State of California

California Energy Commission
Minutes of the May 12, 2021, Energy Commission Business Meeting

The meeting was called to order by Commissioner Douglas. The Pledge of Allegiance was led by Commissioner McAllister.

Present:

Karen Douglas, Commissioner Siva Gunda, Commissioner Patricia Monahan, Commissioner J. Andrew McAllister, Commissioner

The California Energy Commission's (CEC) May 12, 2021 Business Meeting was held remotely, consistent with Executive Orders N-25-20 and N-29-20 and the recommendations from the California Department of Public Health to encourage physical distancing to slow the spread of COVID-19. The public was able to participate and observe the meeting consistent with the direction in these Executive Orders. Instructions for remote participation were provided in the notice for this meeting and as set forth below in the agenda.

THE CEC WILL CONSIDER AND MAY TAKE ACTION ON THE FOLLOWING:

1. Consent Calendar

Items will be taken up and voted on as a group. A commissioner may request that an item be moved and discussed later in the meeting.

- a. School Bus Replacement for California Public School Districts, County Offices of Education, and Joint Power Authorities – GFO-17-607. The purpose of this solicitation is to replace California's oldest and dirtiest diesel school buses with all new battery-electric buses and install supporting charging infrastructure. (Clean Energy Job Creation Fund and Clean Transportation Program funding.) Contact: Ian Baird
 - Chowchilla Elementary School District. Proposed resolution approving Agreement ARV-20-011 with Chowchilla Elementary School District for a \$381,184 grant to replace one diesel powered school bus with one clean, allelectric school bus and install supporting charging infrastructure; and adopting staff's determination that the installation of the charging infrastructure is exempt from the California Environmental Quality Act (CEQA).
 - Soledad Unified School District. Proposed resolution approving Agreement ARV-20-012 with Soledad Unified School District for a \$392,009 grant to replace one diesel powered school bus with one clean, all-electric school bus and install supporting charging infrastructure; and adopting staff's determination that the installation of the charging infrastructure is exempt from CEQA.

- b. Subpoena for Provision of Data. Proposed order approving a subpoena directing the California Independent System Operator to provide data needed by CEC staff to evaluate generation and transmission outages, congestion, and load in assessing resource adequacy and system reliability. Contact: Christopher McLean
- c. Reappoint Two Members to the Disadvantaged Communities Advisory Group (DACAG). The purpose of the DACAG pursuant to Senate Bill 350 (De León, Chapter 547, Statutes of 2015) is to review and provide advice on proposed clean energy and pollution reduction programs and determine whether those proposed programs will be effective and useful in disadvantaged communities. Members of the DACAG may serve up to three consecutive staggered two-year terms. Five members' terms begin April 1 and end March 31 of even-numbered years, and five members' terms begin April 1 and end March 31 of odd-numbered years. Contact: Noemí Gallardo
 - 1. Reappointment of Stephanie Chen: Stephanie was appointed to the DACAG in April 2018. After her first two-year term, the CEC and CPUC extended her term one additional year, through March 2021. She seeks to be re-appointed and is eligible to serve two more terms.
 - 2. Reappointment of Román Partida-Lopez: Román was appointed to the DACAG in July 2020 to finish the term of another member that ended in March 2021. He seeks to be re-appointed and is eligible to serve three more terms.
- d. Electricity Demand Forecasts. Proposed resolution approving *Forms and Instructions for Submitting Electricity Demand Forecasts* in support of the *2021 Integrated Energy Policy Report*. Obligated load-serving entities are instructed to provide the CEC with load data, economic and demographic projections, and other data related to electricity demand for historical years 2019 to 2020 and forecast years 2021 to 2032. Contact: Kelvin Ke
- e. Electricity Resource Plans. Proposed resolution approving Forms and Instructions for Submitting Electricity Resource Plans in support of the 2021 Integrated Energy Policy Report. Obligated load-serving entities are instructed to provide the CEC with energy and capacity requirements, generating resources projections, and other data related to electricity resource plans for historical years 2019 to 2020 and forecast years 2021 to 2030. Contact: Robert Kennedy

Commissioner Monahan moved to approve Item 1 and Commissioner McAllister seconded. The vote was (4-0).

2. Diversity Commitment Update.

Staff will present highlights of investment programs and efforts to accomplish the CEC's Diversity Commitment to increase participation of and benefits to small and diverse business enterprises in funding programs and increase the participation of

and benefits to disadvantaged communities through programs and policies. Contact: Noemí Gallardo (Staff Presentation: 30 minutes)

Staff presented informational Item 2. No vote taken.

