



BOARD OF DIRECTORS
CLIMATE PROTECTION COMMITTEE MEETING

BAY AREA
AIR QUALITY
MANAGEMENT
DISTRICT

COMMITTEE MEMBERS

TERESA BARRETT – CHAIR
SCOTT HAGGERTY
DOUG KIM
KATIE RICE
BRAD WAGENKNECHT
SHIRLEE ZANE

JOHN GIOIA – VICE CHAIR
DAVID HUDSON
LIZ KNISS
MARK ROSS
LORI WILSON

MONDAY
DECEMBER 2, 2019
9:30 A.M.

1ST FLOOR BOARD ROOM
375 BEALE STREET
SAN FRANCISCO, CA 94105

AGENDA

1. CALL TO ORDER - ROLL CALL

PLEDGE OF ALLEGIANCE

PUBLIC MEETING PROCEDURE

The Committee Chair shall call the meeting to order and the Clerk of the Boards shall take roll of the Committee members. The Committee Chair shall lead the Pledge of Allegiance.

This meeting will be webcast. To see the webcast, please visit www.baaqmd.gov/bodagendas at the time of the meeting. Closed captioning may contain errors and omissions, and are not certified for their content or form.

Public Comment on Agenda Items *The public may comment on each item on the agenda as the item is taken up. Public Comment Cards for items on the agenda must be submitted in person to the Clerk of the Boards at the location of the meeting and prior to the Board taking up the particular item. Where an item was moved from the Consent Calendar to an Action item, no speaker who has already spoken on that item will be entitled to speak to that item again.*

2. **PUBLIC COMMENT ON NON-AGENDA MATTERS**

Public Comment on Non-Agenda Items, Pursuant to Government Code Section 54954.3 *For the first round of public comment on non-agenda matters at the beginning of the agenda, ten persons selected by a drawing by the Clerk of the Boards from among the Public Comment Cards indicating they wish to speak on matters not on the agenda for the meeting will have two minutes each to address the Board on matters not on the agenda. For this first round of public comments on non-agenda matters, all Public Comment Cards must be submitted in person to the Clerk of the Board at the location of the meeting and prior to commencement of the meeting.*

Staff/Phone (415) 749-

3. **APPROVAL OF THE MINUTES OF JUNE 10, 2019**

Clerk of the Boards/5073

The Committee will consider approving the attached draft minutes of the Climate Protection Committee meeting of June 10, 2019.

4. **APPROVAL OF THE MINUTES OF SEPTEMBER 19, 2019**

Clerk of the Boards/5073

The Committee will consider approving the attached draft minutes of the Climate Protection Committee meeting of September 19, 2019.

5. **MARIN COUNTY LOW CARBON CONCRETE ORDINANCE** J. Broadbent/5052
jbroadbent@baaqmd.gov

Marin County staff will present on the County's efforts to develop and adopt an ordinance requiring the use of low carbon concrete in building projects.

6. **BUILDING ELECTRIFICATION TRENDS AND OPPORTUNITIES**

J. Broadbent/5052
jbroadbent@baaqmd.gov

Staff from the Building Decarbonization Coalition will present on how public agencies are moving towards building electrification.

7. **UPDATE ON AIR DISTRICT'S BUILDING DECARBONIZATION PROGRAM**

J. Broadbent/5052
jbroadbent@baaqmd.gov

Staff will provide an update on the Air District's current efforts to develop policy resources and tools to support local government implementation of building electrification policies.

8. **PUBLIC COMMENT ON NON-AGENDA MATTERS**

Speakers who did not have the opportunity to address the Board in the first round of comments on non-agenda matters will be allowed two minutes each to address the Board on non-agenda matters.

9. **COMMITTEE MEMBER COMMENTS**

Any member of the Board, or its staff, on his or her own initiative or in response to questions posed by the public, may: ask a question for clarification, make a brief announcement or report on his or her own activities, provide a reference to staff regarding factual information, request staff to report back at a subsequent meeting concerning any matter or take action to direct staff to place a matter of business on a future agenda. (Gov't Code § 54954.2)

10. **TIME AND PLACE OF NEXT MEETING**

Thursday, February 20, 2020, at 375 Beale Street, San Francisco, CA 94105 at 9:30 a.m.

11. **ADJOURNMENT**

The Committee meeting shall be adjourned by the Committee Chair.

