



BAY AREA
AIR QUALITY
MANAGEMENT
DISTRICT

ADVISORY COUNCIL REGULAR MEETING

MONDAY
OCTOBER 30, 2017
10:00 A.M.

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

AGENDA

1. **CALL TO ORDER - ROLL CALL – PLEDGE OF ALLEGIANCE**

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

Staff/Phone (415) 749-

2. **APPROVAL OF THE MINUTES OF FEBRUARY 6, 2017 AND APRIL 3, 2017 MEETINGS**

Clerk of the Boards/5073

The Advisory Council will consider approving the draft minutes of the Advisory Council Regular Meetings of February 6, 2017 and April 3, 2017.

3. **PUBLIC COMMENT ON AGENDA MATTERS**

Pursuant to Government Code Section 54954.3, the public has the opportunity to speak on any agenda item. All agendas for Council meetings are posted at the Air District, 375 Beale Street, San Francisco, California 94105 at least 72 hours before a meeting.

This meeting will be webcast. To see the webcast, please visit <http://www.baaqmd.gov/about-the-air-district/advisory-council/agendasreports> at the time of the meeting. Closed captioning may contain errors and omissions, and are not certified for their content and form.

4. **PROTECTING REFINERY COMMUNITIES FROM AIR POLLUTON**
J. McKay/4629
jmckay@baaqmd.gov

Staff will provide an update on the Air District's three-pronged approach to addressing community concerns about air pollution in refinery communities: (1) Direct regulation of emissions; (2) Capping risk from toxic air emissions; and (3) Closely monitoring crude oil properties and refinery pollution.

5. **AIR MONITORING AND ATTAINMENT STATUS OF CRITERIA POLLUTANT STANDARDS IN THE SAN FRANCISCO BAY AREA**
J. McKay/4629
jmckay@baaqmd.gov

Staff will update the Council regarding attainment of criteria pollutant standards.

6. **ADVISORY COUNCIL NEXT AREA OF FOCUS: BEYOND ATTAINMENT – PRIORITIZATION FOR LOCAL HEALTH IMPACTS**
J. McKay/4629
jmckay@baaqmd.gov

The Air District seeks to review its prioritization of efforts based on public health impact.

7. **INTRODUCTION TO THE OFFICE OF ENVIRONMENTAL HEALTH HAZARD ASSESSMENT (OEHHA) IN ANTICIPATION OF FUTURE DISCUSSION REGARDING PARTICULATE MATTER HEALTH EFFECTS**
J. McKay/4629
jmckay@baaqmd.gov

The Council will receive an introduction to the Office of Environmental Health Hazard Assessment (OEHHA).

8. **COMPLEXITY OF PARTICULATE MATTER AND ITS EFFECTS ON HUMAN HEALTH**
J. McKay/4629
jmckay@baaqmd.gov

The Council will hear a presentation from Professor Michael Kleinman regarding particulate matter.

9. **ADVISORY COUNCIL DELIBERATION: BEYOND ATTAINMENT – PRIORITIZATION FOR LOCAL HEALTH IMPACTS**
J. McKay/4629
jmckay@baaqmd.gov

The Council will deliberate on the next area of focus.

10. **ADVISORY COUNCIL TERMS**
J. McKay/4629
jmckay@baaqmd.gov

The Health and Safety Code assigns Council members two year terms.

11. **CHAIRPERSON'S REPORT**

The Chairperson will provide the Advisory Council with a report of recent and upcoming activities.

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

Pursuant to Government Code Section 54954.3, an opportunity is provided for the public to speak on any subject within the Council's purview. Speakers are typically limited to three minutes each.

13. **COUNCIL MEMBER COMMENTS / OTHER BUSINESS**

Council members may make a brief announcement, provide a reference to staff about factual information or ask questions about subsequent meetings.

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

At the call of the Chair.

15. **ADJOURNMENT**

The Council meeting shall be adjourned by the Chair.

