LA DWP	Los Angeles Department of Water & Power
BOARD LE	TTER APPROVAL

RESOLUTION NO. _____

REIKO A. KERR

Senior Assistant General Manager – Power System Engineering, Planning, and Technical Services

MARTIN L. ADAMS

General Manager and Chief Engineer

DATE:

September 16, 2020

SUBJECT:

Clean Grid LA – Red Cloud Wind Power Sale Agreement No. BP 20-001 and Red Cloud Wind Agency Agreement No. BP 20-002 Between LADWP

and LADWP and the Southern California Public Power Authority

SUMMARY

The attached Resolution recommends City Council approval, by Ordinance, of Red Cloud Wind Power Sale Agreement (PSA) No. BP 20-001 and Red Cloud Wind Agency Agreement (AA) No. BP 20-002 totaling 331 megawatts (MW) of wind energy. Further, it authorizes LADWP to apply the renewable energy and environmental attributes acquired under the PSA towards the State-mandated compliance requirements of LADWP's Renewable Portfolio Standard (RPS) Policy and Enforcement Program.

PSA No. BP 20-001 and AA No. BP 20-002 are required for LADWP to acquire 331 MW of wind energy from the Red Cloud Wind Project (Red Cloud) located in Lincoln, Torrance and Guadalupe Counties in New Mexico. The PSA enables LADWP to purchase this renewable energy from the Southern California Public Power Authority (SCPPA) for a term of 20 years with options to mutually agree to extend the term up to 25 or 30 years. The estimated commercial operation date (COD) is December 2021. The AA designates LADWP as the Project Manager to administer Red Cloud on behalf of SCPPA.

LADWP's current renewable energy sales, per RPS requirements, are approximately 35 percent. Red Cloud is expected to be in-service by December 2021 and is anticipated to increase LADWP's renewable energy sales to all customers by approximately six percent.

City Council approval is required pursuant to City Charter Section 674.

RECOMMENDATION

It is requested that the Board of Water and Power Commissioners (Board) adopt the attached Resolution approving and requesting City Council approval, by Ordinance, pursuant to Charter Section 674, of PSA No. BP 20-001 for the purchase of renewable energy, environmental attributes and capacity and AA No. BP 20-002 for project management.

ALTERNATIVES CONSIDERED

Through the SCPPA Request for Proposal (RFP) process, Red Cloud was selected as an addition to LADWP's generation portfolio because Red Cloud:

- Utilizes LADWP's existing transmission rights between the Navajo 500 kilovolts (kV) Switching Station and the Crystal Switching Station.
- Has an excellent capacity factor at 46 percent due to favorable wind conditions at project location.
- Contributes significantly to LADWP's RPS goals.
- Will be designed, engineered and constructed by an experienced renewable developer.
- Provides resource diversity where the wind production profile compliments the solar production profile during evening and early morning hours.
- Provides ownership opportunity after tax benefits have expired.

The impact of not acquiring renewable energy from Red Cloud could cause LADWP to miss its RPS procurement target of 55 percent renewable energy by 2025. LADWP's only available alternative would be to start negotiations with another developer for renewable energy who may not meet the criteria mentioned above and could potentially include less favorable terms because of the reduction of the federal Production Tax Credits (PTC) occurring after December 31, 2021.

FINANCIAL INFORMATION

The price of energy under the Red Cloud Power Purchase Agreement (PPA) is \$43 per MW hour (MWh) with no escalation over a 20-year term. The price includes the construction of a new gen-tie transmission line, the Western Spirit Transmission Line, which will be owned and operated by the Public Service Company of New Mexico (PNM). In addition, the price includes long-term firm transmission through PNM and Tucson Electric Power (TEP) for the delivery of energy to the Point of Delivery (POD), the Navajo 500 kV Switching Station.

In the event Red Cloud qualifies for 100 percent of the PTC, the energy price will be reduced by \$2.00 per MWh and the new energy price will be \$41.00 per MWh. The price for Test Energy will be reduced to \$30.25 per MWh and Excess Energy will be reduced to \$16.40 per MWh.

The average annual energy LADWP will receive from Red Cloud is approximately 1,333,000 MWh. The estimated average cost of this energy for LADWP is approximately \$57.3 million annually and \$1.15 billion over the 20-year term. If Red Cloud qualifies for 100 percent of the PTC, the estimated average cost will be \$54.6 million annually and \$1.09 billion over the 20-year term. The funds will be used to purchase renewable energy and environmental attributes as part of LADWP's RPS Policy and will benefit the LADWP ratepayers by supplying them with renewable energy that will reduce the consumption and cost of fossil fuels and emissions.