CONTACT:

MANAGER, EXECUTIVE OPERATIONS
375 BEALE STREET, SAN FRANCISCO, CA 94105
vjohnson@baaqmd.gov

(415) 749-4941
FAX: (415) 928-8560
BAAQMD homepage:
www.baaqmd.gov

- To submit written comments on an agenda item in advance of the meeting. Please note that all correspondence must be addressed to the “Members of the Climate Protection Committee” and received at least 24 hours prior, excluding weekends and holidays, in order to be presented at that Committee meeting. Any correspondence received after that time will be presented to the Committee at the following meeting.
- To request, in advance of the meeting, to be placed on the list to testify on an agenda item.
- Any writing relating to an open session item on this Agenda that is distributed to all, or a majority of all, members of the body to which this Agenda relates shall be made available at the District’s offices at 375 Beale Street, Suite 600, San Francisco, CA 94105, at the time such writing is made available to all, or a majority of all, members of that body.

Accessibility and Non-Discrimination Policy

The Bay Area Air Quality Management District (Air District) does not discriminate on the basis of race, national origin, ethnic group identification, ancestry, religion, age, sex, sexual orientation, gender identity, gender expression, color, genetic information, medical condition, or mental or physical disability, or any other attribute or belief protected by law.

It is the Air District’s policy to provide fair and equal access to the benefits of a program or activity administered by Air District. The Air District will not tolerate discrimination against any person(s) seeking to participate in, or receive the benefits of, any program or activity offered or conducted by the Air District. Members of the public who believe they or others were unlawfully denied full and equal access to an Air District program or activity may file a discrimination complaint under this policy. This non-discrimination policy also applies to other people or entities affiliated with Air District, including contractors or grantees that the Air District utilizes to provide benefits and services to members of the public.

Auxiliary aids and services including, for example, qualified interpreters and/or listening devices, to individuals who are deaf or hard of hearing, and to other individuals as necessary to ensure effective communication or an equal opportunity to participate fully in the benefits, activities, programs and services will be provided by the Air District in a timely manner and in such a way as to protect the privacy and independence of the individual. Please contact the Non-Discrimination Coordinator identified below at least three days in advance of a meeting so that arrangements can be made accordingly.

If you believe discrimination has occurred with respect to an Air District program or activity, you may contact the Non-Discrimination Coordinator identified below or visit our website at www.baaqmd.gov/accessibility to learn how and where to file a complaint of discrimination.

Questions regarding this Policy should be directed to the Air District’s Non-Discrimination Coordinator, Rex Sanders, at (415) 749-4951 or by email at rsanders@baaqmd.gov

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

375 BEALE STREET, SAN FRANCISCO, CA 94105

FOR QUESTIONS PLEASE CALL (415) 749-4941

EXECUTIVE OFFICE:

MONTHLY CALENDAR OF AIR DISTRICT MEETINGS

DECEMBER 2019

<u>TYPE OF MEETING</u>	<u>DAY</u>	<u>DATE</u>	<u>TIME</u>	<u>ROOM</u>
Board of Directors Climate Protection Committee	Monday	2	9:30 a.m.	1 st Floor Board Room
Board of Directors Regular Meeting	Wednesday	4	9:30 a.m.	1 st Floor Board Room
Advisory Council Meeting	Monday	9	10:00 a.m.	1 st Floor Board Room
Board of Directors Stationary Source Committee	Monday	16	9:30 a.m.	1 st Floor Board Room
Board of Directors Executive Committee - CANCELLED	Wednesday	18	9:30 a.m.	1 st Floor Board Room
Board of Directors Mobile Source Committee	Wednesday	18	9:30 a.m.	1 st Floor Yerba Buena Room
Board of Directors Budget & Finance Committee - CANCELLED	Wednesday	25	9:30 a.m.	1 st Floor Board Room
Board of Directors Mobile Source Committee – CANCELLED AND RESCHEDULED TO WEDNESDAY, DECEMBER 18, 2019	Thursday	26	9:30 a.m.	1 st Floor Board Room

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Teresa Barrett and Members
of the Climate Protection Committee

From: Jack P. Broadbent
Executive Officer/APCO

Date: November 18, 2019

Re: Approval of the Minutes of June 10, 2019

RECOMMENDED ACTION

Approve the attached draft minutes of the Climate Protection Committee (Committee) meeting of June 10, 2019.

