February 17, 2023



## **Overall Energy & Fuels Markets Summary**

- Crude oil, propane, and natural gas (Henry Hub) weekly average spot prices compared to the previous week (see page 1):
  - · Natural gas (Henry Hub) decreased.
- Regional fuels inventories (see pages 2 and 3) varied compared to the previous week:
  - Ultra-low sulfur diesel (ULSD) and total gasoline inventories increased while propane inventories decreased.
  - ULSD, total gasoline, propane, and natural gas inventories are within the 5-year range.
- Market influencers include:
  - Global factors include the ongoing Russian invasion of Ukraine, warm winter in Europe and the eastern U.S., and global economics/recession concerns.
  - Weather forecast for NY indicating potential for normal to "leaning below" normal temperatures for late-February (see page 6). The warmer winter temperatures this winter season have decreased demand on heating fuels.
- NY retail prices (see pages 4 and 5) for gasoline, diesel, heating oil, propane, and kerosene remain elevated compared to last year:
  - NY retail prices for heating oil and kerosene decreased compared to the prior week.
  - NY transportation gasoline and diesel fuel retail prices slightly increased compared to the prior week.

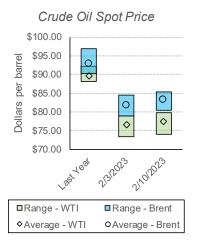
# Issue Contents:

National crude and East Region natural gas inventories	age 2
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Transportation Fuels Prices SummaryP	age 4
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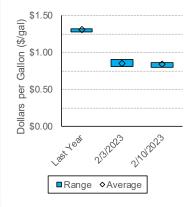
#### Note:

- Data from USEIA, see references section for detailed citations. Visualizations by NYSERDA.
- 2. Graphics summarize available USEIA data from the most recent week ending on Fridays, noted by the date.

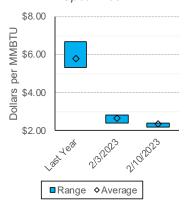
### Fundamental Fuels Market Weekly Price Summaries



#### Propane Mt. Belvieu Spot Price



### Natural Gas Henry Hub Spot Price





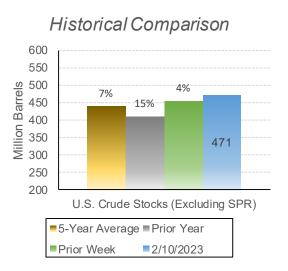
## **National Crude and East Region Natural Gas Inventories**

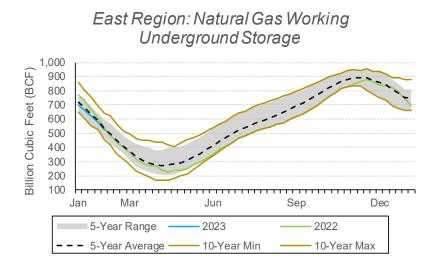
U.S. Crude Weekly Stocks (Excluding Strategic Petroleum Reserve) 600 550 500 450 400 350 300 250 200 Sep Mar Jun Dec Jan 5-Year Range 2022 2023

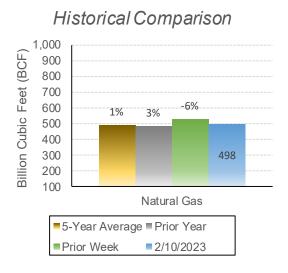
10-Year Min

10-Year Max

- - 5-Year Average







#### Note:

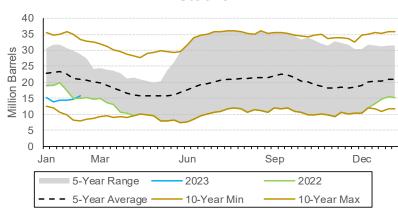
- 1. Data from USEIA, see references section for detailed citations. Visualizations by NYSERDA.
- 2. Graphics summarize available USEIA data from the most recent week ending on Fridays.

Historical comparison bar chart percentages reflect current week. Positive values indicate current week is greater, negative values indicate current week is less than the historical value.