CONTACT:

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

(415) 749-5016
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 “Advisory Council” and received at least 24 hours prior, excluding weekends and holidays, in order to be presented at that Council meeting. Any correspondence received after that time will be presented to the Council 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, CALIFORNIA 94105
FOR QUESTIONS PLEASE CALL (415) 749-5016 or (415) 749-4941**

**EXECUTIVE OFFICE:
MONTHLY CALENDAR OF AIR DISTRICT MEETINGS**

OCTOBER 2017

<u>TYPE OF MEETING</u>	<u>DAY</u>	<u>DATE</u>	<u>TIME</u>	<u>ROOM</u>
Board of Directors Budget & Finance Committee <i>(Meets on the 4th Wednesday of each Month)</i> - CANCELLED	Wednesday	25	9:30 a.m.	1st Floor, Yerba Buena Room #109
Board of Directors Mobile Source Committee <i>(Meets on the 4th Thursday of each Month)</i>	Thursday	26	9:30 a.m.	1st Floor Board Room
Advisory Council Mtg. <i>(Meets on Monday Quarterly)</i>	Monday	30	10:00 a.m.	1st Floor Board Room

NOVEMBER 2017

<u>TYPE OF MEETING</u>	<u>DAY</u>	<u>DATE</u>	<u>TIME</u>	<u>ROOM</u>
Board of Directors Regular Meeting <i>(Meets on the 1st & 3rd Wednesday of each Month)</i>	Wednesday	1	9:45 a.m.	1st Floor Board Room
Board of Directors Nominating Committee <i>(At the Call of the Chair)</i>	Wednesday	15	9:30 a.m.	1st Floor Board Room
Board of Directors Regular Meeting <i>(Meets on the 1st & 3rd Wednesday of each Month)</i>	Wednesday	15	9:45 a.m.	1st Floor Board Room
Board of Directors Climate Protection Committee <i>(Meets on the 3rd Thursday of every other Month)</i>	Thursday	16	9:30 a.m.	1st Floor Board Room
Board of Directors Executive Committee <i>(Meets on the 3rd Monday of each Month)</i>	Monday	20	9:30 a.m.	1st Floor Board Room
Board of Directors Stationary Source Committee <i>(Meets on the 3rd Monday of each Month)</i>	Monday	20	10:30 a.m.	1st Floor Board Room
Board of Directors Budget & Finance Committee <i>(Meets on the 4th Wednesday of each Month)</i>	Wednesday	22	9:30 a.m.	1st Floor, Yerba Buena Room #109
Board of Directors Mobile Source Committee <i>(Meets on the 4th Thursday of each Month)</i> - CANCELLED AND RESCHEDULED TO THURSDAY, DECEMBER 7, 2017 AT 9:30 A.M. IN THE YERBA BUENA CONFERENCE ROOM, 1 ST FLOOR	Thursday	23	9:30 a.m.	1st Floor Board Room

DECEMBER 2017

<u>TYPE OF MEETING</u>	<u>DAY</u>	<u>DATE</u>	<u>TIME</u>	<u>ROOM</u>
Board of Directors Regular Meeting <i>(Meets on the 1st & 3rd Wednesday of each Month)</i>	Wednesday	6	9:45 a.m.	1 st Floor Board Room
Board of Directors Mobile Source Committee <i>(Meets on the 4th Thursday of each Month)</i>	Thursday	7	9:30 a.m.	1st Floor, Yerba Buena Room #109
Board of Directors Executive Committee <i>(Meets on the 3rd Monday of each Month)</i>	Monday	18	9:30 a.m.	1 st Floor Board Room
Board of Directors Stationary Source Committee <i>(Meets on the 3rd Monday of each Month)</i>	Monday	18	10:30 a.m.	1 st Floor Board Room
Board of Directors Regular Meeting <i>(Meets on the 1st & 3rd Wednesday of each Month)</i>	Wednesday	20	9:45 a.m.	1 st Floor Board Room
Board of Directors Budget & Finance Committee <i>(Meets on the 4th Wednesday of each Month)</i>	Wednesday	27	9:30 a.m.	1st Floor, Yerba Buena Room #109
Board of Directors Mobile Source Committee <i>(Meets on the 4th Thursday of each Month)</i>	Thursday	28	9:30 a.m.	1 st Floor Board Room

VJ – 10/18/17 - 4:55 p.m.

G/Board/Executive Office/Moncal

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Approval of the Minutes of February 6, 2017 and April 3, 2017

RECOMMENDED ACTION

Approve the attached draft minutes of the Advisory Council meetings of February 6 and April 3, 2017.

DISCUSSION

Attached for your review and approval are the draft minutes of the Council meetings of February 6, 2017 and April 3, 2017.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Marcy Hiratzka
Reviewed by: Maricela Martinez

Attachment 2A: Draft Minutes of the Advisory Council Meeting of February 6, 2017

Attachment 2B: Draft Minutes of the Advisory Council Meeting of April 3, 2017

Draft Minutes – Advisory Council Regular Meeting of February 6, 2017

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

DRAFT MINUTES

Advisory Council Regular Meeting
Monday, February 6, 2017

*Note: An audio recording of the meeting is available on the website of the
Bay Area Air Quality Management District at
<http://www.baaqmd.gov/about-the-air-district/advisory-council/agendasreports>*

1. CALL TO ORDER

Advisory Council (Council) Chair, Stan Hayes, called the meeting to order at 10:03 a.m.

