4.70 for central prices during the first quarter.
- Southern California diesel price started the first quarter at \$4.54 on January 1 and increased to a high price of \$4.80 on February 23. The price ended the quarter at \$4.72 on March 30.

Figure 15: Diesel Retail Prices by Region



Source: CEC analysis of OPIS data

Imports and Exports

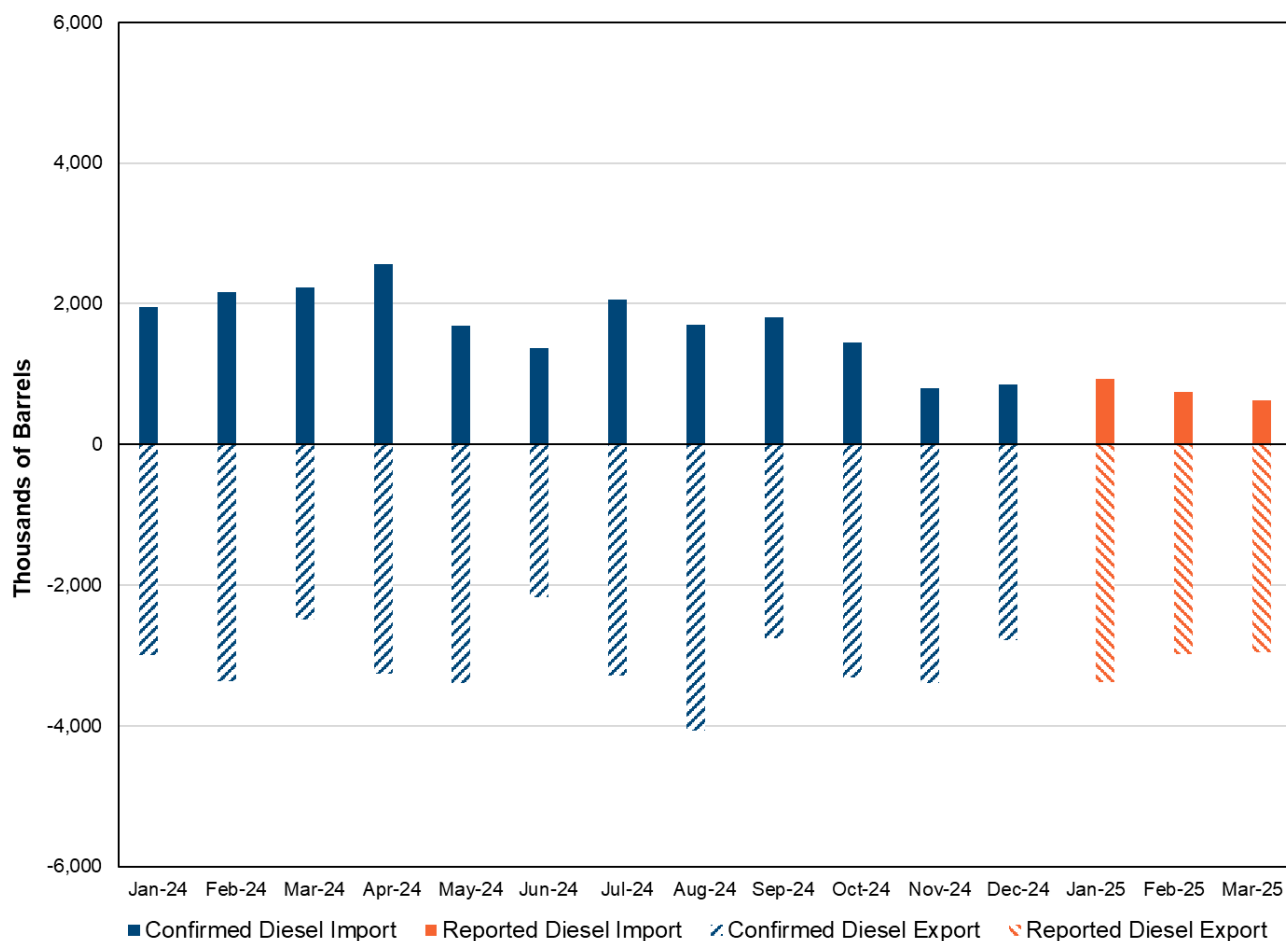
Figure 16 shows California's diesel imports and exports. Imports are shown as reported and confirmed. Reported imports represent the aggregated import data reported to the CEC. Confirmed imports represent reported imports data that have been cross-checked with additional sources of data and represent a more accurate estimate of imports.