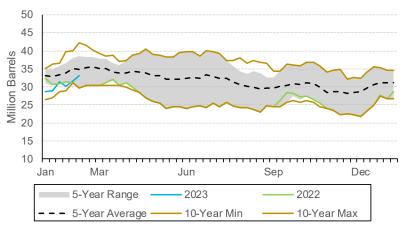


## **Regional Inventories: Select Liquid Fuels**

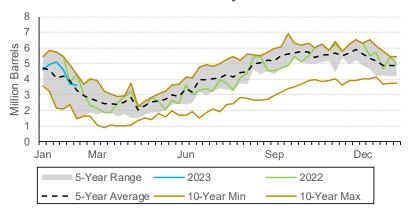
PADD 1B: Distillate (0 - 15 ppm S) Weekly Stocks



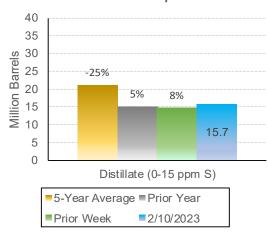
PADD 1B: Total Gasoline Weekly Stocks



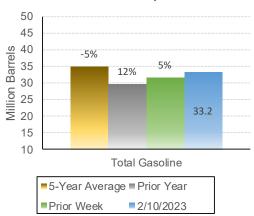
PADD 1B: Propane and Propylene Weekly Inventory



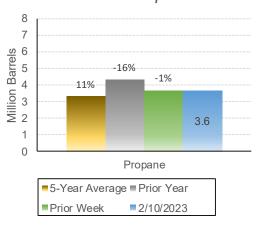
Historical Comparison



### Historical Comparison



### Historical Comparison



#### Notes:

1. Data from USEIA, see references section for detailed citations. Visualizations by NYSERDA.

<sup>2.</sup> Historical comparison bar chart percentages reflect current week. Positive values indicate current week is greater, negative values indicate current week is less than the historical value.

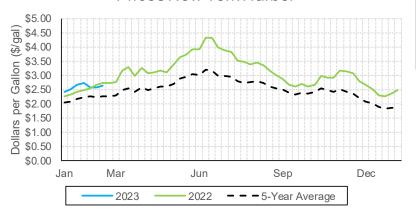


## **Transportation Fuel Prices Summary**

Ultra-low Sulfur Diesel New York Harbor Average Weekly Spot Prices



Conventional Gasoline Average Weekly Spot Prices New York Harbor



For regional NYS
retail price summaries for
transportation fuels,
visit the following
NYSERDA resources:

Transportation Fuel Dashboard

Transportation fuels retail price summaries presented in this report and on the NYSERDA dashboards are collected by the Energy Markets team from AAA and USEIA as part of our ongoing fuels markets analyses and monitoring.

Fuel Type	NYS Average Retail Prices					
ruer Type	2/10/2023	2/3/2023	% Difference	<b>Prior Year</b>	% Difference	
Regular Gasoline (dollars per gallon) <sup>2</sup>	\$3.56	\$3.51	1.5%	\$2.52	40.9%	
On-road Diesel (dollars per gallon) <sup>2</sup>	\$3.93	\$3.85	2.2%	\$2.87	37.1%	

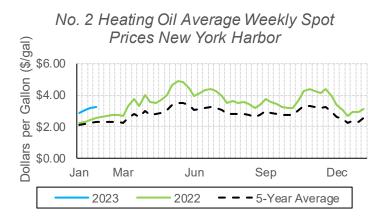
#### Notes:

<sup>1.</sup> Wholesale price data from USEIA, see references section for detailed citations. Visualizations by NYSERDA.

<sup>2.</sup> Retail price data from AAA, see references section for detailed citations. Visualizations by NYSERDA.



## **Heating Fuel Prices Summary**



Propane Mt. Belvieu Average Weekly Spot

Prices

\$2.00

| Solution | Solution

Natural Gas Henry Hub Average Weekly Spot Prices



Weekly Survey Results by Fuel Type	NYS Average Retail Prices				
Weekly Sulvey Results by Fuel Type	2/13/2023	2/6/2023	% Difference	Prior Year	% Difference
Ultra-low #2 Heating Oil Posted Credit Prices (dollars per gallon) <sup>2</sup>	\$4.564	\$4.636	-1.5%	\$4.112	11.0%
Propane Posted Credit Prices - 1,100 gallon usage (dollars per gallon) <sup>2</sup>	\$3.503	\$3.504	0.0%	\$3.462	1.2%
Kerosene Posted Credit Prices (dollars per gallon) <sup>2</sup>	\$6.450	\$6.626	-2.7%	\$4.535	42.2%
Monthly USEIA Reporting	November 2022	October 2022	% Difference	November 2021	% Difference
Monthly Average Residential Natural Gas Prices (dollars per Therm) <sup>3</sup>	\$1.866	\$2.123	-12.1%	\$1.664	12.2%