Roll Call:

Present: Council Chair Stan Hayes and Vice Chair Michael Kleinman; and Members:
Professor Severin Borenstein, Dr. Robert Harley, and Dr. Jane Long.

Absent: Member Tam Doduc and Dr. Tim Lipman

Also Present: Cupertino Councilman Rod Sinks, Board of Directors (Board) Liaison.

2. WELCOME (OUT OF ORDER, ITEM 3)

Chair Hayes reviewed the items of the agenda and invited Jack Broadbent, Executive Officer/Air Pollution Control Officer, to remark on the status of the District's rule development. Ex-Officio Advisory Council Member, Director Rod Sinks, summarized the Board's recent discussions of the regulatory initiatives currently under development and noted that the Board desires the Council's insight on this matter.

3. APPROVAL OF THE MINUTES OF OCTOBER 3, 2016 (ITEM 2)

Public Comments:

No requests received.

Council Comments:

Member Borenstein requested that the language at the end of Item 3 (Welcome) be changed from, "the implications of shifting generation to plants outside the territory in which a cap is

being enforced” to “the implications of *moving production* outside the territory in which a cap is being enforced.”

Council Action:

Member Long made a motion, seconded by Member Borenstein, to approve the Advisory Council minutes of October 3, 2016 as amended; and the motion carried by the following vote of the Council:

AYES: Borenstein, Harley, Hayes, Kleinman, and Long.
NOES: None.
ABSTAIN: None.
ABSENT: Doduc and Lipman.

4. PUBLIC COMMENT ON NON-AGENDA MATTERS

No requests received.

OTHER BUSINESS

5. ADVISORY COUNCIL DELIBERATION ON THE KEY QUESTION

The Council began its 6th discussion regarding its opinion on the efficacy of greenhouse gas (GHG) caps on local refineries, with the intention of finalizing the summary of its deliberations on the matter. Revisions made to the summary since the previous Council meeting on October 3, 2016 were reviewed, and then Chair Hayes asked for final revisions.

Public Comments:

Public comments were made by Roger Lin, Communities for a Better Environment (CBE).

Council Comments on the Document in General:

The Council and staff discussed the potential for benefits from caps if caps are applied broadly enough, trade is controlled, and border adjustments are imposed.

Council Comments on “Discussion” Section:

The Council and staff discussed how the language on Draft Rule 11-18 is a summary of the Draft Staff Report, and not the Council’s opinion; property damage resulting from climate change; global climate change versus regional climate change; the range of time that should be considered when referring to the global warming potential of methane; how effective GHG policies that reduce gasoline demand may be in reducing gasoline usage and GHG emissions; and whether the District should support the *deployment* of carbon capture and sequestration, or only support research.

Council Comments on “Guiding Principles” Section:

The Council and staff discussed the California Air Resources Board’s (CARB) leakage policy within the Cap and Trade Program; whether the State’s variance to apply standards that are more stringent than federal standards applies to GHG; and the District’s authority to regulate stationary sources, but not mobile sources.

Council Action:

Chair Hayes made a motion, seconded by Member Borenstein, to approve the summary of the Council’s opinion on the key question as amended; and the motion carried by the following vote of the Council:

AYES: Borenstein, Harley, Hayes, Kleinman, and Long.
NOES: None.
ABSTAIN: None.
ABSENT: Doduc and Lipman.

6. PRESENTATION ON REGULATION 13, RULE 1: REFINERY CARBON INTENSITY CAP

Dr. Jeff McKay, Deputy Air Pollution Control Officer, stated that staff and the Board are seeking input from the Council on the development of Draft Regulation 13, Rule 1. Mr. Broadbent added that Board members have expressed interest in having Draft Rule 13-1 be an alternative to Draft Rule 12-16. Dr. McKay introduced Eric Stevenson, Director of Meteorology, Measurement, and Rules, who gave the staff presentation *Regulation 13, Rule 1: Refinery Carbon Intensity Caps*, including: issues; proposed solutions; impact of stack height at refineries; cancer risk drivers for a typical large refinery; top sources of GHG emissions at a typical large refinery; refinery rulemaking history and progress; Draft Rule 11-18; key factors in refinery carbon intensity; standard, heavy/sour, and light/sweet operations; crude oil comparison; impact of Rule 13-1 carbon intensity limit; comparison of Rules 12-16 and 13-1; schedule; and next steps.

