DOCKETED	
Docket Number:	21-BUSMTG-01
Project Title:	Business Meeting Agendas, Transcripts, Minutes, and Public Comments
TN #:	241051
Document Title:	Transcript of 12-08-21 for Business Meeting
Description:	N/A
Filer:	Liza Lopez
Organization:	California Energy Commission
Submitter Role:	Commission Staff
Submission Date:	12/21/2021 3:56:50 PM
Docketed Date:	12/21/2021

BUSINESS MEETING

BEFORE THE

CALIFORNIA ENERGY COMMISSION

Ιn	the Matter	of:)
)21-BUSMTG-01
	Business	Meeting)

REMOTE ACCESS ONLY

Public comment is accepted solely through the Zoom platform.

The California Energy Commission's (CEC) December 8, 2021, Business Meeting will be held remotely, consistent with Assembly Bill 361 (Rivas, Chapter 165, Statutes of 2021) to improve and enhance public access to state meetings during the COVID-19 pandemic and future emergencies by allowing broader access through teleconferencing options. The public can participate in the business meeting consistent with the direction provided below.

Please note that the CEC aims to begin promptly at the start time and the end time is an estimate based on the agenda proposed. The business meeting may end sooner or later than the time indicated depending on various factors.

Pursuant to California Code of Regulations Title 20 section 1104(e), any person may make oral comment on any agenda item. To ensure the orderly conduct of business, such comments will be limited to three minutes or less per person. Any person wishing to comment on information items or reports (non-voting items) shall speak during the general public comment portion of the meeting and have three minutes or less to address all remaining comments.

WEDNESDAY, DECEMBER 8, 2021

10:00 A.M.

Reported by: Peter Petty

APPEARANCES

Commissioners (Via Remote)

David Hochschild, Chair Siva Gunda, Vice Chair Karen Douglas Andrew McAllister Patricia Monahan

Staff Present: (Via Remote)

Drew Bohan, Executive Director
Linda Barrera, Chief Counsel
Noemi Gallardo, Public Advisor
Lisa Worrall, Energy Commission Project Manager
Erik Brewer, Center for Transportation and the Environment
Bill Dietrich, Chief Counsel's Office
Mike Gravely, Energy Systems Research Office

Ralph Lee Lisa DeCarlo Jared Babula Christine Collopy Quenby Lum Alex Wan Phil Cazel Matthew Kozuch	2 2 3 4 5 6 7 8
Also Present: (Via Remote)	
<pre>Invited Comments:</pre>	
Scott Galati, DayZen, LLC on behalf of Equinix Robert Sarvey,	2, 3 2
Public Comment (Via Remote)	
Alycia Gilde, CALSTART, Inc. Peter Colwell, Center for Sustainable Energy Amy Gower, CALSTART, Inc.	7 7 8

Agenda Item

I N D E X

			Page
Prod	ceedir	ngs	6
Iten	เร		
1.	Cons	sent Calendar	10
	a.	Guidelines for California's Solar Electric Incentive Programs (Senate Bill 1), Seventh Edition.	
	b.	Prospect Silicon Valley - Agreement ZVI-21-009.	
	b.	Prospect Silicon Valley - Agreement ZVI-21-010.	
	d.	Schneider National Carriers, Inc.	
2.	Grea	l Power Plant Exemption (SPPE) for the at Oaks South Backup Generating Facility -SPPE-01)	11
	a.	Possible closed session deliberation on the above described SPPE. [Government Code Section 11126(c)(3)].	
3.	Amer	er Instituting Rulemaking Proceeding for adments to Procedures for Delegating Geothermal cification Authority and for SPPEs.	34
4.	Touc	chstone Benchmarking, LLC.	43
5.	Cent	ter for Transportation and the Environment, Inc.	53
6.	Rail	Propulsion Systems LLC.	64

I N D E X (Cont.)

			P	age				
7.		nd Block Grant for Light-Duty Electric Vehicle Charger Incentive	7	3				
	a.	CALSTART, Inc.						
	b.	Center for Sustainable Energy						
8.	CALS	TART, Inc.	8	3				
9.	Minu	tes.	9	8				
10.	Lead Commissioner or Presiding Member Reports.							
11.	Executive Director's Report.							
12.	Public Advisor's Report 1							
13.	Public Comment 23, 77,							
14.	Chie	f Counsel's Report	1	.57				
	a.	Pursuant to Government Code Section 11126(e), the CEC may adjourn to closed session with its legal counsel to discuss any of the following matters to which the CEC is a party:	5					
	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)						

I N D E X (Cont.)

			Page
14.	Chie	ef Counsel's Report (Cont.)	157
	ii.	State Energy Resources Conservation and Development Commission v. HyGen Industries, Inc. (Sacramento County Superior Court, Case No. 34-2019-00252543-CU-BC-GDS)	
	iii.	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)	
	b.	Pursuant to Government Code, section 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 constitute a significant exposure to litigation against the CEC, which might include personnel matters.	5
Adjou	ırnmer	nt	159
Repor	rter's	s Certificate	160
Trans	scribe	er's Certificate	161

P	R	\cap	\subset	F.	F.	\Box	Т	M	G	S	

- 2 DECEMBER 8, 2021 10:05 a.m.
- 3 (Start of Introductory Video.)
- 4 MS. MURIMI: Welcome to the California Energy
- 5 Commission's Business Meeting.
- 6 Zoom's closed-captioning feature has been enabled
- 7 to make Energy Commission business meetings more
- 8 accessible. Attendees can use this feature by clicking on
- 9 the "Live Transcript" icon and then selecting either "Show
- 10 Subtitle" or "View Full Transcript." Closed captioning can
- 11 be stopped by closing out of the Live Transcript or
- 12 selecting "Hide Subtitle." Those participating solely by
- 13 phone do not have the option for closed captioning.
- 14 The Energy Commission will continue to post the
- 15 transcript of this business meeting rendered by a
- 16 professional court reporter in the docket system and on the
- 17 business meeting webpage.
- 18 Consistent with Assembly Bill 361 today's
- 19 business meeting is being held remotely through Zoom to
- 20 improve and enhance public access to state meetings during
- 21 the COVID-19 pandemic. The public can participate in the
- 22 business meeting consistent with the instruction for remote
- 23 participation found in the notice of this meeting and as
- 24 set forth in the agenda posted to the Energy Commission's
- 25 website.

Pursuant	to	California	Code	of	Regulations	Title
----------	----	------------	------	----	-------------	-------

- 2 20, section 1104(e) any person may make oral comments on
- 3 any agenda item.
- 4 Once the public comment period begins if you'd
- 5 like to speak, please raise your hand by clicking on the
- 6 "Raise Hand" icon at the bottom of your screen. Please
- 7 note that if Zoom were to shut down, we would switch to the
- 8 Verizon phone line at 888-823-5065. The pass code is
- 9 "Business Meeting." Public comment would then be accepted
- 10 through Verizon.
- 11 To ensure the orderly and fair conduct of
- 12 business public comments will be limited to three minutes
- 13 or less per person for each agenda item voted on today.
- 14 Any person wishing to comment on information
- 15 items or reports which are non-voting items shall reserve
- 16 their comment for the general public comment portion of the
- 17 meeting and shall have a total of three minutes or less to
- 18 state all remaining comments.
- 19 If you're joining by phone press *9 to raise your
- 20 hand and *6 to unmute. After the Public Advisor calls on
- 21 you to speak spell your name and state your affiliation, if
- 22 any.
- 23 Welcome to the California Energy Commission's
- 24 business meeting. The meeting will now begin.
- 25 (End of Introductory Video.)

- 17
- 18 going to be honoring six winners of this Hall of Fame Award
- 19 who really are on the front lines leading the way to a
- 20 clean energy future.
- 21 We've had a really exhaustive selection process.
- 22 I want to personally thank the Selection Committee and
- 23 everybody who was nominated and who participated in that.
- 24 Our winners include, for a Lifetime Achievement Award, Dr.
- 25 Peter Lehman, the Founding Director of the Schatz Energy

- 1 Center. For our Youth Game-Changer Award, the Communities
- 2 for a Better Environment's Youth for Environmental Justice.
- 3 And our Clean Energy Champion Award winners are Abigail
- 4 Solis, Manager of Sustainable Energy Solutions at Self-Help
- 5 Enterprises; Eddie Ahn, Executive Director of Brightline
- 6 Defense; Nicole Capretz, Founder and Executive Director of
- 7 the Climate Action Campaign; and Mutual Housing of
- 8 California.
- 9 So, you can register for this event. It is free,
- 10 but you do need to register, and the link is going to be
- 11 sent out in the Zoom Chat.
- 12 And I would just say you look at how change
- 13 happens in our world and it's really from the bottom up.
- 14 We draw a lot of inspiration at the state level from these
- 15 leaders at the local level. And what we do in turn at the
- 16 State of California inspires a lot of positive change
- 17 around the country and around the world. And so, I think
- 18 we've had a tough couple of years here and I really would
- 19 welcome everybody to come be inspired by seeing these
- 20 amazing leaders and this award ceremony on Friday.
- 21 I'm also very excited to announce a major
- 22 milestone, which is that today we're going to be voting on
- 23 \$730 million in grants during this business meeting. To my
- 24 knowledge this is the single greatest amount of money that
- 25 we have granted in a single meeting. We've done programs

- 1 like Prop 39 was \$1.75 billion, but that was over several
- 2 years. This is really an important milestone, and I want
- 3 to just pay tribute to all the staff and all the different
- 4 programs who helped develop these, to all the stakeholders
- 5 for participating.
- 6 We are really at a watershed moment for the
- 7 Commission and for the work we're doing. And that's really
- 8 meeting the challenge of the moment that we're in together
- 9 with climate, so I'm really excited to be considering and
- 10 voting on all these grants today.
- 11 And I really want staff to take pride in this
- 12 work. It is a lot of work to prepare these and they're
- 13 going to do a lot of good, so take that to heart. As we
- 14 wrap up the end of the year there's a lot to be thankful
- 15 for and a lot to take stock of and I think this is a really
- 16 strong finish. And I just want to thank everybody for
- 17 leaning in so hard. It's not easy to put all this stuff
- 18 together. But anyways I just wanted to note this is a very
- 19 exciting day.
- So, let's see, with that let's turn to Item 1 on
- 21 the Consent Calendar. Madam Public Advisor, do we have any
- 22 public comment on Item 1?
- 23 MS. GALLARDO: This is Noemi Gallardo, the Public
- 24 Advisor. So I will remind our audience if you would like
- 25 to make a comment on Item 1, the Consent Calendar, please

- 1 use the raised-hand feature on Zoom. If you are on by
- 2 phone please press *9 to raise your hand, *6 to unmute.
- 3 Chair, I do not see any hands. We can proceed.
- 4 CHAIR HOCHSCHILD: Okay. Unless there is any
- 5 Commissioner discussion, Vice Chair Gunda, would you be
- 6 willing to move Item 1?
- 7 COMMISSIONER GUNDA: Yes, Chair, thank you. I
- 8 move Item 1.
- 9 CHAIR HOCHSCHILD: And so, Commissioner Monahan,
- 10 would you be willing to second?
- 11 COMMISSIONER MONAHAN: I second.
- 12 CHAIR HOCHSCHILD: Okay. All in favor say aye.
- Vice Chair Gunda?
- 14 VICE CHAIR GUNDA: Aye.
- 15 CHAIR HOCHSCHILD: Commissioner Monahan?
- 16 COMMISSIONER MONAHAN: Aye.
- 17 CHAIR HOCHSCHILD: Commissioner McAllister?
- 18 COMMISSIONER MCALLISTER: Aye.
- 19 CHAIR HOCHSCHILD: And Commissioner Douglas?
- 20 COMMISSIONER DOUGLAS: Aye.
- 21 CHAIR HOCHSCHILD: And I vote age as well. That
- 22 item passes unanimously.
- 23 Let's turn now to Item 2, Small Power Plant
- 24 (SPPE) for the Great Oaks South Backup Generating Facility.
- MR. LEE: Good morning, Chair Hochschild and

- 1 Commissioners. I'm Ralph Lee with the Chief Counsel's
- 2 Office appearing on behalf of the Committee that the Energy
- 3 Commission appointed to preside over the proceeding and
- 4 review of the Applicant SV1, LLC's application for a Small
- 5 Power Plant Exemption, known as an SPPE, for the proposed
- 6 Great Oaks South Backup Generating Facility in San Jose,
- 7 California.
- 8 The Committee proposes that the Energy Commission
- 9 adopt the Committee's Proposed Decision. The Committee
- 10 Proposed Decision reflects the Committee's careful
- 11 consideration of the evidence submitted by the parties as
- 12 well as the public comments received. The Committee
- 13 Proposed Decision recommends that the Energy Commission
- 14 certify a final Environmental Impact Report, known as the
- 15 final EIR for the Great Oaks South Data Center Project, of
- 16 which the Great Oaks South Backup Generating Facility is
- 17 one part.
- 18 The Proposed Decision also recommends that the
- 19 Energy Commission grant a small power plant exemption to
- 20 the Great Oaks South Backup Generating Facility, because it
- 21 would meet the requirements of the Warren-Alquist Act
- 22 including that it would generate less than 100 megawatts,
- 23 it would have no significant impact on the environment or
- 24 on energy resources.
- 25 What the Applicant proposes is to construct and

- 1 operate an approximately 547,000 square foot data center
- 2 located in San Jose California at 123, 127 and 131 Great
- 3 Oaks Boulevard. The primary purpose of the proposed data
- 4 center would be to house IT technology and computer servers
- 5 for private clients in a secure and environmentally
- 6 controlled structure. The backup generating facility would
- 7 consist of 36 individual 3.25-megawatt diesel-fired
- 8 emergency backup generators, 6 of which would be redundant,
- 9 and also three 0.5-megawatt life safety emergency
- 10 generators.
- 11 All generators would be located onsite. No
- 12 electricity that's generated by the backup generating
- 13 facility could be distributed offsite. The backup
- 14 generating facility would generate up to 99 megawatts of
- 15 power, which would be the maximum demand of the data
- 16 center.
- 17 The backup generating facility would serve the
- 18 data center as a backup for its primary power supply
- 19 delivered by the Pacific Gas and Electric Company, commonly
- 20 known as PG&E. The electricity would be supplied by either
- 21 PG&E or the community-choice energy aggregator San Jose
- 22 Clean Energy. The backup generators would be run for
- 23 testing and maintenance, but otherwise usually would not
- 24 operate unless there is an interruption of power from the
- 25 local electric utility.

1 Under the Warren-Alquist Act section 25541,

- 2 Energy Commission may grant a small power plant exemption
- 3 only when it makes three separate and distinct findings.
- 4 First, that the proposed power plant has a generating
- 5 capacity of up to 100 megawatts. Second, that no
- 6 substantial adverse impact on the environment will result
- 7 from the construction or operation of the power plant. And
- 8 third, that no substantial adverse impact on energy
- 9 resources will result from the construction or operation of
- 10 the power plant.
- In addition, the Energy Commission acts as the
- 12 lead agency under CEQA. In reviewing a small power plant
- 13 exemption, the Energy Commission considers the whole of the
- 14 action. For this particular application the whole of the
- 15 action means the backup generating facility, the data
- 16 center, and other related features such as parking and
- 17 landscaping. Collectively these are known as the Project.
- 18 Please note that if the Energy Commission adopts
- 19 the Committee Proposed Decision that adoption would not
- 20 approve the project. Instead, if the Energy Commission
- 21 grants a small power plant exemption the Applicant would
- 22 still be required to obtain permits and licenses from other
- 23 local agencies before it would be allowed to be built and
- 24 operated. In this case, those agencies would include the
- 25 city of San Jose and the Bay Area Air Quality Management

1	District.	Those	agencies	will	also	conduct	anv	other

- 2 environmental analysis necessary as responsible agencies
- 3 under CEQA.
- 4 Now turning to the findings, the Proposed
- 5 Decision found that the generating capacity of a facility
- 6 that cannot distribute power offsite should be calculated
- 7 based on the maximum load of the project as well as by any
- 8 permanent design constrictions that limit the amount of
- 9 power that can be delivered from the facility. In this
- 10 case the project's maximum demand includes the demand of
- 11 the computer servers housed in the data center and the
- 12 cooling and lighting demands of the building. The
- 13 project's demand was calculated to be no more than 99
- 14 megawatts, which would be fixed by the use of electrical
- 15 equipment and would be an upper-capacity limit.
- 16 The Committee has proposed a Condition of
- 17 Exemption PD-1 to ensure that if the configuration of the
- 18 data center were to change in a way that would result in
- 19 any increase in the electrical demand any such alteration,
- 20 change, or modification shall be subject to the
- 21 requirements set forth in the regulations of the Energy
- 22 Commission relating to changes in project design,
- 23 operation, or performance and amendments.
- The Committee's also proposed Condition of
- 25 Exemption PD-2 that precludes any of the electricity from

1	the	Great	Oaks	South	Backup	Generating	Facility	from	being
---	-----	-------	------	-------	--------	------------	----------	------	-------

- 2 used for any other facility, property or use, including but
- 3 not limited to delivery to the electric distribution system
- 4 known as the Grid without the express authorization of the
- 5 Energy Commission.
- 6 The Proposed Decision concludes that the
- 7 project's generating capacity meets the requirements of the
- 8 Warren-Alquist Act.
- 9 Regarding the environmental review of the project
- 10 the project includes design features and mitigation --
- 11 excuse me -- includes design features to mitigate or avoid
- 12 potential environmental effects of the project. Staff
- 13 prepared an environmental review document, the final EIR,
- 14 which proposes additional mitigation measures for air
- 15 quality, biological resources, cultural and tribal
- 16 resources, paleontological resources, greenhouse gas
- 17 emissions, and noise. The Proposed Decision includes these
- 18 additional mitigation measures.
- 19 Granting a Small Power Plant Exemption requires
- 20 the Energy Commission to adopt a mitigation monitoring or
- 21 reporting program. A recommended mitigation monitoring and
- 22 reporting program for the project is attached to the
- 23 Proposed Decision in Appendix B.
- 24 CEQA also requires that the Energy Commission may
- 25 delegate reporting or monitoring responsibilities to

- 1 another public agency that accepts the delegation. For
- 2 this project, the City of San Jose has agreed to monitor
- 3 the Applicant's performance of the mitigation measures that
- 4 the Committee has recommended.
- 5 Staff prepared the final EIR. The Committee
- 6 considered the final EIR during the Committee's
- 7 adjudicatory process and the Proposed Decision includes it
- 8 as Appendix A. On the basis of Appendix A, and the entire
- 9 record and with the imposition and implementation of the
- 10 mitigation measures, the Proposed Decision includes
- 11 Findings of Fact and conclusions of law regarding the
- 12 adequacy of our environmental review for both CEQA and the
- 13 Warren-Alquist Act. The Proposed Decision specifically
- 14 finds that the project will have no adverse impacts on the
- 15 environment.
- 16 The Proposed Decision also concludes that the
- 17 project would not have any adverse impact on energy
- 18 resources. This finding is recommended for the Energy
- 19 Commission in its role as the lead agency under CEQA and is
- 20 required under the Warren-Alquist Act.
- 21 As usual, the public was presented a full
- 22 opportunity to participate at every stage of this
- 23 proceeding. We had meaningful and substantive
- 24 participation from the parties, including the Applicant,
- 25 staff and one intervenor, Robert Sarvey. The Energy

- 1 Commission received comments on the project after the
- 2 scoping meeting in late 2020. The Energy Commission
- 3 received comments from Nick Renna, Claire Warshaw, the Bay
- 4 Area Air Quality Management District, LH, the Oak Grove
- 5 School District, and the Native American Heritage
- 6 Commission. The Energy Commission also received public
- 7 comments on the draft EIR from Claire Warshaw, the Bay Area
- 8 Air Quality Management District, the Applicant, the City of
- 9 San Jose and Enchanted Rock.
- 10 The Committee provided Notice of Availability for
- 11 its Proposed Decision on November 24th, 2021. This Notice
- 12 of Availability was sent electronically to the Proof of
- 13 Service List and the listserv and was sent via U.S. mail to
- 14 a list of property owners, occupants, and responsible and
- 15 trustee agencies. The Notice of Availability invited
- 16 written comments on the Proposed Decision, and it asked
- 17 that written comments be received no later than December
- 18 6th, 2021, at 5:00 p.m.
- 19 We received comments from the Intervenor Robert
- 20 Sarvey, and from Energy Commission staff. Intervenor
- 21 Sarvey's comments on the Proposed Decision essentially
- 22 repeat the contentions he raised in his post-hearing brief,
- 23 all of which have been appropriately addressed in the
- 24 Committee Proposed Decision, including without limitation
- on Pages 34 through 40.

[Intervenor	Sarvev	mav	speak	for	himself	regarding

- 2 his comments. If he does speak staff, the Project
- 3 Applicant, or I can be ready to address any questions the
- 4 Commission may have about his comments. Nothing in his
- 5 written comments on the Proposed Decision establish an
- 6 unmitigated significant environmental impact, nor do they
- 7 otherwise prevent or provide any other basis to reject the
- 8 Committee's Proposed Decision.
- 9 Staff's comments on the Proposed Decision
- 10 recommend an errata containing two clarifications. One
- 11 clarification is that staff consented to the City of San
- 12 Jose's request for an extension to file its comments on the
- 13 draft EIR. A second clarification is that the findings
- 14 regarding the project's operation emissions on Page 29 of
- 15 the Committee Proposed Decision account for the fact that
- 16 NOx emissions will be fully offset during the permitting
- 17 process with the Bay Area Air Quality Management District,
- 18 which is already stated in the Proposed Decision as part of
- 19 the discussion that proceeded those findings. Staff's
- 20 proposed clarifications do not change the Proposed
- 21 Decision's Findings of Fact or conclusions of law.
- The Committee recommends granting staff's request
- 23 for an errata reflecting these clarifications and adopting
- 24 the errata to the Proposed Decision that was filed in the
- 25 docket today at about 8:50 this morning.

1 I therefore recommend	that	the	Energy	Commissi	Lon
-------------------------	------	-----	--------	----------	-----

- 2 adopt the proposed order on the Committee Proposed Decision
- 3 that was filed in the docket for this proceeding on
- 4 November 24th, 2021, with a modification to the first
- 5 paragraph on Page 1 of the Order to incorporate the errata
- 6 by deleting the bracketed material and replacing it with an
- 7 errata, dated December 8th, 2021. And also adding a
- 8 footnote to the docket transaction number for the errata,
- 9 which is TN 240873.
- 10 And with that the proposed order adopts the
- 11 committee- Proposed Decision as modified by the errata as
- 12 the Energy Commission's own final decision certifies the
- 13 final EIR and makes the findings required to grant a Small
- 14 Power Plant Exemption. I'm available to respond to any
- 15 questions; otherwise the parties may address the
- 16 Commission, thank you.
- 17 CHAIR HOCHSCHILD: Thank so much, Ralph.
- 18 With that let's move on to comments from staff
- 19 and welcome Lisa DeCarlo.
- MS. DECARLO: Thank you. Good morning, Chair,
- 21 Commissioners. Lisa DeCarlo, Energy Commission Staff
- 22 Attorney. With me today is Lisa Worrall, Energy
- 23 Commission Project Manager for this proceeding as well as
- 24 numerous technical staff who are available to respond to
- 25 any technical questions Commissioners may have.

