



| Market | Product Name | Product Description | Term | History | Contract Spec |
|-------------------------|--|--|---|--|--|
| Carbon | CCA | Californian Carbon Allowance (CCA) issued by the Air Resources Board of the State of California for use in the State's carbon cap-and-trade program | 1M, 1Y, 2Y, With Matching Vintages 2Y/1Y Spread | 2011 | 1 CCA = 1 Metric Tonne of CO2 Equivalent |
| | RGGI OTC | Regional Greenhouse Gas Initiative (RGGI) Allowances as defined by a certain memorandum of understanding (MOU) and subsequent Model Rule between RGGI member states, which MOU was executed on or about December 20, 2005 as amended from time to time. | Prompt Transfer | 2008 | 1 RGGI = 1 Short Tonne of CO2 Equivalent |
| | RGGI | Regional Greenhouse Gas Initiative (RGGI) Allowances as defined by a certain memorandum of understanding (MOU) and subsequent Model Rule between RGGI member states, which MOU was executed on or about December 20, 2005 as amended from time to time. | 1Y, 2Y/1Y Spread | 2008 | 1 RGGI = 1 Short Tonne of CO2 Equivalent |
| | Golden CCO Non-DEBS | An ARB-compliant offset under AB 32 in which the volume is guaranteed by the seller and the seller guarantees to replace CCOs invalidated by ARB with an equal amount of CCAs. One CCO is equal to 1 metric tonne of CO2 equivalent. | Prompt Transfer | 2013 | 1 GCCO = 1 Metric Tonne of CO2 Equivalent |
| | Golden CCO DEBS | An ARB-compliant offset under AB 32 in which the volume is guaranteed by the seller and the seller guarantees to replace CCOs invalidated by ARB with an equal amount of CCAs. One CCO is equal to 1 metric tonne of CO2 equivalent. DEBS = Direct Environmental Benefits. | Prompt Transfer | 2013 | 1 GCCO = 1 Metric Tonne of CO2 Equivalent |
| | CCO (3) Non-DEBS | An ARB-compliant Offset under AB 32 with three (3) year invalidation borne by Buyer. | Prompt Transfer | 2013 | 1 CCO = 1 Metric Tonne of CO2 Equivalent |
| | CCO (8) Non-DEBS | An ARB-compliant Offset under AB 32 with eight (8) year invalidation borne by Buyer. | Prompt Transfer | 2013 | 1 CCO = 1 Metric Tonne of CO2 Equivalent |
| | CCO (8) DEBS | An ARB-compliant Offset under AB 32 with eight (8) year invalidation borne by Buyer. DEBS = Direct Environmental Benefits. | Prompt Transfer | 2013 | 1 CCO = 1 Metric Tonne of CO2 Equivalent |
| | LCFS | A Low Carbon Fuel Standard is a market-based system that focuses on reducing carbon intensity of fuels within California. Part of several AB32 measures to reduce greenhouse gas emissions throughout the state. | Prompt Transfer, Q1-Q4, 1Y, 2Y, 3Y | 2021 | 1 LCFS = 1 Metric Tonne of CO2 Equivalent |
| | GEO | The Global Emissions Offset futures (GEO) contract is a physically settled contract that allows for delivery of CORSIA eligible voluntary carbon offset credits from three registries: Verified Carbon Standard (VCS), American Carbon Registry (ACR), and Climate Action Reserve (CAR). | 1Y, 2Y | 2021 | 1 GEO = 1 Metric Tonne of CO2 Equivalent |
| | NGEO | Nature-based global emissions futures—called N-GEO futures—require delivery of a specific quantity of carbon offset credits on a future date that the seller will have earned for planting trees, preserving a forest that would otherwise be cut down and similar actions. | 1Y, 2Y | 2021 | 1 NGEO = 1 Metric Tonne of CO2 Equivalent |
| | Oregon CFP | Oregon's Clean Fuels Program (CFP) is a market-based program focused on reducing the carbon intensity (CI) of transportation fuels used in Oregon. | Prompt- 1H, 1H-1Y | 2023 | 1 CFP = 1 Metric Tonne of CO2 Equivalent |
| | WCA | Washington Carbon Allowance (CCA) issued by the Air Resources Board of the State of Washington for use in the State's carbon cap-and-trade program. | 1Y, 2Y | 2022 | 1 WCA = 1 Metric Tonne of CO2 Equivalent |
| | WA CFS | Washington Clean Fuel Standard. | 1Y, 2Y | 2022 | 1 CFS = 1 Metric Tonne of CO2 Equivalent |
| US Emissions (SO2, NOx) | Canada CFR (Liquid Class) | Canada's Clean Fuel Regulations (CFR) are a set of rules and requirements implemented by the Federal government to reduce greenhouse gas (GHG) emissions from the transportation sector. | 1Y | 2023 | 1 CFR = 1 Metric Tonne of CO2 Equivalent |
| | National SO2 | Sulfur Dioxide (SO ₂) Emissions allowances for use in compliance with the US EPA's Acid Rain program under Title IV of the Clean Air Act. | 1Y | 2000 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | HGB NOx | NOx emissions allowances for use in compliance with the emissions reduction cap and trade program in the Houston/Galveston/Braxoria Area. | Vintage 2009+, Vintage 2015, Vintage 2016 | 2002 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | CSAPR Annual NOx | Nitrogen Oxide (NOx) Emissions allowances for use in compliance with the US EPA's Cross-State Air Pollution Rule to reduce NOx emissions on an annual basis. Covered states include: AL, GA, IL, IN, IA, KS, KY, MD, MI, MN, MO, NE, NJ, NY, NC, OH, PA, SC, TN, TX, VA, WV, WI. | 1Y | 2011 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | CSAPR SO2 Group 1 | Sulfur Dioxide (SO ₂) Emissions allowances for use in compliance with the US EPA's Cross-State Air Pollution Rule. Group 1 allowances are allocated to sources located in Group 1 states: IL, IN, IA, KY, MD, MI, MO, NY, NC, OH, PA, PN, VA, WV, WI. | 1Y | 2011 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | CSAPR SO2 Group 2 | Sulfur Dioxide (SO ₂) Emissions allowances for use in compliance with the US EPA's Cross-State Air Pollution Rule. Group 2 allowances are allocated to sources located in Group 2 states: AL, GA, KS, MN, NE, SC, TX. States can only trade SO2 allowances with states in the same group. | 1Y | 2011 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | CSAPR Seasonal NOx Group 2 | Nitrogen Oxide (NOx) Emissions allowances for use in compliance with the US EPA's Cross-State Air Pollution Rule to reduce NOx emissions on a seasonal basis. Group 2 allowances are allocated to sources located in Group 2 states. For more information: https://www.epa.gov/csapr/good-neighbor-plan-2015-osone-naaq | 1Y | 2011 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | Massachusetts Carbon | Massachusetts Greenhouse Gas Initiative. Over 65% of Massachusetts' emissions come from our cars, trucks, homes, and offices; another 20% comes from the power plants that provide electricity for our lights, computers, and appliances. | 1Y | 2018 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | CSAPR Seasonal NOx Group 3 | Nitrogen Oxide (NOx) Emissions allowances for use in compliance with the US EPA's Cross-State Air Pollution Rule to reduce NOx emissions on a seasonal basis. Group 3 allowances are allocated to sources located in Group 3 states. For more information: https://www.epa.gov/csapr/good-neighbor-plan-2015-osone-naaq | 1Y | 2022 | Each allowance represents an authorization to emit one ton of emissions per allowance held in a compliance period. |
