

BOARD MEETING DATE: October 3, 2025

AGENDA NO. 26

REPORT: Technology Committee

SYNOPSIS: The Technology Committee held a hybrid meeting on Friday, September 19, 2025. The following is a summary of the meeting.

RECOMMENDED ACTION:  
Receive and file.

Carlos Rodriguez, Chair  
Technology Committee

AK:psc

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### **Call to Order**

Committee Chair Carlos Rodriguez called the meeting to order at 12:00 p.m.

### **Roll Call**

#### **Committee Members**

Present: Mayor Pro Tem Carlos Rodriguez, Committee Chair  
Supervisor Curt Hagman  
Mayor Pro Tem Larry McCallon  
Supervisor Janet Nguyen  
Board Member Veronica Padilla-Campos

Absent: Mayor Patricia Lock Dawson

For additional details of the Technology Committee Meeting, please refer to the [Webcast](#).

#### **ACTION ITEMS:**

##### **1. Issue Program Announcement and Execute Contracts for Proposition 1B – Goods Movement Emission Reduction Program**

Krystle Martinez, Program Supervisor, Technology Advancement Office, presented on the Proposition 1B – Goods Movement Emission Reduction Program (Prop 1B).

The majority of funding under Prop 1B has been allocated; however, potentially up to \$50 million in funds remain from withdrawn projects. South Coast AQMD staff is seeking cargo handling equipment and transport refrigeration unit projects to utilize the remaining funds. These actions are to: 1) issue a Program Announcement for cargo handling equipment and transport refrigeration unit (TRU) projects under Prop 1B; and 2) authorize the Executive Officer to execute contracts for eligible projects under the Prop 1B Program Fund (81) until all funds are exhausted. For additional details, please refer to the [Webcast](#) beginning at 2:55.

Supervisor Hagman inquired if airport equipment would be eligible under Prop 1B Program. Mei Wang, Assistant Deputy Executive Officer, Technology Advancement Office, responded that cargo handling equipment involved with goods movement at airports can be eligible. For additional details, please refer to the [Webcast](#) beginning at 5:13.

Moved by Hagman; seconded by McCallon; unanimously approved.

Ayes: Hagman, McCallon, Nguyen, Padilla-Campos Rodriguez  
Noes: None  
Abstain: None  
Absent: Lock Dawson

## **2. Release RFP to Continue Enhanced Fleet Modernization Program Implementation, Amend and Execute Contracts**

Victor Juan, Program Supervisor, Technology Advancement Office, presented on utilizing consultant support for the application evaluation, outreach, and participant education for the Replace Your Ride program. With a recent increase in incentive amounts, the program has seen a surge in popularity and application volume; however, funding for consultant support is nearly depleted. These actions are to: 1) release an RFP to solicit proposals for contractor(s) to assist applicants with the application process, screen applications, and other program support for Replace Your Ride; 2) authorize the Executive Officer to execute contracts with contractor(s) in an amount up to \$4,000,000 for a five-year period as the funds from CARB are received; and 3) amend contracts with the Foundation for California Community Colleges and Green Paradigm Consulting, Inc. for a total of up to \$400,000 to continue to support Replace Your Ride program implementation until contractor(s) from the RFP process are selected, under contract, and, if needed, trained on how to implement the program. For additional details, please refer to the [Webcast](#) beginning at 8:57.

Board Member Padilla-Campos asked for clarification about the contractors and their geographic location. Mr. Juan responded that through the RFP, selected contractors could be existing contractors or brand-new contractors that respond to

the RFP. Mr. Juan explained that the contracts were set for three years and contractors screen applicants to ensure CARB's eligibility requirements are met. Mr. Juan responded that the location of the contractors has not been a consideration since the contractors work remotely. Board Member Padilla-Campos concluded by asking from what areas of the Basin does the agency receive the most applications. Mr. Juan responded that generally Los Angeles County accounted for the most participation with about 66 percent, followed by Orange County with about 20 percent, followed by Riverside and San Bernardino Counties with 7 percent for each. For additional details, please refer to the [Webcast](#) beginning at 11:25.