For regional NYS retail price summaries for heating fuels, visit the following NYSERDA resources:

Home Heating Oil Prices Dashboard

Kerosene Prices Dashboard

Propane Prices Dashboard

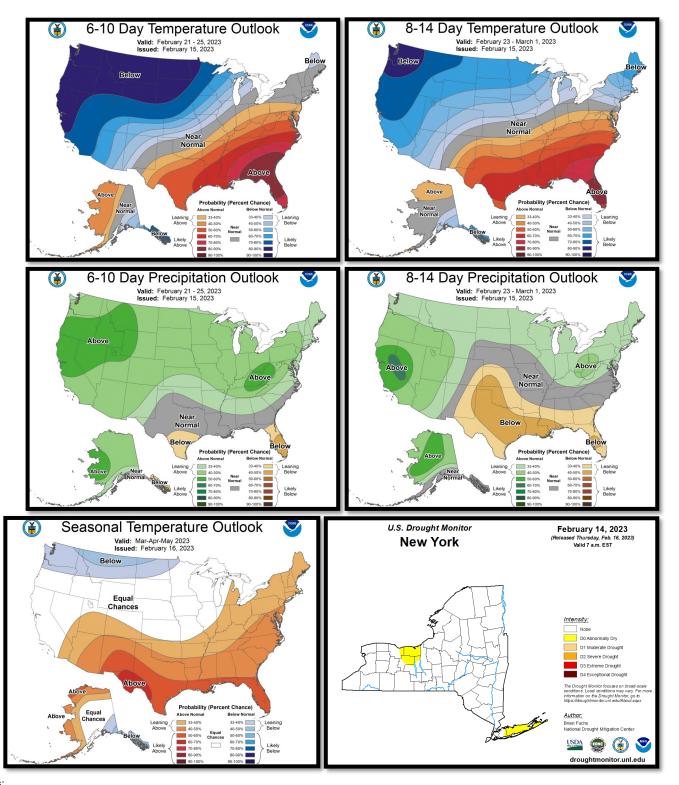
Heating fuels retail price summaries presented in this report and on the NYSERDA dashboards are part of the USEIA State Heating Oil and Propane Program/ NYSERDA Heating Fuel Prices surveys.

#### Notes:

- Wholesale price data from USEIA, see references section for detailed citations. Visualizations by NYSERDA.
- Retail price data from USEIA & NYSERDA, see references section for detailed citations. Visualizations by NYSERDA. Highlighted cells indicate price correction from prior week.
- Residential natural gas price data from USEIA, see references section for detailed citations. Visualization by NYSERDA.



## **Weather Outlook and Seasonal Threat Monitoring**

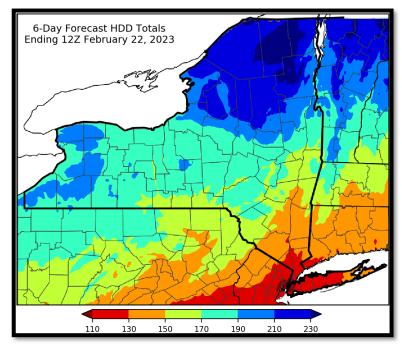


#### Notes:

- 1. Temperature and precipitation outlook graphics from NOAA. See references section for detailed citations.
- 2. Seasonal threat monitoring for winter season. Graphics from NOAA. See reference section for detailed citation.
- Seasonal threat monitoring for drought conditions during the spring/summer. Graphic from National Drought Mitigation Center. See references section for detailed citation.



## **Degree Days Outlook and Summary**



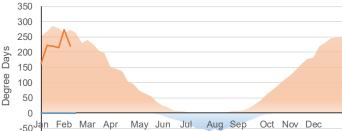
City	6-Day HDD Forecast
Albany	163
Binghamton	179
Buffalo	188
Glans Falls	180
Massena	224
NYC	114
Rochester	182
Syracuse	175
Watertown	202

Forecast Dates:

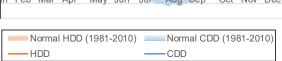
02/16/2023 - 02/21/2023

Notes:

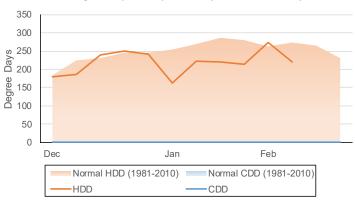
1. M = Missing data



NYS Degree Day Weekly Summary: Current Year



NYS Degree Day Weekly Summary: 2-Month History



For regional NYS
Heating and Cooling
Degree Data along with
additional information,
visit the following
NYSERDA resources:

Heating Degree Data

Monthly Degree Day Data (Heating & Cooling)

#### Notes:

-100

Heating degree day (HDD) forecast from NOAA & Northeast Regional Climate Center at Cornell University (NRCC). See references section for detailed citations.