Public Comments:

Public comments were given by Bill Quinn, California Council for Environmental and Economic Balance; Greg Karras, CBE; and Bob Brown, Western States Petroleum Association.

Council Comments:

The Council and staff discussed the distinction that benzene and diesel particulate matter are not GHG, despite being included in a chart of top sources of GHG emissions at typical large refineries; the status of the installation of fence line monitors around the refineries as required by Rule 12-15, and the public’s reservations about refineries’ self-regulation of monitors; the number of Bay Area refineries that have operating coker units, and toxic pollutants emitted from the coking process; the proposed GHG and criteria pollutant emissions limits of Draft Rule 12-16, and the history of how limits were imposed on different units; the issues that District staff believes would result from Draft Rule 12-16, and which of those issues relate to GHG caps versus criteria pollutant caps; the District’s development of a toxics regulation (Draft Rule 11-18) designed to directly address local impacts to refinery communities; other sources of toxics

throughout the Bay Area, and the need for a presentation to the Council on the Rule, as it seeks to establish a risk management threshold for all Bay Area stationary sources; Draft Rule 13-1’s compatibility with CARB’s 2030 Scoping Plan; how Draft Rule 13-1 would require additional refinery projects, that may increase production, to offset their emission increases; worldwide gas emissions versus California gas emissions; the types of refinery emissions that were to be reduced by twenty percent per *District Resolution 2014-07: Addressing Emissions from Bay Area Refineries*; the criteria for evaluating a rule’s effectiveness; how broadening the purview of the word “toxic” (beyond the cancer risk factor) reveals that Draft 13-1 and 12-16 would indirectly contribute to the reduction of toxic emissions; the appropriate risk threshold for Draft Rule 11-18, and the Council’s opinion of how conservative and achievable the staff-recommended threshold of ten-in-one-million is; and the types of refineries in the Bay Area.

The Council recessed at 12:25 p.m., and resumed at 1:22 p.m.

The Council and staff resumed their discussion, which included the following: District staff’s acknowledgment of the environmental justice community’s view on local criteria pollutants; the District’s efforts to examine sources that may have more localized impacts for Particulate Matter (PM); fee structures for toxics and criteria pollutants; the purpose of having local GHG reduction programs, despite the existence of the Cap and Trade Program; and the difference between PM₁₀ and PM_{2.5}.

Council Action:

None; receive and file.

7. ADVISORY COUNCIL DELIBERATION ON THE DRAFT 2017 CLEAN AIR PLAN/REGIONAL CLIMATE PROTECTION STRATEGY

Dr. McKay explained that the Council’s input was requested on the Draft Clean Air Plan, with particular attention to the Executive Summary for first chapter. Dr. McKay introduced Henry Hilken, Director of Planning and Climate Protection, who gave the staff presentation *Advisory Council Deliberation on the Draft Clean Air Plan/Regional Climate Protection Strategy*, including: critical challenges; what is this plan?; climate challenge in the Bay Area; healthy air for all Bay Area residents; where do we want to be in 2050?; how does this plan get us there?; priority actions; input into this plan; Bay Area leadership; next steps; and open house highlights.

At this time, a video promoting *Spare the Air, Cool the Climate*, was shown.

Public Comments:

No requests received.

Council Comments:

The Council and staff discussed Bay Area GHG projections to 2050 with key state programs; the distribution and frequency of the airing of the video; the distinction between what people are willing to change and what changes will actually be effective solutions to climate issues; the misconception that switching to clean technology will have the same effect as reducing emissions at the source; projections of an increase in electricity demand due to population

growth and electrified transportation, and the feasibility of nuclear power; the feasibility of electrifying the aviation sector; the effectiveness of the Plan’s presentation boards at the Open Houses, and the suggestion of giving them greater visibility to show how the pieces of the Plan fit together; how certain requirements and data that are visible only in the Plan’s Appendices should be included in the actual text of the Plan to show the progress that has been made; the need for focus on efficiency, electrification, and decarbonization in the future; reduced population exposure; making intra-regional mobility within the Bay Area a focus for the Plan, in the event that people continue to live too far from their destinations for walking or biking to be feasible; the distinction between the time scales of climate measures and air quality control measures (long term versus short-term); staff’s request for the Council’s future deliberations on disproportionately impacted communities in local exposure to air pollution and improvements to the Community Air Risk Evaluation (CARE) program; the Council’s suggestion to reconsider the word “eliminating” in the phrase “eliminating disparities”; the Council’s desire to see the District focus on programs that have a regional and comparative advantage to existing State programs; the socioeconomic impact of the District’s regulatory programs; and the Council’s interest in making the Plan more strategic.