For the first quarter of 2025:

- Diesel imports decreased from the previous three months. From October to December 2024, California diesel imports totaled 3.1 million barrels compared to the 2.3 million barrels from January to March 2025.
- From January to March 2025 diesel imports declined 63 percent year-over-year. January to March 2024, imports totaled 6.3 million barrels while 2025 totaled 2.3 million barrels.
- Diesel exports decreased compared to the last three months. From January to March 2025, exports totaled 9.3 million barrels compared to 9.5 million barrels exported from October to December 2024.

- January to March 2025 diesel exports totaled 9.3 million barrels, a 700,000 barrel increase over export totals from the previous year, which was 8.9 million barrels.

Figure 16: California's Diesel Imports and Exports



Note: "Reported Diesel" data are reported directly to the CEC through Form M700. "Confirmed Diesel" is Form M700 data that are confirmed with Port Import/Export Reporting Service (PIERS), California State Lands Commission (SLC), and Energy Information Administration (EIA) data through May 31, 2024.

Source: CEC PIIRA data — California Imports, Exports, and Intrastate Movements Monthly Report, Form M700

CHAPTER 4:

Annual Data

This chapter discusses crude oil and petroleum product storage capacities, transportation methods, pipeline capacities, and thermally enhanced oil recovery at oil fields using data collected annually under Public Resources Code Section 25354 (b).

Annual data are collected in February each year, so this first quarter report presents these new data collected in 2025. These data cover the 2024 reporting year.

Crude Oil Pipeline Systems

Crude oil pipeline systems are those related to pipeline usage from wellhead areas directly to refiners, processing facilities, or terminals. This information is specific to individual refiners and is confidential.

Petroleum Product Transportation

Table 1 shows the count of refineries that use a particular transportation method by product type. More than one transportation method may be used by a refiner for the same product.

Table 1: Count of Refiner Methods of Petroleum Product Movement

Fuel Type	Pipeline	Tanker	Barge	Truck	Railroad
Aviation Fuels (including kerosene-type jet fuel)	7	4	4	4	3
Distillates (excluding kerosene-type jet fuel)	8	4	4	5	4
Gasoline (including blending components)	9	4	5	5	2
Residual Fuel Oil and Unfinished Oils	9	6	6	7	4

Source: CEC PIIRA data – California Refiner Annual Report, CEC Form A04

Petroleum Product Pipeline Systems

Petroleum pipeline systems are those related to the transportation and storage of petroleum products leaving the refinery, being stored at pipeline storage facilities and at terminals, and flowing through the system. This information is specific to individual pipelines and confidential.

Petroleum Product Storage Tanks

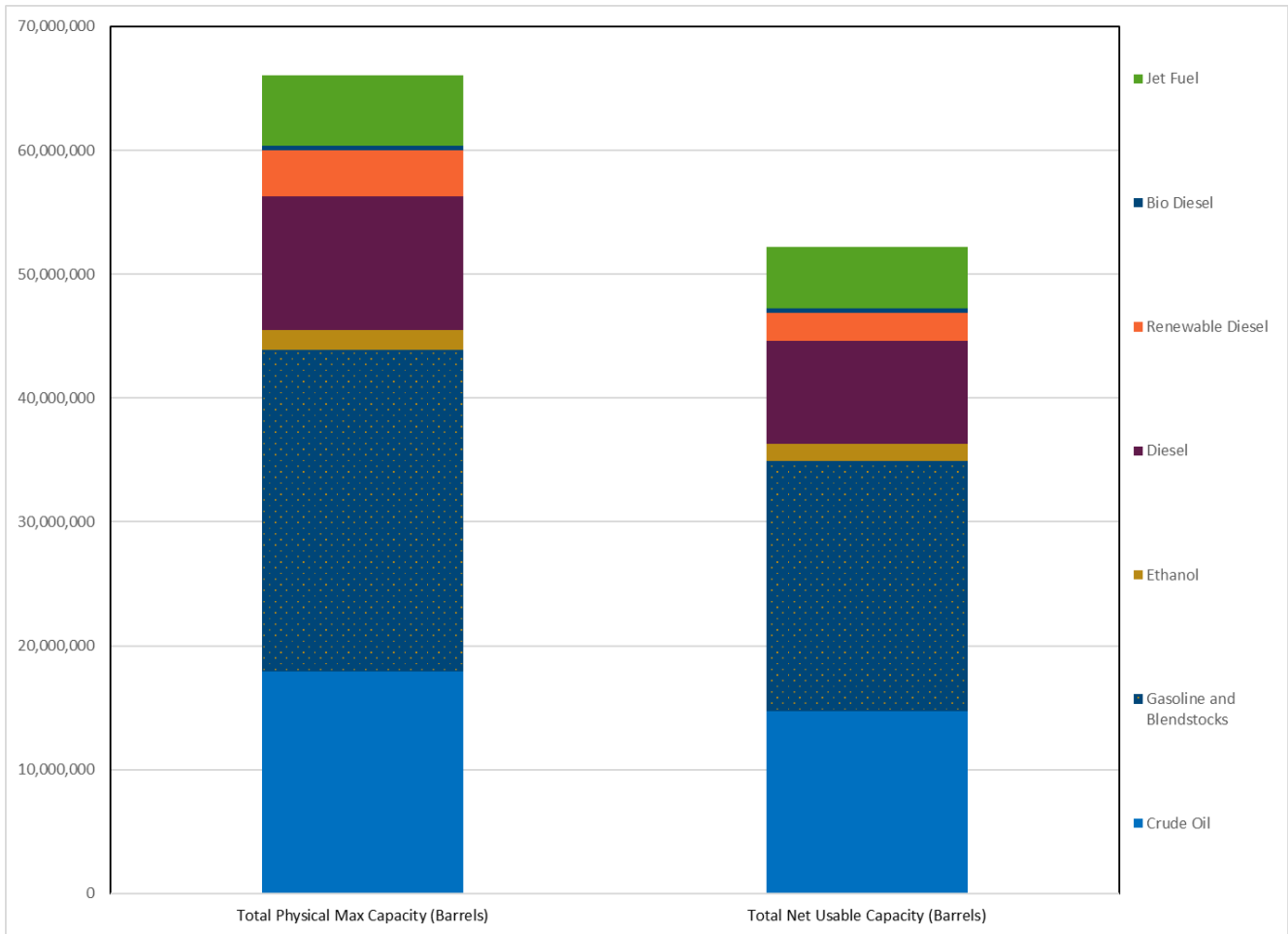
Petroleum product storage tanks are tanks that store crude oil or finished petroleum products. Capacity is reported as total capacity and net usable capacity. **Table 2** and **Figure 17** show the total reported physical capacity and total net usable capacity of storage tanks by petroleum product in California.