DISCUSSION

Attached for your review and approval are the draft minutes of the Committee meeting of June 10, 2019.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Marcy Hiratzka
Reviewed by: Vanessa Johnson

Attachment 3A: Draft Minutes of the Committee Meeting of June 10, 2019

AGENDA: 3A – ATTACHMENT

Draft Minutes – Climate Protection Committee Meeting of June 10, 2019

Bay Area Air Quality Management District
375 Beale Street, Suite 600
San Francisco, California 94105
(415) 749-5073

DRAFT MINUTES

Summary of Board of Directors
Climate Protection Committee Meeting
Monday, June 10, 2019

1. CALL TO ORDER – ROLL CALL

Climate Protection Committee (Committee) Chairperson, Teresa Barrett, called the meeting to order at 9:30 a.m.

Present: Chairperson Teresa Barrett; Vice Chair John Gioia; and Directors Scott Haggerty, David Hudson, Doug Kim, Katie Rice, and Mark Ross.

Absent: Directors Liz Kniss, Brad Wagenknecht, Lori Wilson, and Shirlee Zane.

Also Present: None.

2. PUBLIC COMMENT ON NON-AGENDA ITEMS, PURSUANT TO GOVERNMENT CODE SECTION 54954.3

No requests received.

3. APPROVAL OF THE MINUTES OF APRIL 22, 2019

Public Comments

No requests received.

Committee Comments

None.

Committee Action

Director Haggerty made a motion, seconded by Vice Chair Gioia, to approve the Minutes of April 22, 2019; and the motion carried by the following vote of the Committee:

AYES: Barrett, Gioia, Haggerty, Kim, Rice.
NOES: None.
ABSTAIN: None.
ABSENT: Hudson, Kniss, Ross, Wagenknecht, Wilson, Zane.

4. UPDATE ON COMMUNITY CHOICE ENERGY (CCE) STUDY

Greg Nudd, Deputy Air Pollution Control Officer of Policy, introduced Ben Foster, Fosterra President, and Abby Young, Climate Protection Manager, who gave the joint presentation *Update on Community Choice Energy Study*, including: Air District support of CCE; CCE study; 100% Renewable Power Study for Seven Cities in East Bay Community Energy (EBCE); cities are working harder than ever to reach carbon-free power goals and CCEs provide an expedited way to get there; report scope and goals; why this is important; EBCE product options; key findings and impact; actions taken as a result of the study; EBCE enrollment process in March 2018; and looking forward.

Public Comments

Public comments were given by Jed Holtzman, 350 Bay Area; and Tom Kelly, KyotoUSA.

Committee Comments

The Committee and staff discussed whether CCE agencies may legally switch their customers' electric generation fuel supply to 100% of renewably powered electricity without first informing them; whether the Executive Director of EBCE was invited to attend this meeting, and the request that this study be sent to him; the confusion and community pushback over the EBCE "opt-out" rate for the City of Livermore; which agency owns the study; whether CCEs provide their customers with comparative rates that they would be paying the investor-owned utility company (Pacific Gas & Electric); the manner in which residents' options to enroll or opt out are determined upon the creation of a new CCE; whether CCEs are having difficulty supplying their customers' demands for 100% renewable energy; and how money saved from participating in a CCE program can be reinvested back into community projects.

NOTED PRESENT: Director Ross was noted present at 9:39 a.m.; Director Hudson was noted present at 9:55 a.m.

Committee Action

None; receive and file.

5. DIESEL FREE BY '33 IMPLEMENTATION PLAN

Damian Breen, Deputy Air Pollution Control Officer for Technology, introduced Dr. Ranyee Chiang, Technology Implementation Officer; who gave the staff presentation *Diesel Free by '33 Implementation Plan*, including: Diesel Free by '33 initiative history and Statement of Purpose; 118 signatories; implementation plan goals and program areas (technical assistance, policy support, grants and financing, convene signatories, communications and outreach); and next steps.

Public Comments

Public comments were given by Jed Holtzman, 350 Bay Area.

Committee Comments

The Committee and staff discussed the request that the Air District works with the California Air Resources Board to develop a set of air pollution emission reduction measures for warehouses and distribution centers (some in Assembly Bill 617 communities) that emit Diesel Particulate Matter (DPM) that would require them to implement cleaner technologies; and how the Air District can be proactive in helping jurisdictions update their climate action plans, and the suggestion that the Air District helps new facilities reach zero-emissions and bridge any gaps for city and county planners.

Committee Actions

None; receive and file.

6. PUBLIC COMMENT ON NON-AGENDA ITEMS, PURSUANT TO GOVERNMENT CODE SECTION 54954.3

No requests received.

7. COMMITTEE MEMBER COMMENTS / OTHER BUSINESS

None.