3. CA3 Backup Generating Facility (21-SPPE-01).

Proposed order appointing a committee of two commissioners to preside over the small power plant exemption (SPPE) proceeding and any other proceedings arising from the application filed on April 12, 2021, by Vantage Data Services for the proposed CA3 Backup Generating Facility (CA3) at 2590 Walsh Avenue in Santa Clara, California. CA3 would consist of 44 2.75 megawatt (MW) diesel-fired generators to provide up to 96 MW of backup emergency generation for the associated CA3 Data Center building in the event electricity cannot be supplied by the utility, Silicon Valley Power. The CEC is the lead agency for the project under the Warren-Alquist Act and CEQA and will prepare the appropriate environmental document. If an SPPE is granted, the facility would be exempt from CEC jurisdiction and subject to permitting by the City of Santa Clara and other agencies. Contact: Eric Knight (Staff Presentation: 5 minutes)

The CEC appointed a committee consisting of Commissioner Karen Douglas, as presiding member, and Commissioner Siva Gunda, as associate member. Commissioner Gunda moved to approve Item 3 and Commissioner McAllister seconded. The vote was (4-0).

4. Integrated Environmental Solutions (IES) Virtual Environment (VE) Approved Computer Compliance Program for 2019 Title 24, Part 6 Nonresidential, Version 1.0.

Proposed resolution approving IES VE Title 24 2019 Version 1.0, by Integrated Environmental Solutions Limited, as an alternative calculation method for demonstrating performance compliance with the nonresidential provisions of the 2019 Building Energy Efficiency Standards, California Code of Regulations, Title 24, Part 1 and Part 6. Contact: RJ Wichert (Staff Presentation: 10 minutes)

Commissioner McAllister moved to approve Item 4 and Commissioner Monahan seconded. The vote was (4-0).

5. Energy Conservation Assistance Act Loan Program (ECAA).

Proposed resolutions approving three loans: one ECAA-Ed loan to a local educational agency (LEA) at zero percent interest and two ECAA loans to municipalities at one percent interest to finance energy efficiency and renewable energy projects. (Clean Energy Job Creation Fund, ECAA-Ed Funding, and ECAA Funding) Contact: Matt Jones (Staff presentation: 5 minutes)

 Ravenswood City School District (ECAA-Ed Funding). Proposed resolution approving Agreement 016-20-ECG with Ravenswood City School District for a \$2,925,948 zero-interest loan to retrofit lighting with LEDs and install 527 kW

- solar photovoltaic (PV) arrays. Approval to adopt staff's determination that this action is exempt from CEQA. The proposed PV projects are estimated to generate a combined total of 823,564 kWh of electricity and the LED lighting projects are estimated to save annually 140,166 kWh and \$158,279. The loan repayment term is approximately 18.5 years.
- b. City of Ferndale (ECAA Funding). Proposed resolution approving Agreement 002-20-ECI with the City of Ferndale for a \$203,200 loan at one percent interest to install interior and exterior LED lighting at one city-owned facility and install rooftop solar PV systems totaling 56.6 kW at two city-owned buildings. Approval to adopt staff's determination that this action is exempt from CEQA. The proposed project is estimated to save annually 77,760 kWh and \$14,827. The loan repayment term is approximately 13.7 years.
- c. Mariposa County (ECAA Funding). Proposed resolution approving Agreement 003-20-ECI with Mariposa County for a \$2,838,826 loan at one percent interest to install LED lighting at eight county sites and install carport solar PV systems totaling 376 kW at four separate county facilities. Approval to adopt staff's determination that this action is exempt from CEQA. The proposed project is estimated to save annually 919,257 kWh and \$190,823. The loan repayment term is approximately 14.9 years.

Commissioner McAllister moved to approve Item 5 and Commissioner Monahan seconded. The vote was (4-0).

6. The University of California, Davis.

Proposed resolution approving Agreement 600-20-009 with The Regents of the University of California, on behalf of the Davis campus to award a \$125,000 contract to study the role of light-, medium-, and heavy-duty vehicles and infrastructure in a California hydrogen transition, and adopting staff's recommendation that this action is exempt from CEQA. (Clean Transportation Program funding) Contact: Miki Crowell (Staff Presentation: 5 minutes)

Commissioner Monahan announced that she currently serves on the Board of Advisors for the University of California Institute of Transportation Studies (UC ITS). She does not make governance decisions on behalf of the Institute, but provides guidance and oversight to the UC ITS programs and its four branches. She also announced she does not receive compensation in any form and has no financial interest. In abundance of caution, Commissioner Monahan recused herself from any discussion, consideration, and vote to avoid any perception of a conflict of interest.