Table 2: Petroleum Product Storage Tank Capacity: 2024

Product	Total Physical Capacity (Barrels)	Total Net Usable Capacity (Barrels)
Crude Oil	17,938,919	14,733,748
Gasoline and Blendstocks	25,925,444	20,209,966
Ethanol	1,657,771	1,335,972
Diesel	10,732,402	8,357,048
Renewable Diesel	3,730,414	2,231,312
Biodiesel	417,899	364,781
Jet Fuel	5,662,255	4,975,645

Source: CEC PIIRA data — California Refiner Annual Report, Form A08

Figure 17: Petroleum Product Storage Tank Capacity: 2024



Source: CEC PIIRA data – California Refiner Annual Report, Form A08

Thermally Enhanced Oil Recovery

Thermally enhanced oil recovery is a process of injecting pressurized steam into oil reservoirs to lower the viscosity of, or thin, heavy oil to increase the flow and the amount of recoverable crude oil. Reporting for 2024 is insufficient to allow for sufficient aggregation that will comply with confidential filing requirements. As such, the data related to steam injected from cogeneration plants and natural gas used as fuel in boilers to create steam for oil field injection are redacted.

CHAPTER 5:

Senate Bill X1-2

This chapter discusses new data collected under Senate Bill X1-2 (Skinner, Chapter 1, Statutes of 2023).¹⁰ These data include refining margins (CEC M1322), daily spot contracts (CEC Form D354_TRADING, CEC Form D354_SETTLEMENT), refining maintenance and turnarounds (CEC Form EBR1P, CEC Form EBR1U), and 96-hour imports (CEC EBR700) using data collected under Public Resources Code Section 25354 (j), (l), and (m) and Section 25355.

Monthly Refining Margin

Senate Bill 1322 (Allen, Chapter 374, Statutes of 2022) requires all refiners of gasoline products in the state to provide monthly data about various price and volume information. The CEC must publish aggregated, volume-weighted reports of these data within 45 days of the end of each calendar month.

This information is published [online](https://www.energy.ca.gov/data-reports/energy-almanac/californias-petroleum-market/california-oil-refinery-cost-disclosure) at <https://www.energy.ca.gov/data-reports/energy-almanac/californias-petroleum-market/california-oil-refinery-cost-disclosure>.

The gross volume-weighted gasoline refining margin for January and February were \$0.43 and \$0.80 per gallon, respectively. Lower crude oil prices helped increase refiner margins.