8. TIME AND PLACE OF NEXT MEETING

Thursday, September 19, 2019, at 375 Beale Street, San Francisco, CA 94105 at 9:30 a.m.

9. ADJOURNMENT

The meeting adjourned at 10:26 a.m.

Marcy Hirtzka
Clerk of the Boards

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Teresa Barrett and Members
of the Climate Protection Committee

From: Jack P. Broadbent
Executive Officer/APCO

Date: November 18, 2019

Re: Approval of the Minutes of September 19, 2019

RECOMMENDED ACTION

Approve the attached draft minutes of the Climate Protection Committee (Committee) meeting of September 19, 2019.

DISCUSSION

Attached for your review and approval are the draft minutes of the Committee meeting of September 19, 2019.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Marcy Hiratzka
Reviewed by: Vanessa Johnson

Attachment 4A: Draft Minutes of the Committee Meeting of September 19, 2019

AGENDA: 4A – ATTACHMENT

Draft Minutes – Climate Protection Committee Meeting of September 19, 2019

Bay Area Air Quality Management District
375 Beale Street, Suite 600
San Francisco, California 94105
(415) 749-5073

DRAFT MINUTES

Summary of Board of Directors
Climate Protection Committee Meeting
Thursday, September 19, 2019

1. CALL TO ORDER – ROLL CALL

Climate Protection Committee (Committee) Chairperson, Teresa Barrett, called the meeting to order at 9:37 a.m.

Present: Chairperson Teresa Barrett; and Directors Scott Haggerty, Katie Rice, and Mark Ross.

Absent: Vice Chair John Gioia; and Directors David Hudson, Doug Kim, Liz Kniss, Brad Wagenknecht, Lori Wilson, and Shirlee Zane.

Also Present: None.

2. PUBLIC COMMENT ON NON-AGENDA ITEMS, PURSUANT TO GOVERNMENT CODE SECTION 54954.3

Public comments were given by Jack Fleck, 350 Bay Area.

3. APPROVAL OF THE MINUTES OF JUNE 10, 2019

Public Comments

No requests received.

Committee Comments

None.

Committee Action

Due to a lack of quorum, no action could be taken on this item. The minutes of June 10, 2019 will be tabled until December 2, 2019.

4. BRIEFING ON THE CITY OF BERKELEY’S ORDINANCE BANNING NATURAL GAS IN NEW CONSTRUCTION

Greg Nudd, Deputy Air Pollution Control Officer of Policy, introduced Berkeley Councilwoman, Kate Harrison’s staff member, Chris Naso, who gave the presentation *Berkeley’s Gas Prohibition Ordinance*, including: what it does; cities retain sovereignty in key areas; why did Berkeley pass it; climate emergency – 2018 United Nations’ Intergovernmental Panel on Climate Change report, ban of methane, shortcomings of an energy efficiency-centric approach to decarbonization, and alternative social costs of carbon; health and safety; economics; building electrification revolution – examples; an emerging coalition; and the next step – retrofitting existing buildings.

Public Comments

Public comments were given by Jed Holtzman, 350 Bay Area; and Matthew Gough, Sierra Club.

Committee Comments

The Committee and staff discussed hybrid high-efficiency smart tank electric water heaters; whether copies of this ordinance are available for other jurisdictions to obtain; potential projections of natural gas prices resulting from increased electrification; whether low-income residents will be able to afford the costs associated with the transition from fuel-based energy systems to electrification; whether retrofits to existing buildings, specifically, restaurants, are required by the ordinance; the request that the City give this presentation to the East Bay Community Energy and all nine Bay Area Counties; potential costs of replacing residential panels in single and multi-family dwellings; and the City of Berkeley’s Annual Greenhouse Gas (GHG) Emissions Inventory.

Committee Action

None; receive and file.

5. UPDATE ON REGION-WIDE FLUORINATED GASES (F-STRATEGY)

Mr. Nudd introduced Geraldina Grünbaum, Senior Environmental Planner, who gave the staff presentation *Update on Region-Wide Fluorinated Gases (F-Gas Strategy)*, including: Fluorinated gases; Bay Area F-Gas emissions; sources of hydrofluorocarbons (HFC); future increases in HFCs; opportunities to reduce HFCs; California’s short-lived climate pollutant reduction strategy; F-Gas Strategy’s purpose and focus, regulation and enforcement, and incentives and funding; local government support; and next steps.

Public Comments

Public comments were given by Jed Holtzman, 350 Bay Area.