The Red Cloud energy price is discounted because of Pattern Energy's ability to take advantage of the PTC that is not available to governmental entities such as LADWP. The City of Los Angeles ratepayers indirectly receive the tax cost savings passed along by the owner through a discounted energy price for renewable energy, and from the financial and environmental benefits resulting from reduced emissions and fossil fuel consumption.

Funding is budgeted in the Power Revenue Fund's Fuel and Purchased Power Budget. The rate impact for this facility for the ratepayer is expected to be an increase of 0.135 cents per kilowatt-hour (kWh) over the 20-year term. For LADWP's residential customers, it is an addition of \$4.86 per year over the term. When accounting for the estimated greenhouse gas emissions allowance savings the project provides, the rate impact is estimated to decrease from 0.135 cents per kWh to 0.050 cents per kWh; or a decrease from \$4.86 to \$1.80 per year for LADWP's residential customers over the 20-year term.

At the end of the 20th year, SCPPA and Pattern Energy may mutually agree to extend the term for two additional periods of five years, in each case upon such terms and conditions as may be mutually agreed to by both parties.

The Red Cloud PPA allows for the option to purchase the facility in year 13 and end of PPA term at year ending 20, 25, and 30.

The Purchase Price will be based on the fair market value of Red Cloud at the time of purchase provided that the purchase option is exercised.

BACKGROUND

LADWP is transforming its power generation portfolio in furtherance of its Clean Grid LA roadmap effort to address the environmental, regulatory, reliability, and economic challenges related to discontinued use of gas-fired units that use once-through cooling at coastal generation stations. As a North American Electric Reliability Corporation balancing authority, LADWP has direct responsibility to ensure reliable electricity service as it reduces greenhouse gas (GHG) emissions and transitions from energy sources based on fossil fuels to more sustainable forms of renewable energy.

LADWP's Strategic Long-Term Resource Plan (SLTRP)

LADWP's SLTRP provides a future 20-year planning framework to meet State, City, and LADWP RPS policies that forms the basis for the recommended plan outlined in the 2017 Integrated Resource Plan.

Senate Bill 100 increased the 2030 RPS requirement to 60 percent and L.A.'s Green New Deal (Sustainable City pLAn) has set goals of 55 percent by 2025 and 80 percent by 2036.

LADWP rigorously evaluates each potential strategy to identify and recommend the best overall strategy to meet these key objectives.

Selection Criteria

Red Cloud was chosen based on a detailed comparison of the SCPPA submittals for each project using LADWP's selection criteria, which includes:

- Total delivered cost to the desired Point of Delivery
- Utilization of existing LADWP transmission assets
- Transmission availability
- Project capacity and expected energy delivery
- Level of existing site control
- Level of environmental review
- Expected COD
- Experience in developing utility-scale wind projects
- Level of financial guarantee

LADWP evaluates potential renewable projects through an internal evaluation process which includes a weighted average scoring matrix of select criteria. LADWP determined that Red Cloud provided the best overall value to LADWP's ratepayers.

Southern California Public Power Authority (SCPPA)

SCPPA is a nonprofit joint power agency formed in 1980 to facilitate joint power and transmission projects for the benefit of the Southern California municipal utilities. SCPPA's members include LADWP, the cities of Anaheim, Azusa, Banning, Burbank, Cerritos, Colton, Glendale, Pasadena, and Riverside as well as the Imperial Irrigation District (IID). On April 4, 2006, the Board approved the SCPPA Phase I Renewable Development Agreement No. 96125-76 under Resolution No. 006-157, which was subsequently superseded and replaced by the Phase II Renewable Development Agreement No. 12-020 approved and adopted by the Board on August 22, 2012, by Resolution No. 013-049. This resolution authorized LADWP to participate with other members of SCPPA for the purpose of investigating and performing due diligence on potential new renewable resource options.

SCPPA issued an RFP on January 12, 2018, a competitive selection process for the purchase and/or acquisition of renewable energy resources. This is an open RFP that allows new proposals to be submitted on a continuous basis and existing proposals to be refreshed with current prices and terms. LADWP jointly participated with multiple municipal utilities for the purpose of acquiring renewable energy resources. In 2018, SCPPA received 105 proposals from developers having the capability to provide renewable energy from various sources such as solar, wind, biomass, landfill gas, and geothermal. Pattern Energy responded to SCPPA's RFP with its proposal for Red Cloud.

SCPPA will enter into the Red Cloud PPA for the purchase of energy and environmental attributes from Red Cloud. Through the PSA between SCPPA and LADWP, SCPPA sells all of the renewable energy received from Red Cloud and passes through to LADWP the energy, rights, benefits, and obligations provided under the PSA.