Commissioner Gunda moved to approve Item 6 and Commissioner McAllister seconded. The vote was (3-0).

7. Zero-Emission Transit Fleet Infrastructure Deployment (GFO-20-602).

The purpose of this solicitation is to fund the electric vehicle charging or hydrogen refueling infrastructure needed to support the large-scale conversion of transit bus

fleets to zero-emission vehicles (ZEVs) at multiple transit agencies serving diverse geographic regions and populations. (Clean Transportation Program funding) Contact: Esther Odufuwa (Staff Presentation: 5 minutes)

- a. North County Transit District. Proposed resolution approving Agreement ARV-20-013 with North County Transit District for a \$4,013,750 grant to design and build a hydrogen fueling station, and adopting staff's determination that this action is exempt from CEQA.
- b. SunLine Transit Agency. Proposed resolution approving Agreement ARV-20-014 with SunLine Transit Agency for a \$4,986,250 grant to expand their existing heavy-duty hydrogen fueling infrastructure to include a new stand-alone liquid hydrogen station to support current and future transit fueling needs, and adopting staff's determination that this action is exempt from CEQA.

Commissioner Monahan moved to approve Item 7 and Commissioner Gunda seconded. The vote was (4-0).

8. Skyven Technologies, Inc.

Proposed resolution approving Agreement PIR-20-005 with Skyven Technologies, Inc. for a \$1,479,000 grant to fund the development of a high concentration PV and thermal system for solar combined heat and power in industrial applications, and adopting staff's determination that this action is exempt from CEQA. The project will support decarbonization of California's commercial and industrial sectors and reduce dependence on natural gas by using high-concentration secondary optics and water-cooled PV cells to simultaneously produce electricity and hot water that is cost competitive with electric and natural gas rates. (PIER NG funding) Contact: Baldomero Lasam (Staff presentation: 5 minutes)

Commissioner McAllister moved to approve Item 8 and Commissioner Gunda seconded. The vote was (4-0).

9. AgMonitor Inc.

Proposed resolution approving Agreement EPC-20-036 with AgMonitor Inc. for a \$349,972 grant to expand the recipient's innovative software-as-a-service technology, and adopting staff's determination that this action is exempt from CEQA. The software technology will help California growers irrigate outside of peak demand periods and achieve permanent load shifting. The technology will be deployed on at least 10,000 acres of farmland and will achieve at least 7 MW of load shifting over the agreement term. (EPIC funding) Contact: Anish Gautam (Staff Presentation: 5 minutes)

Commissioner McAllister moved to approve Item 9 and Commissioner Gunda seconded. The vote was (4-0).

10. Bringing Rapid Innovation Development to Green Energy: (GFO-20-301).

The purpose of this solicitation is to fund the continued development, specifically in applied research or technology demonstration and deployment, of high-potential, high-impact energy technologies that are too early for significant private-sector investment. (EPIC funding) Contact: Michael Ferreira (Staff Presentation: 5 minutes)

- a. Stasis Energy Group LLC. Proposed resolution approving Agreement EPC-20-037 with Stasis Energy Group LLC for a \$1,634,740 grant to demonstrate its Thermal Energy Storage Systems (TESS) at 10 commercial buildings, with more than half of the demonstration sites located in disadvantaged or low-income communities, and adopting staff's determination that this action is exempt from CEQA. The proposed TESS uses a bio-based phase change material which stores energy harvested from the HVAC system during daily cooling operations and releases the energy during the costliest electricity generation periods of the day. In addition, the TESS cloud-connected controller can optimize thermal storage use, manage comfort settings for building occupants, and provide real-time and historical data on installed units.
- b. EPC Power Corp. Proposed resolution approving Agreement EPC-20-039 with EPC Power Corp. for a \$3,499,532 grant to fund the design and construction of an innovative integrated power electronics/energy storage system to serve the grid-tied energy storage market, and adopting staff's determination that this action is exempt from CEQA. The system will be rated for 1 MW power and 1 MWh energy and use repurposed, second-life EV packs. The recipient will conduct a one-year technology demonstration at a facility in a disadvantaged community in San Joaquin County, California.

Commissioner McAllister moved to approve Item 10 and Commissioner Monahan seconded. The vote was (4-0).

11. Evaluation of Bi-Directional Energy Transfer and Distributed Energy Resource Integration for Medium and Heavy-Duty Fleet Electrification (GFO-20-304).