Council Action:

None; receive and file.

8. CHAIRPERSON’S REPORT

Chair Hayes announced that the Air & Waste Management Association’s Annual Conference will be held in Pittsburgh, PA from June 5-8, 2017 and asked members of the Council who are interested in attending to let him know.

9. PUBLIC COMMENT ON NON-AGENDA MATTERS

No requests received.

10. COUNCIL MEMBER COMMENTS / OTHER BUSINESS

None.

11. TIME AND PLACE OF NEXT MEETING

During the meeting, the next Advisory Council meeting was tentatively scheduled for April 3, 2017. Chair Hayes requested that staff poll the members of the Council to confirm the date.

12. ADJOURNMENT

The meeting adjourned at 2:59 p.m.

Marcy Hiratzka
Clerk of the Boards

Draft Minutes – Advisory Council Regular Meeting of April 3, 2017

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

DRAFT MINUTES

Advisory Council Regular Meeting
Monday, April 3, 2017

*Note: An audio recording of the meeting is available on the website of the
Bay Area Air Quality Management District at
<http://www.baaqmd.gov/about-the-air-district/advisory-council/agendasreports>*

1. CALL TO ORDER

Advisory Council (Council) Chair, Stan Hayes, called the meeting to order at 10:06 a.m.

Roll Call:

Present: Council Chair Stan Hayes and Vice Chair Michael Kleinman; and Members: Professor Severin Borenstein, Dr. Robert Harley, Dr. Tim Lipman, and Dr. Jane Long.

Absent: Member Tam Doduc.

Also Present: Cupertino Councilman Rod Sinks, Board of Directors (Board) Liaison.

2. APPROVAL OF THE MINUTES OF FEBRUARY 6, 2017

Public Comments:

No requests received.

Council Comments:

Chair Hayes made the following comments about the minutes of February 2017: the “Welcome” item should refer to staff’s welcome, and not the Chairperson’s welcome; public comments on non-agenda matters are to be heard during the item called “Public Comments on Non-Agenda Matters”, and public comments on agenda matters are to be heard during the item called “Public Comments on Agenda Matters”; and the Council prefers a summary of what the Council discussed during individual items, especially in matters that lack a written report.

Council Action:

Chair Hayes moved that the approval of the minutes of February 6, 2017 be postponed until the revisions are made. The Council agreed by consensus.

3. WELCOME

Jack Broadbent, Executive Officer/Air Pollution Control Officer, announced that the District published a press release regarding its concern about the Executive Order that rolled back some of the proposals relative to the Obama Administration’s Clean Power Plan. Mr. Broadbent said that the press release would be sent to the Council Members as well.

At this time, Chair Hayes asked Ex-Officio Board Liaison, Rod Sinks, if he would like to make any comments on behalf of the Board. Director Sinks reported that the Board has been in discussions regarding Draft Rules 12-16, 11-18, and 13-1, and hearing the public’s opinion as well, and thanked the Council for its findings and deliberations, as the Board will soon be considering these rules for adoption. Mr. Broadbent echoed Director Sinks’ appreciation of the Council’s work regarding rules currently under development.

4. PUBLIC COMMENT ON NON-AGENDA MATTERS

None.

5. PRESENTATION ON REGULATION 11, RULE 18: REDUCTION OF RISK FROM AIR TOXIC EMISSIONS AT EXISTING FACILITIES; REGULATION 12, RULE 16: PETROLEUM REFINING FACILITY-WIDE EMISSIONS LIMITS; AND REGULATION 13, RULE 1: REFINERY CARBON INTENSITY CAP

Eric Stevenson, Director of Meteorology, Measurement, and Rules, gave the staff presentation *Rule Development Update - Regulation 11, Rule 18; Regulation 12, Rule 16; and Regulation 13, Rule 1*, including: overview; Bay Area emissions: criteria air pollutants, toxic air contaminants, and greenhouse gasses (GHG); refinery strategy progress and summary; Draft Rule 11-18 background, purpose, basics, and reducing health risks; Draft Rule 12-16 basics and potential issues; Draft Rule 13-1 purpose and first rule of combustion strategy; schedule; next steps, and summary.

Public Comments:

None.