1	Staff	would	like	to	thank	Commissioner	Douglas

- 2 Chair Hochschild and your respective Advisors and Hearing
- 3 Officers Ralph Lee and Susan Cochran for your leadership in
- 4 this proceeding, as well as the Applicant and Mr. Robert
- 5 Sarvey for their participation.
- 6 The proposed Commission decision represents the
- 7 culmination of over a year and a half worth's of work on
- 8 the part of the parties, responsible agencies, and the
- 9 Committee. And presents a thorough and reasoned analysis
- 10 of the proposed project and its potential impacts. Staff
- 11 fully supports the adoption of the Committee's Proposed
- 12 Decision with the errata filed this morning.
- 13 As Hearing Officer Lee noted the only comments
- 14 received on the Committee Proposed Decision, other than
- 15 staff's, were from the only Intervenor in this proceeding
- 16 Mr. Sarvey. His comments reiterate comments he has made
- 17 previously, including at the evidentiary hearing and in
- 18 prior proceedings. And focus on whether the facility's
- 19 potential to emit criteria pollutants during emergency
- 20 operations must be modeled.
- 21 The Commission has already answered this question
- 22 with a "no" in its approval of the exemption for the
- 23 Sequoia Data Center earlier this year. The uncontroverted
- 24 evidence in the record of the proceeding currently before
- 25 you, shows that no agency routinely models emergency

- 1 operations of backup generators for the purpose of
- 2 evaluating the significance of criteria-polluting impacts
- 3 under CEQA. There is no expert consensus about how such an
- 4 evaluation should be conducted in order to produce
- 5 meaningful information about such a project's potential
- 6 impacts. And there is no consensus about what operational
- 7 profile or profiles is reasonable to assume for the
- 8 modeling. And no consensus as to how to evaluate the
- 9 results of such modeling in order to determine whether it
- 10 reflects a significant impact or not.
- 11 Mr. Sarvey relies heavily on BAAQMD's written
- 12 comments for his argument, but as BAAQMD itself notes, the
- 13 comments are offered as recommendations to enhance the CEQA
- 14 analysis. BAAQMD does not assert in its comments that the
- 15 absence of the modeling of criteria-pollutant emissions
- 16 that may result from potential emergency operations is
- 17 fatally deficient under CEQA.
- 18 Mr. Sarvey also invokes comments made by the Air
- 19 Resources Board, but fails to mention that those comments
- 20 were made before the project was modified to add selective
- 21 catalytic reduction, thereby making the engines Tier 4
- 22 compliant, containing the strictest emissions controls
- 23 available to backup diesel generators. CARB has not
- 24 commented subsequent to this project change.
- 25 Staff provided substantial evidence to support

- 1 the conclusion that emergency operations at this facility
- 2 would be infrequent and of short duration if they occurred
- 3 at all and thus would not result in significant adverse
- 4 impacts. The limited data BAAQMD recently gathered and on
- 5 which Mr. Sarvey relies does not prove otherwise. The
- 6 project would be located in a highly reliable location on
- 7 the grid and is unlikely to be affected by a public safety
- 8 shut-off event.
- 9 California continues to make headway on
- 10 strategies to prevent and address grid stress during
- 11 extreme heat events. And this project won't be online
- 12 during the small window of potential vulnerability
- 13 identified for the summer of 2022.
- 14 CEQA does not require an agency to speculate
- 15 about the unlikely impacts. And the Committee Proposed
- 16 Decision provides a thorough discussion of potential
- 17 impacts resulting from the proposed project without
- 18 engaging in such speculation.
- 19 Staff recommends the Commission adopt the
- 20 Proposed Decision and is available to answer any questions.
- 21 Thank you.
- 22 CHAIR HOCHSCHILD: Thanks so much, Lisa.
- 23 With that let's turn to Scott Galati on behalf of
- 24 the Applicant.
- MR. GALATI: Good morning, Chair, good morning,

- 1 Commissioners. Thank you very much for this opportunity to
- 2 address you and we obviously are representing Equinix. We
- 3 ask that you adopt the Proposed Decision with the errata
- 4 that we support.
- 5 I'd like to make a few comments, really letting
- 6 the Committee know, thank you for your thorough analysis in
- 7 the Proposed Decision. We think that it is both thorough,
- 8 address the issues, and is legally defensible.
- 9 In addition, we'd like to thank Lisa DeCarlo and
- 10 Lisa Worrall for helping us and working closely with us on
- 11 getting to a finally EIR that we also think is thorough and
- 12 legally defensible.
- 13 We also would reiterate that nothing raised in
- 14 the comments on the Proposed Decision, other than what
- 15 you've addressed in the errata, would change any of the
- 16 analysis or conclusions that you've made.
- Just to hit one more time with the punch line, is
- 18 these emergency generators are an insurance policy. That
- 19 is what they are. We hope to never turn them on. We hope
- 20 for the stability of the grid to never require it. And
- 21 even though we've gone through some very unstable times
- 22 over the last couple of summers Equinix did not have to
- 23 turn on its emergency generators in its other facilities.
- 24 So we do have a very stable grid. It is continuing to
- 25 become more stable. I think that you will find that these

- 1 generators operate in a very, very small fashion for
- 2 testing and maintenance and now they are equipped with the
- 3 best available control technology that exists.
- We'd also like to identify for you that these
- 5 facilities are incredibly important to our infrastructure.
- 6 They're incredibly important to a very big piece of
- 7 California's economy. The Equinix Project is the first
- 8 project that has proposed an alternative to making sure
- 9 that all the energy that it either uses is either offset by
- 10 RECs or actual deliverable electricity. And in fact, has
- 11 achieved the goal of being 100 percent carbon-neutral in
- 12 North America. Most of their facilities, many of their
- 13 facilities are here in California.
- So, we would ask once again that you approve the
- 15 project. And let us get back to the City of San Jose who
- 16 is also very important and nice to work with. A special
- 17 shout-out to Adam Petersen and David Keyon in working with
- 18 us on the greenhouse gas reduction strategy that they were
- 19 adopting at the time this project was here.
- 20 I'd also like to call out Ms. Gallardo. The
- 21 public outreach was important. There was quite a bit of
- 22 public comment at the very beginning of the project, though
- 23 most of that was some confusion with the Energy
- 24 Commission's terminology. As a small power plant, I think
- 25 most people were thinking that there was going to be a

- 1 power plant around the corner, as opposed to a data center
- 2 with some backup generating facilities. But once that was
- 3 cleared up, I think that we were able to address all of the
- 4 issues. I think that was that the process worked and
- 5 that's how it should work, and we appreciate that.
- 6 So again, we thank you for the opportunity and we
- 7 are here to answer any questions. And we look forward to
- 8 starting to build this project. Thank you.
- 9 CHAIR HOCHSCHILD: Thank you, Mr. Galati.
- 10 Let's turn next to Robert Sarvey as the
- 11 Intervenor.
- MR. SARVEY: Good morning, Commissioners. I want
- 13 to thank the Committee for allowing me to participate. And
- 14 I want to thank the City of San Jose for requiring complete
- 15 mitigation of the project's GHG emissions. Failure do so
- 16 in the last five data centers you approved will lead to a
- 17 potential 700,000 metric tons of GHG emissions per year
- 18 that remain unmitigated.
- 19 Commissioners, the California Air Resources
- 20 Board, and the Bay Area Air Quality Management District
- 21 have asked you in this proceeding and several other data
- 22 center proceedings to model the emergency emissions from
- 23 this and other data center projects. Unfortunately, this
- 24 Proposed Decision continues to allow 100-plus megawatt
- 25 diesel arrays (phonetic) to operate without understanding

- 1 their impact on the environment or the public.
- 2 Essentially the PD refuses to analyze what will
- 3 happen if this project runs in emergency mode, which is the
- 4 stated purpose of the project. I don't understand how the
- 5 Air Resources Board and BAAQMD can be ignored.
- 6 On July 6th, BAAQMD submitted a CEQA comment
- 7 letter on the draft EIR for this project. In its comments
- 8 BAAQMD repeats its CEQA recommendation. Backup generators
- 9 are operating more frequently than previously understood
- 10 because of climate change-induced crisis and grid-
- 11 operational challenges. And as such it is critical to
- 12 consider the impacts of operating the emergency backup
- 13 diesel generators. This communication occurred long after
- 14 BAAQMD's December 2020 Tier 4 mandates. So staff assertion
- 15 that somehow BAAQMD does not want these emergency
- 16 operations evaluated is not true.
- 17 Common sense says the purpose of the project
- 18 should be evaluated to inform the public and you decision
- 19 makers, and that's a requirement of CEQA. Thank you.
- 20 CHAIR HOCHSCHILD: Thank you, Mr. Sarvey.
- 21 Let's turn now to public comment. Madam Public
- 22 Advisor, do we have public comment on Item 2?
- 23 MS. GALLARDO: This is Noemi Gallardo, the Public
- 24 Advisor. I'd like to remind the audience or our attendees,
- 25 if you'd like to make a public comment to please use the

- 1 raised-hand feature on Zoom. If you are on by phone,
- 2 please raise your hand by pressing *9 and then *6 to
- 3 unmute.
- I am looking for hands now. I do not see any,
- 5 Chair.
- 6 CHAIR HOCHSCHILD: Okay.
- 7 MS. GALLARDO: We can continue.
- 8 CHAIR HOCHSCHILD: Well, thank you to all the
- 9 staff and the parties' speakers today for all the comments.
- 10 I served as Associate Member on this committee and just
- 11 wanted to extend my appreciation to everybody, and
- 12 especially to Commissioner Douglas for her tremendous
- 13 leadership on these complex and ongoing issues and her
- 14 service on this committee.
- 15 And with that I would turn it over to
- 16 Commissioner Douglas who was the Presiding Member. And
- 17 first by asking, also, if you think we need a closed
- 18 session. And if not if you wanted to share any comment.
- 19 COMMISSIONER DOUGLAS: Right, thank you Chair
- 20 Hochschild. I do not think we need a closed session on
- 21 this item. I appreciate the question.
- 22 And in terms -- and I do have some comments. I
- 23 wanted to ask Hearing Officer Lee, did you hear anything
- 24 that you wanted to respond to? I don't have any follow up
- 25 questions particularly, but I wanted to offer the

- 1 opportunity.
- MR. LEE: No, thank you. I would just say that
- 3 his oral comments today repeat his written comments in the
- 4 post-hearing brief. And the Committee Proposed Decision
- 5 adequately addresses these comments.
- 6 COMMISSIONER DOUGLAS: All right, thank you, Mr.
- 7 Lee.
- 8 I wanted to just provide some notes of
- 9 appreciation as well to Chair Hochschild, the Associate
- 10 Member on this committee, and his Advisor Le-Quyen Nguyen.
- 11 And staff, and Applicant, and Intervenor Sarvey, for all of
- 12 you for your work throughout this process, and Technical
- 13 Advisor Jon Hilliard as well as my advisors. And, of
- 14 course, the Hearing Office team, Hearing Officer Lee. And
- 15 I know you had a strong team behind you, because we spoke
- 16 with them frequently through the course of this proceeding.
- I also wanted to just emphasize that we did, of
- 18 course, get important input and comments from Bay Area Air
- 19 Quality Management District and the City of San Jose. And
- 20 this is actually the first SPPE proceeding in which staff
- 21 has prepared an Environmental Impact Report. And this
- 22 environmental document allowed for a robust evaluation of
- 23 potential environmental and energy resource impacts,
- 24 including analyzing a reasonable range of potentially
- 25 feasible alternatives to the proposed projects.

- 2 we talked about this every time one of these comes up --
- 3 but the CEC proposed action today is not in itself an
- 4 approval of the Applicant's proposed project as Mr. Galati
- 5 noted. What the CEC approval does is it would exempt the
- 6 project from the CEC's Application for Certification, or
- 7 AFC process, but the project must still obtain approvals
- 8 from the City of San Jose and the Bay Area Air Quality
- 9 Management District.
- 10 So, the Committee Proposed Decision includes the
- 11 findings necessary to grant the SPPE. Hearing Officer Lee
- 12 thoroughly covered the key points in his presentation. And
- 13 before, I think this might be the right point to ask if
- 14 Chair Hochschild, as the Associate Member, would like to
- 15 make any additional remarks on this matter.
- 16 CHAIR HOCHSCHILD: No additional remarks from my
- 17 side. I'm in support. And unless there are other
- 18 Commissioners wishing to comment on this, I would invite a
- 19 motion from you, Commissioner Douglas, whenever you're
- 20 ready.
- 21 COMMISSIONER MCALLISTER: I do have one question
- 22 actually.
- 23 CHAIR HOCHSCHILD: Okay. Yeah, please go ahead.
- 24 COMMISSIONER MCALLISTER: Just quickly, so I
- 25 understand and agree with everything that's been said on

- 1 this by staff and Commissioner Douglas as well. And so I
- 2 understand that, the landscape. I guess, maybe I would
- 3 like to ask staff, a little bit more about the role of the
- 4 Bay Area AQMD just in terms of we obviously all have to be
- 5 concerned about the air quality impacts and the greenhouse
- 6 gas emissions, particulates, etcetera. I understand Mr.
- 7 Galati's point that there is a best available control
- 8 technology in place on this, or there will be on this
- 9 project if it gets constructed. But I just wanted to make
- 10 sure that -- put on the record and sort of ask staff to
- 11 tell us a little bit more about Bay Area's process to make
- 12 sure that those emissions are actually covered from an
- 13 overall environmental impact perspective.
- 14 CHAIR HOCHSCHILD: Yeah, a good question.
- MS. DECARLO: And I invite Wenjun to jump on and
- 16 Joseph Hughes to kind of weigh in on that. I can briefly
- 17 say that should the exemption go forward; the project will
- 18 have to get a permit from the Bay Area Air Quality
- 19 Management District. And it will thoroughly impose all of
- 20 its permit requirements on the project, including
- 21 limitations on the number of hours the project can test its
- 22 generators, so yeah.
- 23 And in terms of emergency operations, we really
- 24 don't -- the evidence in the record doesn't show that these
- 25 facilities will operate a significant amount of time. And

- 1 so we feel that with the selective catalytic reduction, the
- 2 diesel particulate filters applied to the generators, and
- 3 the limitations on the operations, at least in a routine
- 4 fashion, that the project will not create a significant
- 5 adverse impact as a result of potential generator
- 6 operations.
- 7 COMMISSIONER MCALLISTER: Great, thanks very
- 8 much. And in terms of incrementality the Bay Area, as I
- 9 understand it, has to take into account the sort of sum
- 10 total of emissions in the Basin and sort of make sure that
- 11 they're taking that overall view. And sort of putting this
- 12 particular project, if it's to be constructed for the
- 13 permitting process, in that broader context to make sure
- 14 that the incremental emissions are taken care of, right?
- MS. DECARLO: Yes.
- 16 COMMISSIONER MCALLISTER: So, I wanted to just
- 17 make sure that point was made. Anybody want to add
- 18 anything to that?
- 19 CHAIR HOCHSCHILD: Scott Galati, were you going
- 20 to say something on that?
- 21 MR. GALATI: Yes, I would just like to also
- 22 remind the Committee that the emissions for NOx will be
- 23 offset by the Applicant by and/or through the Bay Area's
- 24 process to ensure that those offsets are done in a net air
- 25 quality benefit range. And those will be offset based on

- 1 the projected use for testing and maintenance even though
- 2 we always project a little more use than we actually run.
- 3 CHAIR HOCHSCHILD: I did have one additional
- 4 question, just on SCR. What is the total cost to add the
- 5 SCR process for a backup generator facility such as this?
- 6 MR. GALATI: I'll do my best to answer that. I
- 7 think that the SCR under diesel particulate filters are
- 8 between \$300,000 and a million dollars per machine.
- 9 CHAIR HOCHSCHILD: Got it. Okay, helpful.
- 10 Any other questions or comments? If not,
- 11 Commissioner Douglas I'd welcome a motion on this item from
- 12 you.
- 13 COMMISSIONER DOUGLAS: All right, let me just ask
- 14 Ralph Lee again to clarify the motion, because he had
- 15 something about -- he had a couple of substitutions too in
- 16 order to pull the errata.
- MR. LEE: Yes. I propose the motion should be to
- 18 adopt the proposed order on Committee Proposed Decision
- 19 that was filed in the docket for this proceeding on
- 20 November 24th, 2021, with a modification to the first
- 21 paragraph on Page 1 to incorporate the errata by deleting
- 22 the bracketed material and replacing it with an errata
- 23 dated December 8th, 2021. And also adding a footnote to
- 24 the Docket Transaction Number for the errata, which is TN
- 25 240873.

- 1 COMMISSIONER DOUGLAS: All right, thank you, Mr.
- 2 Lee. So moved.
- 3 CHAIR HOCHSCHILD: Okay. Commissioner McAllister
- 4 would you be willing to second?
- 5 COMMISSIONER MCALLISTER: I'll second this item.
- 6 CHAIR HOCHSCHILD: Okay all in favor say aye,
- 7 Commissioner Douglas?
- 8 COMMISSIONER DOUGLAS: Aye.
- 9 CHAIR HOCHSCHILD: Commissioner McAllister?
- 10 COMMISSIONER MCALLISTER: Aye.
- 11 CHAIR HOCHSCHILD: Vice Chair Gunda?
- 12 VICE CHAIR GUNDA: Aye.
- 13 CHAIR HOCHSCHILD: Commissioner Monahan?
- 14 COMMISSIONER MONAHAN: Aye.
- 15 CHAIR HOCHSCHILD: And I vote age as well. That
- 16 item passes unanimously.
- 17 Let's turn now to Item 3, Orders Changing
- 18 Rulemaking Proceeding for Amendments to Procedures for
- 19 Delegating Geothermal Certification Authority for SPPEs.
- MR. BABULA: Good morning, Commissioners. My
- 21 name is Jared Babula. I am an attorney in the Chief
- 22 Counsel's Office. I am here today seeking approval for an
- 23 order instituting a rulemaking proceeding to amend two
- 24 powerplant siting-related processes. Next slide.
- 25 Before discussing the two processes subject to

- 1 the order I want to identify three specific benefits of
- 2 this rulemaking, which can be described as: Align,
- 3 Modernize, and Streamline.
- 4 Align: The Governor's emergency proclamation last
- 5 summer directed the CEC to perform any and all actions to
- 6 accelerate the state's transition to carbon-free energy.
- 7 Assessing and amending the regulatory language will provide
- 8 an opportunity to ensure powerplant siting processes align
- 9 with the state's carbon-free and renewable energy goals and
- 10 to accelerate those procurement processes.
- 11 Modernize: The specific provisions at issue date
- 12 back to the late 1970s and have never been significantly
- 13 amended. Since then, many changes have occurred in
- 14 California's electricity sector and related regulatory and
- 15 market environments.
- 16 For example, the CEC's needs assessments for
- 17 power plants that were highly contentious when utilities
- 18 were vertically integrated, meaning they both generated and
- 19 distributed electricity, are less contentious in a
- 20 deregulated electricity market. Thus, the language is due
- 21 for a review.
- 22 Streamline: Amending the language will allow for
- 23 the removal of redundant layers of process while preserving
- 24 the CEC's detailed environmental review as well as the
- 25 agency and public engagement under CEQA. Next slide.

1	The CEC has exclusive licensing authority over
2	thermal powerplants 50 megawatts or larger which includes
3	geothermal powerplants. The Warren-Alquist Act authorizes
4	the CEC to delegate, as appropriate, licensing authority to
5	counties for geothermal powerplants. The process for such
6	delegation as currently set forth in the CEC's regulations
7	is complex, time-consuming and has never been utilized.
8	The order before you would direct staff to work with
9	stakeholders to improve the process allowing for a
10	potential avenue for more efficient licensing of geothermal
11	powerplants thus expanding renewable energy generation.
12	The second process subject to this order is a
13	small power plant exemption process. The Warren-Alquist
14	Act provides that the CEC can exempt thermal powerplants
15	100 megawatts or less from its jurisdiction if certain
16	findings are made. Like the geothermal regulations the
17	small power plant exemption regulations are dated and in
18	need of amendments to improve the process for exempting
19	these smaller projects to achieve the benefits noted in the
20	previous slide. Because the CEC continues to act as lead
21	agency under CEQA for these exemptions the CEC will
22	continue to provide a robust environmental review and
23	opportunities for public and agency input as required under

24 CEQA regardless of amendments made to CEC's SPPE

25 procedures. Next slide.

- 1 Staff recommends approval of the Order
- 2 Instituting the Rulemaking authorizing staff, under the
- 3 guidance of the Lead Commissioner, to carry out the
- 4 rulemaking process consistent with the Administrative
- 5 Procedures Act and California Environmental Quality Act and
- 6 to present the proposed regulations at a future business
- 7 meeting for adoption.
- 8 This concludes my presentation. I am available
- 9 to answer any questions. Thank you.
- 10 CHAIR HOCHSCHILD: Thank you, Jared.
- 11 Let's turn to public comment on Item 3.
- MS. GALLARDO: This is Noemi Gallardo, the Public
- 13 Advisor, reminding attendees if you would like to make a
- 14 comment on Item Number 3 please use the raise hand feature.
- 15 If you are on by phone press *9 to raise your hand and then
- 16 *6 to unmute.
- 17 I do see a hand raised. This is Scott Galati.
- 18 Scott, just a reminder to spell your name for the record,
- 19 indicate your affiliation if any. I am opening your line
- 20 and you may begin.
- 21 MR. GALATI: My name is Scott Galati, and I am
- 22 with a company called DayZen, LLC, which is my own company
- 23 and so representing myself in this particular comment
- 24 period.
- We thank the Commissioner very much for opening

- 1 such a rulemaking. We do believe that some of the
- 2 regulations date back to 1975. And we have moved into a
- 3 different ability to evaluate things, including the primary
- 4 reason that I'm supporting these regulation changes is that
- 5 CEQA has evolved over time since these regulations actually
- 6 were adopted. And the CEQA process is sufficient to ensure
- 7 a robust analysis as well as public input.
- 8 The second part of the process in an SPPE or a
- 9 geothermal SPPE process or a licensing process would
- 10 involve lengthy committee time, intervenor testimony, the
- 11 kinds of things that are necessary, in my opinion, to
- 12 protect the environment and to allow public participation
- 13 on something as intrusive as a large power plant. But not
- 14 necessary under our current laws of CEQA for something,
- 15 let's say, like a data center. Those are very -- the
- 16 issues are a very local concern and less statewide concern.
- 17 And we'll participate -- on behalf of many of my clients --
- 18 we'll participate in the actual language changes. And we
- 19 look forward to that.
- 20 And we thank the Committee and the Commissioners
- 21 extremely a lot for undertaking this. I think it's
- 22 necessary and it will be beneficial to the state for
- 23 critical infrastructure. Thank you.
- MS. GALLARDO: All right, thank you.
- I do not see any other hands raised, Chair.

- 1 think we can continue.
- 2 CHAIR HOCHSCHILD: Okay, thank you.
- 3 Let's turn now to Commissioner Douglas.
- 4 COMMISSIONER DOUGLAS: Right, thank you, Chair
- 5 Hochschild. And thank you, Jared, for your great
- 6 presentation.
- 7 As Jared said this rulemaking is an example of
- 8 the Energy Commission's increasing and continued focus on
- 9 ensuring reliability and responding to the Governor's
- 10 direction in his July 30th State of Emergency Proclamation
- 11 for the state's energy agencies to accelerate plans for the
- 12 construction, procurement and rapid deployment of new clean
- 13 energy and storage projects.
- 14 What we are exploring here is ways of
- 15 streamlining and accelerating administrative processes for
- 16 small power plant exemptions and for potential delegation
- 17 of authority to counties to permit geothermal power plants
- 18 without compromising important provisions and safeguards
- 19 for public and health, environmental protections, public
- 20 participation, and reliability requirements of CEQA and the
- 21 Warren-Alquist Act.
- 22 And the CEQA process itself is a very robust
- 23 process. We utilize that process for SPPEs and I really
- 24 think -- and then of course in our current process we have
- 25 an adjudicative layer on top of that. And I really think

1	for	the	kinds	of	projects	that	fall	within	the	SPPE

- 2 process, doing a CEQA analysis with all of the safeguards
- 3 and public participation and agency coordination that is
- 4 involved is appropriate and sufficient.
- 5 I'd also like to point out that the proposed
- 6 changes complement the June 2021 Public Utilities
- 7 Commission decision to procure 11,500 megawatts of new net-
- 8 qualifying capacity electricity resources before 2026. On
- 9 this, these proposed changes, both parts of these proposed
- 10 changes could support geothermal permitting and support
- 11 achievement of that goal, as well as the state's vision for
- 12 supporting development of Lithium Valley and the Salton Sea
- 13 region, where existing. And also new geothermal power
- 14 plants can also be utilized to produce lithium from brines
- 15 from the geothermal reservoir under the Salton Sea.
- So happy to answer any questions or engage in any
- 17 discussion on this, but I do think this is an important
- 18 initiative.
- 19 CHAIR HOCHSCHILD: Thank you so much
- 20 Commissioner.
- 21 Any comments on this? Vice Chair Gunda, please.
- 22 VICE CHAIR GUNDA: Yeah, thank you Chair
- 23 Hochschild, thank you Commissioner Douglas, and Jared thank
- 24 you for that presentation and the briefing on this.
- Coming into this business meeting, as with any

- 1 process improvements extremely supportive of kind of doing
- 2 this work to both support the long-term resource planning,
- 3 but also just improving the state processes and ensuring
- 4 the transparency that we continue to work on. So I think,
- 5 as we move forward on the process, I mean I'm absolutely
- 6 supportive of this. I just want to put a couple of plugs
- 7 for consideration for the staff as we move forward. I
- 8 think the energy landscape is changing a lot and we are in
- 9 this moment of incredible transition.
- 10 And there is also this requirement of CEC
- 11 continuing to modernize the way we gather data and really
- 12 put that out there for consumption and track and provide
- 13 real-time insights. I just want to think about the data-
- 14 gathering and data-dissemination element as we think
- 15 through this OIR if there are opportunities to complement
- 16 improvements to the QFER data, anything as it pertains to
- 17 geothermal, because it's going to play a huge role.
- 18 But also, to the comments on the previous item, I
- 19 think there's opportunities to gather information on the
- 20 SPPEs as we grant them, to think through what could be some
- 21 beneficial information for the state as a whole, so we can
- 22 put that out. So I just want to put that for
- 23 consideration.
- 24 Again Jared, to you and the entire legal team,
- 25 thank you for your work on this. I look forward to

- 1 supporting the item.
- 2 CHAIR HOCHSCHILD: Thank you, Vice Chair Gunda.
- 3 Any other? Yes, Commissioner Monahan, please.
- 4 COMMISSIONER MONAHAN: I'll just be brief, but I
- 5 also want to thank Commissioner Douglas and Jared for their
- 6 leadership on this. Both as Vice Chair Gunda said for the
- 7 sake of meeting our clean energy goals by accelerating
- 8 geothermal deployment permitting, but also just cutting
- 9 unnecessary red tape when it comes to SPPEs. I think this
- 10 is a better process, it's more effective. And I just want
- 11 to emphasize that moving from the adjudicative process to
- 12 this one will, I think, enhance our ability to oversight
- 13 these facilities. So just very strongly supportive of
- 14 this.
- 15 CHAIR HOCHSCHILD: Thank you, Commissioners.
- 16 Unless there are other comments from
- 17 Commissioners, Commission Douglas, would you be willing to
- 18 move the item?
- 19 COMMISSIONER DOUGLAS: Yeah, I move approval this
- 20 item.
- 21 CHAIR HOCHSCHILD: Okay. How about Commissioner
- 22 Monahan, would you be willing to second that?
- 23 COMMISSIONER MONAHAN: I second it.
- 24 CHAIR HOCHSCHILD: Okay, all in favor say aye.
- 25 Commissioner Douglas?