| | Renewable Energy | CA B&C REC | California Book & Claim REC. Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the Connecticut Renewable Portfolio Standard (RPS). | 1Y, 2Y, 3Y | 2023 |
| CA PCC REC | | California Portfolio Content Category REC. Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the Connecticut Renewable Portfolio Standard (RPS). | 2022, 1Y, 2Y | 2023 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CT Class I REC | | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the Connecticut Renewable Portfolio Standard (RPS). CT Class I RECs may be traded and used to meet CT Class I RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The CT RPS has multiple classes of renewables depending on generation type. Class I includes such resources as wind, landfill qualifying biomass and others. | 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CT Class II REC | | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class II renewable generator under the Connecticut Renewable Portfolio Standard (RPS). CT Class II RECs may be traded and used to meet CT Class II RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The CT RPS has multiple classes of renewables depending on generation type. Class II includes such resources as municipal solid waste and small hydro. | 1Y, 2Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CT Class III REC | | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class III renewable generator under the Connecticut Renewable Portfolio Standard (RPS). CT Class III RECs may be traded and used to meet CT Class III RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The CT RPS has multiple classes of renewables depending on generation type. Class III includes such resources as energy efficiency projects and cogeneration applications. | 1Y, 2Y, 3Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| DC Solar REC | | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Solar renewable generator under the District of Columbia Renewable Portfolio Standard (RPS). DC SRECs may be traded and used to meet DC Solar RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The DC RPS has multiple classes of renewables depending on generation type. The Solar Class includes solar PV generating sources. | 2022, 1Y, 2Y, 3Y, 4Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| DC Tier 1 REC | | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier I renewable generator under the District of Columbia Renewable Portfolio Standard (RPS). DC Tier I RECs may be traded and used to meet DC Tier I RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The DC RPS has multiple classes of renewables depending on generation type. Tier I includes such resources as wind, landfill qualifying biomass and others. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CRS National Wind REC | | CRS (Center for Resource Solutions) renewable energy must be generated from new facilities that meet rigorous standards for environmental quality. The ultimate owner of the CRS REC owns the amount of wind generated. | 1Y, 2Y, 3Y, 4Y, 5Y, 6Y, 7Y, 8Y | 2023 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CRS Texas Wind REC | | CRS (Center for Resource Solutions) renewable energy must be generated from new facilities that meet rigorous standards for environmental quality. The ultimate owner of the CRS Texas Wind REC owns the amount of wind generated. | 1Y, 2Y, 3Y, 4Y, 5Y, 6Y, 7Y, 8Y | 2023 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| CRS National Solar REC | | CRS (Center for Resource Solutions) renewable energy must be generated from new facilities that meet rigorous standards for environmental quality. The ultimate owner of the CRS REC owns the amount of solar generated. | 2021, 2022, 1Y, 2Y, 3Y, 4Y | 2023 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA APS | | The Massachusetts Alternative Energy Portfolio Standard is a mandatory market-based program which requires that a fraction of the electricity sold by the states retail electricity suppliers be generated using alternative energy technologies. Generators obtain AEC's (Alternative Energy Certificates) for the electricity they produce. AEC's are then sold to electricity suppliers. | 1Y, 2Y, 3Y, 4Y, 5Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA CES | | The Massachusetts Clean Energy Standard sets a minimum percentage of electricity sales the utilities and retail electricity suppliers must procure from clean energy sources. The ultimate owner would acquire Clean Energy Credits (CECs) or make alternative compliance payment. | 1Y, 2Y, 3Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA CES-E | | The Massachusetts Clean Energy Standard sets a minimum percentage of electricity sales the utilities and retail electricity suppliers must procure from clean energy sources for existing resources. The ultimate owner would acquire Clean Energy Credits (CECs) or make alternative compliance payment. | 1Y, 2Y, 3Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA CPS | | The Massachusetts Clean Peak Energy Standard provides benefits to clean energy technologies that can supply electricity or reduce electrical demand during seasonal peak. | 2021, 2022, 1Y, 2Y, 3Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA Class I | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier 1 renewable generator under the Massachusetts Renewable Portfolio Standard (RPS). MA Tier 1 RECs may be traded and used to meet MA Tier 1 RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The MA RPS has multiple classes of renewables depending on generation type. | 1Y, 2Y, 3Y, 4Y, 5Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. | |

Renewable Energy Credits