Council Comments Regarding Draft Rule 11-18:

The Council and staff discussed how Diesel Particulate Matter (PM) accounts for the vast majority of cancer risk from toxic air contaminant emissions in the Bay Area, the District’s lack of authority over establishing standards for and regulation of mobile sources of air pollution, the District’s current grant programs regarding mobile sources, enforcement of the California Air Resources Board’s (CARB) mobile source regulation that the District is allowed to carry out, and whether those are stringent enough, and possible indirect source authority in the future; whether a gross overstatement of activity in the (on and off-road) construction sector may be contributing to the high cancer risk from construction equipment emissions; how facilities would be affected as the cancer risk action level is decreased to from 100 in a million to 10 in a million; ancillary benefits that the District believes will result from Draft Rule 11-18; future regulation pertaining to gas storage; and the fact that several of the slides display emissions and risk level data from

2014 (a year in which CARB began retrofitting on-road trucks) which may not be indicative of forward-looking regulatory activity.

Council Comments Regarding Draft Rule 13-1:

The Council and staff discussed the assigning of GHG numbers to power that would be purchased, in concert with CARB’s efforts; how the proposed carbon intensity would not include GHGs emitted at the point of extraction, nor the transportation of crude; how the proposed rule would allow refineries to operate within their current crude slate windows in order to minimize leakage; the proposed required implementation of energy efficiency projects with simple payback of ten years or less, why the District chose that payback threshold, and which party would calculate payback deadlines; whether the District’s attempt to implement direct GHG policies on local communities would derail CARB’s efforts on what is actually a global issue, and the District’s objective of addressing the public’s concern about GHG emissions and providing a stopgap between what the District believes will hold refineries to their current product and crude slate levels, until CARB implements its revised Scoping Plan; how the District feels Draft Rule 13-1 would complement CARB’s revised Scoping Plan; the fact that, because GHGs are global pollutants, there are no benefits to the Bay Area by reducing GHG emissions in the Bay Area if leakage occurs, and the District’s desire to nonetheless implement the regulation and establish climate leadership; the argument that efforts on this rule diverts staff’s attention from regulating local pollutants; a direct regulatory measure in CARB’s revised Scoping Plan to achieve a 20% reduction from the refinery sector statewide; the comparison of Bay Area refinery production rates and subsequent GHG emissions with those in refineries outside the Bay Area; how big a region should be before GHG regulation can be implemented without the fear of leakage, and the feasibility of collaborating with other California Air Districts in order to form more widely-enforced regulations; the need for a consumption-side intervention, versus a production-side intervention, in order to make a difference in GHG emission reductions; how each refinery would have a different carbon intensity based on its current operations; and concern by the environmental justice community of local pollution, but not of global climate change.

Council’s Consensus on Draft Rules

- 11-18: The Council supports this Draft Rule. Toxics and criteria pollutants are best addressed directly through existing programs rather than indirectly as co-benefits of greenhouse gas regulations.
- 13-1: The Council felt that it did not have enough information to form an opinion about this Draft Rule at this time. Staff (and CARB) are to bring it back to the Council prior to consideration of its adoption.
- 12-16: The Council opposes this Draft Rule because it feels that the cap is unlikely to be effective in addressing climate change or improvements the air in refinery communities, and will cause leakage.

Council Action:

None; receive and file.

The Council recessed at 11:51 a.m. and resumed at 12:45 p.m.

6. ADVISORY COUNCIL NEXT AREA OF FOCUS

Mr. Broadbent introduced this item by describing the District’s areas of regulatory focus since its inception in 1955, and how the foci evolved over time. These included reducing emissions that contribute to regional air contaminants (ozone, PM, volatile organic compounds [VOC], and NOx); establishing a climate program; supporting local government monitoring efforts and implementing CARB regulations as part of a partnership arrangement with the State; wood smoke regulation; characterizing local concentrations of toxic air contaminants; and developing an understanding of toxic air contaminants regarding criteria contaminants. Mr. Broadbent stated that the District’s objective of understanding local impacts at a community-based level and accordingly targeting its grants produced the District’s Community Air Risk Evaluation (CARE) program, which was the topic of the presentation. Mr. Broadbent emphasized that the CARE program represents the important work that the District is doing to characterize and address disproportionately impacted communities in and around the Bay Area, and asked the Council to provide direction to staff, as this is a broad topic and would take many months to properly deliberate. Mr. Broadbent introduced Henry Hilken, Director of Planning and Climate Protection, who gave the staff presentation *Advisory Council Next Area of Focus*, including: CARE program introduction and background; Bay Area air quality is improving; overall air pollution down, but higher risks in some communities; CARE program goals; CARE builds upon traditional air quality attainment programs; community engagement integral to CARE program; air pollution and health records mapped to zip code areas; map areas with highest air pollution health impacts; Bay Area communities most impacted by air pollution; framework for reducing community health impacts (RECEPTORS were mentioned by staff here); partnered with San Francisco City Planning and the Department of Public Health on Community Risk Reduction Plan; new methods needed for community - scale air pollution management; and more information.