The purpose of this solicitation is to fund Technology Demonstration & Deployment research projects that evaluate resilience, renewable integration, and cost management use cases for medium- and heavy-duty (MDHD) battery electric vehicles (BEVs). Funding is available for projects that advance hardware or software tools for managed bidirectional energy transfer from electric school buses (Group 1); or advance hardware or software to integrate MDHD BEVs and charging equipment in a behind-the-meter distributed energy resource (DER) package that includes distributed generation, stationary storage, and an energy management system (Groups 2-3). (EPIC Funding) Contact: Elise Ersoy (Staff Presentation: 10 minutes)

a. MOEV Inc. Proposed resolution approving Agreement EPC-20-038 with MOEV Inc. for a \$3,319,387 grant to demonstrate an artificial intelligence based fleet charging management system with DERs including electric transit buses, charging stations, a battery energy storage system, and solar PV, and adopting

- staff's determination that this action is exempt from CEQA. The demonstration will be used to evaluate the potential for the artificial intelligence charging management system to optimize the management of DERs to reduce costs, increase the use of renewable energy sources, and provide grid resilience.
- b. Lawrence Berkeley National Laboratory. Proposed resolution approving Agreement EPC-20-040 with Lawrence Berkeley National Laboratory for a \$4,000,000 grant to design, construct, and study an electric school bus depot charging system, featuring a novel and efficient direct current-coupled topology with an integrated solar canopy and stationary storage, and adopting staff's determination that this action is exempt from CEQA. Such a system caters to the scalability of EV charging depots because it requires no power from the utility and can also power a resilience hub.

Commissioner McAllister moved to approve Item 11 and Commissioner Monahan seconded. The vote was (4-0).

12. Food Production Investment Program 2020 (GFO-20-307).

The purpose of this solicitation is to fund energy technologies at California food processing facilities which reduce energy use and greenhouse gas (GHG) emissions. (FPIP funding) Contact: Cyrus Ghandi (Staff Presentation: 10 minutes)

- a. Blue Diamond Growers. Proposed resolution approving Agreement FPI-20-002 with Blue Diamond Growers for a \$340,093 grant to fund the installation of an advanced, energy efficient air compressor system at the recipient's almond processing facility, and adopting staff's determination that this action is exempt from CEQA. The new system will include more efficient equipment and advanced controls resulting in reduced GHG emissions and electricity consumption.
- b. Pacific Coast Producers. Proposed resolution approving an Agreement FPI-20-003 with Pacific Coast Producers for a \$138,110 grant to install an optimized compressed air system at the recipient's tomato processing facility, and adopting staff's determination that this action is exempt from CEQA. Optimization will be achieved by installing a high-efficiency air compressor, air dryer, filters, variable frequency drives, and a larger air storage tank, which enables lower system pressure and requires less energy to maintain. This project will result in reduced electricity consumption, GHG emissions, and operating costs.
- c. Jessie Lord Bakery, LLC. Proposed resolution approving Agreement FPI-20-004 with Jessie Lord Bakery, LLC for a \$5,494,374 grant to replace and retrofit inefficient equipment including refrigeration and hot water systems to reduce GHG emissions at the recipient's baked products facility, and adopting staff's determination that this action is exempt from CEQA. This project is expected to provide benefits to priority populations through criteria pollutant emission reductions.
- d. Baker Commodities, Inc. Proposed resolution approving Agreement FPI-20-005 with Baker Commodities, Inc. for a \$857,350 grant to fund the installation of

boilers and insulation at the recipient's animal food production facility, and adopting staff's determination that this action is exempt from CEQA. The project will replace existing boilers and add insulation to holding tanks used in the cooking process which will improve efficiency and reduce heat loss, natural gas use, and GHG emissions. The project is expected to benefit priority populations through criteria pollutant emission reductions.

- e. WWF Operating Company, LLC. Proposed resolution approving Agreement FPI-20-006 with WWF Operating Company, LLC for a \$283,500 grant to fund the installation of state-of-the-art steam traps at the recipient's dairy processing facility, and adopting staff's determination that this action is exempt from CEQA. The project will replace existing, inefficient steam traps with non-mechanical traps that will reduce steam loss, natural gas use, and GHG emissions. This project is expected to benefit priority populations through criteria pollutant emission reductions.
- f. Campbell Soup Supply Company L.LC. Proposed resolution approving Agreement FPI-20-007 with Campbell Soup Supply Company L.L.C. for a \$899,588 grant to retrofit an existing double effect evaporator at the recipient's tomato processing facility, and adopting staff's determination that this action is exempt from CEQA. This project will add a new evaporator vessel, pumps, modifications to existing structural platforms, vapor lines, condensate piping systems, and electrical and controls. The new high-efficiency system will support the company's sustainability goals, reduce operating costs, improve energy efficiency, and reduce natural gas use and GHG emissions.
- g. E. & J. Gallo Winery. Proposed resolution approving Agreement FPI-20-008 with E. & J. Gallo Winery for a \$769,861 grant to install a high-efficiency compressor system at its Livingston winery and a low-GWP low-charge ammonia refrigeration system at its St. Helena winery, and adopting staff's determination that this action is exempt from CEQA. This project will result in reduced electricity consumption, GHG emissions, and operating costs.