Daily Spot Contracts

This data set is under review by the Division of Petroleum Market Oversight. Filers on both sides of a deal are responsible for submitting a report at the trade and settlement phases of a transaction. In other words, for every transaction, each party files a separate report for the initial trade and final settlement. Therefore, every deal should be associated with four reports to the CEC. A reporting form may contain any number of separate trade or settlement reports. In January 2025, 19 companies filed a total of 572 reporting forms containing 6,295 trade and settlement reports. In February 2025, 20 companies filed 590 reporting forms containing 5,955 trade and settlement reports. In March 2025, 20 companies filed 634 reporting forms containing 5,590 trade and settlement reports.

¹⁰ California Energy Commission. "[Senate Bill X1-2 Implementation](https://www.energy.ca.gov/proceeding/senate-bill-x1-2-implementation)," available at <https://www.energy.ca.gov/proceeding/senate-bill-x1-2-implementation>.

California Refinery Planned and Unplanned Maintenance

Refiners conduct maintenance to maintain the safety and reliability of their crude oil processing units. Planned maintenance usually occurs during the spring and fall when refineries switch from winter to summer blend or vice versa. This information is specific to individual refiners and is confidential.

96-Hour Planned Imports

The CEC was already collecting imports in its Form EBR700, California Imports, Exports, and Intrastate Movements Weekly Report. SB X1-2 authorized the collection of this information prospectively and on a smaller time interval. This prospective reporting provides visibility into near-term imports before they occur. These data can also be used as a comparison to data reported after the imports have occurred. However, when used retrospectively, such as in this quarterly report, the 96-hour reporting does not provide significantly different data than what are reported in other chapters. For imports of crude oil, gasoline, and diesel, see Chapters 1, 2, and 3, respectively.

APPENDIX A:

Glossary

Term	Definition
American Petroleum Institute gravity	A measurement of how heavy or light a petroleum liquid is compared to water.
Blendstocks	Any material that is blended in an oil refinery to make a product, especially for making gasoline.
Brent North Sea (Brent)	A blended crude stream produced in the North Sea region that serves as a reference or "marker" for pricing a number of other crude streams.
California Air Resources Board (CARB)	The "clean air agency" in California government. CARB's main goals include attaining and maintaining healthy air quality, protecting the public from exposure to toxic air contaminants, and providing innovative approaches for complying with air pollution rules and regulations.
California Energy Commission (CEC)	The state agency established by the Warren-Alquist State Energy Resources Conservation and Development Act in 1974 (Public Resources Code, Sections 25000 et seq.) responsible for energy policy. The Energy Commission's seven major areas of responsibilities are: • Forecasting statewide energy demand. • Licensing of power plants and transmission lines sufficient to meet those needs. • Promoting energy conservation and efficiency measures. • Promoting the development of renewable energy. • Promoting the transition to clean transportation fuels. • Investing in energy innovation.

Term	Definition
California Energy Commission (CEC)	Planning for and supporting the state's response to energy emergencies. Funding for the Commission's activities comes from the Energy Resources Program Account, Federal Petroleum Violation Escrow Account, and other sources.
California Estimated Refinery Acquisition Cost (CA-RAC)	A weighted average of the prices of California (San Joaquin Valley) crude, Alaskan crude, and foreign crude.
California State Lands Commission (SLC)	The state agency that provides the people of California with stewardship of the lands, waterways, and resources entrusted to its care based on the principles of equity, sustainability, and resiliency, through preservation, restoration, enhancement, responsible economic development, and the promotion of public access.
Hypermart	A station that is a company-owned or -operated supermarket or wholesale chain store that sells its own fuel at the same location
Oil Price Information Service (OPIS)	A company that provides crude oil and petroleum pricing data.
Petroleum Industry Information Reporting Act (PIIRA)	Legislation enacted in 1980 that enables a complete response to possible shortages of fuel or other disruptions. The information also helps develop and administer energy policies in the interest of the state's economy and the public's well-being.
Port Import/Export Reporting Service (PIERS)	A company that provides import and export data at the bill-of-lading level.
United States Energy Information Administration (EIA)	An independent agency within the U.S. Department of Energy that develops surveys, collects energy data, and analyzes and models energy issues. The agency must meet the requests of Congress, other elements within the Department of Energy, Federal Energy Regulatory Commission, the Executive Branch, its own independent needs, and assist the public, or other interest groups, without taking a policy position. See more information about EIA at http://www.eia.gov/about/
West Texas Intermediate (WTI)	A crude stream produced in Texas and southern Oklahoma that serves as a reference

Term	Definition
West Texas Intermediate (WTI)	or "marker" for pricing several other crude streams and which is traded in the domestic spot market at Cushing, Oklahoma.