Public Comments:

None.

Council Comments:

The Council and staff discussed the difficulty of modeling the synergy of multiple existing co-pollutants; the progression and limits of technical advances in air quality monitoring; the conflict between transit-oriented development and refraining from building near sources of air pollution; the variations of exposure that can exist within a CARE community; the elements of the District’s update of the CARE program, which will use a base year 2015 inventory; how to define “clean air” and protect disproportionately impacted communities from cumulative, regional emissions, while taking into account how to balance the health impacts, risk, and concentrations of multiple air pollutants; possible medical institutions and public agencies that could provide the District with appropriate health statistics and modeling techniques; comparative risk, and how to minimize risk; the need for public education on how to reduce health impacts and distinguish short-term health effects, risks, and benefits from long-term ones; risk perception and public “dread” factors; the request for a presentation on whether local GHG emissions could be reduced by containing methane produced by organic decomposition; the suggestion of expanding CARE’s criteria to include non-cancer health effects (such as heart attacks and strokes); the need to make better use of underutilized sites (exposure zones) and the District’s guidance document that promotes healthy infill development, called *Planning Healthy Places*; how the District responds to, and the District’s role regarding acute air pollution-related

incidents, and the types of alerting systems that are in place for refinery-adjacent communities; the Council’s request that the District’s Clean Air Plan be brought back for discussion, focusing on the feasibility of a zero-emissions electricity system versus 100% renewable electricity; UC Berkeley’s continuing research on relative levels of diesel truck emissions resulting from the implementation of CARB’s Truck and Bus Regulation, which requires trucks and buses to either upgrade their engines to newer models or replace their filters according to their weight; the District’s ozone attainment strategies and how they related to nitrogen oxide (NO_x) and VOC reductions; the feasibility of exceeding national PM and ozone standards as preventative measures; how District fees, pertaining to PM and ozone, are structured; and the need for the generation of revenue that can be used to help disadvantaged communities.

Council Action:

None; receive and file.

OTHER BUSINESS

7. CHAIRPERSON’S REPORT

Chair Hayes announced that Council Members who wish to attend the 110th Annual Air and Waste Management Association Conference on June 5 should alert District staff for registration. He mentioned District staff that will be making presentations and noteworthy conference sessions.

8. PUBLIC COMMENT ON NON-AGENDA MATTERS

No requests received.

9. COUNCIL MEMBER COMMENTS / OTHER BUSINESS

Council Member Harley gave an update on the research that his UC Berkeley team has been conducting regarding the on-road measurement of emissions from heavy-duty diesel trucks, the impacts of fleet turnover, and CARB’s drayage truck regulation.

Director Sinks announced that Silicon Valley Clean Energy will be celebrating its service launch today (April 3, 2017.)

10. TIME AND PLACE OF NEXT MEETING

Chair Hayes asked District staff what the anticipated months of future meetings (in 2017) would be, and staff preferred July and October. The next meeting was tentatively scheduled for July 17. Ex Officio Board Member Sinks said that if the Board considers the adoption of Draft Rule 11-18 before July, he would like the Advisory Council to confirm the Council’s position on the rule prior to that July Board meeting. Upon hearing this request, the Council Members present supported Draft Rule 11-18.

11. ADJOURNMENT

The meeting adjourned at 2:32 p.m.

Marcy Hirtzka
Clerk of the Boards

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 16, 2017

Re: Protecting Refinery Communities from Air Pollution

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

In 2012, staff began a rule development process designed to address communities' concerns regarding air pollution from refineries and the potential of these emissions to increase due to changes in crude oil inputs. The Air District has taken a three-pronged approach to addressing these concerns: (1) *Direct regulation of emissions*; (2) *Capping risk from toxic air emissions*; and (3) *Closely monitoring crude oil properties and refinery pollution*.

Direct regulation of emissions is being implemented through traditional Best Available Retrofit Control Technology (BARCT) rulemaking required under the California Health and Safety Code. In October 2014, the Board directed staff to develop rules to reduce refinery emissions by 20% or as much as feasible by 2020. In December 2015, the Board approved three rules projected to reduce refining criteria pollutant emissions by 14%. In April 2016, the Board adopted a fourth rule that would reduce refining emissions by up to an additional 3%. Staff is working on two more rules that will further criteria pollutant emissions from refining operations. These rules will be brought to the Board for consideration in 2018.