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| MA Class II | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier 2 renewable generator under the Massachusetts Renewable Portfolio Standard (RPS). MA Tier 2 RECs may be traded and used to meet MA Tier 2 RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. | 1Y, 2Y, 3Y, 4Y | 2011 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA Class II WTE | Massachusetts "Class II" Waste to Energy Renewable Energy Certificates (RECs) | 1Y, 2Y, 3Y, 4Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA Solar I | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Massachusetts Renewable Portfolio Standard (RPS). MA Solar II RECs may be traded and used to meet MA Solar II RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2014 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MA Solar II | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Massachusetts Renewable Portfolio Standard (RPS). MA Solar II RECs may be traded and used to meet MA Solar II RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. | 1Y, 2Y, 3Y, 4Y, 5Y | 2014 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MD Solar | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Solar renewable generator under the Maryland Renewable Portfolio Standard (RPS). MD SRECs may be traded and used to meet MD Solar RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The MD RPS has multiple classes of renewables depending on generation type. The Solar Class includes solar PV generating sources. | 1Y, 2Y, 3Y, 4Y, 5Y, 6Y | 2011 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MD Tier I | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier 1 renewable generator under the Maryland Renewable Portfolio Standard (RPS). MD Tier 1 RECs may be traded and used to meet MD Tier 1 RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The MD RPS has multiple classes of renewables depending on generation type. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| MD Tier II | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier 2 renewable generator under the Maryland Renewable Portfolio Standard (RPS). MD Tier 2 RECs may be traded and used to meet MD Tier 2 RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The MD RPS has multiple classes of renewables depending on generation type. | 2022, 1Y, 2Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| ME Class I | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the Maine Renewable Portfolio Standard (RPS). ME Class I RECs may be traded and used to meet ME Class I RPS obligations during the compliance period, which begins Jan. 1 and ends Dec 31 of each vintage year (for clarity ME's program is on a calendar year basis which is quoted as the year in which the period ends. Calendar Year 2007 is defined as the compliance period of January 1, 2007 through December 31, 2007). The ME RPS has multiple classes of renewables depending on generation type. Class I includes such resources as wind, landfill qualifying biomass and others. | 1Y, 2Y, 3Y, 4Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| ME Class IA | ME Class IA RECs is a resource defined under the Maine RPS as a "Class I resource other than a Class I resource that for at least 2 years was not operated or was not recognized by the New England Independent System Operator as a capacity resource." | 1Y, 2Y, 3Y, 4Y | 2020 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| ME Class II | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class II renewable generator under the Maine Renewable Portfolio Standard (RPS). ME Class II RECs may be traded and used to meet ME Class II RPS obligations during the compliance period, which begins Jan. 1 and ends Dec 31 of each vintage year (for clarity ME's program is on a calendar year basis which is quoted as the year in which the period ends. Calendar Year 2007 is defined as the compliance period of January 1, 2007 through December 31, 2007). Class II resources includes large scale hydro. | 1Y, 2Y, 3Y, 4Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NEPOOL Dual Qualified Class I | | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2022 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NH Class I | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the New Hampshire Renewable Portfolio Standard (RPS). NH Class I RECs may be traded and used to meet NH Class I RPS obligations during the compliance period, which begins Jan. 1 and ends Dec 31 of each vintage year (for clarity NH's program is on a calendar year basis which is quoted as the year in which the period ends. Calendar Year 2007 is defined as the compliance period of January 1, 2007 through December 31, 2007). The NH RPS has multiple classes of renewables depending on generation type. Class I includes such resources as wind, landfill qualifying biomass and others. | 1Y, 2Y, 3Y, 4Y, 5Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NH Class II | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class II renewable generator under the New Hampshire Renewable Portfolio Standard (RPS). NH Class II RECs may be traded and used to meet NH Class II RPS obligations during the compliance period, which begins Jan. 1 and ends Dec 31 of each vintage year (for clarity NH's program is on a calendar year basis which is quoted as the year in which the period ends. Calendar Year 2007 is defined as the compliance period of January 1, 2007 through December 31, 2007). The NH RPS has multiple classes of renewables depending on generation type. Class II includes solar resources. | 1Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NH Class III | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class III renewable generator under the New Hampshire Renewable Portfolio Standard (RPS). NH Class III RECs may be traded and used to meet NH Class III RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The NH RPS has multiple classes of renewables depending on generation type. Class III includes such resources as energy efficiency projects and cogeneration applications. | 1Y, 2Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NH Class IV | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class IV renewable generator under the New Hampshire Renewable Portfolio Standard (RPS). NH Class IV RECs may be traded and used to meet NH Class IV RPS obligations during the compliance period, which begins Jan. 1 and ends Dec 31 of each vintage year (for clarity NH's program is on a calendar year basis which is quoted as the year in which the period ends. Calendar Year 2007 is defined as the compliance period of January 1, 2007 through December 31, 2007). The NH RPS has multiple classes of renewables depending on generation type. Class IV includes such resources as existing hydro. | 1Y, 2Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NJ Class I REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class I renewable generator under the New Jersey Renewable Portfolio Standard (RPS). NJ Class I RECs may be traded and used to meet NJ Class I RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity NJ's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The NJ RPS has multiple classes of renewables depending on generation type. Class I includes such resources as wind, landfill qualifying biomass and others. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NJ Class II REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Class II renewable generator under the New Jersey Renewable Portfolio Standard (RPS). NJ Class II RECs may be traded and used to meet NJ Class II RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity NJ's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The NJ RPS has multiple classes of renewables depending on generation type. Class II includes such resources as municipal solid waste and small hydro. | 1Y, 2Y, 3Y, 4Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NJ Solar REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying solar renewable generator under the New Jersey Renewable Portfolio Standard (RPS). NJ Class Solar RECs (SRECs) may be traded and used to meet NJ SREC RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity NJ's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The NJ RPS has multiple classes of renewables depending on generation type. The Solar Class includes solar PV generating sources. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y, 6Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NY EDP Hydro | | 2022, 1Y, 2Y, 3Y, 4Y | 2022 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NY EDP Wind | | 2022, 1Y, 2Y, 3Y, 4Y | 2022 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| NY Tier I REC | NY Tier I RECs may be traded and used to meet NY Tier I RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. The NY RPS has multiple classes of renewables depending on generation type. Tier I refers to RECs that have been newly generated and come from the cleanest renewable resources. | 2022, 1Y | | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| OH Non Solar REC | Non-Solar RECs are issued certificates eligible for generation of electricity based on renewable energy sources other than solar. Ohio Non-Solar certificates are sold to the obligated entities to meet their obligation for purchases from renewable energy sources that do not involve solar. | 2022, 1Y, 2Y, 3Y, 4Y | 2014 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| PA Solar REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying solar renewable generator under the Pennsylvania Renewable Portfolio Standard (RPS). PA Class Solar RECs (SRECs) may be traded and used to meet PA SREC RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity PA's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The PA RPS has multiple classes of renewables depending on generation type. The Solar Class includes solar PV generating sources. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| PA Tier 1 REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier 1 renewable generator under the Pennsylvania Renewable Portfolio Standard (RPS). PA Tier 1 RECs may be traded and used to meet PA Tier 1 RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity PA's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The PA RPS has multiple classes of renewables depending on generation type. Tier 1 includes such resources as wind, landfill qualifying biomass and others. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |

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| | PA Tier 2 REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying Tier II renewable generator under the Pennsylvania Renewable Portfolio Standard (RPS). PA Tier II RECs may be traded and used to meet PA Tier II RPS obligations during the compliance period, which begins Jun. 1 and ends May. 31 of each vintage year (for clarity PA's program is on a reporting year basis which is quoted as the year in which the period ends. Reporting Year 2007 is defined as the compliance period of June 1, 2006 through May 31, 2007). The PA RPS has multiple classes of renewables depending on generation type. Tier II includes such resources as municipal solid waste, waste coal generation and small hydro. | 2022, 1Y, 2Y, 3Y, 4Y | 2008 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | PJM TRI Qualified REC (N1/PA1/MD1) | Class I Renewable Energy Certificates, Tier I Renewable Energy Credits and Tier I Alternative Energy Credits. Where a Class I REC is an electronic certificate issued by the PJM Environmental Information System Generation Attribute Tracking System (PJM GATS) for generation in the Pennsylvania, New Jersey, and Maryland renewable portfolio standard programs. | 2022, 1Y, 2Y, 3Y, 4Y, 5Y, 6Y | 2014 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | RI "Existing" REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Rhode Island Renewable Portfolio Standard (RPS). RI RECs may be traded and used to meet RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. Eligible generation includes solar, wind, geothermal, tidal, ocean, small hydroelectric, qualifying biomass, and fuel cells powered by renewable sources. Pre 97 | 1Y, 2Y, 3Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | RI "NEW" REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Rhode Island Renewable Portfolio Standard (RPS). RI RECs may be traded and used to meet RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year. Eligible generation includes solar, wind, geothermal, tidal, ocean, small hydroelectric, qualifying biomass, and fuel cells powered by renewable sources. Post 97 | 1Y, 2Y, 3Y, 4Y, 5Y | 2009 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | TX National Wind REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Texas Renewable