Commissioner McAllister moved to approve Item 12 and Commissioner Gunda seconded. The vote was (4-0).

13. Local Building Energy Efficiency Standards Application (19-BSTD-06).

Consideration and possible adoption of resolutions regarding three separate applications submitted by local jurisdictions for ordinances that contain building energy efficiency standards exceeding the energy efficiency requirements of the 2019 Building Energy Efficiency Standards (Title 24, Part 6). Contact: Danuta Drozdowicz (Staff Presentation: 5 minutes)

a. City of Piedmont. New ordinance that contains requirements that low-rise residential projects with a value over \$25,000 include certain energy efficiency measures and that any newly constructed low-rise residential building be an all-electric building.

- b. City of Albany. New ordinance that contains requirements that newly constructed buildings meet or exceed specified Energy Design Rating or Compliance Margins.
- c. City of San Carlos. New ordinance that contains requirements for solar ready buildings and solar panel systems requirements for non-residential and new buildings, as well as requirements for all-electric newly constructed buildings with exceptions allowed for applications such as cooking and fireplaces.

Commissioner McAllister moved to approve Item 13 and Commissioner Monahan seconded. The vote was (4-0).

14. Minutes.

Possible approval of the April 14, 2021 business meeting minutes.

Commissioner Monahan moved to approve Item 14 and Commissioner McAllister seconded. The vote was (4-0).

15. Lead Commissioner or Presiding Member Reports.

The Commissioners reported on their recent activities.

16. Executive Director's Report.

The Executive Director had nothing to report.

17. Public Advisor's Report.

The Public Advisor gave a report.

18. Public Comment.

None.

19. Chief Counsel's Report.

- a. Pursuant to Government Code section 11126, subdivision (e), the CEC may adjourn to closed session with its legal counsel to discuss any of the following matters to which CEC is a party:
 - i. In the Matter of U.S. Department of Energy (High Level Waste Repository), (Atomic Safety Licensing Board, CAB-04, 63-001-HLW); State of California v.United States Department of Energy (9th Cir. Docket No. 09-71014).
 - Communities for a Better Environment and Center for Biological Diversity v. Energy Resources Conservation and Development Commission, and California State Controller (Alameda County Superior Court, Case No. RG13681262, Court of Appeal, First Appellate District, Division Four, Case No. A157299).
 - iii. State Energy Resources Conservation and Development Commission v. Electricore, Inc. and ZeroTruck (Sacramento County Superior Court, Case No.34-2016-00204586-CU-BC-GDS).

- iv. State Energy Resources Conservation and Development Commission v. HyGen Industries, Inc (Sacramento County Superior Court, Case No. 34-2019-00252543-CU-BC-GDS).
- v. Olson-Ecologic Testing Laboratories, LLC v. CEC. (Orange County Superior Court, Case No. 30-2019-01115513-CU-BC-CJC).
- vi. Interlink Products International, Inc. v. Xavier Becerra, Drew Bohan, Melissa Rae King (United States District Court for the Eastern District of California, Case No. 2:20-cv-02283).
- vii. Southern California Gas Company v. California State Energy Resources Conservation and Development Commission (Sacramento County Superior Court, Case No. 34-2021-80003576-CU-WM-GDS).
- b. Pursuant to Government Code sections 11126, subdivisions (a) and (e), the CEC may also discuss any judicial or administrative proceeding that was formally initiated after this agenda was published; or determine whether facts and circumstances exist that warrant the initiation of litigation, or that constitute a significant exposure to litigation against the CEC, which might include personnel matters.

The Chief Counsel had nothing to report.

Appearances:

Liam Buckley, IES

Lewis Fulton, UC Davis

Lauren Skiver, Sunline Transit Agency

Inbal Nachman, Skyven Technologies

Allan Abela, EPC Power

Nick Brown, Stasis Energy Group

Rajit Gadh, MOEV

David Kiehn, Campbell Soup Company (written testimony)

Sean Lee, Jessie Lord Bakery

Doug Smith, Baker Commodities

Erick Watkins, Pacific Coast Producers

There being no further business the meeting was adjourned.

Respectfully submitted,

PATRICIA CARLOS Secretariat