<sup>2.</sup> HDD and Cooling Degree Day (CDD) data from NOAA. Positive values represent HDD and negative values represent CDD. See reference section for detailed citation. Visualization by NYSERDA.



### References

### **National and Regional Fuel Inventories**

USEIA. 2022. U.S. Stocks of Crude Oil and Petroleum Products. Available online: <a href="https://www.eia.gov/dnav/pet/xls/PET">https://www.eia.gov/dnav/pet/xls/PET</a> STOC WSTK DCU NUS W.xls.

USEIA. 2022. Weekly Central Atlantic (PADD 1B) Ending Stocks of Distillate Fuel Oil, 0 to 15 ppm Sulfur (Thousand Barrels. Available online: <a href="https://www.eia.gov/dnav/pet/hist\_xls/WD0ST\_R1Y\_1w.xls">https://www.eia.gov/dnav/pet/hist\_xls/WD0ST\_R1Y\_1w.xls</a>.

USEIA. 2022. Weekly Central Atlantic (PADD 1B) Ending Stocks of Total Gasoline (Thousand Barrels). Available online: https://www.eia.gov/dnav/pet/hist\_xls/WGTST1B1w.xls.

USEIA. 2022. Weekly Central Atlantic (PADD 1B) Propane and Propylene Ending Stocks Excluding Propylene at Terminal (Thousand Barrels). Available online: <a href="https://www.eia.gov/dnav/pet/hist\_xls/WPRST1B1w.xls">https://www.eia.gov/dnav/pet/hist\_xls/WPRST1B1w.xls</a>.

### **National and Regional Price Summaries**

AAA. 2022. National and State Gas Prices. *New York Average Gas Prices*. Available online: https://gasprices.aaa.com/?state=NY.

USEIA. 2022. Spot Prices for Crude Oil and Petroleum Products. Available online: https://www.eia.gov/dnav/pet/xls/PET\_PRI\_SPT\_S1\_D.xls.

USEIA. 2022. Natural Gas. *Natural Gas Spot and Future Prices (NYMEX)*. Available online: https://www.eia.gov/dnav/ng/xls/NG\_PRI\_FUT\_S1\_D.xls.

USEIA & NYSERDA. 2022. State Heating Oil and Propane Program/NYSERDA Heating Fuel Prices Survey. Available online: <a href="https://www.eia.gov/petroleum/heatingoilpropane/">https://www.eia.gov/petroleum/heatingoilpropane/</a>.

### **Weather Outlook and Data**

National Oceanic and Atmospheric Administration (NOAA). 2022. National Weather Service Climate Prediction Center. Temperature and Precipitation Outlooks. Available online: <a href="https://www.cpc.ncep.noaa.gov/">https://www.cpc.ncep.noaa.gov/</a>.

NOAA and Northeast Regional Climate Center (NRCC) at Cornell University. 2022. Weekly HDD Summary for New York. Available online: <a href="http://www.nrcc.cornell.edu/industry/hdd/">http://www.nrcc.cornell.edu/industry/hdd/</a>.

NOAA. National Weather Service Climate Prediction Center. Degree Days Statistics. Available online: <a href="https://www.cpc.ncep.noaa.gov/products/analysis">https://www.cpc.ncep.noaa.gov/products/analysis</a> monitoring/cdus/degree days/.

National Drought Mitigation Center. U.S. Drought Monitor. New York. Available online at: <a href="https://droughtmonitor.unl.edu/CurrentMap/StateDroughtMonitor.aspx?NY">https://droughtmonitor.unl.edu/CurrentMap/StateDroughtMonitor.aspx?NY</a>.

Note that there may be slight differences between USEIA reported values and this NYSERDA summary due to methodology differences.

Developed weekly by the NYSERDA Energy Markets team, part of the Energy & Environmental Analysis Group. For any questions, please reach out to:

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