1	COMMISSIONER DOUGLAS: Aye.
	-
2	CHAIR HOCHSCHILD: Commissioner Monahan?
3	COMMISSIONER MONAHAN: Aye.
4	CHAIR HOCHSCHILD: Commissioner McAllister?
5	COMMISSIONER MCALLISTER: Aye.
6	CHAIR HOCHSCHILD: Vice Chair Gunda?
7	VICE CHAIR GUNDA: Aye.
8	CHAIR HOCHSCHILD: And I vote aye as well. That
9	item passes unanimously thanks to everyone.
10	CHAIR HOCHSCHILD: We'll turn now to Item 4,
11	Touchstone Benchmarking, LLC.
12	MS. COLLOPY: Good morning, Chair, Vice Chair and
13	Commissioners. I am Christine Collopy, the Assistant
14	Deputy Director of the Efficiency Division. Today I will
15	be presenting Item 4, which is a request to approve an
16	agreement with Touchstone Benchmarking, LLC, to support the
17	CEC's statewide building energy benchmarking program. Next
18	slide, please.
19	The Touchstone Benchmarking agreement tracks the
20	energy performance of a specific building, allowing
21	building owners and tenants to track energy use over time
22	and compare one building's energy performance against
23	another building.
24	It creates a single, statewide covered-buildings

CALIFORNIA REPORTING, LLC 229 Napa Street, Rodeo, California 94572 (510) 224-4476

43

list for commercial and multifamily buildings. And this

25

	1	will	ensure	that	the	CEC	is	onlv	contactino	, building	owne
--	---	------	--------	------	-----	-----	----	------	------------	------------	------

- 2 who are required to comply with the statewide program.
- 3 It amplifies existing outreach and education
- 4 efforts, including offering building owners an
- 5 individualized energy scorecard.
- 6 It improves data quality by providing automatic
- 7 error-checking for submittals and provides regular
- 8 downloads from the ENERGY STAR Portfolio Manager database.
- 9 These benefits together will yield improved
- 10 compliance rates for the CEC's statewide benchmarking
- 11 program. And allows staff to identify customized
- 12 opportunities for improving building energy efficiency.
- 13 Next slide, please.
- 14 The proposed scope of work with Touchstone
- 15 Benchmarking includes an annually updated covered-buildings
- 16 list of all commercial and multifamily buildings in
- 17 California required to comply with the program.
- 18 The proprietary Touchstone Benchmarking cloud-
- 19 based solution includes software system setup and
- 20 integration, software and database configuration, data
- 21 collection and tracking, a dashboard for reporting, a
- 22 building owner scorecard, and technical support for our CEC
- 23 staff.
- 24 Funding for this agreement is from the Cost of
- 25 Implementation Account or COIA. Next slide, please.

- 1 This agreement also includes development of a
- 2 customized, interactive statewide map with enhanced visuals
- 3 including individual building performance metrics such as
- 4 ENERGY STAR score and energy use intensity, provides the
- 5 ability to compare buildings by size, type and location.
- 6 And building data will be compiled annually for historical
- 7 year-over-year comparison. Next slide, please.
- 8 Should this agreement be approved today,
- 9 Touchstone Benchmarking will have the California Covered-
- 10 Buildings List developed and the benchmarking platform
- 11 stood up by June of 2022. Next slide, please.
- 12 Staff recommends approval of this Touchstone
- 13 Benchmarking agreement to support the CEC's statewide
- 14 building energy benchmarking program. Thank you, and I'm
- 15 available for any questions.
- 16 CHAIR HOCHSCHILD: Thank you so much.
- 17 Let's turn to public comment.
- 18 MS. GALLARDO: This is Noemi Gallardo, the Public
- 19 Advisor. Reminder to attendees if you'd like to make a
- 20 comment on Item 4, please raise your hand using the raise
- 21 hand icon, it looks like a high-five on the screen. If
- 22 you're on by phone, please press *9 to raise your hand, *6
- 23 to unmute.
- Chair, I do not see any hands raised. We can
- 25 proceed.

1 CHAIR HOCHSCHILD:	Okay.	Let's	turn to	0
---------------------	-------	-------	---------	---

- 2 Commissioner McAllister to make it a start.
- 4 so I'm in full support of this item and wanted to provide
- 5 just a tiny bit of context. We've been operating this
- 6 benchmarking program that flowed from Assembly Bill 802 and
- 7 we put that together and have been operating it. We built
- 8 an in-house -- really we built a dashboard that many,
- 9 probably all of you have seen, and has provided really good
- 10 insight into the data that's being collected.
- 11 And this industry or this approach to
- 12 incentivizing building performance has matured quite a bit
- 13 over the last few years and I want to give props to our
- 14 team for really being a part of that evolution, our whole
- 15 benchmarking team. Christine, you've been a real
- 16 incredible leader in this, so thank you for the
- 17 presentation and just for all your efforts on sort of
- 18 enriching our data landscape, including on the benchmarking
- 19 side of things. And a number of staff been involved in
- 20 that project over the years, and I think it's really
- 21 produced good results.
- 22 And now this enables us to kind of take it to the
- 23 next level and as Christine said really get a more rigorous
- 24 and systematic view of the buildings that are required to
- 25 comply with our benchmarking statute. And right now,

- 1 that's at 50,000 square feet and up multifamily and
- 2 nonresidential buildings, so relatively large ones.
- 3 And the prospects for this benchmarking approach
- 4 and building on it are really bright. So certainly, we
- 5 would like to lower -- we'd like to include more buildings
- 6 in this sort of rich data environment and understand the
- 7 buildings more. And so lowering the floor down to 20,000
- 8 square feet, something like that, will be a good idea,
- 9 going forward.
- 10 And then also taking the benchmarking data and
- 11 moving towards a building performance standards approach,
- 12 where we really sort of give people a goal to shoot for
- 13 over the coming decade or so. And then provide program
- 14 support to help them do that, really starting with sort of
- 15 low-income and affordable housing and all sorts of
- 16 different building types that are going to be different
- 17 kinds of initiatives. So really what we're doing creating
- 18 the conditions, the knowledge base so that people can
- 19 really invest intelligently around improving the
- 20 performance of their buildings.
- 21 And so this tool really kind of, I think, raises
- 22 the -- well it standardizes in a way that other
- 23 jurisdictions are also doing and it also kind of raises the
- 24 level of the program. And Christine ticked off some of the
- 25 reasons how that's going to happen, but overall it'll

- 1 create a covered list that gives us much more insight into
- 2 who's complying and who's not, it'll increase compliance, I
- 3 think, just by that transparency effort, and it'll also
- 4 enable us to follow up with the buildings that aren't
- 5 complying. And then eventually, if and when we get a
- 6 building performance standard or we put it in programs that
- 7 are going to actively incentivize and encourage building
- 8 owners to invest in their buildings to improve performance,
- 9 then this provides the information for us to target those
- 10 efforts.
- 11 And this really is where we have to go. We know
- 12 we have to get our existing buildings improved and
- 13 decarbonized. And that's really the big nut that we have
- 14 to crack, and this is a sort of structured basis for moving
- 15 forward with those efforts.
- And so again I want to just thank Christine and
- 17 the whole staff on benchmarking and the Efficiency Division
- 18 and IT actually, for all the work they've done on the
- 19 dashboard. And in full support of this of this item.
- I would finally just call out our partnership
- 21 with ENERGY STAR on this. They have invested in the
- 22 performance, in the ENERGY STAR Portfolio Manager, which is
- 23 really the industry standard tool. And the Biden
- 24 Administration is looking at how they can improve it,
- 25 constantly further, and we're involved in those

- 1 conversations as well. And I just want to give props to
- 2 the ENERGY STAR, the EPA team. It's on all things ENERGY
- 3 STAR, but particularly Portfolio Manager. And also the
- 4 resources that they have put together and are developing
- 5 further for building performance standards, so they've got
- 6 a good toolkit for that as well.
- 7 So, this partnership, I think, with across the
- 8 various states that are doing it and the localities, I see
- 9 many cities are now doing benchmarking. And with the
- 10 Federal Government, I think, is really positive and
- 11 portends well for the future. And then the White House has
- 12 taken up building performance standards as a policy tool
- 13 that they really want to promote and so we're working with
- 14 the CDQ there also to sort of assist that effort in any way
- 15 that's helpful.
- 16 So anyway, a little bit broader context for this
- 17 item. and I'm very supportive of the Touchstone contract.
- 18 CHAIR HOCHSCHILD: Thank you, Commissioner. I
- 19 really appreciate you calling out ENERGY STAR. It's really
- 20 a tremendous program. I know it had been somewhat
- 21 denigrated previously, but I just really share your
- 22 sentiments about the value of that.
- Other Commissioners? Yes, Vice Chair Gunda,
- 24 please go ahead.
- 25 VICE CHAIR GUNDA: Yeah, thank you, Chair

- 1 Hochschild. And thank you, Commissioner McAllister, for
- 2 adding that additional context. And thank you Christine
- 3 for going through the overview of this proposed support --
- 4 sorry, I'm just completely blanking on my words today. I
- 5 stayed up too late. Just kidding, but I just wanted to
- 6 make two quick points.
- 7 I think to Commissioner McAllister's earlier
- 8 comments, the evolution of the benchmarking has been very
- 9 interesting to observe. And with the new IMD (phonetic)
- 10 data that's coming in, and then this work I think there's
- 11 incredible opportunity for us to really help make
- 12 buildings, the division of having buildings be a true part
- 13 of the grid resiliency and support and performance. So I
- 14 just wanted to acknowledge that, that importance of this
- 15 work and the related importance, so just thank you
- 16 Commissioner McAllister for that.
- 17 And then also just anytime we do this data work
- 18 it's just as a good point to recognize the incredible staff
- 19 we have that are trying to take advantage of all the data
- 20 we have and provide analysis. I also want to call out
- 21 Jason Harville for his efforts at the enterprise level to
- 22 modernize infrastructure, but also to just acknowledge
- 23 Efficiency Division specifically about the work that they
- 24 have been doing, both on the benchmarking side, the pace
- 25 side; just kind of taking advantage of the data that we are

- 1 getting in. So this is one more incremental movement
- 2 towards modernizing our overall efforts.
- 3 And finally, Commissioner McAllister, thank you.
- 4 I know it's been a 10,15-year slog on the data side and
- 5 thanks for keeping up that momentum on improving our
- 6 overall data vision for the Commission. So yeah, looking
- 7 forward to supporting it and really thrilled about this
- 8 work.
- 9 CHAIR HOCHSCHILD: Well said. And so with that
- 10 unless there's other comments Commissioner McAllister, I'd
- 11 welcome a motion from you on Item 4.
- 12 COMMISSIONER MCALLISTER: Yes, I will.
- One final comment actually. And I can't the
- 14 data back and forth, I mean Commissioner Gunda is such a
- 15 great partner on all the data work. And it's super-
- 16 exciting. I mean it's hard to kind of contain our
- 17 enthusiasm, right? Curb your enthusiasm about all the
- 18 different kind of cross-cutting issues that we're going to
- 19 be just much more in the know about. And we're going to be
- 20 able to let loose staff on some really interesting issues,
- 21 including around building performance and benchmarking.
- But this is a key industry. You know, energy
- 23 efficiency already is hundreds of thousands of jobs in our
- 24 state. But as we, both at the Commission and sort of
- 25 facilitating outside the Commission in ways that obviously

- 1 don't impede, that don't sort of go you know, that
- 2 respect everyone's privacy. And obviously, that is of
- 3 upmost importance. And Jason, I agree, did a great job
- 4 there.
- 5 This industry needs these kinds of insights: the
- 6 performance, and the building level, and the appliance
- 7 level, and the reliability conversation on how aggregated
- 8 DERs are going to really help the grid function. Those
- 9 programs necessarily are derivatives. They're not metered
- 10 energy, they're not metered power, right? They're
- 11 derivatives of metered information. And so this analytical
- 12 piece is a key element to really getting it done on the
- 13 demand side, which is different from a supply side.
- 14 And so I think we always have to sort of say,
- 15 "Look, we know that there is a lot of potential in the
- 16 demand side, but we really have to go the extra mile to
- 17 create the conditions that we can quantify it and make it
- 18 accountable. And so I think all of these efforts really
- 19 are working towards that overall goal. And I just have to
- 20 give props again to Vice Chair Gunda for all the
- 21 conversation on the reliability side and keeping, creating
- 22 the conditions of equivalence that we really can. We are
- 23 approaching the demand side with the level of rigor that's
- 24 necessary. So this is one small piece of that overall kind
- 25 of approach. But the context, it always helps to kind of

- 1 keep reinforcing that that we're building something new on
- 2 the demand side. It really is going to raise the level,
- 3 but it does take new ways of thinking and a lot of data.
- 4 So anyway, with that I'm happy to move Item 4 if
- 5 there no other comments.
- 6 CHAIR HOCHSCHILD: All right, thank you.
- 7 Vice Chair Gunda, would you be willing to second
- 8 Item 4?
- 9 VICE CHAIR GUNDA: I second Item 4.
- 10 CHAIR HOCHSCHILD: All in favor say aye.
- 11 Commissioner McAllister?
- 12 COMMISSIONER MCALLISTER: Aye.
- 13 CHAIR HOCHSCHILD: Vice Chair Gunda?
- 14 VICE CHAIR GUNDA: Aye.
- 15 CHAIR HOCHSCHILD: Commissioner Douglas?
- 16 COMMISSIONER DOUGLAS: Aye.
- 17 CHAIR HOCHSCHILD: Commissioner Monahan?
- 18 COMMISSIONER MONAHAN: Aye.
- 19 CHAIR HOCHSCHILD: And I vote age as well. That
- 20 item passes unanimously.
- 21 Let's turn now to Item 5, Center for
- 22 Transportation and the Environment.
- 23 MS. LUM: Good morning, Chair and Commissioners.
- 24 I'm Quenby Lum, an Associate Energy Specialist from the
- 25 Energy Research and Development Division. Today we are

- 1 recommending one award from a recent EPIC solicitation
- 2 focused on projects to advance technologies in mobile
- 3 renewable backup generation. Four other projects from this
- 4 solicitation were approved at a previous business meeting.
- 5 The goal of these projects is to provide backup
- 6 power during Public Safety Power Shutoffs, wildfires, and
- 7 other grid outage events using clean energy mobile units.
- 8 This will help meet the growing need for clean backup power
- 9 solutions to offset or replace fossil-fuel diesel
- 10 generators which emit greenhouse gases and air pollution.
- 11 Next slide, please.
- The benefits of this project include increased
- 13 electricity reliability and resiliency; emergency service
- 14 and response capacity; improved safety for communities
- 15 during outages; reduced greenhouse gases, air pollution
- 16 emissions, and noise levels compared to diesel generators.
- 17 As shown on the map here there are multiple
- 18 demonstration sites located in a mix of disadvantaged, low-
- 19 income, and Tier 3 high-fire threat districts to help
- 20 support these more vulnerable communities.
- 21 Demonstrations will also take place in different
- 22 climate zones and in different seasons throughout the year
- 23 to ensure system performance is robust in a variety of
- 24 weather conditions. Next slide, please.
- The proposed awardee is The Center for

- 1 Transportation and the Environment. The project team will
- 2 be designing and demonstrating a hydrogen fuel cell mobile
- 3 backup generation vehicle. This project is unique, because
- 4 it is a self-sufficient and self-contained system. The
- 5 truck will run on hydrogen, and it will also use hydrogen
- 6 fuel to supply the backup generation.
- 7 Compared to mobile diesel generators, which are
- 8 only used to provide power, need to be towed to the usage
- 9 site and also require frequent refueling, the Hydrogen Back
- 10 Up Generator will be able to drive to and from an emergency
- 11 or disaster relief site 90 miles each way, bring its own
- 12 fuel on-board, and provide at least 35 kilowatts of
- 13 continuous power for a minimum of 48 hours. Next slide,
- 14 please.
- The vehicle will be equipped to supply up to 10
- 16 gallons of water and to serve as an incident command
- 17 vehicle, modeled after a typical incident command vehicle
- 18 used by federal, state, and local agencies like the one
- 19 shown here on the left from FEMA. It will support stand-
- 20 alone loads for emergency and disaster relief applications
- 21 such as cell phone and other electronic device charging,
- 22 LED lighting, refrigerators, HVAC systems, and
- 23 communication systems.
- 24 The vehicle will be fitted with standard
- 25 electrical outlets that are compatible with any household

- 1 appliance and electronic device without the need for
- 2 special adapters. Next slide, please.
- 3 The use of diesel backup generators has increased
- 4 a great amount in recent years due to wildfires and Public
- 5 Safety Power Shutoffs. As shown on the map here, a recent
- 6 study reports that in just 5 of the state's 35 air
- 7 districts, California has more than 21,000 permitted
- 8 diesel-powered backup and emergency generators with a total
- 9 capacity of approximately 8,000 megawatts.
- 10 Combined, these generators can emit approximately
- 11 440,000 metric tons of CO2 per year, which is equivalent to
- 12 approximately 95,000 passenger vehicles. Replacing all of
- 13 the diesel backup generators in these air districts with
- 14 emissions-free wind, solar, and hydrogen generators could
- 15 not only mitigate these greenhouse gas emissions, but also
- 16 contribute to reductions in other pollutants such as
- 17 particulate matter, hydrocarbons, and nitrogen oxides that
- 18 are harmful to local communities. Next slide, please.
- 19 Staff recommends approval of this grant
- 20 agreement, and adoption of the determination that this
- 21 action is exempt from CEQA.
- With me today are Erik Brewer from the Center for
- 23 Transportation and the Environment, Bill Dietrich from the
- 24 Chief Counsel's Office, and Mike Gravely from the Energy
- 25 Systems Research Office who are available to answer

- 1 questions you may have. This concludes my presentation,
- 2 thank you.
- 3 CHAIR HOCHSCHILD: Thank you, Quenby.
- 4 Let's turn now to public comment on Item 5.
- 5 MS. GALLARDO: This is Noemi Gallardo, the Public
- 6 Advisor. Reminding attendees if you'd like to make a
- 7 comment on Item Number 5, please raise your hand using the
- 8 raised-hand feature on Zoom. If you're on by phone, please
- 9 press *9 to raise your hand and *6 to unmute.
- 10 Chair, I do not see any hands raised. We may
- 11 continue.
- 12 CHAIR HOCHSCHILD: Okay. Well, I would just say,
- 13 I think, just in general we're seeing a kind of breaking
- 14 down silos from all these different categories we're
- 15 working on: transportation and grid and so forth. And
- 16 everything's kind of being woven together, this is another
- 17 positive example of that. So I just want to thank the
- 18 staff for putting this together. And would open it up if
- 19 there's other Commissioners who would like to chime in.
- Let's start with Commissioner Monahan.
- 21 COMMISSIONER MONAHAN: Well, just to build on
- 22 what you were saying, Chair, I mean I think it's really
- 23 exciting to see how hydrogen fuel cells and batteries,
- 24 together with solar, wind, are playing this important role
- 25 for backup power.

- 1 And I live in Berkeley and when the power goes
- 2 out, I hear a lot of backup generators just popping up in
- 3 every household. So as Quenby said, there's 21,000
- 4 permitted diesel backup generators, many more diesel backup
- 5 generators just showing up in homes. And so it's just
- 6 exciting to think of the role that clean energy could play
- 7 in backup generation generally.
- 8 And I too want to thank Quenby and Mike Gravely
- 9 for all the leadership that they're displaying on this set
- 10 of grants. And this is a demonstration project, it's
- 11 really not meant to be cost-competitive today it's more
- 12 futuristic. And the project currently relies on fossil-
- 13 fuel driven hydrogen, but requires that there be a plan to
- 14 transition to green. And that's where we need to get to is
- 15 a green energy system that is affordable and reliable.
- I also want to comment on Cummins who's playing a
- 17 role in this. And Cummins is a leader on alternative fuel
- 18 engines generally. They recently moved into the California
- 19 Fuel Cell Partnership building and opened this I think
- 20 21,000 square foot space for fuel cell technologies in the
- 21 heavy-duty sector. So it's just great to see partners like
- 22 Cummins investing in hydrogen fuel cell technologies that
- 23 we're going to need for meeting especially goods-movement
- 24 related decarbonization.
- 25 So, it's an exciting sort of connecting the dots,

- 1 as you said Chair, in terms of like we know we don't need
- 2 these silos. We've got a silo bust. And this grant is one
- 3 example of that.
- 4 CHAIR HOCHSCHILD: Silo busting, yes.
- 5 Vice Chair Gunda, go ahead.
- 6 VICE CHAIR GUNDA: Yeah, great Chair. I just
- 7 want to continue to support what you and Commissioner
- 8 Monahan mentioned. And Quenby, thank you so much for the
- 9 presentation.
- I think just a point of context I just wanted to
- 11 add is there's a couple things happening in terms of energy
- 12 transition and equity. I think we keep talking about that
- 13 there is a huge transition, both on the gas side, the
- 14 electricity side and there is a role that hydrogen plays
- 15 across this paradigm. And I think having a good
- 16 understanding by doing programs like this, pilots like this
- 17 that just provides us some information on what are the
- 18 different pathways for hydrogen as we move forward and the
- 19 downstream technologies that hydrogen could utilize to
- 20 support the energy transition, but also equity, especially
- 21 in terms of air quality and such.
- So, I just wanted to say I think I am learning
- 23 every time we do a project like this we bring something to
- 24 the business meeting. There's an opportunity for me
- 25 individually as that, as a person to learn the

- 1 opportunities here. So Quenby, thank you to you and the
- 2 entire R&D team, on kind of continuing this conversation on
- 3 alternate fuel pathways for decarbonizing the economy. So
- 4 just wanted to note that.
- 5 And also, 100 percent agree to Commissioner
- 6 Monahan and Chair Hochschild. There is an absolute need
- 7 here to help integrate our themes of energy transition and
- 8 decarbonization and equity across all the different areas
- 9 that we all work in. And just continue to see these as
- 10 opportunities for us to be able to publicly discuss some of
- 11 these items. So thank you, looking forward to supporting
- 12 it.
- 13 COMMISSIONER DOUGLAS: So, Chair Hochschild, if I
- 14 could just jump in for some quick support?
- 15 CHAIR HOCHSCHILD: Yeah, please. Mm-hmm.
- 16 COMMISSIONER DOUGLAS: I really found this item
- 17 interesting. I'm in strong support. And I agree with
- 18 Commissioner Monahan in the sense that these are very much
- 19 cross-cutting issues and opportunities. And it's kind of
- 20 fun to see a project like this and just think about the
- 21 possibilities really for air quality, for resilience and
- 22 reliability.
- 23 And just even in terms of the transition from to
- 24 being able to use green hydrogen in these types of
- 25 technologies, I think it's something that we should really

- 1 focus on. In the work that I do around renewables I do
- 2 think there are some opportunity areas, there are some
- 3 geographies where we can really -- and some technologies
- 4 where we can really produce a lot of renewable energy. And
- 5 so knowing that there are and could be these kind of cost-
- 6 effective and really important use cases is helpful. And
- 7 so I'm really supportive of this.
- 8 CHAIR HOCHSCHILD: Thank you.
- 9 Let's see, with that unless there's other
- 10 comments --
- 11 COMMISSIONER MCALLISTER: I do have my hand up
- 12 here.
- 13 CHAIR HOCHSCHILD: Yeah, sorry. Go ahead.
- 14 COMMISSIONER MCALLISTER: No worries, yeah. So
- 15 just chiming I agree particularly with what Commissioner
- 16 Douglas just said, but all my colleague have said so far.
- 17 And I think there's a real imperative to
- 18 understand hydrogen and really sort of get increasingly
- 19 hard information, firm information about sort of the
- 20 different use cases, in particular sort of potentially
- 21 high-value use cases like this where the hydrogen economy
- 22 is kind of likely to start and take root. So we can really
- 23 project where it's likely to go, what role it's going to
- 24 play across the various sectors, starting more or less
- 25 primarily with transportation, but on the industrial side.