Committee Comments

The Committee and staff discussed examples of <150 Global Warming Potentials limits in new refrigeration systems; how jurisdictions can help technicians become well-versed natural refrigerants; the “3-liter house” concept that is popular in Europe, utilizing innovative measures when modernizing old buildings; the need for residents to understand how their homes are constantly absorbing and expelling contaminants, and whether the Air District can offer incentives for low-carbon residential upgrades; the suggestion that this strategy becomes a statewide effort with the involvement of all California air districts; anticipated challenges associated with building electrification; whether there is a way to identify the source of refrigerant leaks; and whether disposal requirements for appliances exist, and the suggestion to provide consumer education regarding best disposal practices.

Committee Actions

None; receive and file.

6. PUBLIC COMMENT ON NON-AGENDA ITEMS, PURSUANT TO GOVERNMENT CODE SECTION 54954.3

No requests received.

7. COMMITTEE MEMBER COMMENTS / OTHER BUSINESS

Director Rice announced Drive Clean Marin’s electric vehicle (EV) and electric bike test drive event on September 21, 2019, at the College of Marin. The Air District will feature its “Clean Cars for All” program at this event.

Director Rice said that she would like to see a collaborative standardized methodology of how cities and counties collect and calculate their GHG emission inventories.

Director Ross referenced the article “Californians are Buying Up Electric Cars, but Where Will They Plug In?” published on September 18, 2019 in *The San Francisco Chronicle*, and noted that there was no mention of the Air District’s efforts to promote EVs in the Bay Area.

8. TIME AND PLACE OF NEXT MEETING

Monday, December 2, 2019, at 375 Beale Street, San Francisco, CA 94105 at 9:30 a.m.

9. ADJOURNMENT

The meeting adjourned at 10:56 a.m.

Marcy Hiratzka
Clerk of the Boards

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Teresa Barrett and Members
of the Climate Protection Committee

From: Jack P. Broadbent
Executive Officer/APCO

Date: November 18, 2019

Re: Marin County Low Carbon Concrete Ordinance

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

In June 2019, the Air District Board of Directors awarded \$4.5 million through the Climate Protection Grant Program to 17 Bay Area public agencies to fund greenhouse gas (GHG) reduction activities in the Bay Area. Among the projects funded, the County of Marin was awarded \$206,456 to create market demand for low carbon concrete by developing appropriate building code and technical specifications that can be replicated by public agencies in the Bay Area and beyond; creating and disseminating replicable templates and tools; and providing technical assistance to demonstrate the feasibility of low carbon concrete in pilot projects.

Concrete is the most widely used construction material in the world and is responsible for an estimated six to ten percent of global carbon dioxide emissions from human activity. Most of these emissions come from Portland cement, the “glue” that binds aggregate-like sand and gravel into concrete. The emissions associated with concrete can be reduced by minimizing cement use or by using cement alternatives, known as “supplementary cementitious materials” (SCM), such as fly ash, slag, and glass powders.

To date, green building ordinances have focused on reducing operational energy use through increased energy-efficiency requirements and an emphasis on low-emission fuel sources. In general, standards have focused little on reducing embodied carbon emissions generated by the processes associated with the production of a building, including material extraction, transportation, manufacturing, and building construction.

In older buildings, lifetime operational carbon emissions exceed the carbon emissions embodied in the building’s materials, because of the historically higher carbon content of the electricity used in the buildings over their lifetimes. As new construction and upgraded buildings grow closer to achieving zero-net operating energy emissions, embodied carbon emissions from construction materials represent most of the lifetime emissions from these newer, more energy-efficient buildings. Moreover, because the embodied emissions are already emitted by the time

the building is occupied, there is little potential to mitigate those impacts later in the building's life, as is possible with energy-efficiency retrofits for operational emissions.

DISCUSSION

The County of Marin has approved an ordinance to address embodied carbon emissions in concrete by modifying the Building Code to introduce scaling requirements for building permit applicants by either limiting cement content or increasing SCMs. The standards establish a sliding scale of requirement for the maximum amount of cement used for different strength concrete mixes. The new standards apply to all projects requiring a building permit that includes newly poured concrete, and to all public projects developed by the County of Marin.

Alice Zanmiller, the project lead and a planner from Marin County's Community Development Agency's Sustainability Team, will present on the development of the standards, key components of the ordinance, and next steps for implementation of the ordinance.