Portfolio Standard (RPS). TX RECs may be traded and used to meet RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year and can be banked for use in three successive compliance years. | 1Y, 2Y, 3Y, 4Y, 5Y | 2023 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | TX Solar REC | Renewable Energy Credits (RECs) represent the environmental attributes of one megawatt-hour of electricity generated from a qualifying renewable generator under the Texas Renewable Portfolio Standard (RPS). TX RECs may be traded and used to meet RPS obligations during the compliance period, which begins Jan. 1 and ends Dec. 31 of each vintage year and can be banked for use in three successive compliance years. | 1Y, 2Y, 3Y, 4Y, 5Y | 2021 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| | Virginia REC (Non Solar) | Non-Solar RECs are issued certificates eligible for generation of electricity based on renewable energy sources other than solar. Virginia Non-Solar certificates are sold to the obligated entities to meet their obligation for purchases from renewable energy sources that do not involve solar. | 2022, 1Y, 2Y | 2019 | 1 REC = 1 megawatt-hour (MWh) of electricity generated from 1 renewable energy resource. |
| Coal | CSX -1% | ORIGIN: CSX Kanawha and/or Big Sandy Freight Districts; CONTRACT SIZE: Unit Trains of approximately 11,000 tons; BTU: 12,500 Btu/lb. with rejection below 12,200 Btu/lb.; MOISTURE: 7% typical; ASH: 12.0% with rejection above 13.5%; SO2: reject above 1.2 lbs. SO2 (compliance coal); reject above 1% sulfur (-1% sulfur); HGI: 42-45 typical, reject below 40; VOLATILE MATTER: Minimum 30%; SIZING: 2" x 0" with maximum 55% below 1/4"; INITIAL FUSION TEMP: 2,600 AFT typical; BTU ADJUSTMENT (\$/ton): Price x (Actual Btu/lb.-12,500)/12,500; DELIVERY POINT: FOB Railcar, mine, capable of loading 10,000 ton trains on 4hrs or less | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2001 | |
| | CSX -1% FS | Financially settled CSX -1% contract. Contract size: 1,000 tons. Settle monthly against the corresponding Platts OTC Broker index. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2004 | |
| | NS -1% | ORIGIN: NS Kenova and/or Thacker (I) Freight Districts; CONTRACT SIZE: Unit Trains of approximately 10,000 tons; BTU: 12,500 Btu/lb. with rejection below 12,200 Btu/lb.; MOISTURE: 7% typical; ASH: 12.0% with rejection above 13.5%; SO2: reject above 1.2 lbs. SO2 (compliance coal); reject above 1% sulfur (-1% sulfur); HGI: 42-45 typical, reject below 40; VOLATILE MATTER: Minimum 30%; SIZING: 2" x 0" with maximum 55% below 1/4"; INITIAL FUSION TEMP: 2,600 AFT typical; BTU ADJUSTMENT (\$/ton): Price x (Actual Btu/lb.-12,500)/12,500; DELIVERY POINT: FOB Railcar, mine, capable of loading 10,000 ton trains on 4hrs or less | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2000 | |
| | NYMEX | NYMEX coal is 12000 -1% 13.5% coal that is loaded in the barge either on the big sandy river or the ohio river. Although the traded cleared product no longer exists, NYMEX type coal is still and bought and sold by producers and utilities. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2000 | |
| | NYMEX FS | Financially settled NYMEX contract. Contract size: 1,550 tons. Settle monthly against the corresponding Platts OTC Broker index. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2006 | |
| | PRB8800 | ORIGIN: Southern Powder River Basin excluding Jacobs Ranch; CONTRACT SIZE: Unit Trains of approximately 15,000 tons; BTU: 8,800 Btu/lb. with rejection below 8,600 Btu/lb.; MOISTURE: 27% with no rejection limit above; ASH: 5.5% with no rejection limit above; SO2: .80 lbs. SO2/mmBtu with reject above 1.2 lbs. SO2; SODIUM: 1.5% with no rejection limits; BTU ADJUSTMENT (\$/ton): Price x (Actual Btu/lb.-8,800)/8,800; SO2 ADJUSTMENT (\$/ton): (.80lbs SO2/mmBtu-Actual lbs. So2/mmBtu)*Actual Btu/lb.*Air Daily SO2 price/1,000,000; DELIVERY POINT: FOB Railcar, mine, jointly served by both UP and BN railroads | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2000 | |
| | PRB8800 FS | Financially settled PRB 8800 contract. Contract size: 1,000 tons. Settle monthly against the corresponding Platts OTC Broker index. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2004 | |
| | PRB8400 | ORIGIN: Southern Powder River Basin excluding Jacobs Ranch; CONTRACT SIZE: Unit Trains of approximately 15,000 tons; BTU: 8,400 Btu/lb. with rejection below 8,200 Btu/lb.; MOISTURE: 30% with no rejection limit above; ASH: 6.5% with no rejection limit above; SO2: .80 lbs. SO2/mmBtu with reject above 1.2 lbs. SO2; SODIUM: 1.5% with no rejection limits; BTU ADJUSTMENT (\$/ton): Price x (Actual Btu/lb.-8,400)/8,400; SO2 ADJUSTMENT (\$/ton): (.80lbs SO2/mmBtu-Actual lbs. So2/mmBtu)*Actual Btu/lb.*Air Daily SO2 price/1,000,000; DELIVERY POINT: FOB Railcar, mine, jointly served by both UP and BN railroads | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2000 | |
| | ILB 11500 3.0% | ORIGIN:Illinois Basin CME; BTU: 11,500 btu/lb standard gross calorific value, 11,100 btu/lb minimum (American Society for Testing and Materials ("A.S.T.M.") D5685); ASH:Maximum 12.00% (A.S.T.M. D3174); SULFUR:Maximum 3% (A.S.T.M. D4239); MOISTURE: Maximum 14.00% (A.S.T.M. D3302); VOLATILE MATTER: Minimum: 30.00%(A.S.T.M. D3175); GRINDABILITY: Minimum 50 Hardgrove Index (HGI) (A.S.T.M. D409); CHLORINE: Maximum 0.35% (A.S.T.M. D4208); ASH FUSION TEMPERATURE (AFT): 1,850 degrees Fahrenheit, as measured by initial deformation temperature (IDT), reducing atmosphere (A.S.T.M. D1857); SIZING: Three inches topsize, nominal, with maximum fifty five percent passing one quarter inch square wire cloth sieve to be determined basis the primary cutter of the mechanical sampling system. (A.S.T.M. D4749); | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2017 | |
| | ILB 11800 5.0% | ORIGIN:Illinois Basin CME; BTU: 11,500 btu/lb standard gross calorific value, 11,100 btu/lb minimum (American Society for Testing and Materials ("A.S.T.M.") D5685); ASH:Maximum 12.00% (A.S.T.M. D3174); SULFUR:Maximum 5% (A.S.T.M. D4239); MOISTURE: Maximum 14.00% (A.S.T.M. D3302); VOLATILE MATTER: Minimum: 30.00%(A.S.T.M. D3175); GRINDABILITY: Minimum 50 Hardgrove Index (HGI) (A.S.T.M. D409); CHLORINE: Maximum 0.35% (A.S.T.M. D4208); ASH FUSION TEMPERATURE (AFT): 1,850 degrees Fahrenheit, as measured by initial deformation temperature (IDT), reducing atmosphere (A.S.T.M. D1857); SIZING: Three inches topsize, nominal, with maximum fifty five percent passing one quarter inch square wire cloth sieve to be determined basis the primary cutter of the mechanical sampling system. (A.S.T.M. D4749); | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2018 | |