- 1 And really finding those off-takers that can add high value
- 2 and therefore can support that ecosystem I think is really
- 3 important.
- 4 And I want to reiterate what Commissioner Douglas
- 5 said about just we really have to move towards green sort
- 6 of ASAP. The hydrogen that we use has to be green hydrogen
- 7 in order for it to really play that long-term role and help
- 8 us get to 100 percent. And so the source of the energy in
- 9 the process by which the hydrogens is derived is pretty
- 10 key. And so I want to just keep us focused on that.
- I mean there's a lot of optimism about hydrogen
- 12 these days. And sort of managing those conversations and
- 13 really determining where that, where the high value and
- 14 most likely marketplaces are in line can go is really
- 15 important. I think this program contributes -- this
- 16 project contributes greatly to that so in full support.
- 17 CHAIR HOCHSCHILD: And just on a related note,
- 18 thunderous agreement to Commissioner McAllister's
- 19 viewpoint, 95 percent of the hydrogen use in the world
- 20 today comes from fossil. We should not forget that. We
- 21 need to change that, and if you don't change that you're
- 22 not helping at all on the emission side. So I mean this is
- 23 -- I think we're all eyes wide-open on this.
- I do want to make a request if I could, to Mike
- 25 Gravely, to share the deck that we've just developed on our

- 1 hydrogen roadmap with all of my fellow Commissioners.
- 2 We've gotten a number of requests from legislators on this
- 3 question. And we've developed what I think is an excellent
- 4 overview of the key issues, the key questions, the swim
- 5 lanes that we see as an agency on this. And it's a great
- 6 briefing document, so if we could share that with my
- 7 colleagues. I don't know if everybody has seen that yet.
- 8 It just got finished.
- 9 But with that I think we're prepared to move
- 10 ahead. Commissioner McAllister, would you -- I'm sorry,
- 11 was there another comment Vice Chair Gunda? No? Okay. If
- 12 I could ask you to move Item 5.
- 13 COMMISSIONER MCALLISTER: I move Item 5.
- 14 CHAIR HOCHSCHILD: All right. Let's see,
- 15 Commissioner Monahan, would you be willing to second?
- 16 COMMISSIONER MONAHAN: I second Item 5.
- 17 CHAIR HOCHSCHILD: All right, all in favor say
- 18 aye.
- 19 Commissioner McAllister?
- 20 COMMISSIONER MCALLISTER: Aye.
- 21 CHAIR HOCHSCHILD: Commissioner Monahan?
- 22 COMMISSIONER MONAHAN: Aye.
- 23 CHAIR HOCHSCHILD: Commissioner Douglas?
- 24 COMMISSIONER DOUGLAS: Aye.
- 25 CHAIR HOCHSCHILD: Vice Chair Gunda?

- 1 VICE CHAIR GUNDA: Aye.
- 2 CHAIR HOCHSCHILD: And I vote age as well. Item
- 3 5 passes unanimously.
- And just as we're going forward, I have a hard
- 5 stop at noon just for a document I have to review to be
- 6 able to get it in by 1:00, so we will go until just before
- 7 or just after noon and then break for lunch. And continue
- 8 if we don't get all the way through. But with that let's
- 9 move on to Item 6, Rail Propulsion Systems.
- 10 MR. WAN: Good morning, Chair and Commissioners.
- 11 My name is Alex Wan and I'm an Associate Energy Specialist
- 12 in the Freight and Transit Unit of the Fuels and
- 13 Transportation Division.
- Today, I'll be presenting on the agreement with
- 15 Rail Propulsion Systems, LLC, to develop a wireless power
- 16 transfer charging system for a battery-electric locomotive.
- 17 This wireless system will allow the locomotive to be
- 18 charged wirelessly across an eight-foot-long stretch of
- 19 track. Next slide, please.
- Before I continue, I just wanted to provide a
- 21 brief overview of the project. As I mentioned earlier the
- 22 project will involve developing wireless charging
- 23 infrastructure to charge a switcher locomotive.
- 24 Transmitter pads will be placed along an eight-foot-long
- 25 stretch of railroad track, and it will transmit energy to a

- 1 receiver on the locomotive. Thus, the receiver on the
- 2 locomotive will receive energy as the locomotive goes down
- 3 the stretch of track that transmitters are located within.
- 4 This project will result in several benefits for
- 5 Californians. First, it is innovative. As I mentioned
- 6 earlier it will allow switcher locomotives to be charged
- 7 anywhere throughout an eight-foot-long stretch of track.
- 8 Thus, it will allow for opportunity charging and reduce
- 9 periods of downtime. It will also have the same charging
- 10 speed and efficiency as standard wired charging, would not
- 11 hinder rail operations, and also would not require the
- 12 locomotive to be plugged in. As a result, this project
- 13 would lead to greater innovation.
- 14 Another benefit is increased worker safety. With
- 15 wired charging, workers have to carry heavy cables. And
- 16 these cables can cause injuries, create tripping hazards,
- 17 and increase contact with equipment that has high-voltage
- 18 electricity. With this project, however, there are no
- 19 heavy cables and no tripping hazards as the transmitter
- 20 pads are flush with the rails. The transmitter pads will
- 21 not be energized either.
- 22 Moreover, the project will result in emission
- 23 reductions in the Anaheim area. Both the locomotives and
- 24 charging technology used for this project are zero-
- 25 emission. The Recipient has estimated that there will be a

- 1 reduction of 532.2 metric tons of Carbon Dioxide Equivalent
- 2 greenhouse gases each year. This is important because the
- 3 project site location at Coast Rail Services railyard is
- 4 located in a heavily pollution-burdened disadvantaged
- 5 community according to CalEnviroScreen 3.0. All the major
- 6 railyards in the South Coast Air Basin, which are potential
- 7 sites for deployment of the wireless charging for battery-
- 8 electric locomotives are located either in or directly
- 9 adjacent to a disadvantaged community. This project has
- 10 the potential to significantly improve the air and health
- 11 of the local community.
- 12 Last but not least, the photos on this slide are
- 13 of the battery pack for the locomotive and a picture of the
- 14 locomotive that the receiver will be placed on. Next
- 15 slide, please.
- 16 For this project Rail Propulsion Systems, LLC,
- 17 will first create a sub-scale/prototype Wireless Power
- 18 Transfer, WPT, system at their workshop in Fullerton. They
- 19 will use this prototype WPT system to run simulations.
- 20 They will also run performance and function tests. The
- 21 work that they do on this prototype system will help them
- 22 determine what improvements they need to make while
- 23 building the full-scale WPT system.
- 24 The next step they will take is to design, build,
- 25 and test a full-scale WPT system that can transfer 75

- 1 kilowatts of power. They will build this system at their
- 2 workshop in Fullerton. After they finish building it, they
- 3 will perform function and performance tests on the system
- 4 at the workshop. After the system passes tests, it would be
- 5 integrated into the battery locomotive at the Coast Rail
- 6 Services railyard in Anaheim. Function and performance
- 7 tests will be performed on it afterwards. And once the
- 8 system passes these tests it will be demonstrated at the
- 9 railyard for 12 months. Next slide, please.
- 10 This project has the potential to impact the
- 11 railroad market in several ways. First, there are over 300
- 12 switcher locomotives operating throughout California at
- 13 various rail yards and ports and industrial and military
- 14 yards. Some of these locomotives consume between 10,000
- 15 and 50,000 gallons of diesel per year. Thus, there is a
- 16 potential to convert up to hundreds of switcher locomotives
- 17 to battery-electric locomotives and to use the WPT system
- 18 to power them.
- 19 Another potential market in the future for the
- 20 WPT system is passenger rail agencies. They can
- 21 potentially use the WPTs at passenger train stations and
- 22 service yards to charge passenger locomotives and railcars.
- 23 There are at least 100 passenger locomotives and 500
- 24 passenger railcars in California, so there is much
- 25 potential to use WPTs to charge hundreds of locomotives and

- 1 railcars. Most of these locomotives and railcars would be
- 2 used for commuter and intercity routes where trains stop
- 3 frequently.
- In addition, the wireless charging system can
- 5 potentially be used for passenger locomotive Head End Power
- 6 otherwise known as HEP. HEP for locomotives includes
- 7 lighting, air conditioning, and other electric systems on
- 8 passenger cars. HEPs can be connected to a power grid via a
- 9 WPT so that passengers trains do not have to use the diesel
- 10 engines to run the HEP while waiting at a station. Next
- 11 slide, please.
- 12 Staff recommends approval of the \$270,000 grant
- 13 with the Rail Propulsion Systems, LLC, and adoption of
- 14 staff's determination that the projects are exempt from
- 15 CEQA.
- 16 This concludes my presentation. Thank you very
- 17 much for your time and consideration. I'm available for any
- 18 questions that you may have.
- 19 CHAIR HOCHSCHILD: Thank you so much, Alex.
- Let's move on to public comment on Item 6.
- 21 MS. GALLARDO: This is Noemi Gallardo, the Public
- 22 Advisor. Reminding attendees if you would like to comment
- 23 on Item Number 6, please raise your hand using what looks
- 24 like the high-five icon on the screen. If you are on by
- 25 phone please press *9 to raise your hand, *6 to unmute.

- 1 Chair, I do not see any hands raised. We can
- 2 continue.
- 3 CHAIR HOCHSCHILD: Let's turn to Commissioner
- 4 Monahan.
- 5 COMMISSIONER MONAHAN: Well, thanks Alex, and to
- 6 the FTD team that's led to all the BESTFIT solicitation. I
- 7 mean, I think this is an area where really the Fuels and
- 8 Transportation Division is overlapping with the R&D work
- 9 that we do. I would say we're looking at these innovative
- 10 charging solutions where there's not yet a full-on business
- 11 case for this, but we're making these exploratory
- 12 investments because we want to, because the future of
- 13 charging is changing so fast.
- 14 And I always like look at China for what they're
- 15 doing and think, well China is doing it, we should be doing
- 16 it here in California. And China has like a one-kilometer
- 17 road right now where it's a wireless charging road and
- 18 they're testing out for all sorts of vehicles, how to --
- 19 and it's actually paired with solar and batteries so it's a
- 20 clean delivery system. And I think that's what we're
- 21 looking for, these innovative charging solutions that bring
- 22 renewable energy with our charging and make it super-easy
- 23 to charge vehicles.
- So, I love the fact that Rail Propulsion Systems
- 25 is located in Fullerton, California. And can I just say,

- 1 "Come to California companies that are investing in
- 2 innovative charging." And we have a grant program that
- 3 will be -- we have \$250 million over two years that the
- 4 Legislature has given us to encourage companies to come to
- 5 California and put down roots and help us meet our clean
- 6 energy goals and help us drive a clean energy economy with
- 7 good jobs here in the state.
- 8 And Rail Propulsion Systems is they are really on
- 9 the cutting edge of clean rail. They're looking at all
- 10 sorts of clean rail solutions, and this is just one of
- 11 them. So I really strongly supportive of this portfolio of
- 12 grants, and this grant in particular.
- 13 CHAIR HOCHSCHILD: Hear, hear.
- Other Commissioners wishing to make a comment,
- 15 Commissioner McAllister?
- 16 COMMISSIONER MCALLISTER: I have a question
- 17 actually. So I am in full support of this just right out
- 18 of the gate. I guess the diesels that are on locomotives
- 19 typically are pretty high capacity. I mean, these are
- 20 large loads and large engines. And I'm wondering sort of if
- 21 staff knows, kind of in terms of what it would really take,
- 22 like what kind of capacity of a full-on sort of charging
- 23 station would look like for a locomotive?
- Then also when they go over passes, they do have
- 25 a lot of -- there's a lot of stored, potential energy up at

- 1 the top of one of these passes. And going down the
- 2 backside of a pass seems like would be a prime opportunity
- 3 to do some sort of breaking, some wireless breaking with
- 4 induction kind of like a car. And obviously there's a lot
- 5 of potential, there would be a lot of potential energy
- 6 there. So just kind of wondering, the different themes
- 7 that those are sort of part of the overall plan going
- 8 forward and if we're looking at those opportunities?
- 9 MR. WAN: Yes. You know, based on what I've
- 10 learned so far --
- 11 COMMISSIONER MCALLISTER: Alex, you're very, very
- 12 -- there you go.
- 13 CHAIR HOCHSCHILD: Alex, you need to speak up,
- 14 it's hard to hear you.
- 15 MR. WAN: Sure, sorry about that. But based on
- 16 what I've learned so far the full-scale power system will
- 17 be over 500 kilowatts and the future plans would be to
- 18 first have it to charge switcher locomotives and then in
- 19 the future if it works out to move towards passenger rail
- 20 cars in the future for both commuter and intercity trains.
- 21 COMMISSIONER MONAHAN: Can I also say,
- 22 Commissioner McAllister, when I think of this, I think of
- 23 it as opportunity charging, not full-on charging.
- 24 COMMISSIONER MCALLISTER: Yeah, right.
- 25 COMMISSIONER MONAHAN: And in fact, transit buses

71

- 1 are doing this right now: Antelope Valley, other -- Long
- 2 Beach. So it's more like how do you get a little extra
- 3 juice, not how do you refuel the whole vehicle. But I love
- 4 your ideas around rail and how we can think about future
- 5 investments.
- 6 COMMISSIONER MCALLISTER: Yeah, thanks. That
- 7 makes a lot of sense (Overlapping colloquy.)
- 8 CHAIR HOCHSCHILD: I like that term, "opportunity
- 9 charging," which is sort of what I feel like I do with my
- 10 iPhone.
- 11 So, unless there are other comments, Commissioner
- 12 Monahan, would you be willing to move Item 5, or Item 6,
- 13 sorry?
- 14 COMMISSIONER MONAHAN: I move Item 6.
- 15 CHAIR HOCHSCHILD: Commissioner McAllister, would
- 16 you be willing to second?
- 17 COMMISSIONER MCALLISTER: I'd second.
- 18 CHAIR HOCHSCHILD: All right, all in favor say
- 19 aye, Commissioner Monahan?
- 20 COMMISSIONER MONAHAN: Aye.
- 21 CHAIR HOCHSCHILD: Commissioner McAllister?
- 22 COMMISSIONER MCALLISTER: Aye.
- 23 CHAIR HOCHSCHILD: Vice Chair Gunda?
- 24 VICE CHAIR GUNDA: Aye.
- 25 CHAIR HOCHSCHILD: Commissioner Douglas?

- 1 COMMISSIONER DOUGLAS: Aye.
- 2 CHAIR HOCHSCHILD: And I vote aye. as well. That
- 3 item passes unanimously.
- 4 Let's turn now to Item 7, Second Block Grant for
- 5 Light-Duty Electric Vehicle Charger Incentive Projects.
- 6 MR. CAZEL: Good morning, Chair and
- 7 Commissioners. My name is Phil Cazel with the Fuels and
- 8 Transportation Division.
- 9 CHAIR HOCHSCHILD: I'm sorry, Phil, you have a
- 10 lot of background static. I don't know if there is -- now
- 11 we can't hear you at all. So, it's okay if you turn it
- 12 back on. What I mean is we could hear you okay, there was
- 13 just a lot of static in the background. So now you're on
- 14 mute though, we can't hear you at all.
- MR. CAZEL: Yeah, I think it was the fan on my
- 16 computer.
- 17 CHAIR HOCHSCHILD: Okay that's better. Go ahead.
- 18 MR. CAZEL: Okay, good morning again. My name is
- 19 Phil Cazel with the Fuels and Transportation Division.
- 20 Today staff is seeking approval of the two agreements
- 21 listed in Item 7. If approved, CALSTART and the Center for
- 22 Sustainable Energy, or CSE, will each design, implement,
- 23 and manage up to \$250 million for incentives that will be
- 24 made available to install electric vehicle charging
- 25 infrastructure.

1 Toda	v we	are	requesting	approval	of u	ot a	\$1

- 2 million in start-up costs for each grant agreement and
- 3 approval to delegate authority to the Executive Director to
- 4 approve additional future funds of up to \$250 million per
- 5 agreement. Next slide, please.
- 6 These new proposed block grants will build on the
- 7 success of the CEC's California Electric Vehicle
- 8 Infrastructure Project, better known as CALeVIP, and deploy
- 9 thousands of electric vehicle chargers, adding to the
- 10 approximately 195,000 existing and planned chargers.
- 11 The incentives offered under the proposed
- 12 agreements will support the growth of widespread,
- 13 accessible, and convenient charging infrastructure that is
- 14 critical to the growth of transportation electrification in
- 15 California. They will also facilitate increased zero
- 16 emission vehicle adoption, which surpassed 1 million in
- 17 cumulative vehicle sales last month. All this contributes
- 18 to the State's 2025 goal of 250,000 public and shared
- 19 chargers, and to closing the gap identified in the CEC's AB
- 20 2127 Report of the estimated 1.2 million chargers that will
- 21 be needed by 2030 for light-duty vehicles.
- 22 Finally, in addition to leading to better air
- 23 quality and GHG reductions, these incentives will also
- 24 focus on adding more charging locations in disadvantaged
- 25 communities, low-income communities, and multi-unit

1 dwellings to address community transportation needs and

- 2 yield direct local benefits. Next slide, please.
- 3 The proposed agreements will design incentive
- 4 programs based on identified needs and opportunities. The
- 5 \$1 million in start-up costs proposed for approval in each
- 6 agreement today will be used to perform community outreach
- 7 and for public workshops that will provide input to develop
- 8 the incentive programs, as well as to develop software and
- 9 processes needed to implement the incentives.
- 10 The CALeVIP incentives were made available on a
- 11 first-come, first served basis throughout different regions
- 12 of the state, which provided for rapid installation of
- 13 charging infrastructure. The agreements proposed today
- 14 would continue rapid deployment but could include different
- 15 design elements to focus on community and equity needs.
- 16 Each phase of incentives will be developed by
- 17 CALSTART and CSE and will include input and approval from
- 18 Energy Commission staff. And as I mentioned earlier,
- 19 future funding will be approved by the Executive Director
- 20 to implement each incentive project or phase, up to the
- 21 total of \$250 million per agreement. Next slide, please.
- The two proposed agreements would implement
- 23 concurrent and complementary incentive programs. The
- 24 specific projects will be designed with stakeholder and
- 25 community input. They will invest in low-income and

- 1 disadvantaged communities and advance equity goals as well
- 2 as meeting the need to accelerate deployment of chargers.
- 3 Incentive programs developed by CALSTART and CSE will
- 4 provide the tools needed to ensure equity and community
- 5 needs are met.
- 6 Also, a high level of collaboration among Energy
- 7 Commission staff and the implementers will occur in
- 8 developing each incentive program concept. All incentive
- 9 programs developed will be presented in public workshops to
- 10 seek feedback from community and industry stakeholders and
- 11 will include input from Energy Commission staff to prevent
- 12 duplication and overlap. Next slide please.
- We are seeking your approval of these two
- 14 agreements, a. and b. in Item 7. Today's approval would
- 15 provide approximately \$1 million in start-up costs for each
- 16 agreement and delegate authority to the Executive Director
- 17 to approve future funding for each approved project or
- 18 phase of incentives developed by CALSTART and CSE, up to
- 19 \$250 million cap per agreement.
- We are also seeking adoption of the staff
- 21 findings that this action would have no significant impact
- 22 on the environment and is exempt from CEQA.
- Thank you for your consideration. Peter Colwell
- 24 with CSE and Alycia Gilde with CALSTART are online to
- 25 comment and are available to answer any questions, as am I.

- 1 Thank you.
- 2 CHAIR HOCHSCHILD: Thank you.
- 3 Let's turn now to public comment on Item 7.
- 4 MS. GALLARDO: This is Noemi Gallardo, the Public
- 5 Advisor. Reminder to attendees if you would like to make a
- 6 comment, please -- we're on Item 7 just to be clear --
- 7 please raise your hand using the raised-hand icon on Zoom.
- 8 If you are on by phone press *9 to raise your hand *6 to
- 9 unmute.
- I do see a hand raised, Alycia Gilde. A reminder
- 11 to please restate your name, spell it and indicate your
- 12 affiliation for the record. Your line is open, Alycia, and
- 13 you may begin.
- MS. GILDE: Wonderful. Thank you so much.
- 15 Alycia Gilde, Senior Director at CALSTART. Well good
- 16 morning, Commissioners and stakeholders vested in advancing
- 17 a clean energy and transportation future. On behalf of
- 18 CALSTART we are honored to be selected as an implementer
- 19 for the second block grant for light-duty electric vehicle
- 20 charger incentive projects.
- 21 We are looking forward to working with a
- 22 California Energy Commission and our project partners GRID
- 23 Alternatives, Tetra Tech and Veloz to implement community-
- 24 first incentive projects for electric charging that will
- 25 enable faster adoption of zero-emission vehicles in our

- 1 low-income and disadvantaged communities.
- 2 As we collaborate with the Energy Commission our
- 3 partners and stakeholders at large on the development and
- 4 implementation of these projects there are three critical
- 5 elements we aspire to achieve.
- 6 First, prioritizing transformative equity whereby
- 7 we place equity at the center driving effective strategy
- 8 with data and defined metrics, a focused engagement plan
- 9 and technical assistance to rapidly expand light-duty
- 10 electric vehicle adoption and consumer access.
- 11 Secondly, promoting rapid market acceleration by
- 12 delivering infrastructure through a flexible and scalable
- 13 framework that meet community needs, supports a pipeline of
- 14 new projects, and efficiently administer funds.
- And lastly, that we build upon success and align
- 16 infrastructure planning, partners, investments, and
- 17 programs to facilitate a holistic, cohesive and innovative
- 18 ecosystem for zero-emission transportation.
- 19 We are thrilled with the investments this state
- 20 has committed to advancing zero-emission vehicle adoption
- 21 and look forward to implementing projects that will drive
- 22 meaningful benefits to communities across the state. Thank
- 23 you so much.
- 24 CHAIR HOCHSCHILD: Thank you.
- MS. GALLARDO: All right, thank you.

- 1 Oh yes, so I do see another hand raised, this is
- 2 Peter Colwell. Peter, a reminder for you to restate your
- 3 name, spell it and indicate your affiliation if any. Your
- 4 line is open, and you may begin. And Peter, you may need
- 5 to unmute on your end.
- 6 MR. COLWELL: Hello, my name is Peter Colwell,
- 7 C-o-l- w-e-l-l. I'm with the CSE and we are very honored
- 8 and excited to be working on this second block grant. This
- 9 is a continuation of our CALeVIP program, and we believe
- 10 that this is going to help accelerate more charters in the
- 11 ground.
- We know that we still have work to do and are
- 13 looking forward to the continued growth of chargers
- 14 throughout California. Thank you.
- MS. GALLARDO: Thank you.
- 16 All right, Chair I do not see any other hands
- 17 raised, we can continue.
- 18 CHAIR HOCHSCHILD: Great. Let's turn to
- 19 Commissioner Monahan.
- 20 COMMISSIONER MONAHAN: Well thanks to Phil and to
- 21 the whole team at the Fuels and Transportation Division.
- 22 And Hannon Rasool have been very involved in this, Mark
- 23 Wenzel, Brian Fauble, Sharon Purewal.
- 24 And this, we're looking at this opportunity to
- 25 have two different implementers as a way to rapidly deploy

- 1 charging infrastructure and to do it in a way that's
- 2 attentive to equity. You know, we have a goal of having
- 3 250,000 chargers by 2025 with the funding from the
- 4 Legislature. We want to make sure that we can meet that
- 5 goal, and so we'll be investing strategically and using the
- 6 results of our SB 1000 equity analysis to make sure that
- 7 we're constantly titrating (phonetic) our investments to be
- 8 attentive to equity.
- 9 And I love the fact that this gives us more
- 10 flexibility. And it's important to note that this isn't --
- 11 we're not saying we are definitively going to use all that
- 12 funding, that is, but just it gives the Executive Director
- 13 the approval. We are saying, "Up to this amount," and the
- 14 Executive Director will decide how much money will be
- 15 deployed. And so this just gives us a chance to tailor our
- 16 investments to meet the state priorities and to and to
- 17 respond to the performance of each of the implementers. So
- 18 we are going to be working very closely with them to make
- 19 sure those swim lanes (phonetic) are clear.
- 20 And so I also wanted to say that I think of block
- 21 grants as a great way to rapidly deploy infrastructure.
- 22 We're still going to be having our own grant programs that
- 23 we manage, because we don't have all the answers. And
- 24 especially when it comes to multifamily dwellings, we
- 25 really don't have all the answers.