Mayor Pro Tem McCallon asked if Hydrogen Vehicles (Fuel Cell Electric Vehicles) were part of the program. Mr. Juan responded that the current CARB grant only allows Battery Electric Vehicles, Fuel Cell Electric Vehicles, and Plug-In Hybrid Electric Vehicles as eligible replacement vehicle options. Mayor McCallon commented on the need for instructions on signage in multiple languages at the South Coast AQMD Hydrogen Fueling Station. Aaron Katzenstein, Deputy Executive Officer, Technology Advancement Office, replied that staff would look into the signage at the South Coast AQMD Hydrogen Fueling equipment. For additional details, please refer to the [Webcast](#) beginning at 12:30.

Moved by Padilla-Campos; seconded by Hagman; unanimously approved.

Ayes: Hagman, McCallon, Nguyen, Padilla-Campos Rodriguez

Noes: None

Abstain: None

Absent: Lock Dawson

### **3. Execute Contracts to Demonstrate Plug-In Hybrid Tugboat and Install Supporting Charging Infrastructure**

Maryam Hajbabaei, Program Supervisor, Technology Advancement Office, presented on the Targeted Airshed Grant award of \$10,000,000 including administrative funds of \$500,000, to demonstrate a plug-in hybrid tugboat and develop innovative supporting charging infrastructure. The Board previously approved transferring up to \$1.5 million from the Air Quality Investment Program Fund (27) - Rule 1111 into Fund (83) for the cost-share of the plug-in tugboat project and executing a contract with Crowley Maritime Corporation (Crowley). Since then, Crowley withdrew from the project and South Coast AQMD staff subsequently received a proposal from Baydelta Maritime, LLC (Baydelta) and Arc Boat Company Inc (Arc). Baydelta is proposing to develop plug-in hybrid tugboats and Arc will provide the supporting marine charging system. These actions are contingent upon U.S. EPA's final awards, to execute contracts with Baydelta and Arc for a total of \$11 million from the Clean Shipping Technology Demonstration Special Revenue Fund (83) for the plug-in hybrid tugboat and the supporting

infrastructure project. For additional details, please refer to the [Webcast](#) beginning at 15:26.

Board Member Padilla-Campos inquired about the project timeline. Dr. Hajbabaie responded that both companies are prepared to initiate the project, which includes a one-year and a two-year deployment period. For additional details, please refer to the [Webcast](#) beginning at 17:46.

Ranji George, public member, expressed support for the project and noted that hybrid plug-in technologies offer additional emission reduction benefits. For additional details, please refer to the [Webcast](#) beginning at 19:15.

Harvey Eder, Public Solar Power Coalition, highlighted the benefits of solar energy for power generation and emphasized the expedited permitting process for installing such technology. For additional details, please refer to the [Webcast](#) beginning at 20:50.

Mayor Pro Tem McCallon commented in support of this project and production of more of these technologies for the application at the ports. For additional details, please refer to the [Webcast](#) beginning at 23:45.

Moved by McCallon; seconded by Nguyen; unanimously approved.

Ayes: Hagman, McCallon, Nguyen, Padilla-Campos Rodriguez  
Noes: None  
Abstain: None  
Absent: Lock Dawson

**4. Authorize Carl Moyer and VW Programs to Fund Eligible Truck Projects  
Truck Projects with Program Eligible Low NOx Engines**

Kelly Gamino Trainor, Program Supervisor, Technology Advancement Office, presented on the FY 2024-25 Community Air Protection (CAP) incentive funds totaling \$73,351,356, of which 12.5 percent may be used for administrative costs. These actions are to: 1) adopt a resolution recognizing an amount up to \$73,351,356 in CAP funds from CARB into the Community Air Protection AB 134 Fund (77); and 2) reimburse the General Fund for administrative costs up to \$9,168,919 from the Community Air Protection AB 134 Fund (77). For additional details, please refer to the [Webcast](#) beginning at 24:30.