BUDGET CONSIDERATION / FINANCIAL IMPACT

Funding for the Climate Protection Grant Program was included in the Fiscal Year Ending (FYE) 2018 budget.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Geraldina Grünbaum
Reviewed by: Henry Hilken

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Teresa Barrett and Members
of the Climate Protection Committee

From: Jack P. Broadbent
Executive Officer/APCO

Date: November 18, 2019

Re: Building Electrification Trends and Opportunities

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

Residential and commercial buildings are among the largest sources of carbon emissions in cities and counties across the Bay Area and California. Roughly half of building emissions come from the on-site combustion of natural gas, largely for the purposes of space and water heating. Reducing these emissions is critical to achieving local, regional, and state climate goals. Building electrification is a subject that has attracted a growing amount of attention by public agencies. Almost a dozen local jurisdictions in the state have adopted building energy reach codes that favor or require all-electric new development.

The Air District is working closely with local governments, organizations, and subject matter experts to support the movement toward building electrification. The Air District's 2018 Climate Protection Grant Program features a number of grants aimed at accelerating the switch from natural gas to electricity in commercial and residential buildings. City of Berkeley staff recently presented to this Committee on the City's adoption of an ordinance banning the use of natural gas in most new construction.

DISCUSSION

The Air District has recently partnered with the Building Decarbonization Coalition (BDC) to develop tools and resources to support local government efforts to phase out natural gas use in buildings. BDC is a collaborative of stakeholders and experts across the building and energy sector, acting to decarbonize the built environment through market transformation, consumer outreach, public policy, and research.

Panama Bartholomy, Director of the Building Decarbonization Coalition, will present to the Committee on the importance of building decarbonization in order to meet state and local climate goals, pathways to further reduce GHG emissions in the building sector, decarbonization strategies

led by the Coalition, and opportunities for the Air District and local governments to help accelerate building decarbonization across the Bay Area region.

BUDGET CONSIDERATION/FINANCIAL IMPACT

None.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Axum Teferra
Reviewed by: Henry Hilken

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Teresa Barrett and Members
of the Climate Protection Committee

From: Jack P. Broadbent
Executive Officer/APCO

Date: November 18, 2019

Re: Update on Air District's Building Decarbonization Program

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

In 2017, the Board of Directors adopted the 2017 Clean Air Plan (2017 Plan), which sets a vision for reducing Bay Area greenhouse gas (GHG) emissions 40 percent below 1990 levels by 2030 and 80 percent below 1990 levels by 2050. In the Bay Area, natural gas use from residential and commercial buildings represents approximately 11 percent of the region's GHG inventory. Switching this natural gas use to low-carbon electricity is a critical component of the Air District's climate protection strategy.

The 2017 Plan includes control measures to reduce GHG emissions from buildings by maximizing energy efficiency in both new and existing buildings; increasing production of on-site renewable energy such as rooftop solar; developing and deploying technologies for on-site energy storage; and switching from natural gas to clean electricity, or other renewable energy, for space and water heating, clothes drying, cooking, and other domestic uses. In 2018, the Air District provided funding for a number of local projects designed to reduce natural gas use in buildings through the Climate Protection Grant Program.

State and local policies have set aggressive renewable energy supply targets for the electric grid. In 2018, Senate Bill (SB) 100 established a new statewide target of zero carbon electricity by 2045, with an interim goal of 60 percent carbon-free power by 2030. The many community choice energy programs serving the Bay Area are also fast-tracking the elimination of fossil fuels from their electricity supply. Because of this greening of the electric grid, switching energy use in buildings from fossil fuels to electricity for space heating, water heating, cooking, and clothes drying, will similarly fast-track a decarbonization of the building stock.

DISCUSSION

The Air District has launched a region-wide Building Decarbonization Initiative to support achieving the goals of the 2017 Clean Air Plan. The focus of the initiative, which is a key component of the Air District's region-wide Carbon Dioxide (CO₂) Reduction Strategy, is to

provide policy support, tools, and resources to local governments to accelerate fuel-switching in buildings away from natural gas. Through collaborations with local governments, expert organizations, and our regional agency partners, the Air District is leading a region-wide effort to decarbonize the Bay Area's buildings.

Staff will present on the Building Decarbonization Initiative, including new collaborations, tools and resources under development, and next steps for rolling out assistance to local governments in support of local building decarbonization efforts.

BUDGET CONSIDERATION/FINANCIAL IMPACT

Funding for the contract with the Building Decarbonization Coalition was included in the Fiscal Year Ending (FYE) 2019 budget.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Axum Teferra
Reviewed by: Henry Hilken