So, I look forward to working with CALSTART	and
---	-----

- 2 CSE, congratulate both of them. They've both done a great
- 3 job in applying for in their applications for these block
- 4 grants. And we need to move quickly to make sure that we
- 5 can show the Legislature and the Governor's Office that
- 6 we're using these funds strategically, smartly and swiftly.
- 7 CHAIR HOCHSCHILD: All right, well said.
- 8 Other? Yeah, Vice Chair Gunda.
- 9 VICE CHAIR GUNDA: Yeah, just a very quick thing.
- 10 Commissioner Monahan, first of all congratulations to you
- 11 and your leadership on -- I know when I saw the business
- 12 meeting and it said \$275 million for this grant I was like,
- 13 "Did I misread that?" Just kind of these eye-popping
- 14 numbers of investments that the State of California is
- 15 committed to, CEC is committed to, and I'm just thrilled to
- 16 see this much investment going in, but also leadership.
- 17 And the courage that it requires to push this amount of
- 18 money to make sure it's done right. So Phil and the entire
- 19 team, thank you for your thoughtful and careful work on all
- 20 these things.
- One point of ask as always, you know,
- 22 transportation electrification especially is going to be a
- 23 huge impact on the grid. And the way that electrification
- 24 happens on the transportation side, the time of charging
- 25 and potential discharging with meter G (phonetic) I just

- 1 want to put a plug in for gathering information through
- 2 these projects as much as we can that we could really
- 3 leverage. We don't have a lot of data yet on these. So
- 4 what I ask Phil, you and the team, to please work with our
- 5 office and more broadly with Commissioner McAllister and
- 6 other -- and Commissioner Douglas. We're all working on
- 7 different aspects of the grid-planning side, so we'd love
- 8 to have an opportunity to think through opportunities for
- 9 information gathering and bringing them into our analytical
- 10 planning products. Thank you.
- 11 CHAIR HOCHSCHILD: Thank you.
- 12 Any other comments from Commissioner Douglas?
- 13 Would you -- okay.
- I just want to say I really want to commend you,
- 15 Commissioner Monahan and Hannon Rasool and the whole team
- 16 who worked on this. I like very much how it's set up. And
- 17 I think it's important that we have some different
- 18 approaches here and can kind of compare and contrast. And
- 19 we are going to be watching this really, really closely.
- 20 The stakes are extremely high for the state for our climate
- 21 goals. We want this money to be well-deployed, well-
- 22 administered and to get out quickly. And so this is a
- 23 really absolutely key priority for us that this go well.
- 24 And so I want to just thank all the staff who worked on
- 25 this, the stakeholders involved, CALSTART and CSE. And

- 1 we're going to be doing everything we can to support the
- 2 success of this significant investment.
- 3 So unless here further comments or discussions
- 4 I'd invite Commission Monahan to move Item 7.
- 5 COMMISSIONER MONAHAN: I move Item 7.
- 6 CHAIR HOCHSCHILD: Vice Chair Gunda, would you be
- 7 willing to second?
- 8 VICE CHAIR GUNDA: It's a real occasion of me
- 9 seconding such a big amount, I absolutely will. Thank you.
- 10 CHAIR HOCHSCHILD: With that all in favor say
- 11 aye.
- 12 Commissioner Monahan?
- 13 COMMISSIONER MONAHAN: Aye.
- 14 CHAIR HOCHSCHILD: VICE CHAIR GUNDA?
- 15 VICE CHAIR GUNDA: Aye.
- 16 CHAIR HOCHSCHILD: Commissioner Douglas?
- 17 COMMISSIONER DOUGLAS: Aye.
- 18 CHAIR HOCHSCHILD: Commissioner McAllister?
- 19 COMMISSIONER MCALLISTER: Aye.
- 20 CHAIR HOCHSCHILD: And I vote age as well. That
- 21 item passes unanimously.
- Let's turn now to Item 8, CALSTART.
- MR. KOZUCH: All right. Good morning, Chair, and
- 24 Commissioners. My name is Matt Kozuch, staff with the
- 25 Fuels and Transportation Division's Freight & Transit Unit.

83

1	We are seeking approval today for an amendment to
2	an agreement with CALSTART, Inc. This current agreement,
3	approved at the March 2021 business meeting, covers a block
4	grant to design, implement, and fund, with CEC oversight,
5	various medium- and heavy-duty zero-emission vehicle
6	infrastructure incentive projects throughout California.
7	The proposed amendment today would augment the agreement's
8	spending authority by about \$226 million for a total grant
9	spending authority amount of nearly \$276 million, which
10	includes the \$50 million in authority previously approved
11	through the March 2021 business meeting. Next slide,
12	please.
13	The goal of this agreement is to develop and
14	implement medium- and heavy-duty zero-emission vehicle
15	infrastructure incentive projects to address critical
16	barriers and gaps to the deployment of this infrastructure
17	across California. This agreement is designed to speed up
18	the installation of medium- and heavy-duty zero-emission
19	vehicle infrastructure to provide more accessible electric
20	charging and hydrogen refueling options which are critical
21	for accommodating future medium- and heavy-duty zero-
22	emission fleets.
23	By 2030 it's projected by CARB's 2020 Mobile
24	Source Strategy that the state will require about 180,000

medium- and heavy-duty zero-emission vehicles to achieve

84

25

- 1 current state climate and air quality goals. Preliminary
- 2 modeling from the CEC's AB 2127 Report estimates to support
- 3 this projected future vehicle population, approximately
- 4 157,000 DC fast chargers will be needed by 2030, including
- 5 up to 16,000 higher capacity 350 kilowatt chargers. This
- 6 agreement will help the state reach this 2030 target to
- 7 support future zero-emission fleets.
- 8 Lastly, this agreement will provide targeted
- 9 emission reductions and health benefits to Californians,
- 10 especially within disadvantaged communities that typically
- 11 have much higher rates of diesel air pollution. Next
- 12 slide, please.
- 13 CALSTART will design and implement incentive
- 14 projects through this block grant, including targeted
- 15 strategies for transit bus, school bus, and drayage zero-
- 16 emission vehicle infrastructure. They will design
- 17 the internal controls, processes, and
- 18 procedures necessary to process block grant funding,
- 19 evaluate incentive requests, and produce accurate monthly
- 20 fiscal accounting and reporting. Furthermore, CALSTART
- 21 will create an inclusive equity strategy that utilizes
- 22 focused outreach to ensure maximum project benefit to
- 23 underserved communities. CALSTART will begin to release
- 24 incentive funding publicly in waves, beginning in the first
- 25 quarter of 2022. Next slide, please.

- 1 In summary we would like to recommend approval of
- 2 this proposed amendment to increase this agreement's
- 3 spending authority to a total of about \$276 million,
- 4 including the \$50 million approved at the March 2021
- 5 business meeting.
- In addition, we would like to recommend adoption
- 7 of staff's determination that this action is exempt from
- 8 CEQA. Currently, \$17 million in funding is available to
- 9 CALSTART through this block grant. Additional funding, up
- 10 to the nearly \$276 million spending authority total, will
- 11 require approval from the Executive Director of the CEC
- 12 through an amendment.
- 13 We would like to thank you for your time and
- 14 consideration of these items. Amy Gower with CALSTART is
- 15 here to provide public comment and we are both available
- 16 for any questions that you may have. Thank you very much.
- 17 CHAIR HOCHSCHILD: Thank you, Matthew, appreciate
- 18 it.
- 19 Let's go to public comment on Item 8.
- MS. GALLARDO: All right, this is Noemi Gallardo,
- 21 the Public Advisor. A reminder to attendees if you would
- 22 like to make a comment on Item Number 8, please raise your
- 23 hand using the icon, it looks like a high-five on the
- 24 screen. If you're on by phone please press *9 to raise
- 25 your hand, *6 to unmute.

1	I	do	see	а	hand	raised,	Amv	Gower.	Α	reminder	to

- 2 restate your name, spell it for the record and indicate
- 3 your affiliation, if any. Oh, I just lost her. Hold on.
- 4 So Amy I'm opening your line, please feel free to begin and
- 5 you may need to unmute on your end.
- 6 MS. GOWER: Good morning, everyone. Thank you so
- 7 much for this opportunity to provide public comment on
- 8 behalf of CALSTART. We are honored to be the implementer
- 9 of EnergIIZE Commercial Vehicles Project. My name is Amy
- 10 Gower and I'm leading EnergIIZE at CALSTART.
- 11 We are designing the first of its kind incentive
- 12 project for zero-emission commercial vehicle infrastructure
- 13 with equity at the center of driving meaningful impacts.
- 14 EnergIIZE is designed by the thoughtful feedback solicited
- 15 through stakeholder input. Through a series of focus
- 16 groups, we engaged more than 282 individuals across a
- 17 variety of groups, including fleets, technology providers,
- 18 government, and communities.
- 19 As Matt mentioned we will begin offering
- 20 incentives in the first quarter of 2022 and have tailored
- 21 incentives to support industry and frontline communities.
- 22 To help applicants navigate the complicated landscape of
- 23 infrastructure planning we are developing an infrastructure
- 24 readiness center that will provide technical assistance to
- 25 support project participation. We are developing an

- 1 effective and efficient application process to support the
- 2 scale of infrastructure incentives needed to build
- 3 California's zero-emission ecosystem. With the help of our
- 4 partners at Tetra Tech and GRID Alternatives we are
- 5 developing application documents that are as fair and
- 6 simple as possible.
- 7 We are grateful for CEC's fantastic partnership
- 8 on this project and look forward to more collaboration to
- 9 come. Thank you so much for this opportunity.
- MS. GALLARDO: Thank you.
- 11 All right, I do not see any other hands raised,
- 12 Chair. I think we can continue.
- 13 CHAIR HOCHSCHILD: Okay, thank you.
- 14 Let's turn to Commissioner Monahan.
- 15 COMMISSIONER MONAHAN: Well, I really liked Vice
- 16 Chair Gunda's description of these as eye-popping numbers,
- 17 they are a little eye-popping. I hadn't thought about that
- 18 before. And Matt thanks to you and Hannon and Elizabeth
- 19 and Michelle Vater and all the folks that have helped with
- 20 this, because I know there's just a lot of attention and
- 21 focus in the Fuels and Transportation Division to making
- 22 sure that these grant programs work.
- 23 And CALSTART congratulations to you for the
- 24 EnergIIZE program. I think it's the first in the world to
- 25 ever have a program to fund heavy-duty ZEV infrastructure

- 1 through state funds and so it's really groundbreaking. And
- 2 the Legislature is giving us very specific goals: 1,000
- 3 transit buses, 1,000 school buses, 150,000 drayage tracks.
- 4 And we need to make sure that our programs meet these
- 5 goals.
- 6 And I love the fact that CALSTART is also
- 7 managing the Air Resources Board program for vehicle
- 8 incentives, which is affectionately called HVIP. I would
- 9 say not to be competitive with the Air Resources Board, but
- 10 EnergIIZE Commercial Vehicles is a little better moniker.
- 11 But the fact that CALSTART is doing both gives me
- 12 confidence and faith that we can make this sort of a
- 13 seamless experience for the grantee.
- 14 And again, this is an up-to spending amount.
- 15 We're not saying we're definitively allocating that.
- 16 there's going to be performance metrics and we want to make
- 17 sure that this works for grantees and helps us meet our
- 18 state goals. But I'm just really excited about this and
- 19 excited to work with CALSTART to make this a success.
- 20 CHAIR HOCHSCHILD: Thank you, Commissioner. I
- 21 fully agree.
- One other point of I would just make is that we
- 23 do have a successful history of partnering with entities
- 24 like CALSTART and others and New Energy Nexus and many
- 25 others to administer big chunks of our funding when that

- 1 makes sense. But it really requires really robust
- 2 communication and when there's hurdles and challenges, just
- 3 having those channels of communication be open and problem-
- 4 solve in real time and not letting things get worse before
- 5 they addressed is essential. And particularly when we're
- 6 talking about chunks of money this size just the stakes are
- 7 very, very high.
- 8 And so I think not saying anything new here, but
- 9 just going forward we really depend on excellent
- 10 communication and problem-solving. And problems come up,
- 11 challenges come up, some things change and that's normal,
- 12 but it's the communication that really makes it successful.
- 13 So a few Commissioners wishing to make a comment. Let's
- 14 start with Commissioner McAllister.
- 15 COMMISSIONER MCALLISTER: Yes, just very briefly.
- 16 So totally agree with your comments, Chair. And I wanted
- 17 to just congratulate Commissioner Monahan for just this is
- 18 a series of grants, this is serious money here. And just
- 19 totally agree that it's so positive and it's going to move
- 20 the needle in a big, big way. And I agree with the Chair
- 21 about our various program implementation models, which this
- 22 is one and the previous item as well, all have roles in the
- 23 marketplace.
- 24 And I think working through these big contracts,
- 25 assuming that it was done very competently, which I totally

- 1 have faith that it will be, it can really seed this field
- 2 in ways that I think can be really, really positive. And
- 3 the idea that we go forward and sort of in tranches means
- 4 that we have a lot of influence over how that evolves, and
- 5 I think that's just a really good structure.
- 6 Of course, we have lots of different program
- 7 models, including administration of really important market
- 8 transformation programs with our staff directly at the
- 9 Commission. And I think that also has a really wonderful
- 10 place as well in this overall landscape.
- 11 And then yeah, I just wanted to express all
- 12 confidence in the Executive Director. I know that loading
- 13 this responsibility into the Executive Office is going to
- 14 make sure that we're paying full attention, obviously, with
- 15 all the Commissioner offices keeping tabs as well, so just
- 16 want to express real confidence in this structure for these
- 17 programs going forward.
- 18 And thanks again Commissioner Monahan, for all
- 19 your leadership and the Chair as well. You're making a big
- 20 difference in the state and nation.
- 21 CHAIR HOCHSCHILD: We are making a big
- 22 difference. And I just thank you for those comments about
- 23 the Executive Director Drew. You've been a very steady
- 24 hand at the wheel throughout all this and well said.
- I think Vice Chair Gunda, you were going to make

- 1 a comment?
- 2 VICE CHAIR GUNDA: Yeah, Chair. Again,
- 3 Commissioner McAllister and Monahan great comments. And I
- 4 think just wanted to add kind of a couple things. First of
- 5 all, congratulations to CALSTART again for this large
- 6 responsibility, on behalf of the State of California, and
- 7 Matthew to you and the entire team for helping pull this
- 8 together.
- 9 Couple of I think at a high level that -- Chair,
- 10 to you, I know you've really invested over the last couple
- 11 of years to help CEC become the vehicle for clean energy
- 12 investments for the state and do it in a responsible and a
- 13 transparent manner. And I think that includes the
- 14 Ombudsman in your office, Jennifer, being able to gather
- 15 information on these things and the overarching process
- 16 improvements that have occurred at CEC to help move this
- 17 kind of money forward in a responsible way. So I just want
- 18 to say thanks to you and again to Commissioner Monahan.
- 19 What an amazing opportunity, this is just incredible to
- 20 move the clean energy, clean transportation goals forward.
- 21 And as a part of that I just wanted to note what
- 22 an amazing opportunity for us all to live in a state that
- 23 kind of really puts this level of money into these kinds of
- 24 goals, stands steadfastly behind the climate imperative.
- 25 And then kind of moving forward these incredible goals and

- 1 processes and principles.
- 2 So I know I really like to hear the word
- 3 "equity," love to hear the word. That it's becoming a part
- 4 of our DNA more and more every day that we think about
- 5 this. I also want to compliment the FTD's work on thinking
- 6 through on our investments where they are going, but also
- 7 the impact of the investments. And then the study that FTD
- 8 is going to begin to look into the impact of the
- 9 investments in the disadvantaged communities.
- 10 So I think it's so many different routes that
- 11 have been put in over the last couple of years. And it's
- 12 really becoming an amazing forest that we could benefit
- 13 from, so congratulations across the board for everybody.
- 14 And Commissioner Monahan specifically for your leadership,
- 15 Hannon, the entire FTD team and Chair for just the overall
- 16 vision for CEC as a vehicle for moving the green climate
- 17 goals with the state.
- 18 CHAIR HOCHSCHILD: Thank you for those comments.
- 19 Commissioner Douglas, were you going to make a
- 20 comment?
- 21 COMMISSIONER DOUGLAS: No, I'm in strong support
- 22 of this. I think it is important to look for innovative
- 23 ways to deploy these kinds of programs. And especially as
- 24 we're called upon to accelerate our work in the clean
- 25 energy transition and move more funding out faster to meet

- 1 these needs out in California for key infrastructure, like
- 2 I'm in full support of this kind of approach.
- 3 CHAIR HOCHSCHILD: Great. Well, thank you.
- 4 Just a few final thoughts before I invite a
- 5 motion on this item. Commissioner Monahan is very modest
- 6 about her role in this but arriving at the Energy
- 7 Commission when she did was just this perfect storm of
- 8 opportunity, that we pushed and pushed for resources and
- 9 got them. And your good judgment, your persistence, your
- 10 20 years of experience in clean transportation has been
- 11 absolutely fundamental to the progress we're making here
- 12 today. This is historic as we wrap up three quarters of a
- 13 billion dollars of approvals here at the meeting this
- 14 morning.
- I just want to say when we do our job right in
- 16 this space it does good obviously in the transportation
- 17 sector. It unlocks and accelerates investment from OEMs
- 18 and new investment and new companies in the transportation
- 19 sector. But it also does much more. I think it actually
- 20 has spillover benefits to other sectors and helps people
- 21 see what is possible, because the transformation that's
- 22 happening right now in the transportation sector is so
- 23 enormous and exciting and so heavily shaped and inspired by
- 24 leadership in California, of which this is a part.
- 25 But Governor Newsom's executive order, a year

- 1 ago, GM I don't believe would have made the commitment to
- 2 go to 100 percent electric by 2035. Or all the other
- 3 incredible new investments and commitments we're seeing,
- 4 including from Ford and so forth. We are moving the
- 5 market.
- And we can do the same thing, for example, in
- 7 building decarb. We are working really hard on that.
- 8 We're pushing a big new proposal for funding in that space.
- 9 And I do think there are these wonderful spillover effects
- 10 from one field to another, and we talked about the gradual
- 11 subsidence of silos within our strategy, but that's also
- 12 just happening out in the marketplace. And I think it's a
- 13 really incredible statement we can make that we can go this
- 14 big and execute and see change. And then that's going to
- 15 inspire a lot of others, so this is a historic day, and
- 16 this is a historic item.
- I just want to thank Commissioner Monahan again
- 18 for the amazing leadership. Hannon, such professionalism
- 19 and passion and talent and your whole team, this is really
- 20 -- I want you guys to take pride in this. And more to
- 21 come, okay. This is a down payment, but we are just
- 22 getting started.
- 23 So with that I would welcome --
- 24 COMMISSIONER MONAHAN: I've got to say something
- 25 really fast, Chair.

1	СПУТР	HOCHSCHILD:	Voc	nloseo	Dloseo	770 ah
L	CUATK	TOCUSCUTTD:	ies,	prease.	riease,	yean.

- 2 COMMISSIONER MONAHAN: First, I feel deeply
- 3 uncomfortable with all the thank-yous. But second, I just
- 4 want to acknowledge you, Chair, for your vision, your
- 5 generosity and I would say your dogged unrelenting pursuit
- 6 of clean, affordable, reliable energy. And your
- 7 partnership has been just critical in accelerating progress
- 8 here in California.
- 9 And I want to say that this move to an electric
- 10 transportation future is unstoppable. It is global in
- 11 nature and the EU and China, and other countries are with
- 12 us, and now the manufacturers are too. And as you said,
- 13 our Governor really took a leadership role in terms of
- 14 saying, "Hey we're going to phase out all internal
- 15 combustion engines when it comes to transportation," and
- 16 the other countries took notice, and the automakers took
- 17 notice.
- 18 And the vehicle manufacturers are now making
- 19 those same, setting those same goals. So it's our job here
- 20 in California to demonstrate that we are, we will remain at
- 21 the cutting edge in that the leadership role, not just in
- 22 the United States but globally, on zero-emission
- 23 transportation. And building out a ZEV infrastructure
- 24 that, as Vice Chair Gunda says, is responsive to our grid
- 25 needs is going to be really critical in that.

1	CHAIR HOCHSCHILD: Yeah.
2	COMMISSIONER MONAHAN: And I want to reiterate
3	what you said about the Fuels and Transportation Division
4	and Hannon Rasool, in particular. His leadership has
5	really been instrumental in all of the progress that we've
6	made.
7	CHAIR HOCHSCHILD: Yeah, well said. Well, I just
8	Mahatma Gandhi's quote about change, particularly things
9	like this which even a few years ago nobody would have
10	anticipated this scale of change going on. But he said,
11	"First they ignore you, then they mock you, then they fight
12	you, and then you win." And I always keep that thought
13	with me when we were talking about big, important changes
14	in the right direction.
15	So with that I would welcome a motion from
16	Commissioner Monahan on Item 8.
17	COMMISSIONER MONAHAN: I move Item 8.
18	CHAIR HOCHSCHILD: Vice Chair Gunda, would you be
19	willing to second?
20	VICE CHAIR GUNDA: Second Item 8.
21	CHAIR HOCHSCHILD: All in favor say aye.
22	Commissioner Monahan?
23	COMMISSIONER MONAHAN: Aye.
24	CHAIR HOCHSCHILD: Vice Chair Gunda?
25	VICE CHAIR GUNDA: Aye.

CALIFORNIA REPORTING, LLC 229 Napa Street, Rodeo, California 94572 (510) 224-4476

1	CHAIR HOCHSCHILD: Commissioner McAllister?
2	COMMISSIONER MCALLISTER: Aye.
3	CHAIR HOCHSCHILD: Commissioner Douglas?
4	COMMISSIONER DOUGLAS: Aye.
5	CHAIR HOCHSCHILD: And I vote age as well. That
6	item passes unanimously. Congratulations to everyone.
7	Colleagues, with your permission, I have to get a
8	document done, so I would suggest we reconvene at 1:00 if
9	that's okay? And we'll finish up the agenda at that time.
10	COMMISSIONER DOUGLAS: Perfect.
11	CHAIR HOCHSCHILD: Great, thanks guys.
12	COMMISSIONER DOUGLAS: Thank you.
13	(Off the Record at 12:08 p.m.)
14	(On the Record at 1:01 p.m.)
15	CHAIR HOCHSCHILD: Okay, thank you, Noemi. I
16	think we are all back.
17	And with that let's get back to the agenda. We
18	were on Item 9, Approval of the Minutes. Any public
19	comment on that?
20	MS. GALLARDO: This Noemi Gallardo, the Public
21	Advisor. A reminder to attendees if you would like to make
22	a comment on Item Number 9, please use the raised-hand
23	feature on Zoom. If you are on by phone press *9 to raise

Chair, I do not see any hands raised. We can

your hand and *6 to unmute.

24

- 1 continue.
- 2 CHAIR HOCHSCHILD: Unless there's Commissioner
- 3 comments, Vice Chair Gunda, would you be willing to move
- 4 Item 9?
- 5 VICE CHAIR GUNDA: Yes, I move Item 9.
- 6 CHAIR HOCHSCHILD: Commissioner McCallister would
- 7 you mind seconding that?
- 8 COMMISSIONER MCALLISTER: Second.
- 9 CHAIR HOCHSCHILD: All in favor say aye.
- Vice Chair Gunda?
- 11 VICE CHAIR GUNDA: Aye.
- 12 CHAIR HOCHSCHILD: Commissioner McAllister?
- 13 COMMISSIONER MCALLISTER: Aye.
- 14 Commissioner Monahan?
- 15 COMMISSIONER MONAHAN: Aye.
- 16 CHAIR HOCHSCHILD: Commissioner Douglas?
- 17 COMMISSIONER DOUGLAS: Aye.
- 18 CHAIR HOCHSCHILD: And I vote age as well. That
- 19 item passes unanimously.
- Let's turn now to Item 10, Lead Commissioner and
- 21 Presiding Member Reports. Commissioner McAllister, why
- 22 don't you start us off.
- 23 COMMISSIONER MCALLISTER: Absolutely.
- Well, let's see, I think I mostly want to kind of
- 25 use this last meeting of the year to -- we're past

- 1 Thanksgiving -- to give some thanks. And obviously there's
- 2 lots going on. And just from this meeting and last month's
- 3 meeting just so many different themes in the hopper and so
- 4 much in my world and just across the Commission. I feel
- 5 like we are really firing on all cylinders.
- 6 And increasingly our projects are sort of not
- 7 just multi-disciplinary within divisions, but really multi-
- 8 divisional. And I really am just thankful for the
- 9 collaboration across all Commissioner offices for sure.
- 10 And then also just all this: all the staff offices, the
- 11 division heads, and we have an incredible crop of division
- 12 deputy directors, and just staff at all levels running each
- 13 project, each office. And just watching some of the newer
- 14 staff evolve into subject-matter experts it's just a really
- 15 amazing, just palpable sense of progress over the course of
- 16 this past year. And I want to just sort of say that and
- 17 express my gratitude to everybody.
- 18 I do have a bunch of names that I want to go
- 19 through, and I'll try to do it efficiently. But I feel
- 20 like we do give a lot of thanks along the way on individual
- 21 projects, even items at our business meetings as they come
- 22 before us. But this is kind of an opportunity to step back
- 23 and sort of take stock and think about the year past and
- 24 kind of get ready and start to think creatively about the
- 25 year to come. And not only how to accomplish our goals,

1 but also how to how to help our staffs thrive and h	how	₩e
---	-----	----

- 2 might tweak organizational issues and kind of just focus on
- 3 the human development aspect of it too, because that's
- 4 equally if not more important than the actual results that
- 5 we get as a Commission.
- 6 So I wanted to start out just at the at the
- 7 highest staff level, Drew -- just we'll hear his report
- 8 later -- but really, I'm thankful for his collaboration as
- 9 I mean we all are. And Linda Spiegel is great addition to
- 10 his team and Rob Cook and Melanie on his team just really
- 11 keeping all the trains running on time and troubleshooting
- 12 as needed is just really valuable.
- 13 And also, in the Executive Office I wanted to
- 14 call out Jason Harville and his competence and just his
- 15 whole kind of embracing of our data transformation. And
- 16 really his attitude as a service, as a server, as a
- 17 servant, I guess, of our greater Commission goals. I think
- 18 really enabling others to thrive and really building a
- 19 robust platform, he's just a real gem. And I wanted to
- 20 just make sure that Jason, your acknowledged there, because
- 21 it means a lot to the whole Commission. And it's going to
- 22 make a huge impact as we go forward in our next year.
- On the Small Offices, I know that I'm going to
- 24 repeat what other Commissioners want to say, but I can't
- 25 thank some of these folks. Noemi Gallardo, just your