Moved by McCallon; seconded by Hagman; unanimously approved.

Ayes: Hagman, McCallon, Nguyen, Padilla-Campos Rodriguez  
Noes: None

Abstain: None  
Absent: Lock Dawson

**ADMINISTRATIVE ACTION ITEMS:**

**5. Approve Payments for Completed Contracts**

Authorize Executive Officer to execute two new contracts for previously approved projects: 1) with Cummins, Inc and reallocate the remaining funds of \$1,050,000 from the Transportation Power, LLC project to Cummins, Inc. to complete two battery electric refuse truck projects from the Air Quality Investment Program Fund (27) – Rule 1111; and 2) with San Bernardino County for \$1,000,000 to deploy two zero-emission Breathmobiles from the Advanced Technology, Outreach and Education Fund (17) which are being funded with \$500,000 from the U.S. EPA Clean Air Technology Initiative and \$500,000 from the Clean Fuels Program Fund (31). For additional details, please refer to the [Webcast](#) beginning at 26:41.

Supervisor Hagman commented that he does not have a financial interest but is required to identify for the record that he is the Supervisor for the County of San Bernardino, which is involved in this item.

Mr. Eder inquired about the status of solar and the history of what the District has done with solar. For additional details, please refer to the [Webcast](#) beginning at 26:41.

Moved by Hagman; seconded by Padilla-Campos; unanimously approved.

Ayes: Hagman, McCallon, Nguyen, Padilla-Campos Rodriguez  
Noes: None  
Abstain: None  
Absent: Lock Dawson

**INFORMATIONAL ITEM:**

**6. Presentation on Rethinking Power Generation**

Bobby K. Cherian, Senior Vice President Government Affairs, Hyliion Inc, presented on rethinking power generation. For additional details, please refer to the [Webcast](#) beginning at 39:54.

Committee Chair Rodriguez expressed his excitement for the Karno linear generator technology. For additional details, please refer to the [Webcast](#) beginning at 31:05.

Supervisor Hagman asked about the operating costs and return on investment for the Karno linear generator and how it compares to competitors. Mr. Cherian replied that the upfront costs are lower than fuel cells but higher than traditional natural gas generators and that operating costs are less than several utility grid costs and over

the long run, more cost-effective to operate. For additional details, please refer to the [Webcast](#) beginning at 40:05.

Mayor Pro Tem McCallon asked about the start-up time. Mr. Cherian responded from a black start, it would take 30 seconds to start up and generate power and 3-4 minutes to achieve full power. For additional details, please refer to the [Webcast](#) beginning at 41:11.

Committee Chair Rodriguez inquired about examples of the different applications and Mr. Cherian responded that he cannot share the specific applications at this time. He reiterated that the Karno technology is being used by the Navy in unmanned vessels and potential EV charging/infrastructure applications.

Committee Chair Rodriguez asked about barriers and challenges from a regulatory standpoint, other applications for their technology for wastewater treatment and ports, and Hyliion's relationship with utilities and residential applications. Mr. Cherian stated their technology is compliant with South Coast AQMD Rule 1110.3 and that a recent EPA determination established that linear generators are not considered internal combustion engines. Mr. Cherian explained that applications at wastewater treatment facilities and ports are viable and that Hyliion has been working with utilities wherever necessary but does not see their product for use in the residential market. Committee Chair Rodriguez asked whether Hyliion can return to Technology Committee in about 6 months to provide an update once the product has been on the market. For additional details, please refer to the [Webcast](#) beginning at 41:40.

Supervisor Hagman inquired about the fuel agnostic capabilities and if Karno requires upgraded infrastructure to support natural gas operations. Mr. Cherian responded that no upgrades are needed to the gas infrastructure. For additional details, please refer to the [Webcast](#) beginning at 48:02.