PPA Between SCPPA and Red Cloud Wind LLC

SCPPA is entering into the PPA with Red Cloud Wind LLC, a special-purpose entity whose ultimate upstream equity owner is Pattern SC Holding LLC (Pattern), a Delaware limited liability company. The PPA will be an attachment to the PSA. Pattern will design, construct, own, maintain and operate Red Cloud which is located in Lincoln, Torrance and Guadalupe Counties, approximately 85 miles southeast of Albuquerque, New Mexico. Red Cloud will also ensure delivery of the energy to the POD through the construction of a new gen-tie transmission line and securing long-term firm transmission service agreements with the PNM and with TEP. Please refer to Figure 1 for Red Cloud location and transmission path.

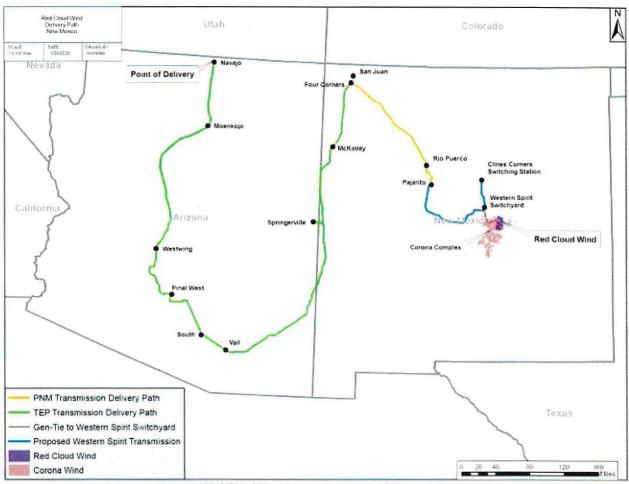


Figure 1: Red Cloud Wind Project Location and Transmission Map

The PPA provides that Red Cloud will sell to SCPPA a net of 331 MW of wind energy with an annual guaranteed delivery of 1,067,000 MWh and an annual expected generation of 1,333,000 MWh of renewable energy and associated environmental attributes at \$43.00 per MWh with no escalation.

The price for Test Energy and environmental attributes will be \$32.25 per MWh. The price of the Excess Energy that is in excess of 110 percent of the expected annual generation will be \$17.20 per MWh after COD.

After the 11th year from COD, LADWP can elect to exercise its curtailment option which allows for four percent curtailment for that contract year. LADWP must notify Pattern Energy each year LADWP elects to exercise the curtailment option. If the curtailment option is exercised, the energy price increases to \$44.45 per MWh for the contract year.

In the event the Red Cloud Wind Project qualifies for 100 percent of the PTC, the energy price will be reduced by \$2.00 per MWh and the new energy price will be \$41.00 per MWh. The price for Test Energy, Excess Energy, and Curtailment Option Energy Price will also be reduced.

Even though Red Cloud is located in New Mexico and is within the local balancing authority of PNM, Red Cloud will be part of LADWP's Balancing Authority Area via a pseudo-tie.

LADWP's RPS Policy provides that eligible renewable resources procured after June 1, 2010 should be classified into Portfolio Content Categories (PCC). For these resources, LADWP must procure an increasing proportion of its renewable energy from resources classified as PCC-1 including resources that are interconnected to a California Balancing Authority such as LADWP. LADWP must procure a minimum of 75 percent of PCC-1 resources by December 31, 2025. With this resource, Red Cloud will help LADWP achieve its PCC-1 requirements because Red Cloud will be delivered to the POD located within LADWP's balancing authority. Please refer to Figure 2 for Red Cloud's contribution to LADWP's RPS Policy.

The PPA also provides that during its term, Red Cloud must deliver facility energy in an amount equal to 160 percent of the Expected Annual Generation over a period of two consecutive years. To the extent there is a shortfall of guaranteed energy delivered, the Seller can provide replacement of equivalent renewable energy or otherwise compensate LADWP.

Finally, as discussed above, the PPA also includes the option to purchase Red Cloud under the Purchase Option Agreement. SCPPA could choose to exercise the buyout under the Purchase Option at year 13 from COD or end of term. Following the exercise of the Purchase Option, the PPA would terminate and SCPPA would obtain ownership of Red Cloud. Upon the repayment of any outstanding bonds used by SCPPA and any other amounts owed, ownership would ultimately transfer to LADWP. In addition to its rights under the Purchase Option, the PPA gives SCPPA a right-of-first offer for any proposed sale of Red Cloud during the term of the PPA. The attached Resolution requires prior authorization by the Board before any Purchase Option is exercised.