- 1 competence in helping things run is fantastic and you're
- 2 bringing people into the Commission.
- In the Media Office Lindsay and Sandy and Elaine,
- 4 just invaluable in so many ways. And on the international
- 5 front I wanted to thank Alana, Alana Sanchez, and Anna of
- 6 course who are really helping us build those ties beyond
- 7 our borders in California.
- 8 And then the IEPR core team. As everybody knows
- 9 leading the IEPR together with most of you on different
- 10 topics, particularly Vice Chair Gunda. But the IEPR team,
- 11 Heather Raitt, Denise Costa, Stephanie Bailey and Raquel
- 12 Kravitz, that is just the dream team of getting the IEPR
- 13 done. It's a huge facilitative role and really helps. It
- 14 really makes things happen, because not all of us are
- 15 always on time with all of our deliverables and they make
- 16 it. They are pleasant about it, but they help us get
- 17 things done and that have to be done. And this year's IEPR
- 18 going to be a testament to all their effectiveness there.
- In the Chief Counsel's Office so many cross-
- 20 cutting projects and so it's a little hard to balance sort
- 21 of the functional divisions in the Commission and the
- 22 projects, so I'm trying not to call people out more than
- 23 once, but it might happen. In CCO on the Standards team
- 24 Linda Barrera is just valuable as Chief Counsel. I can't
- 25 just express how happy I am to have to be working with her

- 1 on many different topics. And her Deputy, Jimmy Qaqundah,
- 2 who is also just marvelous. And on specific topics Michael
- 3 Murza, Matt Chalmers, Josephine Crosby, Jacqueline Moore
- 4 and Christina Evola. That's not everybody that I've worked
- 5 with from my office, but some of the principles there.
- 6 On the EIR for the Standards Jared Babula and
- 7 Susan Cochran, Caryn Holmes, Ralph Lee, Nick Oliver,
- 8 Matthew Pinkerton and Lisa DeCarlo. And then on CalSHAPE,
- 9 Allan Ward has been really, really key on that as well as
- 10 Matthew Pinkerton.
- In STEP Division, those I've worked with most
- 12 closely and just really value are Gerry Bemis, Matt Layton,
- 13 Mark Hamlin and Lisa Worrall and Carol Watson. Thank you
- 14 to all of you.
- 15 And so moving on to sort of the core of what my
- 16 office does day to day is obviously the Efficiency
- 17 Division. I want to just thank Mike Sokol and Christine
- 18 Collopy for their leadership and Tajanee Ford-Whelan for
- 19 her support of them; amazing team there at the leadership
- 20 of the Division. Our immediate liaison is Amber Beck, and
- 21 she has really thrived in her new role and is just doing
- 22 wonderful work helping us connect a lot of different dots,
- 23 so thank you, Amber.
- 24 And then I'll go through each office just
- 25 quickly. We have had so many achievements this year. The

- 1 building standards, moving forward on various appliance
- 2 efficiency standards, and getting the flexible demand
- 3 appliance standard rulemaking moving forward, the load
- 4 management standards. The list is pretty long here, so I
- 5 just want to call out a bunch of folks in each of the
- 6 offices. Existing Building Office they worked on the 3232
- 7 Report, really seminal stuff; and the IEPR SB 350; load
- 8 management standards, all under Jen Nelson's leadership, so
- 9 thank you Jen. And with Heather Bird, Michael Kenney,
- 10 Eugene Lee, Dee Anne Ross, Gavin Situ, who worked on the
- 11 ACEEE scorecard. And we got first this year, so I'd have
- 12 to call him out, thank you Gavin, and Gabe Taylor.
- 13 The Appliances Office: Pierre duVair, Peter
- 14 Strait, both providing great leadership there, Soheila
- 15 Pasha, David Johnson, Sean Steffensen on various appliance
- 16 efficiency efforts. And energy efficiency and water
- 17 efficiency, obviously, which is really key going forward,
- 18 we were developing a great skillset in water.
- In Building Standards Office, next week actually
- 20 is the Building Standards Commission adoption of the entire
- 21 package of the 2022 Building Code. And we've obviously
- 22 adopted our part, we're one of the few non-building
- 23 standards commission agencies that have independent
- 24 adoption authority and so we've done that, thank you to my
- 25 colleagues and all the staff working on it. The Building

- 1 Standards Commission, we'll wrap that up and adopt the
- 2 whole package starting the conversation next week at their
- 3 hearings. But that work on our end has been done. We have
- 4 a huge team and I just want to read through this list: Mazi
- 5 Shirakh, Payam Bozorgchami, Danny Tam, RJ Wichert, Jeff
- 6 Miller, Peter Strait again, Adrian Ownby, Haile Bucaneg,
- 7 Javier Perez, Will Vicent, Michael Shewmaker,
- 8 Danuta Drozdowicz, Thao Chau, Meng Moua (phonetic), Simon
- 9 Lee, Alexis Markstrum, Ronald Balneg, Haider Alhabibi, Amie
- 10 Brousseau, Che Geiser, Chris Olvera, Bach Tsan and Muhammad
- 11 Saeed, those last two being new and really beginning to
- 12 thrive in the Commission; really happy about their presence
- 13 and work.
- 14 In the Standards Compliance Office Lorraine White
- 15 and Joe Loyer, Matthew Haro, Daniel Wong, Charles Opferman
- 16 and Ronnie Raxter, a great team there and lots of work
- 17 ahead on the 2022 code and getting ready for 2025.
- 18 The Efficiency Division data team, and this is
- 19 the Efficiency Division's kind of collaboration with Jason
- 20 and his team at the Executive Office. And I think this is
- 21 kind of a model of how a matrix kind of organization is
- 22 going to help us do a lot of really innovative analysis
- 23 with the AMI data and other information that we're going to
- 24 be getting in. That's Troy Dorai, Mitchell Prevost, Dennis
- 25 Yagen and Corrine Fishman; different touches on there from

- 1 IT as well.
- 2 On load management standards, and I think I've
- 3 bent everyone's ear about how transformational I think the
- 4 load management standards will be and that rulemaking will
- 5 be opening before the end of the year. And we're hoping to
- 6 get that done during the course of 2022. But really
- 7 amazing innovative work by Karen Herder, Gavin Situ, Morgan
- 8 Shepherd. David Cuffee in IT has been really key to build
- 9 the Midas tool that's going to enable that and Gabe Taylor
- 10 as well, so thanks to all of you.
- On the flexible demand appliance standards that's
- 12 Nick Struven, Todd Ferris, Peter Strait and Sean
- 13 Steffensen. That's a moving forward, it's a big lift and
- 14 it's something very new out of whole cloth. But I'm really
- 15 optimistic that we'll get that, a solid foundation during
- 16 2022 as well; lots of great work on that already.
- 17 Also, the housing and building decarbonization
- 18 working group that I've talked to you all about at some
- 19 point, Will Vicent and Javier Perez are really driving that
- 20 work. It's a multi-agency effort to coordinate across our
- 21 housing and energy programs that I think is beginning to
- 22 pay real benefits in terms of really having it both ways:
- 23 finding our cake and eating it too in terms of reaching our
- 24 climate goals and also facilitating housing funding
- 25 programs.

1	Ι'm	sure	Vice	Chair	Gunda	will	thank	all	these

- 2 people and more as well, but I cannot forget EAD. That
- 3 division is just really in some ways the heart and soul of
- 4 the Commission and will be really key and instrumental in
- 5 our analytical work as it deepens even further. On the
- 6 IEPR forecasting and on the AB 3232 work, Matt Coldwell and
- 7 Nick Janusch, Ingrid Neumann, Mike Jaske and Michael
- 8 Kenney. IEPR on natural gas, Melissa Jones and Jason Orta,
- 9 really great work there. On the flexible demand working
- 10 group or the -- sorry, supply side demand response working
- 11 group that's Tom Flynn, Erik Lyon, David Erne. So thanks
- 12 to all of you.
- 13 And I have to thank Grace Anderson for helping
- 14 out on all the Western states and the Western interconnect
- 15 coordination that we're doing as a Commission, and both
- 16 across the other states and across the energy agencies,
- 17 between the PUC and the CAISO. Grace is just a font of
- 18 knowledge and we're just so lucky to have her.
- 19 And on standards and EIR stuff I wouldn't want to
- 20 leave out Angela Tanghetti. She's done a lot of the
- 21 backend analysis for those deliverables.
- 22 And on the data regulations that have revolved
- 23 around EAD and have involved a variety of staff Ryan Eggers
- 24 and Amanda Poletti and Eddie Rosales who is the Efficiency
- 25 Division, but has been involved in the PACE aspect of that.

- 1 So those data regs are really foundational for our
- 2 analytical enablement going forward.
- 3 In the Renewables Division since the local
- 4 assistance and financing office moved over there they have
- 5 taken on a bunch of new activities and new programs.
- 6 Natalie Lee and her leadership has been really key, along
- 7 with the Armand Angulo, her deputy.
- 8 The Build Program, which is approximate to
- 9 rolling out, and I'm happy to be able to say that. And
- 10 Deana Carrillo has really led that with aplomb and
- 11 effectiveness, Larry Froess, Tiffany Mateo, Erica Chac and
- 12 Myoung-Ae Jones and Camille Remy Obod, so thanks to all of
- 13 you for putting in place what I think is going to be a
- 14 robust program.
- And then on CalSHAPE, which is the school-focused
- 16 program on energy and air quality and water Jonathan Fong
- 17 has largely led that, so thank you, along with Christopher
- 18 Meyer and Kourtney Vaccaro, Eli Harland as well from the
- 19 executive row -- from the Commissioner row.
- I'm happy to be working with you Chair Hochschild
- 21 on the Energy Research and Development Division. And
- 22 Laurie ten Hope, obviously we have to just keep thanking
- 23 her as much as possible. Jonah Steinbuck has taken over
- 24 and is really doing a great job. On the industrial side,
- 25 Virginia Lew, Kevin Uy, David Stout, Christian Fredericks

- 1 and Ilia Krupenich, so thanks for all of you. On
- 2 efficiency integration load flexibility, the CalFLEX hub
- 3 David Hungerford, just a real deep skill set and knowledge
- 4 base on demand response and everything related, so thank
- 5 you David. And on building efficiency Yu Hou has been a
- 6 really great ERDD member for that.
- 7 I'm wrapping up here getting close. On hydrogen
- 8 Mike Petouhoff, thanks Mike for helping for really driving
- 9 the hydrogen planning. On market facilitation, Erik Stokes
- 10 and Misa Werner have just been incredible on developing the
- 11 EPIC floor plan and getting that across the finish line.
- So, moving on to my office Gaylene Cooper you
- 13 have just stepped in and done everything amazingly well and
- 14 juggled a lot, more than just my office, but thank you so,
- 15 so much. And Laura Castaneda my long-term executive
- 16 assistant who is now a mother for the first time, and
- 17 congratulations to her. And the baby and mom are doing
- 18 well, and she'll be returning to us in the near future, but
- 19 just want to wish her all the best for the holidays.
- 20 Also want to thank Le-Quyen, Ken and Terra from
- 21 the Chair's Office. We just intersect so much, and our
- 22 staffs work so closely together, it's almost they're part
- 23 of -- really it's one team, and I want to just acknowledge
- 24 them for all their great work.
- 25 And in my office, I just have to -- I mean I've

- 1 got such a great team and really firing on all cylinders,
- 2 Bryan Early my chief of staff, and you all work with Fritz
- 3 Foo and Bill Pennington who are playing really great roles
- 4 and moving the various balls forward.
- 5 And then I want to thank really partners outside
- 6 of the Commission. Just really quickly in the Governor's
- 7 Office Alice Reynolds and Hazel Miranda have just been
- 8 really great partners. James Ralph in the DC office also
- 9 just really terrific to work with.
- 10 My partners in the PUC, senior staff, I won't
- 11 name them individually but just the senior staff across
- 12 Energy Division and other divisions as well as each
- 13 Commissioner in their particular topics, but certainly
- 14 Commissioners Rechtschaffen and Shiroma, Houck and
- 15 President Batjer and Commissioner Guzman Aceves. All five
- 16 of them we work with very closely on different topics, so I
- 17 really value their partnership and really their service
- 18 ethic. I mean all of them just have an amazing commitment
- 19 to California, as do all of you, so I want to just say
- 20 thanks across the board.
- 21 And let's see I want to acknowledge some CAISO
- 22 folks, but I think I'll defer to Vice Chair Gunda on that.
- 23 But really, I guess I'll just go to the top and appreciate
- 24 Elliot Mainzer, just the culture that he's creating at the
- 25 CAISO of collaboration with us as well.

1	All of our stakeholders on the building
2	standards, appliances, load management, building decarb
3	generally, we just have such a, I think, arguably the most
4	kind of broad-based, numerous, active, vocal set of
5	stakeholders for all these different topics. And it just
6	really goes to the importance and the foundational nature
7	of buildings and efficiency and demand side of
8	distribution-level resources that we're so excited about
9	across the state. So really, I'm thankful to have a lot of
10	different ears to bounce things off of and maybe shoulders
11	to cry on occasionally, but generally assistance getting
12	initiatives across the finish line.
13	And a few other agencies, the ARB, really
14	developing ever closer ties with the Air Resources Board or
15	various topics; the Department of Housing and Community
16	Development on the building code; Community Services and
17	Development on low-income, weatherization and potentially
18	new initiatives that we can partner on; the Business,
19	Consumer Affairs and Housing agents or Consumer Services
20	and Housing Agency, Secretary Castro Ramirez has been a
21	rally great ally there; and the Strategic Growth Council
22	that we partner with ever more closely; and CalHFA, that's
23	the Housing Finance Agency within the Housing Agency.
24	And then out there in the building sector,

CALIFORNIA REPORTING, LLC 229 Napa Street, Rodeo, California 94572 (510) 224-4476

CALSMACNA, just a great group of folks that help us get to

25

- 1 good answers; NRDC, collaborating on a number of many, many
- 2 fronts; the CBIA, all the builders who obviously have a big
- 3 stake in good decision-making at the Commission that
- 4 participate and contribute; many different original
- 5 equipment manufacturers; the California Energy Alliance;
- 6 (Indiscernible) our friends over at the utilities, South
- 7 Coast AQMD and Bay Area AQMD increasingly involved in our
- 8 issues around buildings and appliances, which is really
- 9 welcome.
- 10 Our IOU partners, generally I want to just thank
- 11 them at PG&E and Edison and SoCal Gas and SDG&E as well as
- 12 SMUD, LADWP, so they're really big partners that we hash
- 13 through some of these difficult issues with and that are
- 14 really always at the table to participate, so we appreciate
- 15 that.
- 16 And then I wanted to thank also the DACAG and
- 17 that's partly a thank-you for Noemi for managing the DACAG.
- 18 But I think having them as a resource makes us all better.
- 19 Makes us all more accountable certainly, but it really
- 20 makes our outcomes better. And that is a set of voices
- 21 that is just we're so thankful, we're so fortunate to have
- 22 contributing the time and energy and thoughtfulness and
- 23 passion to these issues, because we're just not going to
- 24 get it right unless we get to everyone in the state, unless
- 25 we enable participation by everyone in the state. And the

- 1 DACAG is helping us make our best effort to do that.
- 2 And then finally I just want to acknowledge some
- 3 international partners. I'm working very closely with
- 4 Mexico. In fact, tonight I'm going down to Mexico for a
- 5 couple of days to sign a new MOU with Jalisco. And going
- 6 to meet with some of the state and local and national
- 7 Mexican players to talk about things we might do going
- 8 forward, so that's really fantastic, really grateful for
- 9 that partnership. To Liliana Ferrer our consul here in
- 10 Sacramento, just a really beautiful person and doing great
- 11 work with us to grow our ties to Mexico.
- 12 And then our various efforts with Denmark as
- 13 well. I know Commissioner Douglas is driving much of that
- 14 on the building side and some of the other efficiency
- 15 efforts in that industry particularly that they're working
- 16 on.
- 17 And so, I think I'll stop there, it's kind of
- 18 exhaustive. Thanks for letting me go first, but there's so
- 19 much to be thankful for and this is an opportunity to call
- 20 out people and really get it on record. People deserve so
- 21 much more credit than we can give them in these little
- 22 opportunities that we have.
- 23 You know, a year has -- a difficult year actually
- 24 has gone by, and I think people have really shown their
- 25 mettle as they manage to get things done, sort of utility

- 1 players, manage to find a way. And we're so grateful as an
- 2 as an agency and as a state to have commitment from all of
- 3 the different staff and stakeholders. So, I will stop
- 4 there and pass the mic back to you Chair Hochschild. Thank
- 5 you very much.
- 6 CHAIR HOCHSCHILD: Thank you, Commissioner, for
- 7 that very gracious set of thank-yous.
- 8 So, let's turn next to Vice Chair Gunda.
- 9 VICE CHAIR GUNDA: Thank you, Chair. Thank you,
- 10 Commissioner McAllister for taking the time to individually
- 11 call out staff. It's not easy to just kind of like go
- 12 through every single name, but I always appreciated your
- 13 ability to just pause and kind of commend everybody so I'm
- 14 grateful.
- I am not going to be able to follow your lead.
- 16 I'm going to keep kind of things at a higher level. But
- 17 just kind of wanted to start off with just noting a couple
- 18 of personal things and I think that puts the gratitude in
- 19 context.
- 20 So, I mean I was obviously appointed to the
- 21 Commission this year, earlier this year in February. I
- 22 cannot believe it's been 11 months, just cannot believe it.
- 23 In some ways it's like I don't know how it happened and the
- 24 other ways it's like, "Oh my God, it feels like forever,"
- 25 so I just wanted to go from there --

l CHAIR HC	OCHSCHILD: You	didn't	have	а	single	gray	У
------------	----------------	--------	------	---	--------	------	---

- 2 hair before you started, Siva. (Laughter.)
- 3 VICE CHAIR GUNDA: Yes, and other aspects of my
- 4 physical stuff that's beginning to emerge. But I kind of
- 5 wanted to just say Chair, thank you. Thank you for helping
- 6 me get comfortable with the idea of being on the
- 7 Commission, for your support. Obviously, thanks to the
- 8 Administration, Governor Newsom, the Governor's Office,
- 9 specifically Ana Matosantos, Alice Reynolds that we work so
- 10 closely with on a number of issues. And I just want to say
- 11 my thanks there. And Kristi Stauffacher who helps with
- 12 their appointments, so just a real big thanks for both the
- 13 appointment and since then just with all the four
- 14 colleagues that I have. Thank you for being for being so
- 15 gracious and generous with me. I've become very
- 16 comfortable.
- 17 First, I tried to figure out how I should be
- 18 different in this role, but I feel like I just should be
- 19 myself and just be, which is -- you all have been mentors
- 20 to me when I was staff, and you continue to be my mentors
- 21 in a lot of different aspects. I draw a lot of strength
- 22 from your example, from your courage in fighting for the
- 23 climate fight, but also your courage in being able to
- 24 tackle big things. So I learn from each one of you every
- 25 day. It's really helpful to be on the dais with you and

- 1 doing this fight with you all is just easier and it also is
- 2 comforting to be in all of your company.
- I know both Commissioner Douglas -- I think she
- 4 turned off her video -- and Commissioner Monahan do not
- 5 like to be given thanks, so I'm going to make it extra
- 6 special for them. Thank you to both of you for all your
- 7 support this year. Commissioner Douglas, it's been amazing
- 8 working with you on reliability and resource planning, the
- 9 SB 100 implementation as a whole. Commissioner McAllister,
- 10 on the building decarb issues and forecasting.
- 11 Commissioner Monahan, you -- and I mentioned this in
- 12 previous business meetings -- you have been a regular
- 13 check-in on me, just making sure that I'm doing well and
- 14 offering your support on making sure I do a good job, but
- 15 also take care of myself. So just thank you so much for
- 16 being wonderful colleagues.
- 17 And Chair, thank you for being you. We need that
- 18 childlike passion, exuberance and compassion, which you all
- 19 have so thanks for bringing that to the Commission and
- 20 inspiring all of us to do a good job.
- 21 Kind of from there I just want to go in linear
- 22 fashion, which is my team. Miina Holloway the Executive
- 23 Assistant, Le-Quyen who came in as the interim Chief of
- 24 Staff, but also Liz Gill, Sudhakar Konala who are advisors,
- 25 and now Erik Lyon who has come in to support while Liz and

- 1 Sudhakar are out, and a student that I had, and John who is
- 2 a fellow with us, a (indiscernible) fellow, so just thank
- 3 you all.
- 4 Miina, I wouldn't know how I would get through
- 5 day to day without your kind of kindness being a good
- 6 anchor for me, checking in with me. Making sure that I
- 7 don't do anything outside of who I am, so thank you for
- 8 regularly keeping me anchored to what you think are good
- 9 parts of me.
- 10 So, and I kind of will go from there to just main
- 11 teams and say thank you on the main teams. As Commissioner
- 12 McAllister noted we had some incredible advances in some of
- 13 the work we do. Obviously, reliability has been the
- 14 centerpiece for my responsibility this year. And I know
- 15 there's so many staff that have worked on this across
- 16 multiple divisions: DRDD, STEP and obviously EAD. I just
- 17 want to say kudos to the team for keeping the lights on.
- 18 We got through 2021. I know 2022 is upon us and we'll kind
- 19 of do a good job, but that has been an 18-month marathon.
- This Thanksqiving was the first time I actually
- 21 took three days off and I turned off my cell phone in 18
- 22 months. And the only reason I know that is because that is
- 23 what many of our staff have done for 18 months. And it's
- 24 not it's not only a reflection of appreciation, but I'm
- 25 also really sorry that everybody has to work as hard as we

- 1 did to keep the lights on and move forward. So, to all
- 2 staff, you know who you are, thank you for bringing your
- 3 best and the brightest to the table every single day.
- A couple of high-level recognitions there.
- 5 Obviously Aleecia Gutierrez who leads the EAD Division as a
- 6 whole. Mike Sokol who has been an amazing partner on the
- 7 building decarb. Shawn Pittard from STEP who's been
- 8 incredible I mean, thank you for -- You know, Shawn, again
- 9 we are blessed with these generous people, but you have
- 10 that extra-special kindness that you bring to the table.
- 11 Thank you, Shawn, for doing that.
- 12 And ERDD, Laurie ten Hope. And the other couple
- 13 of people that have been instrumental in reliability from
- 14 our team is Justin Cochran who, I don't know who else works
- 15 as much as Justin does. He has a dark sense of humor. I
- 16 love that about you, because it brings problems to the
- 17 table to solve. But Justin thank you for such hard work on
- 18 so many fronts on the emergency.
- 19 And Linda Barrera we could not have gone through
- 20 our Emergency Proclamation this year without your office's
- 21 support. And thank you so much for helping the Emergency
- 22 Proc, but since then all the work we've done.
- 23 And I think there's an opportunity to just note
- 24 the interagency collaboration as Commissioner McAllister
- 25 did. We could not have gone through reliability success

- 1 without partners from DWR, CPUC, CARB and CAISO. So from
- 2 DWR just noting a couple of staff members, Ted Craddock and
- 3 his team, and Joel Ledesma who are both working on the
- 4 energy space of the reliability, for reliability purposes.
- 5 CPUC, all the Commissioners, thank you so much
- 6 for being such wonderful partners to us and be attending so
- 7 many of the IEPR workshops here, especially Commissioner
- 8 Rechtschaffen. And definitely get a pizza, (indiscernible)
- 9 coffee sometime (indiscernible) for all the meetings.
- But I also want to take an opportunity here to
- 11 thank Simon Baker, Pete Skala and finally Ed Randolph. And
- 12 just want to note that we have Ed Randolph retiring this
- 13 year as well as President Batjer at the end of this year.
- 14 Incredible people, a lot of wealth of knowledge.
- 15 To President Batjer for her incredible generosity
- 16 and leadership for the climate goals of California, thanks
- 17 to her and wishing her the best. And to Ed 10 years of
- 18 leading Energy Division is not a small issue, so thank you
- 19 for doing that. And it will be big shoes to fill,
- 20 hopefully we'll have a good team there. And on the top of
- 21 that CPUC is also going to lose Saul Gomez to CNRA, which
- 22 we benefit from, but CPUC is going to lose that with Saul,
- 23 you've been a part of all the work, reliability work, so
- 24 thank you so much for that work.
- On the CARB team Rajinder Sahota and the work on

- 1 the scoping plan and the intersection with the SB 100
- 2 implementation process.
- 3 And as well as CAISO Mark Rothleder, Neil Millar,
- 4 Anna McKenna, Delphine Hou and obviously Elliot Mainzer.
- 5 So I just want to thank the interagency collaboration and
- 6 without that we would not have been able to succeed this
- 7 year.
- 8 Outside of that just as a as a point of noting we
- 9 have leaned on developers this year. We have leaned on
- 10 IOUs, POUs, CCAs to find every megawatt we could, similar
- 11 to what we've done in 2020 including LADWP, SMUD, a number
- 12 of developers. I'm not going to name names, but just thank
- 13 you so much.
- I think it's important to note here we are in an
- 15 energy transition and some of the developers and some of
- 16 the works that we were leaning on our partners, not only
- 17 for reliability for the energy transition, I just want to
- 18 say thank you for your work during those times and thank
- 19 you for working with us to move towards a cleaner and
- 20 reliable future for the state of California.
- 21 And I will just second Commission McAllister and
- 22 all the names that he mentioned internally, but I do want
- 23 to note maybe five or six names from EAD specifically. On
- 24 the main core areas that EAD has worked on this year
- 25 obviously include the forecasting improvements, building

- 1 decarbonization work, demand scenarios like supply-side
- 2 resource planning as well as reliability and progress on
- 3 the overarching data work.
- 4 So there's a couple of interagency reports that
- 5 we wrote this year, so I just want to say on the midterm
- 6 reliability and the DER work just Tom Flynn, Erik Lyon,
- 7 Hilary Poore thank you so much for all your work on that as
- 8 well as Mark Kootstra -- sorry, I'm losing my names here --
- 9 Chris McLean, Angela Tanghetti, Lana Wong, Rachel
- 10 MacDonald, Hannah Craig, thank you for all the work you've
- 11 done in the resource planning and the broader reliability
- 12 pieces. Obviously western states, Grace Anderson and Chris
- 13 again; the data regs Ryan Eggers, Amanda Poletti.
- 14 And forecasting team, it's been a very hard year
- 15 for the forecasting team both in terms of resource
- 16 constraints this year, but also just a lot of asks from
- 17 them to include climate impacts very quickly and then some
- 18 of the timely things that we're dealing with. So Matt
- 19 Coldwell, Heidi, Nick Fugate and Lynn Marshall thank you so
- 20 much for all your work on all fronts.
- 21 Building decarb Mike Jaske, Aida Escala, Nick
- 22 Janusch and Ingrid Neumann. And under reliability again,
- 23 just want to say, David Erne, Al Alvarado (phonetic),
- 24 people who have worked on this issue, so we continue to
- 25 bring these pieces together.