| ILB FOB NOLA 6000 3.0% | ORIGIN:Illinois Basin CME; BTU: 11,500 btu/lb standard gross calorific value, 11,100 btu/lb minimum (American Society for Testing and Materials ("A.S.T.M.") D5685); ASH:Maximum 12.00% (A.S.T.M. D3174); SULFUR:Maximum 3% (A.S.T.M. D4239); MOISTURE: Maximum 14.00% (A.S.T.M. D3302); VOLATILE MATTER: Minimum: 30.00%(A.S.T.M. D3175); GRINDABILITY: Minimum 50 Hardgrove Index (HGI) (A.S.T.M. D409); CHLORINE: Maximum 0.35% (A.S.T.M. D4208); ASH FUSION TEMPERATURE (AFT): 1,850 degrees Fahrenheit, as measured by initial deformation temperature (IDT), reducing atmosphere (A.S.T.M. D1857); SIZING: Three inches topsize, nominal, with maximum fifty five percent passing one quarter inch square wire cloth sieve to be determined basis the primary cutter of the mechanical sampling system. (A.S.T.M. D4749); | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2018 | | |
| NAPP 13000 3% FOB Rail | Northern Appalachian prices loaded into the railcar at the mine where the BTU = 13000 and the sulfur content in the coal is 3%. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2022 | | |
| NAPP 6900 #% FOB Vessel | Northern Appalachian prices loaded into the vessel in Baltimore, Maryland, where KCAL = 6900 and the sulfur content in the coal is 3%. | Cal 24, Cal 25, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24, Q4 24, 1M, 2M, 3M | 2022 | | |
| Nuclear Fuels | Conversion | The conversion of uranium into UF6, which can then be enriched and fabricated into fuel rods. | Q3 22, Q4 22, Q1 23, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24, Q3 24 | 2006 | |
| | Location Swaps | A trade in the differential value of enrichment of uranium between various enrichment facilities. | Cal 22 | 2009 | |
| | Nymex Uranium Swaps | Uranium swaps are a hedging tool for producers and users of uranium, and provide a transparent forward price mechanism for the volatile uranium marketplace. | 1M - 21M, Q2 24, Q3 24, Q4 24, Q1 25, Q2 25, Q3 25, Q4 25, Q1 26, Q2 26, Q3 26, Q4 26, Q1 27, Q2 27, Q3 27, Q4 27, Q1 28 | 2008 | |
| | SWU | Separative Work Unit (SWU) | Q4 22, Q1 23, Q2 23, Q3 23, Q4 23, Q1 24, Q2 24 | 2006 | |
| | U308 | Trades in the physical underlying commodity of uranium. | 1M - 21M, Q2 24, Q3 24, Q4 24, Q1 25, Q2 25, Q3 25, Q4 25, Q1 26, Q2 26, Q3 26, Q4 26, Q1 27, Q2 27, Q3 27, Q4 27, Q1 28 | 2006 | |
| | UF6 | Trades in the physical product of UF6 and conversion contained in UF6. | 1M - 21M, Q2 24, Q3 24, Q4 24, Q1 25, Q2 25, Q3 25, Q4 25, Q1 26, Q2 26, Q3 26, Q4 26, Q1 27, Q2 27, Q3 27, Q4 27, Q1 28 | 2006 | |
| Houston 2x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston 2x16 refers to Houston power trades on the weekends and holidays, 16 daytime hours per day. This is a physical settlement. | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 | | |
| Houston 7x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston 7x16 refers to Houston power trades for the 7 days per week, 16 daytime hours per day. This is a physical settlement. | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 | | |
| Houston 7x8 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston 7x8 refers to Houston power trades for the 7 days per week, 8 nighttime hours per day. This is a physical settlement. | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 | | |
| Houston ATC | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston ATC refers to Around the Clock. Continuously throughout the entire day and night. This is a physical settlement. | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 | | |

| | | | | |
|---------------------------------|--|--|---|------|
| ERCOT | Houston Peak | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston Peak refers to Monday through Friday between 7 a.m. and 11 p.m., when electricity is consumed the most throughout the United States. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | Houston Wrap | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. Houston Wrap refers to off-peak trading hours. Off-peak hours go from midnight to 7 a.m. Monday-Sunday. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North 2x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North 2x16 refers to North Texas power trades on the weekends and holidays, 16 daytime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North 7x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North 7x16 refers to North Texas power trades for the 7 days per week, 16 daytime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North 7x8 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North 7x8 refers to North Texas power trades for the 7 days per week, 8 nighttime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North ATC | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North ATC refers to Around the Clock. Continuously throughout the entire day and night. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North Peak | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North Peak refers to Monday through Friday between 7 a.m. and 11 p.m., when electricity is consumed the most throughout the United States. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | North Wrap | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. North Wrap refers to off-peak trading hours. Off-peak hours go from midnight to 7 a.m. Monday-Sunday. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South 2x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South 2x16 refers to South Texas power trades on the weekends and holidays, 16 daytime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South 7x16 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South 7x16 refers to South Texas power trades for the 7 days per week, 16 daytime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South 7x8 | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South 7x8 refers to South Texas power trades for the 7 days per week, 8 nighttime hours per day. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South ATC | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South ATC refers to Around the Clock. Continuously throughout the entire day and night. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South Peak | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South Peak refers to Monday through Friday between 7 a.m. and 11 p.m., when electricity is consumed the most throughout the United States. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| | South Wrap | The Electric Reliability Council of Texas (ERCOT) Markets consist of 4 trading zones. Houston, North, South, and West. South Wrap refers to off-peak trading hours. Off-peak hours go from midnight to 7 a.m. Monday-Sunday. This is a physical settlement | Cal 22, Cal 23, Cal 24, Cal 25, Cal 26, Cal 27, Cal 28, AUG-SEPT 21 | 2018 |