Mayor Pro Tem McCallon expressed concern about the start up time and Karno's application as back-up power for data centers, but commented that alternative energy solutions are good. For additional details, please refer to the [Webcast](#) beginning at 48:35.

Board Member Padilla-Campos expressed gratitude for the presentation. For additional details, please refer to the [Webcast](#) beginning at 49:38.

Mr. George asked about emissions from the technology and the heat required to achieve the power levels and the reliability of the technology. Mr. Cherian responded that the gaseous emissions are coming from the exhaust stream without

any after treatment system. For additional details, please refer to the beginning [Webcast](#) at 50:05.

**OTHER MATTERS:**

**7. Other Business**

There was no other business to report.

**8. Public Comment Period**

Mr. Geroge expressed concerns for the cost of hydrogen. For additional details, please refer to the [Webcast](#) beginning at 53:05.

**9. Next Meeting Date**

The next regular Technology Committee meeting is scheduled for Friday, October 17, 2025, at noon.

**Adjournment**

The meeting adjourned at 12:25 p.m.

**Attachment**

Attendance Record

## **ATTACHMENT**

### **SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT TECHNOLOGY COMMITTEE MEETING Attendance Record – September 19, 2025**

Mayor Pro Tem Carlos Rodriguez .....	South Coast AQMD Board Member
Supervisor Curt Hagman .....	South Coast AQMD Board Member
Mayor Pro Tem Larry McCallon .....	South Coast AQMD Board Member
Supervisor Janet Nguyen .....	South Coast AQMD Board Member
Board Member Padilla-Campos .....	South Coast AQMD Board Member
Charles Hahn .....	Board Consultant/Assistant (Nguyen)
Debra Mendelsohn .....	Board Consultant/Assistant (McCallon/Rodriguez)
Andrew Silva .....	Board Consultant/Assistant (Lock Dawson)
Bobby K. Cherian .....	Hyllion Inc.
Christian Contreras .....	Public Member
Jessica Denver .....	Go-Biz
Kiera Dixons .....	Public Member
Harvey Eder .....	Public Solar Power Coalition
Ranji George .....	Public Member
Catherine Smith .....	Public Member
Ana Ambriz .....	South Coast AQMD Staff
Debra Ashby .....	South Coast AQMD Staff
Cindy Bustillos .....	South Coast AQMD Staff
Sam Cao .....	South Coast AQMD Staff
Penny Shaw Cedillo .....	South Coast AQMD Staff
Philip Crabbe III .....	South Coast AQMD Staff
Daniel Garcia .....	South Coast AQMD Staff
Maria Corralejo .....	South Coast AQMD Staff
Scott Gallegos .....	South Coast AQMD Staff
Carlos Gonzalez .....	South Coast AQMD Staff
Maryam Hajbabaei .....	South Coast AQMD Staff
Alex Han .....	South Coast AQMD Staff
Sheri Hanizavareh .....	South Coast AQMD Staff
Aaron Katzenstein .....	South Coast AQMD Staff
Angela Kim .....	South Coast AQMD Staff
Victor Juan .....	South Coast AQMD Staff
Justin Joe .....	South Coast AQMD Staff
Howard Lee .....	South Coast AQMD Staff
Tom Lee .....	South Coast AQMD Staff
Hay Lo .....	South Coast AQMD Staff
Krystle Martinez .....	South Coast AQMD Staff
Ghislain Muberwa .....	South Coast AQMD Staff

Susan Nakamura .....	South Coast AQMD Staff
Wayne Natri .....	South Coast AQMD Staff
Vasileios Papapostolou .....	South Coast AQMD Staff
Robert Paud .....	South Coast AQMD Staff
Cynthia Ravenstein .....	South Coast AQMD Staff
Kristin Remy .....	South Coast AQMD Staff
Lisa Tanka .....	South Coast AQMD Staff
Kelly Gamino Trainor .....	South Coast AQMD Staff
Mei Wang .....	South Coast AQMD Staff