1 On	gas	evolution	and	transitional	issues	as

- 2 Commissioner McAllister already pointed out Melissa Jones
- 3 thank you for your leadership on that aspect along with
- 4 Katie elder as well as the (Indiscernible.) team, including
- 5 Jennifer Campagna, Jason Orta, all the people that are
- 6 working behind the scenes.
- 7 There's so many other pieces that I wanted to add
- 8 just at a high level: Noemi thank you for being a wonderful
- 9 colleague and a mentor to me. I want to be vulnerable.
- 10 I'm an immigrant, a person of color; there's plenty for me
- 11 to learn on diversity and equity. Thank you for helping me
- 12 learn, I thank you for making that a part of our DNA and
- 13 thank you for bringing those aspects to the table every
- 14 day. I look to you for guidance, I look to you for
- 15 leadership and heart in those issues and looking forward to
- 16 working with your next year's IEPR. And on just all the
- 17 Small Offices Jason was mentioned for data.
- 18 On closing, DACAG, I think I just have to stop
- 19 for a minute and thank DACAG. Because they took the time
- 20 to meet with me one-on-one many times this year and helped
- 21 me understand some of the topics, so to all the DACAG
- 22 members thank you so much for your time in helping educate
- 23 me and do a good job in this role.
- 24 And all the stakeholders, without you we wouldn't
- 25 do our job so thank you for taking the time. Obviously, we

- 1 don't have intervener compensation like PUC, and CARB does
- 2 a lot of different issues. You are here on your own time
- 3 and dime to help move the public conversation and without
- 4 you we can't do a good job, to all the stakeholders. And
- 5 for both pushing us forward but questioning the decisions
- 6 we make. Thank you so much for all your support on that.
- 7 And in the Executive Office, Drew, my friend and
- 8 colleague. It's funny we both call each other bosses now,
- 9 it's a really confusing discussion. But I always look to
- 10 you, Drew, as kind of an anchor for me in kind of keeping
- 11 my moral compass straight, so thank you so much for your
- 12 support.
- And you know, the media and comm teams and lead
- 14 teams thanks for your help with reliability, my
- 15 confirmation process, all of it. Thank you. Thank you
- 16 everybody, Lindsay and Anna and your entire teams.
- 17 So now that would be my executive summary. I
- 18 would like to stop there. (Laughter.) I have another 32
- 19 pages of recording to be done.
- 20 CHAIR HOCHSCHILD: Just like the IEPR, yes.
- 21 VICE CHAIR GUNDA: Yes, like the IEPR. So I'll
- 22 stop there, but in closing again I wanted to just share a
- 23 couple of personal thoughts. The last two years has been
- 24 incredibly difficult for a number of our staff. It has
- 25 been a reckoning for the country from justice. From the

- 1 point of view of the impacts of climate, the differences we
- 2 have on things I would assume we should all agree on like
- 3 climate and COVID. We begin to see the differences more
- 4 often than the similarities that bind us, and it has been a
- 5 pressure cooker in the country and sometimes in the state.
- 6 But I feel safe in this community in CEC and this family of
- 7 people.
- 8 We bring in our differences, but there is so much
- 9 common thread that binds us. There is kindness, there is
- 10 commitment to climate, there is commitment to equity, there
- 11 is a continuous desire to foster a good culture to move us
- 12 all forward. And for that I'm thankful to every leader
- 13 that's visible on the dais, every leader that is not
- 14 visible and behind the curtains that continue to foster
- 15 that culture here. So I just want to say thank you to each
- 16 one of you for moving us all forward and yeah, for another
- 17 year moving forward.
- I hope you all have wonderful holidays this
- 19 season and get to spend some time with family, but also
- 20 thank you for your hearts that you bring to the table.
- 21 Thanks.
- 22 CHAIR HOCHSCHILD: Thank you for those beautiful
- 23 and heartfelt comments and for all the heart you have
- 24 brought to the work, Vice Chair Gunda. I just couldn't be
- 25 more grateful. I know I speak for all of us when I say

- 1 that, just what a wonderful, wonderful addition in this new
- 2 role you've been and will be.
- 3 So, with that let's turn to Commissioner Douglas.
- 4 COMMISSIONER DOUGLAS: Great, thank you Chair
- 5 Hochschild, and thank you to my colleagues who've spoken
- 6 already. And I sincerely support and second all of your
- 7 comments and thanks.
- 8 So last December I, and we all recognized the
- 9 Energy Commission staff, for their ability to quickly
- 10 adjust to work from home in response to the pandemic. And
- 11 to keep their focus on the job and help us get the job done
- 12 and be as productive and more productive as we have really
- 13 been, even with all the change and everything going on.
- 14 And I want to just build off of that and thank all of the
- 15 Energy Commission staff again for their resiliency and
- 16 commitment to public service and our mission as these
- 17 challenges continue.
- 18 And I'm just going to go through some divisions.
- 19 I'll be a little higher level, but I wanted to recognize
- 20 some of the really significant achievements with a number
- 21 of the divisions that I've worked very closely with.
- 22 And so, in terms of the Renewable Energy Division
- 23 some of their achievements this year include helping get
- 24 the Lithium Valley Commission up off the ground and
- 25 providing them with really invaluable administrative and

- 1 substantive support. Chief Counsel's Office was very
- 2 engaged in that as well, of course. Getting the CalSHAPE
- 3 guidelines and program off the ground and into
- 4 implementation. Obtaining Energy Commission and OAL
- 5 approval of updates to the RPS enforcement regulations.
- 6 And initiating the pre-rulemaking process for updates that
- 7 are coming to the Power Source Disclosure Program among
- 8 many other things.
- 9 And the Renewable Energy Division is where a lot
- 10 of either new programs or programs transferred from other
- 11 parts of the Commission have come from. They've really not
- 12 only had to step up and adjust to increasing workload in
- 13 their core programs, but they've absorbed a number of
- 14 additional work and initiatives and done so very well, and
- 15 with a tremendous commitment to keeping things on time and
- 16 keeping the work at a high level of quality.
- 17 In terms of the STEP Division citing,
- 18 transmission, environmental protection, we've really seen
- 19 the STEP Division have to rise to the occasion in this past
- 20 year. They've played a major role in our reliability-
- 21 related efforts including the summer reliability challenges
- 22 and needs, improving our situational awareness during
- 23 critical summer moments. And being available on call and
- 24 outside of work hours to deal with events and eventualities
- 25 that that would arise sometimes at inconvenient times, and

- 1 just letting us know about them in real time. Leading
- 2 efforts to identify opportunities from existing resources
- 3 to supply critical megawatts at net peak times.
- 4 Contributing to many of our critical reports and analyses,
- 5 including the SB 100 report, 60-day report and the 2021
- 6 draft IEPR. And moving very expeditiously to respond to
- 7 the Governor's Emergency Proclamation, including their
- 8 close coordination with Department of Water resources on
- 9 the State Power Augmentation project. And establishing an
- 10 expedited review for battery energy storage systems and for
- 11 amendments and alterations that help address these critical
- 12 summer needs.
- 13 The STEP Division has also had a major role to
- 14 play in the launch of really important planning
- 15 initiatives, including the SB 100 Resource Build process in
- 16 partnership with the Energy Assessments Division, the CPUC
- 17 and the CAISO. Helping lead three public workshops and
- 18 delivering a starting point scenario for the CAISO's 20-
- 19 year transmission outlook and providing critical support to
- 20 California's approach to offshore wind energy, including
- 21 coordination with multiple key state agencies and the
- 22 Federal Government. And implementation of key parts of the
- 23 2021 and 2022 State Budget. It's been a major initiative
- 24 and a lot of work and effort.
- They've also supported the Lithium Valley effort

- 1 when it comes to permitting and having some really key and
- 2 important conversations with Imperial County about how to
- 3 coordinate very, very closely between the Energy Commission
- 4 and the County.
- 5 Chief Counsel's Office I, as the Attorney
- 6 Commissioner, I work especially closely with Chief
- 7 Counsel's Office. I appreciate the challenges and the
- 8 critical nature of the role that they play. The Chief
- 9 Counsel's Office has provided really important and
- 10 appreciated legal advice and counsel. They do that on all
- 11 facets of our work, both for Commissioners and
- 12 Commissioners Offices and for the Executive Director and
- 13 staff for proceedings and events, large and small, every
- 14 single day here at the Commission. It's an incredibly
- 15 critical support role that they play. And the scope of
- 16 work ranges from contracts, grants, loans, adoption and
- 17 implementation of regulations, litigation, presiding over
- 18 citing matters, and more.
- 19 Some highlights that I wanted to call out include
- 20 their strong support and hard work in the RPS enforcement
- 21 rulemaking. Their work in supporting us in a revise and
- 22 legal analysis on some of the substantive, and policy and
- 23 legal issues that we had to look at coming out of that.
- 24 Providing support for Small Power Plant Exemption
- 25 proceedings for both staff and the Committees. And helping

- 1 with and playing a key role in both helping formulate and
- 2 implement the Governor's Emergency Proclamation. And
- 3 supporting the DACAG and Lithium Valley Commission. I
- 4 can't help them enough; it's really, really important.
- I also wanted to call out the work of the
- 6 Secretariat and the Dockets Unit. There have been multiple
- 7 times when they've stayed late to allow us to docket
- 8 something where it was just important, there was a deadline
- 9 or there was a key reason to get something docketed. And
- 10 they've been able to accommodate that.
- I wanted to call out the work of the Office of
- 12 Audits, Investigation and Program Review led by our Chief
- 13 Auditor Lisa Negri for her really important work and her
- 14 team of ensuring that we're good stewards of public funds.
- 15 And particularly looking at both our internal work, but
- 16 also our grant programs. There was a time when we had a
- 17 backlog of audit findings, and we had a need to just get a
- 18 process in place for smoothing that out and responding
- 19 timely and resolving issues timely. And she's really
- 20 stepped up working with the Audit Committee and with staff
- 21 to make that happen, so much appreciation for her as well
- 22 as to our Grant Ombudsman Jennifer Martin-Gallardo.
- 23 And the Public Advisor, who due in part to some
- 24 of her great work this year, is now heading an office that
- 25 we have renamed and given a broader portfolio to. So now

1	it's	the	Office	of	the	Public	Advisor,	Energy,	Equity	and
---	------	-----	--------	----	-----	--------	----------	---------	--------	-----

- 2 Tribal Affairs, PAO+. And her incredible work, support,
- 3 sensitivity and just knowledge of how to do and how to
- 4 support outreach and engagement, her commitment to ensuring
- 5 that the Energy Commission be a government body that is
- 6 accessible to the public and wherever they come from and
- 7 from whatever point of view, but that the public feel that
- 8 they can come here and engage in our processes is
- 9 critically important. She supported our rollout to remote
- 10 processes and helped us think through how to make remote
- 11 workshops and hearings work. And tirelessly supporting
- 12 each division and taking on new initiatives, including a
- 13 refresh of our internal and external equity and diversity
- 14 efforts.
- I want to call out our tribal team: Tom Gates,
- 16 also Katrina our new Tribal Liaison, just really appreciate
- 17 their work and their achievements this last year.
- 18 On ERDD I think the Chair will talk more about
- 19 ERRD, but I just wanted to mention they made major
- 20 contributions in the initiative to pull together the Energy
- 21 Trailer Bill and just really do some big thinking about how
- 22 California can invest now, even more in our energy future.
- 23 Administrative Services Division, similarly, just
- 24 tremendous workload this year with the move to a new
- 25 building, with all of the budget and other work.

- 1 IEPR team, of course, and I think Andrew already
- 2 spoke to that. But I had the opportunity to go to many
- 3 workshops and, as always, they were very well done.
- 4 And I wanted to personally thank the Executive
- 5 Office and executive leadership Drew and Linda and the
- 6 entire executive leadership team for your hard work and
- 7 commitment to our mission and to our staff, and the IT
- 8 team.
- 9 And now last, I'll go to my office, Ollie
- 10 Awolowo, my Advisors Kourtney and Eli, John Hilliard the
- 11 Technical Advisor to Commissioners for citing matters, and
- 12 Mark Ennis (phonetic) and our offshore wind Fellow.
- So last of all but not least in any way I thank
- 14 you, my colleagues. And I'm very proud of the work we've
- 15 done together, and I really appreciate and enjoy the
- 16 collaboration that we have with each other and with the
- 17 many agencies that we work with a number of you have
- 18 already called out. And I just really appreciate and enjoy
- 19 being part of this much greater effort and for the greater
- 20 good of California and the state and national and even
- 21 international leadership that we're able to show, so thank
- 22 you.
- 23 CHAIR HOCHSCHILD: Thank you so much,
- 24 Commissioner.
- 25 Let's turn now to Commissioner Monahan.

1	COMMISSIONER MONAHAN: Well, I wanted to start by
2	acknowledging two people who are retiring from in the Fuels
3	and Transportation Division. There are two big sets of
4	shoes to fill.
5	I'm going to start with John Butler. I don't
6	know if you guys know that John is retiring, this is his
7	last year at the Energy Commission. And John has just
8	been a rock for the Fuels and Transportation Division and
9	for the CEC more broadly. I mean, John keeps the trains
10	running on time and he's ably stewarded the many grants
11	handled by the Fuels and Transportation Division.
12	As Hannon came on as new Deputy Director of the
13	Fuels and Transportation Division, John was really seminal
14	in helping him be able to adjust to his new job and not
15	have to worry about grants management. With no drama and
16	an abundance of competence and a sly sense of humor John
17	has really been an exemplary public servant. As the budget
18	of the Clean Transportation program expanded eightfold in
19	one year, John was and has been really indispensable in
20	setting up good processes to manage that money. So, let's
21	just all wish John all the best as he transitions to
22	retirement, thank you for this. A little clap for John.
23	CHAIR HOCHSCHILD: How many years has it been for
24	John?

25 COMMISSIONER MONAHAN: I don't know. Drew would

132

- 1 know more than me because he's been at CEC Fuels and
- 2 Transportation Division, I think it's just been like a
- 3 decade. So maybe Drew in his remarks can give more of a
- 4 longer history of John's contributions to the Agency.
- 5 So, the next one I want to acknowledge Jean
- 6 Baronas. I don't know if you guys intersect with her on
- 7 the hydrogen side, but she's been the hydrogen leader
- 8 forever and a day, as long as I can tell. So, Jean really
- 9 has a no-nonsense approach to building out hydrogen
- 10 infrastructure. She's really data-oriented and
- 11 standardization-oriented. Don't get her started on
- 12 standards, because she will talk your ear off. When I
- 13 first started at the Energy Commission I really leaned
- 14 heavily on Jean, her expertise and her years of experience.
- 15 And she was willing to just like educate me, so I will
- 16 always be thankful to her for helping integrate me into the
- 17 world of hydrogen and the CEC.
- 18 So, she's retiring from the CEC but not from
- 19 work. She's going to be using her standards-based approach
- 20 to embark on a new project involving teaching and research.
- 21 She's building software systems to modularize learning and
- 22 support people who are underserved in schools. So it's a
- 23 loss to us, but we wish her well. And she's really trained
- 24 up her team to step in.
- So, with that I want to just reiterate some of

- 1 the messages I've heard from other Commissioners. Just
- 2 this recognition that this has been a time of enormous
- 3 change at the Energy Commission, to go from being in the
- 4 office every day, working on paper. When I first started
- 5 at the Energy Commission, "I was like we work on paper?" to
- 6 this point where we are able to work with perhaps even
- 7 greater efficiency from home.
- I think the greater efficiency, though, as Vice
- 9 Chair Gunda and others have referenced comes with a cost
- 10 where there's no private time anymore. And you work on the
- 11 weekends, and you work on nights and you -- and so trying
- 12 to figure out a way to balance the urgency of the work we
- 13 do with the need to tend to our families and make sure that
- 14 we are all coming, bringing our A-game to work and not
- 15 bringing our tired over-stressed. I continue to feel like
- 16 if we don't have time for exercise and family then we're
- 17 not going to perform well in the workplace. And we need to
- 18 carve out time, because that actually helps us be better
- 19 and be kinder to others.
- 20 So, I want to start with some thank-yous. I'm
- 21 going to stay somewhat high-level, so I'm sure I'm going to
- 22 forget many people. But I want to start with Drew who
- 23 just is amazing as a resource, I think, for all of us.
- 24 Drew's advice is always so grounded in his strategic
- 25 thinking, and I just really count on Drew to give me good

1	insights	and	to	help	me	make	aood	decisions	based	on	aood

- 2 information. So just really appreciate his competence and
- 3 his sense of humor, which is always enjoyable.
- 4 On the government affairs side it's really been
- 5 great to have Anna on our team and she's been really
- 6 helpful with AB, with well what we thought was going to be
- 7 AB 8 reauthorization last year, but it just turned out to
- 8 be \$1.165 billion of General Fund monies to help us with
- 9 clean transportation programs. So, Anna has just been
- 10 amazing.
- And Alana, it took so long to get this MOU with
- 12 the City of Zhangjiakou in China pulled together. And
- 13 Alana was there all the way, for years getting this to the
- 14 finish line, so thanks Alana.
- We've already heard -- I mean the IEPR team
- 16 rockstars, Heather, all, I really appreciate all you've
- 17 done to make these IEPR workshops so seamless and to get
- 18 things done on time, so really appreciate the whole team.
- 19 The PAO+, which I'm glad Noemi came up with that
- 20 moniker because it's easier to remember, just Noemi you
- 21 have been an amazing partner. And as we try to think
- 22 through what benefits mean in transportation and having
- 23 that integrate with what's happening, the project that
- 24 you're managing on the CEC-wide level I think has just been
- 25 so critical. And you are a joy to work with, so thank you.

1 I	also	want	to	thank	Dorothy	who	I	intersect	with

- 2 a fair amount in PAO+ and she's also been really wonderful
- 3 to work with.
- From the CCO's side, Linda, you're a rockstar.
- 5 We really appreciate having you as the leader of CCO. But
- 6 the team has been great, Allan Ward, Renee who helps me on
- 7 so many levels. I have come to deeply appreciate the work
- $8\,$ of CCO as someone who is not an attorney and tends to be a
- 9 little sanguine about things. CCO keeps me on track, so
- 10 please keep making me stay in line, I want to make sure
- 11 that I'm doing everything by the book, and CCO really helps
- 12 me to do that.
- 13 And the media and communication side, Lindsay
- 14 you're amazing. And all the different things that you do
- 15 to make sure that we can communicate effectively with the
- 16 public and especially for me on the clean transportation
- 17 side has just been wonderful. And Tom, who is a new
- 18 addition, newish, he's just an amazing person to work with
- 19 and I feel very lucky that he's helping navigate the
- 20 transportation world.
- 21 So, let's see I'll do FTD last, just quick shout-
- 22 out at ERDD. So, of course, Laurie and Jonah are amazing
- 23 stewards. And we are going to miss Laurie. That's a whole
- 24 separate crying that we must do, and I'm sure the Chair is
- 25 going to bring tears to our eyes about Laurie. And we

- 1 welcome Jonah.
- I want to call out Ben Wender who has been an
- 3 amazing thought leader on the side of how do we do R&D that
- 4 intersects well with clean transportation. So Ben thank
- 5 you for being such a great thought partner, really look
- 6 forward to working with you next year.
- 7 And EAD I wanted to call out well Aleecia is
- 8 great, we welcome you to your new role. And the team of
- 9 folks at EAD that have been working on transportation
- 10 there's been just so much evolution in EAD. And Vice Chair
- 11 Gunda, I think you were part of that transition.
- But I really want to call out Heidi Javanbakht --
- 13 sorry for butchering your last name -- who was instrumental
- 14 in the launch of the ZEV data portal. And she's just been
- 15 really good, kind of like a thought leader in general on
- 16 this intersection of transportation and electric vehicles.
- 17 And she helped launch the ZEV dashboard, but it's a team of
- 18 folks. Jesse who I know -- Jesse Gage who works like crazy
- 19 to process data and he loves EV data; Matt Coldwell, Liz
- 20 Pham, Lindsay has been part of that. So this took an
- 21 integration with IT as well and communication, so there's a
- 22 lot of cooks in that ZEV dashboard kitchen.
- 23 And on the forecast thanks to Matt, Clinton,
- 24 Jesse, Aniss, and Robert who have all been really, really
- 25 instrumental in helping I would just kind of say refresh

- 1 the transportation analysis. And they've all been really
- 2 open to this idea that we're in a state of intense learning
- 3 and we need to continue to learn and adjust as we go.
- 4 Okay, I've got to thank the IT team, because I
- 5 call on them all the time and Giana Villegas and Raj Singh
- 6 have really helped me, but others have as well, so just
- 7 thanks to IT. You guys come through all the time. I'm
- 8 desperate I'm like, "I'm in a meeting. I can't get my
- 9 Internet to work," and they immediately help me, so thank
- 10 you for all that.
- 11 All right so in the Fuels and Transportation
- 12 Division, of course, we've got to start with Hannon. I've
- 13 been calling him my unicorn, which I hope doesn't make him
- 14 develop a pointy head. But he works so hard, weekends,
- 15 nights. He's one actually, Hannon, you should take some
- 16 time off and maybe not work so many nights and weekends.
- 17 But Hannon has just been just a breath of fresh air and
- 18 just really such a dedicated, hard-working, visionary,
- 19 thoughtful, kind, competent manager and partner in all of
- 20 the work that we do. So, as we have been turning under
- 21 every rock to help build the case that we need in smart
- 22 strategic investments and zero-emission vehicle
- 23 infrastructure Hannon has just been an amazing thought
- 24 partner in that whole process. And I just deeply
- 25 appreciate all he brings, also including a sense of humor.

- 1 You'll hear that as a constant theme of mine, deeply
- 2 appreciate a sense of humor: humor, humility and
- 3 competence, that's the winning combination that that just
- 4 bring success, I think.
- So, there's been a number of big projects in the
- 6 Fuels and Transportation Division over the last year. So,
- 7 we had the first AB 2127 report and looking at what are our
- 8 charger needs for 2030 and that team Kiel Pratt, Matt
- 9 Alexander, Wendell Krell, Jeffrey Lu, Raja Ramesh, Noel
- 10 Crisostomo -- who has actually recently left and gone to
- 11 DOE -- just a really amazing effort. And those guys are
- 12 constantly working to improve our analysis and make sure
- 13 that we are making smart decisions based on good data.
- So, on a nerdy side we've been trying to look at
- 15 the integration of standards -- ISO 15118 o be especially
- 16 nerdy -- into our investments in charging infrastructure.
- 17 And there's been a lot of work on that engagement with
- 18 stakeholders. And just I want to appreciate Hannon,
- 19 Jeffrey and Noel for engaging the stakeholder community
- 20 over standardization. We haven't made any decisions, but
- 21 it's been a really robust process.
- The SB 1000 report, which is on equity led by
- 23 Tiffany. And she just is amazing and keeps looking at,
- 24 trying to find different ways to evaluate equity which I
- 25 really appreciate.