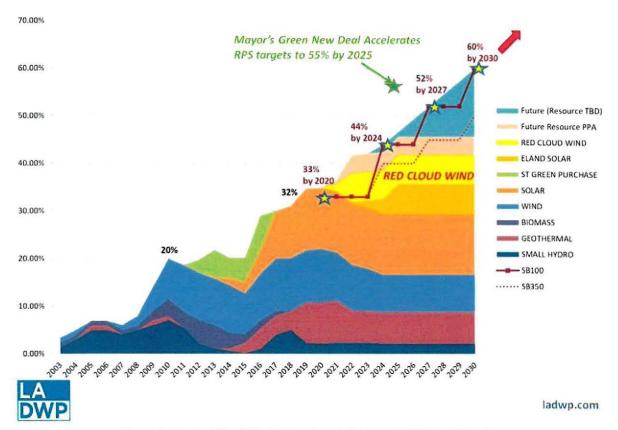


Figure 2: The Red Cloud Wind Project's contribution to LADWP's RPS Policy

PSA No. BP 20-001 Between SCPPA and LADWP

Under the PSA, LADWP contractually agrees to mutual covenants and agreements in order to pay SCPPA for its share of costs for Red Cloud renewable energy, environmental attributes, and capacity. In addition, the PSA:

- Contains the PPA, the agreement between SCPPA and Red Cloud.
- Identifies the roles, rights, and obligations of SCPPA and LADWP including but not limited to: project deliverables, project manager, setting up of an annual budget, accounting, and reporting requirements.
- Establishes LADWP as the Project Manager for the purpose of project control, communication, and coordination with SCPPA.
- Establishes payment mechanisms including but not limited to: payment pledges, charges and billing procedures, and interest payments.
- Establishes the rights and obligations of SCPPA and LADWP to deliver energy, capacity and environmental attributes.
- Encompasses other agreements and obligations including but not limited to: nonperformance and payment defaults, and liability conditions to termination or amendments.

- Addresses other services such as delivery procedures, transmission, and dynamic scheduling.
- Requires LADWP Board approval before exercising of the Purchase Option.

Under the terms of the PSA, LADWP contractually agrees:

- To purchase test energy (pre-COD) from Red Cloud at a cost of \$32.25 per MWh, expected to begin in mid-2021. This price includes environmental attributes.
- To purchase from SCPPA the energy output from Red Cloud, which is 331 MW of wind energy and associated environmental rights and attributes, expected to begin at the end of 2021.
- To pay for the average annual delivery of 1,333,000 MWh of energy, at a fixed price of \$43.00 per MWh, with no annual escalation factor.
- To pay for the excess energy (including its environmental attributes) that is in excess of 110 percent of the Expected Annual Generation energy at a cost of \$17.20 per MWh.

AA No. BP 19-016 Between SCPPA and LADWP

The AA designates LADWP as the Project Manager to manage and administer Red Cloud for and on behalf of LADWP in order to enable SCPPA to carry out activities necessary for the planning, development, and acquisition of Red Cloud.

The mutual covenants and agreements addressed by the AA include:

- Identifying the roles and obligations of SCPPA and LADWP in connection with project reviews, monitoring, accounting, billing, reporting, and controls including the setting up of an annual budget and reporting requirements.
- Establishing payment mechanisms and billing procedures including but not limited to payments between LADWP and SCPPA for costs, and charges related to Red Cloud.
- Establishing a term for the AA to be the same as the term of the PSA. Both terms are linked to the term of the PPA.

Risk Management Provisions

The PPA provides SCPPA step-in rights in the event Pattern Energy defaults on its obligations. Pattern Energy is required to post two performance securities: the first security during construction (before achieving COD), and the second security for the term of the PPA once Red Cloud achieves COD.

To the extent there is a shortfall of guaranteed energy delivered, the Seller can provide replacement of equivalent renewable energy or otherwise compensate LADWP.

Because of the effects of the COVID-19 Pandemic that are currently being felt globally and potentially may linger for an extended period, COVID-19 Pandemic was addressed in the definition of Force Majeure in the PPA. With this addition, it will allow the affected party to extend key milestones and obligations to allow for the affected party to mitigate and to resume performing under the PPA.

Several additional provisions protect LADWP's participation in Red Cloud including the ability to review and inspect designs and construction.

In accordance with the Mayor's Executive Directive No. 4, the City Administrative Officer's (CAO) Report dated September 3, 2020, is attached.

ENVIRONMENTAL DETERMINATION

It has been determined that entering into power sale agreements and agency agreements with SCPPA to purchase renewable wind power is exempt pursuant to the General Exemption described in California Environmental Quality Act Guidelines Section 15061(b)(3). General Exemptions apply in situations where it can be seen with certainty that there is no possibility that the activity in question may have a significant effect on the environment.

CITY ATTORNEY

The Office of the City Attorney reviewed and approved the Resolution and Red Cloud Wind Power Sale Agreement (PSA) No. BP 20-001 and Red Cloud Wind Agency Agreement (AA) No. BP 20-002 as to form and legality.

ATTACHMENTS

- Resolution
- Draft Ordinance
- Power Sales Agreement No. BP 20-001
- Agency Agreement No. BP 20-002
- CAO Report