| Natural Gas Basis | GATE | PG&E Citygate is a trading pipeline located outside of Sacramento in California. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | AECO | Alberta Energy Company is a Hub & the Canadian benchmark price for natural gas | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | SOCAL | SOCAL Hub service territory encompasses approximately 24,000 square miles in diverse terrain throughout Central and Southern California, from Visalia to the Mexican border. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | SCL-GCT | SoCal Citygate is a trading pipeline located in California right outside of Los Angeles. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | MALIN | Malin Hub is located in southern border of Oregon | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | ROX | Gas trading pipeline in the Rockies area. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | CGI | Gas Hub located in the Rockies | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | SUMAS | Sumas Hub Northwest Canadian border located in Washington | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | SAN JUAN | San Juan, New Mexico Gas Hub located in New Mexico | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | PERM | Permian Basin Gas Hub is located in Northwest Mexico / Southwest US | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | WAHA | Gas Hub located within the Permian Basin in West Texas | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | SHIP | Houston Ship Channel Hub is located north end of the Galveston Bay to the channels turning basin | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | TEXOK | Gas Zone from Montgomery County, Texas to Carter County, Oklahoma | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | REX Z3 | Deliveries off of Rockies Express Pipeline into other pipelines in zone 3. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | PAN | Panhandle Zone Pipeline starts in Texas and goes through OKKS, MO,IL,IN,OH,MI | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | MCO | MCO Hub is NGR, Midcontinent is located in southwest Kansas. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | ANK OK | ANK Pipeline System Company transports Natural Gas in Oklahoma | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | S STAR | Southern Star Index trading pipeline includes Texas, Oklahoma and Kansas | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | ENABLE | Enable Gas Transmission System includes deliveries into six distinct pooling areas. The six Pooling Areas are the Flex or Neutral Pooling area, the North Pooling Area, the South Pooling Area, the Line CP Pooling Area, and the West 1 and West 2 Pooling Areas. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | DMARC | Northern Natural Demarc Description: Deals transacted at NNG's Demarcation point, which is the pooling point that separates NNG into its Field and Market zones. This is pooling point/Mileage Indicator District (MID) point 168 as defined in NNG's Rate Schedule MPS: MID Pooling Services rate schedule. The point itself is located in Clay County, KS. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | VENT | Deliveries at the Ventura pooling point on Northern Natural Gas in Hancock County, IA. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | CHI | Chicago Citygate Gas trading pipeline in Chicago Illinois | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | MICH | Michigan Consolidated Gas Pipeline | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | DAWN | Gas traded at Union Gas' Dawn Hub in Dawn Township, Ontario. | 1-5M, 11 Seasons, 8 Quarters, Cal 23-28 | 2021 |
| | Social Index Futures | Social is the Southern California Gas service territory. Index: NGL Southwest; SoCal Gas; Midpoint | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | Social Ehrenberg Physical Index | Deliveries into the Southern California Gas system Southern Zone via El Paso Natural Gas at Ehrenberg, CA. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | El Paso South Mainline Physical Index | Deliveries on El Paso's south mainline at points between Cornudas station in West Texas to but not including Ehrenberg, AZ. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | Kern Delivered Physical Index | Deliveries on Kern River Pipelines extending from southwestern Wyoming to Bakersfield, California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | Social Wheeler Ridge Physical Index | Deliveries into Wheeler Ridge, California zone which includes transactions from Kern River/Mojave, and from PG&E at Kern River Station. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | Social Kramer Physical Index | Transactions received into Southern California Gas from the Kern River/Mojave system at Kramer Junction, CA. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | Social KRS Physical Index | Transactions received into Southern California Gas From the Kern River Station. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| | PG&E Topock Physical Index | Transactions received into The Pacific Gas & Electric (PG&E) Topock Compressor Station (Site) located approximately 15 miles southeast of Needles, California, in San Bernardino County | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Social Needles Physical Index | Deliveries into the Southern California Gas system in Needles, California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Social City Gate Physical Index | Deliveries to customers behind Southern California Gas' local distribution system in Southern California | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| PG&E City Gate Index Futures | PG&E Citygate is PG&E's local distribution system in Northern California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| PG&E City Gate Physical Index | Deliveries into the PG&E system in Northern California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Malin Index Futures | Malin is the natural gas pipeline in Malin, Oregon. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| GTN Malin Physical Index | Deliveries from TransCanada's GTN Pipeline and El Paso/Kinder Morgan's Ruby Pipeline into PG&E's Redwood Path at Malin, Oregon. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Ruby-Onyx Hill Physical Index | Deliveries into the Ruby pipeline in Onyx Hills, California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Perm Index Futures | Perm is the natural gas pipeline in the Permian Basin, Located in Northwest Mexico / Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Permian Keystone Physical Index | Deliveries into the Keystone pipeline in the Permian Basin, Located in Northwest Mexico / Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| EP Waha Pool Physical Index | Deliveries into the Waha Pool Permian Basin Area near El Paso, Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Permian Keystone Physical Index | Deliveries into the Keystone pipeline in the Permian Basin, Located in Northwest Mexico / Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| EP Waha Pool Physical Index | Deliveries into the Waha Pool Permian Basin Area near El Paso, Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Waha Index Futures | Waha is located within the Permian Basin in West Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Waha Hub Physical Index | Deliveries into the Waha hub located within the Permian Basin in West Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Oasis Waha Pool Physical Index | Deliveries into the Oasis Waha Pipeline located in Southeast Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| San Juan Index Futures | San Juan pipeline is located in Northwest New Mexico. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Bondad Station Physical Index | Deliveries into the Bondad Station Pool located in the San Juan Basin, in New Mexico/Texas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| TW Blanco Physical Index | Deliveries into the TW-Blanco Transwestern Pipeline Company located in the San Juan Blanco Pool in New Mexico. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Rox Index Futures | ROX location is in the Northwest Pipeline Corporation in the Rocky Mountains. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Kern Receipt Physical Index | Receipts the Kern River Pipeline starting from Southwest Wyoming and Ending in Bakerfield, California. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |
| Opal Physical Index | Transactions within the Kern River Fuel Zone, which includes the Hams Fork interconnect with Dominion Overthrust; Muddy Creek Compressor Station, Pool and interconnects with CIG and Northwest Pipeline; Opal Plant; Overland Trail interconnect; Pioneer Plant; Rendezvous Pipeline Plant/Interconnect; Roberson Creek interconnect with Dominion Overthrust, and KRGT Virtual Receipts. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 | |

Natural Gas Index

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|------------------------------------|--|---|------|
| CIG Index Futures | CIG hub is located in the Rockies. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| CIG Physical Index | Deliveries into the CIG pipeline Hub located in the Rockies. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Cheyenne Physical Index | Deliveries in the Cheyenne location owned and operated by Kinder Morgan which runs from the Wyoming-Colorado border to South Central Kansas. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Rex Compression Pool Index | Deliveries into the Rockies Express Pipeline (REX). | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Rocky Mountain Pool Physical Index | Deliveries into the Rocky Mountain Pool located in the Rockies. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| White River Hub Physical Index | Deliveries into the White River Hub located in Northwest Colorado, and is actually the combination between Enterprise's Meeker, CO Processing Plant and pipeline interconnections with Questar Pipeline, Rockies Express, TransColorado, Colorado Interstate Gas, Wyoming Interstate Company, Northwest Pipeline, and Williams Field Services' Parachute Lateral. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Wyoming Pool Physical Index | Deliveries into the Wyoming Natural Gas Hub. | 1M, 2M, 3M, AUG-OCT 22, NOV22-MAR23, APR-OCT 23 | 2021 |
| Opal Physical Index | Transactions within the Kern River Fuel Zone, which includes the Hams Fork interconnect with Dominion Overthrust; Muddy Creek Compressor Station, Pool and interconnects with CIG and Northwest Pipeline; Opal Plant; Overland Trail interconnect; Pioneer Plant; Rendezvous Pipeline Plant/interconnect; Roberson Creek interconnect with Dominion Overthrust, and ERGT Virtual Receipts. | Exchange & OTC | 2021 |
| CIG Index Futures | CIG hub is located in the Rockies. | Exchange & OTC | 2021 |
| CIG Physical Index | Deliveries into the CIG pipeline Hub located in the Rockies. | Exchange & OTC | 2021 |
| Cheyenne Physical Index | Deliveries in the Cheyenne location owned and operated by Kinder Morgan which runs from the Wyoming-Colorado border to South Central Kansas. | Exchange & OTC | 2021 |
| Rex Compression Pool Index | Deliveries into the Rockies Express Pipeline (REX). | Exchange & OTC | 2021 |
| Rocky Mountain Pool Physical Index | Deliveries into the Rocky Mountain Pool located in the Rockies. | Exchange & OTC | 2021 |
| White River Hub Physical Index | Deliveries into the White River Hub located in Northwest Colorado, and is actually the combination between Enterprise's Meeker, CO Processing Plant and pipeline interconnections with Questar Pipeline, Rockies Express, TransColorado, Colorado Interstate Gas, Wyoming Interstate Company, Northwest Pipeline, and Williams Field Services' Parachute Lateral. | Exchange & OTC | 2021 |
| Wyoming Pool Physical Index | Deliveries into the Wyoming Natural Gas Hub. | Exchange & OTC | 2021 |