1	Ωn	the	Investment	Plan.	as	VO11	anvs	know.	. the
1	O11	CIIC	TILVESCHIETIC	rran,	as	y O u	yuys	VIIOM I	, CIIC

- 2 biggest-ever investment plan and it took a big, heavy lift
- 3 to get that to the finish line. Patrick Brecht, Tammy
- 4 Haas, Charles Smith and Michael Comiter have all been
- 5 really instrumental in that.
- 6 EnergIIZE, which we just heard about, it's the
- 7 first in the nation. I also want to emphasize the 4D
- 8 blueprints that took a lot of work to manage on the heavy-
- 9 duty side and on the light-duty side.
- 10 There was also, as I mentioned, the hydrogen team
- 11 has done a crack job, the joint AB 8 Report I think it's
- 12 the best yet. You guys will be seeing it soon. And for the
- 13 first time the team like reached out to international, went
- 14 to Japan and Germany and is putting an international
- 15 perspective on that. And with the Chair's encouragement
- 16 like collecting data on how much money other countries are
- 17 putting into hydrogen infrastructure, so there will be a
- 18 public unveil, I'm not going to let you know right now.
- 19 But it's a great team, so that's: Gene Baronas, Jane
- 20 Berner, Miki Crowell, Mark Johnson, Sebastian Serrato, Phil
- 21 Cazel, Andrew Hom and Heidi Javanbakht have all have been
- 22 involved in the hydrogen and work in the AB 8 report.
- 23 So, I want to acknowledge the crack team of
- 24 office managers: Charles Smith, Mark Wenzel and Elizabeth
- 25 John who just again, low drama, high performance, really

- 2 better job with their grants. That continuous improvement
- 3 is something I just deeply appreciate.
- 4 So lastly, there's been a team of folks that were
- 5 working on CTP funding including Hannon, Quintin Gee who
- 6 has moved over to EAD. But while he was at the Fuels and
- 7 Transportation Division, he helped a lot with that process
- 8 on the messaging and really trying to communicate
- 9 effectively data, Ouintin is the master of that. Anna, and
- 10 I want acknowledge Melanie Vail who actually now is taking
- 11 over John's job in the Fuels and Transportation Division,
- 12 but she's been critical on the money management side.
- So, my own office I just want to thank well first
- 14 Catherine Cross who is kind of like Hannon, she's also if
- 15 you text her any time she responds, nights, weekends.
- 16 Again, it's little worrisome, works too much but she just
- 17 manages. And she's taught me, "Don't touch my calendar --
- 18 took me a while -- don't touch it Patty." And she is going
- 19 to do a much, much better job than I ever could. And so, I
- 20 just really thank Catherine for all the work she does to
- 21 keep me showing up to meetings on time and putting together
- 22 really complicated meetings. It's not an easy job.
- I want to thank my advisor Mona, who's been a new
- 24 addition to the office; so awesome, really just super-
- 25 competent, also helps me on the legal side. She's leading

- 1 our equity work, so she'll be interfacing very closely with
- 2 Noemi and just is such a nice, kind person and really
- 3 collaborative. So I really appreciate all that Mona does
- 4 for me and for the office.
- 5 And Ben De Alba who has been with me since the
- 6 beginning. And Ben has. t two young children that he is
- 7 like literally juggling, -- thank God, because they're
- 8 really cute -- they show up in meetings periodically. But
- 9 he is like still delivering his A-game as he works from
- 10 home. And he manages the Ports Collaborative. And Ben
- 11 really can stand in for me on a lot of events. He really
- 12 has a deep understanding of transportation that so in a way
- 13 he's like if -- he helps me in terms of he can do things
- 14 that if I can't go, I'll just be like, "Oh, Ben will do
- 15 it." And he does it so well, whether it's public
- 16 presentations he's just super-reliable, so thank you Ben
- 17 for all that you do.
- 18 I also want to thank Le-Quyen who I feel like is
- 19 an adjunct advisor to all of us, I don't know how she does
- 20 it. She's incredible, so competent. And whether it's like
- 21 putting together a brunch to welcome Vice Chair Gunda or
- 22 it's a complicated meeting or it's a complicated subject
- 23 around policy Le-Quyen does it all. And so, Chair, you are
- 24 lucky, but we are also. We thank you for sharing her with
- 25 all of us.

- 1 So, I would also like to just say that I feel so
- 2 lucky to work in an organization so collaborative as ours.
- 3 And every year I just have a deeper appreciation for my
- 4 fellow Commissioners and all that you bring. And I don't
- 5 think I've ever worked in an organization where the
- 6 leadership brought so little ego to the game. Where the
- 7 focus is, "How do we help meet California's critical energy
- 8 needs?" and not, "How do I further my own political or
- 9 personal career?" So, I just want to thank everybody for
- 10 kind of checking your ego at the door when it comes to
- 11 work.
- 12 And yeah, I learn from you all every day that we
- 13 interface with each other, and I look forward to learning
- 14 more in the years to come.
- 15 CHAIR HOCHSCHILD: Thank you for those beautiful
- 16 comments, Commissioner. I really, really appreciate it and
- 17 resonate. I'd just like to build off of that.
- 18 I will recognize a number of folks, but I just
- 19 wanted to first share two thoughts and one is just building
- 20 off of that, which is I've been beekeeping for over 15
- 21 years now, Commissioner McAllister does as well. And I've
- 22 always been inspired by the concept of collective
- 23 intelligence, which is what honeybees exhibit and they make
- 24 good decisions as a group. I really feel like that's
- 25 actually how we're meant to be. And there's something

- 1 incredibly satisfying when you really feel that. And I
- 2 think in any marriage you have this sort of unconscious
- 3 allocation of responsibilities who's going to remember
- 4 what, who's going to handle what. And it's sort of true at
- 5 work too. And just you kind of know when it works and
- 6 there's just an incredibly complimentary set of skills and
- 7 talents and that all is with a shared purpose and a
- 8 collaborative spirit.
- 9 And I've worked at a number of dysfunctional
- 10 organizations over the years, and so then I just never take
- 11 that for granted. I feel so, so grateful for that and just
- 12 the team-first spirit that I think we have and which, I
- 13 think, has continued to grow and expand every month as we
- 14 bring on new talent. And I just really just feel that.
- 15 The second point I want to make is just about
- 16 rest. This has been an intense year. It's been an intense
- 17 two years. And people are working really hard such as to
- 18 set up today's meeting to do three quarters of a billion
- 19 dollar (indiscernible). And we need to rest, everybody
- 20 needs that. And I really want to just urge everyone,
- 21 particularly over these winter holidays, to turn off the
- 22 phone, get off the screen, reconnect with loved ones,
- 23 reconnect with nature, restore.
- We need that and that's what's going to keep us
- 25 all in a position to be able to keep doing this important

- 1 work. There is nothing more important than your own health
- 2 and being connected to your loved ones, to your body, to
- 3 nature. Those things are what keep us going. And so
- 4 really that's my request to everybody is over the holidays
- 5 to really unplug and get some downtime and really savor
- 6 that and restore.
- 7 So, I did want to run through some of my thank-
- 8 yous. Mostly what I feel about our whole team is just,
- 9 wow, I feel so amazed and grateful for the team all around
- 10 us. Just starting with my own advisors, Le-Quyen I don't
- 11 know what I would do without you. I actually do know,
- 12 because I went to the COP without you and I left a governor
- 13 waiting for an hour, I mean it was a mess. So basically, I
- 14 just am so grateful for how you keep everything organized
- 15 to keep me on track and just the ability to see around
- 16 corners and fix so many problems and just be so
- 17 constructive and so relentlessly amazing. You're
- 18 incredible to the staff and the Energy Commission is better
- 19 for it.
- Terra, just so grateful for your energy and
- 21 talent and passion for what you do, the role in Lithium
- 22 Valley. And before that your contributions to the solar-
- 23 mandated SB 100 and all the things you worked on since
- 24 you've been here and just the professionalism that you
- 25 bring. And the SB 100 process, I think, was just a home

1	run	and	that's	been	spread	far	and	wide.

- 2 Ken, your depths on building decarb and all the
- 3 related issues has just been invaluable, and so grateful
- 4 for your fountain of ideas.
- Justin Cochran, my Emergency Advisor you will not
- 6 run out of things to do in this day and age, keeping you
- 7 very busy but I just appreciate your steady hand on the
- 8 wheel.
- 9 Jen Martin-Gallardo, this wonderful role you're
- 10 fulfilling in supporting our grant applicants, improving
- 11 the process, advocating constantly for better, simpler
- 12 processes for grant-making is so appreciated by all the
- 13 stakeholders, and even more important now with all this
- 14 additional money coming through. Thank you for everything
- 15 you do.
- My Military Advisor, Mike Gravely. We had a
- 17 terrific event with the Navy and the Marine Corps and the
- 18 Assistant Secretary of the Navy signing a five-year MOU
- 19 last week. And just everything you did to set that up to
- 20 pioneer electric vehicle charging and energy storage on all
- 21 these military base installations and seeing that spread
- 22 around the country, just incredible.
- 23 Alana Sanchez, my International Advisor, thank
- 24 you for setting up all the terrific visits and meetings and
- 25 travel during my trip to the UK and Europe for offshore

- 1 wind, just tremendous and for the wonderful symposium we
- 2 did with Germany and California recently.
- 3 We have four positions in addition to the five of
- 4 us on the Commission, four positions at CEC that are
- 5 appointed by the Governor and have worked really hard to
- 6 support outstanding candidates there. Those are now all
- 7 filled, and I just couldn't be more thrilled.
- 8 Lindsay Buckley, our amazing Communications
- 9 Advisor, Communications Lead at the Media Shop, just so
- 10 much vision and professionalism. Who have made their
- 11 documents readable and better graphics and video, just the
- 12 upgrade there and just the talent you've shown in the staff
- 13 you've hired, incredible.
- 14 Anna Ferrera, the passion you bring for energy to
- 15 the Government Affairs and International Affairs and all
- 16 your rich experience in the Legislature and federal
- 17 government and state government is so appreciated.
- 18 And then Noemi and Katrina, at the Public
- 19 Advisors. Noemi, if you were a car you'd be a -- I don't
- 20 know which fantastic car to pick but you'd be top of the
- 21 line, an Electric Rolls Royce maybe. I couldn't be more
- 22 grateful for just the passion you bring for inclusion and
- 23 all the different ways that that's expressing itself
- 24 through policy, through these events.
- 25 And then just to bring us together, I mean we'd

- 1 had this amazing unity celebration just a week or so ago
- 2 creating an occasion for people just to share their
- 3 personal journeys, how they got to where they are at the
- 4 Energy Commission and to see each other as people. And
- 5 you're the heartbeat of the Energy Commission, Noemi, and I
- 6 really mean that.
- 7 And then Katrina, what a pleasure to bond with
- 8 you on our trip to the north coast to visit all the tribes
- 9 with Commissioner Douglas and all the others. I'm just
- 10 super-excited for what you're going to do in your role of
- 11 Tribal Liaison.
- 12 Linda Barrera, my goodness, how did we get so
- 13 lucky? I just had very, very high expectations for you and
- 14 you started, and you've exceeded those very high
- 15 expectations. Just incredible professionalism, attention
- 16 to detail, outstanding legal judgment, very high EQ, very
- 17 high diplomacy and just passion for the mission. And you
- 18 have excelled and are building an amazing team and we just
- 19 lucked out with you in this role. So as hard as it was to
- 20 lose Darcy, I'm really just enormously grateful to have you
- 21 in the CCO role and that's just a really crucial role for
- 22 the whole Commission.
- I wanted to especially call out Rob Cook who is
- 24 kind of behind the scenes of just keeping everything
- 25 running, in particular with our budget. Rob, I know you've

- 1 been working amazingly hard, and you and Noemi handling all
- 2 this influx of new money. And the move and so on, and I
- 3 just am very grateful for that.
- 4 And then Carousel Gore, you also just to have
- 5 provided an incredible, rich array of skills and gifts in
- 6 terms of how to problem-solve and create a healthy culture
- 7 and resolve HR issues that come up, so thank you for all
- 8 that.
- 9 Drew, of course, just endless energy, endless
- 10 insight and just passion for the mission. It's just a joy
- 11 to work with you and I am so proud of what we're all doing
- 12 together.
- 13 Laurie, we've fete'd you thoroughly, but I can't
- 14 say enough about you. And I think, in addition, all you've
- 15 done to get us to this place I think really your greatest
- 16 legacy is actually in the inspiration that you provide to
- 17 your team and to the Energy Commission. And for younger
- 18 people coming up and getting hired to have you there as a
- 19 role model, to see what affluence looks like, and the good
- 20 that we can do if we do our job well. You've showed us the
- 21 way. And Jonah, so proud of you to come in and fill those
- 22 big shoes.
- 23 And I'm really excited to be Lead, getting
- 24 together with Commissioner McAllister on ERDD and for all
- 25 the good we're going to do together.

1 Sc	, I	' 11	stop	there,	and ·	iust	thank	ever	vbodv

- 2 again. And we've taken almost two hours to do these thank-
- 3 yous, but it's time well-spent.
- 4 So, with that let's move on to Item 11, Executive
- 5 Director's Report.
- 6 MR. BOHAN: Thank you, Chair, Commissioners for
- 7 all those acknowledgments of so many of our staff who have
- 8 contributed to our success. Yes, it took a long time, but
- 9 it really is the aspect of our organization that's the most
- 10 important. You look and read any book on how to run an
- 11 organization, it says, "People, people, people," so thank
- 12 you for that.
- 13 As I discussed with some of you earlier this week
- 14 with a couple exceptions, I'm not going to mention names
- 15 this year, instead I just want to thank the entire nearly
- 16 700 people in our organization that make it tick every day,
- 17 everybody. This includes staff, management, appointees
- 18 and, of course, the five of you, thank you all.
- I want to just say a few things. This was the
- 20 year of settling in and 2020 was a shock for all of us.
- 21 And it required big adjustments in each of our lives. By
- 22 2021 a lot of us have gotten a rhythm and right now we're
- 23 mostly working at home. I'm going into the office it feels
- 24 like going into an empty football stadium. It's a space
- 25 designed for a lot of people and there's nobody there, so

- 1 hopefully that will get righted soon.
- 2 But the good news is two years ago some people
- 3 thought telework might promote sloth. In fact, just the
- 4 opposite has happened as some of you have acknowledged and
- 5 our productivity has gone up, in part because work is never
- 6 more than a flipped-open laptop away. And it's allowed us
- 7 to hurdle into 2021 with breakneck speed and continue
- 8 through it and tick off just a number of accomplishments I
- 9 want to just hit really briefly.
- But it's at a pace we need to manage, and I think
- 11 we need to manage it a little better. So the Executive
- 12 Office and others are talking about how best to interface
- 13 with the five of you. I've talked to each of you about
- 14 this, but how can we in the coming year find better ways
- 15 and really be intentional about helping us all continue to
- 16 fulfill our mission and do good work, while also achieving
- 17 in some cases a little better, healthier life-work balance
- 18 than we've been doing. So more to come on that.
- 19 In terms of our mission, CEC is helping identify
- 20 the best way to best ways to meet this massive, clean
- 21 energy challenge before us. And I just want to tick
- 22 through a few things.
- One, we're making possible what increasingly
- 24 seems like an inevitable revolution in the way we drive
- 25 cars.

	1		We	're	raising	the	bar	on	energy	efficiency	ever
--	---	--	----	-----	---------	-----	-----	----	--------	------------	------

- 2 higher.
- 3 We're developing innovative ways to shift energy
- 4 consumption to times of the day when energy is cheap and
- 5 abundant.
- 6 We're certifying renewable resources and making
- 7 sure utilities meet their statutory RPS obligations. We
- 8 basically manage the rules of the game.
- 9 We're peering into the future to help us procure
- 10 the required resources. And to ideate on the policies that
- 11 California will need to solve the climate crisis.
- We're investing in research to find innovative
- 13 solutions.
- 14 We're managing our thermal generation fleet,
- 15 which today is still critical to our reliability. And
- 16 we're doing it in a way that keeps people safe.
- 17 And we're setting the standard for how to
- 18 thoughtfully reach out and engage to all Californians. And
- 19 we owe a debt of gratitude to all the assistance we've
- 20 gotten from everybody who participates in the work that we
- 21 do.
- 22 Each of us at the CEC is making a ding in the
- 23 universe, to borrow a phrase from Steve Jobs, and I think
- 24 it's really an extremely positive ding.
- 25 And now for the exceptions I mentioned earlier. I

- 1 just want to take a moment to thank two people who report
- 2 directly to me and the Executive Office and who I work
- 3 closely with on a daily, sometimes hourly basis.
- 4 Linda you all know, Linda Spiegel has been Chief
- 5 Deputy for less than a year, but it feels like we've been
- 6 working together very closely for a long time. She's
- 7 brilliant, she's tenacious and she's just genuinely a kind
- 8 person who approaches a lot of the knotty problems we spend
- 9 a lot of time discussing with a kindness and thoughtfulness
- 10 that's just wonderful to deal with. Thank you, Linda.
- 11 And Gaylene Cooper who, thank you Commissioner
- 12 McAllister for acknowledging her, she's the rock of the
- 13 Executive Office but she's kind of the rock of the whole
- 14 organization. She's also brilliant, she's tireless and
- 15 she's about as steady as it gets. And I want to thank her
- 16 for jumping into everything that's needed, and particularly
- 17 to help you out, Commissioner McAllister, so thank you
- 18 Gaylene.
- 19 And, again, I just want to say thank you to the
- 20 whole team. Have a great holiday break and I'll see you
- 21 next year.
- 22 CHAIR HOCHSCHILD: Thank you so much, Drew.
- 23 Let's turn now to Item 12, Public Advisor's
- 24 Report.
- MS. GALLARDO: Hello everybody, this is Noemi,

- 1 the Public Advisor. I want to say I've never been compared
- 2 to a car before or any type of vehicle, but there is a
- 3 Lamborghini that has my last name (indiscernible) think of
- 4 it, Chair.
- 5 CHAIR HOCHSCHILD: Okay, well it's the electric
- 6 Lamborghini. (Laughter.)
- 7 MS. GALLARDO: And so, I want to tell you all
- 8 that I just feel like being at the Energy Commission has
- 9 made me a better person, so I'm very grateful for that.
- 10 I'm grateful to all of you for having the trust and
- 11 confidence in me. One, just to have me be here in the
- 12 first place as Public Advisor. And then two, also to
- 13 expand the Office of the Public Advisor to include energy,
- 14 equity and tribal affairs. And we're not going to let you
- 15 down on that.
- On that note I do want to thank my team, the PAO+
- 17 team of Rosemary and Dorothy who have been with me since
- 18 the beginning, Katrina and Tom who are new but feel like --
- 19 I feel so comfortable with them, I feel like they've been
- 20 there forever. Jayme, my new assistant, who has hit the
- 21 ground running. And Kaylin (phonetic) and Taher
- 22 (phonetic), our interns who we lean on a lot for extra
- 23 support, even in this business meeting.
- 24 And then I also want to thank real guick, the
- 25 Executive Office, Chief Counsel's Office, particularly Lisa

- 1 and Patricia.
- 2 Media Public Communications Office and IT,
- 3 particularly Giana, Patty, Raj and David. We're working on
- 4 so many efforts together, so on behalf of PAO+ we love and
- 5 appreciate you, thank you.
- 6 And then just a couple individuals, Carousel
- 7 Gore. She has been my thought partner on the inclusion,
- 8 diversity, equity and access initiative. We've been doing
- 9 that since 2019. I think we've done and made a lot of
- 10 progress and we're looking to do more, so expect that.
- 11 She's also my moral support and my good friend, so thank
- 12 you, Carousel.
- 13 Le-Quyen I also wanted to give out a shout-out
- 14 to, because she's also my advisor, my mentor, my go-to when
- 15 anything is going wrong or I'm not sure what to do, and she
- 16 always figures out how to fix things.
- 17 And Laurie ten Hope as well, has been an
- 18 incredible partner to me since the beginning. So
- 19 Commissioner Monahan, if you want to have a crying session
- 20 together when Laurie actually leaves, I will need it, so
- 21 I'll be with you on that one. And so that's it for me.
- 22 Again, thank you to everybody.
- 23 And I want to give a reminder to our attendees to
- 24 please join us for the Hall of Fame on Friday. It's going
- 25 to be a wonderful event where we celebrate folks who are

- 1 working to make a clean energy future for all of us here in
- 2 California. So I put the link in the chat, please
- 3 register.
- And with that, Chair, I can also give the
- 5 instructions for the Public Comment, Item 13 whenever
- 6 you're ready.
- 7 CHAIR HOCHSCHILD: That would be great, thank
- 8 you.
- 9 MS. GALLARDO: All right. So this is the period
- 10 for any person wishing to comment on information items or
- 11 reports of the meeting agenda or any other item. Each
- 12 person has up to three minutes to comment. Comments are
- 13 limited to one representative per organization. We may
- 14 reduce the comment time depending on the number of
- 15 commenters.
- 16 Please use the raised-hand icon to indicate your
- 17 interest in making public comment. If you're on the phone
- 18 press *9 to raise your hand and *6 to unmute.
- 19 After you are called on, please restate and spell
- 20 your name. If you are affiliated with an organization,
- 21 tribe, any other type of entity please let us know. And do
- 22 not use the speakerphone when talking, because we won't
- 23 hear you clearly.
- I will look for hands now. All right, Chair, I
- 25 do not see any hands raised. We can continue.

1 CHAIR HOCHSCHILD:	Okay.	Thank you,	Noemi.
---------------------	-------	------------	--------

- 2 Let's turn now to Item 14, Chief Counsel's
- 3 Report.
- 4 MS. BARRERA: Good afternoon. Oh, my goodness,
- 5 it's so hard to go after so many great speeches. And
- 6 thanks for your mentions during the business meeting. I
- 7 also want to thank you for a great year full of
- 8 accomplishments. Your leadership and kindness makes my job
- 9 easy and a joy to work for you, all five Commissioners, and
- 10 further the Energy Commission's mission.
- 12 Office, in particular to Drew and Linda Spiegel and Gaylene
- 13 and all the Deputy Directors for being great clients and
- 14 collaborators.
- I also want to thank every member of the Chief
- 16 Counsel's Office for their thoughtful, thorough and
- 17 diligent work to support staff, the executive team and our
- 18 Commissioners. I feel extremely grateful to have the
- 19 opportunity to lead an office of attorneys and professional
- 20 staff in a positive and collaborative way. And we just
- 21 will continue to be excited to help you, staff and
- 22 Executive Office innovate and establish like what
- 23 Commissioner Monahan said earlier, first-in-the-nation
- 24 programs to advance clean energy for all Californians.
- 25 And so thanks, thank you so much. And I hope

- 1 that everybody has a great end of the year, and that we are
- 2 all able to rest a little bit, so that we can energize and
- 3 be all have the gas -- not gas, but electric charge for
- 4 next year.
- 5 CHAIR HOCHSCHILD: Thank you so much, Linda.
- 6 Well just before we wrap up, I do want to say
- 7 again, I really liked a term that Commission McAllister
- 8 used I think when we adopted the Energy Code in August,
- 9 which was "embedded wisdom." There's a lot of embedded
- 10 wisdom in that decision, because of our process, because of
- 11 all the teamwork. And so that's really, I think, that
- 12 applies to the Energy Commission as a whole, the way we're
- 13 working now and the results we're producing, the decisions
- 14 we're making, the grant-making we're doing. There's a lot
- 15 of embedded wisdom and that comes from all the talent we
- 16 have and how we are working together and having a healthy
- 17 culture.
- 18 And that's on all of us to keep building that, to
- 19 keep growing that. And just like our policy work I think
- 20 that also spreads. And when we can show how to live and
- 21 work and support each other and be successful and be a
- 22 team, that spreads beyond the Energy Commission. It
- 23 spreads into our lives, into our sister agencies. And I
- 24 think we're really modeling that. And I look forward to
- 25 many more months and years together of doing this work and

1	keeping pushing the mission forward.
2	So, thank you to everybody and have a great
3	holiday. We'll see you on the other side.
4	VICE CHAIR GUNDA: Chair? Chair, may I?
5	CHAIR HOCHSCHILD: Oh yeah, go ahead Vice Chair?
6	VICE CHAIR GUNDA: I apologize. I wanted to just
7	take the queue and be brave about this.
8	I lost two names, I just wanted to call them out.
9	CHAIR HOCHSCHILD: Okay.
10	VICE CHAIR GUNDA: I felt really bad about
11	leaving Gordon Schremp. We depend on him for all petroleum
12	issues and gas (indiscernible). And he was on the next
13	page in my executive summary, but the last name got cut
14	off. And then Cary Garcia on the forecasting team. I just
15	wanted to mention those two names, which I forgot, thank
16	you.
17	CHAIR HOCHSCHILD: Outstanding.
18	Okay, have a good holiday everyone. Thank you.
19	(The Business Meeting adjourned at 2:34 p.m.)
20	
21	
22	
23	
24	
25	

REPORTER'S CERTIFICATE

I do hereby certify that the testimony in the foregoing hearing was taken at the time and place therein stated; that the testimony of said witnesses were reported by me, a certified electronic court reporter and a disinterested person, and was under my supervision thereafter transcribed into typewriting.

And I further certify that I am not of counsel or attorney for either or any of the parties to said hearing nor in any way interested in the outcome of the cause named in said caption.

IN WITNESS WHEREOF, I have hereunto set my hand this 17th day of December, 2021.



PETER PETTY
CER**D-493
Notary Public

TRANSCRIBER'S CERTIFICATE

I do hereby certify that the testimony in the foregoing hearing was taken at the time and place therein stated; that the testimony of said witnesses were transcribed by me, a certified transcriber and a disinterested person, and was under my supervision thereafter transcribed into typewriting.

And I further certify that I am not of counsel or attorney for either or any of the parties to said hearing nor in any way interested in the outcome of the cause named in said caption.

IN WITNESS WHEREOF, I have hereunto set my hand this 17th day of December, 2021.



Myra Severtson Certified Transcriber AAERT No. CET**D-852