Risk from toxic air contaminants will be capped under proposed Rule 11-18. This rule applies to all significant, multi-category, sources of risk, including the refineries. Under proposed Rule 11-18, impacted sources will have to minimize risk from toxic air pollutants to the lowest levels feasible. Proposed Rule 11-18 will be brought to the Board for consideration on November 15, 2017.

Air District staff can now closely monitor crude oil properties and refinery emissions due to the Board's adoption of Rule 12-15 in April 2016. This rule requires the refineries to make historical and ongoing data about crude oil properties available to the Air District. It also requires the refineries to install and operate fence-line monitoring systems and make that information available to the public. And, it increases the accuracy of the Air District's emissions inventory for the refineries. These tools, combined with community monitoring operated by the Air District, will

allow Air District staff to monitor changing crude slates and ensure that any significant changes in emissions due to changing crude slates can be identified and addressed.

DISCUSSION

Staff will provide an update on all three tools being used to protect refinery communities from air pollution. Staff will also provide an update on the next steps in the coming year and how Assembly Bill 617 will fit into and extend and strengthen these efforts.

Regarding direct regulation; staff will provide detailed estimates of expected emission reductions from regulations already in place, including significant particulate matter reductions from fluid catalytic cracking units. Staff will also provide an updated schedule for rules that will further reduce emissions from refineries along with estimated emission reductions for those rules.

Regarding capping risk from toxic air contaminants; staff will provide an update on Rule 11-18, including changes made in response to comments from stakeholders and an estimate of the benefits of the proposed risk action levels.

Regarding refinery crude oil monitoring; staff will provide a status on the implementation of Rule 12-15 and will describe how the data collected under the rule will be used to identify any changes in emissions due to changes in crude oil properties, such as a possible switch to heavier and more sulfurous crudes from Canada or Venezuela.

Finally, staff will provide information on how the BARCT and community emission reduction plan requirements of AB 617 provide a roadmap for the next steps in reducing air emissions in refinery communities.

BUDGET CONSIDERATIONS/FINANCIAL IMPACTS

No additional costs. This is an update on ongoing activities already accounted for in the current, approved budget.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Greg Nudd

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/Air Pollution Control Officer

Date: October 17, 2017

Re: Air Monitoring and Attainment Status of Criteria Pollutant Standards in the San
Francisco Bay Area

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

Much of the Bay Area Air Quality Management District's (Air District) past efforts have focused on bringing ambient concentrations of criteria pollutants below the state and federal standards. Although some of these standards have gradually become more stringent, the Air District has succeeded in reducing ambient concentrations such that attainment with federal and state standards has been almost entirely achieved. Continuous air monitoring tracks and documents whether these standards are met and maintained.

Staff will provide information on the current National Ambient Air Quality Standards (NAAQS), State Ambient Air Quality Standards (SAAQS), attainment status of the Air District for criteria pollutants and the locations of air monitoring stations throughout the Bay Area.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Advisory Council Next Area of Focus: Beyond Attainment – Prioritization for Local
Health Impact

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

The San Francisco Bay Area is at, or near, attainment for criteria pollutants. Yet negative health effects from air pollution remain. The Bay Area Air Quality Management District (Air District) seeks to review its prioritization of efforts based on public health impact. The Air District has deployed its Community Air Risk Evaluation (CARE) program to identify locations that experience the highest levels of pollution-related health impacts. Important work remains to further characterize the nature and source of the impacts and to prioritize actions.

DISCUSSION

Federal and State standards in place for criteria pollutants provide targets for ambient air, but may not provide protection from local concentrations. In addition, progress in health science suggests that significant impacts may exist below the standards.

In seeking to prioritize its efforts based on health effects, the Air District is engaging in work to both better characterize local emissions, and to further advance the understanding of health impacts from those emissions. The cumulative effect of multiple pollutants is of importance in the most impacted locations. The effect of particulate matter is especially concerning in this regard. Particulate matter exists in a wide variety of forms, may serve as a carrier for other compounds, and may evolve rapidly after emission. Therefore, particulate matter is an appropriate first topic for review of the Air District's prioritization of actions to reduce public health effects from air pollution.

Air District staff will suggest future agenda items for this topic.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Introduction to the Office of Environmental Health Hazard Assessment (OEHHA) in
Anticipation of Future Discussion Regarding Particulate Matter Health Effects

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

The Office of Environmental Health Hazard Assessment (OEHHA) has conducted several epidemiological studies on the health effects of particulate matter in California, and is working on a number of studies looking at other widespread air pollutants identified in the Clean Air Act. These studies join other studies done in California, nationally, or internationally that examine the health impacts of air pollution exposure.

Work at OEHHA has focused on a number of areas based on two legislative mandates: 1) the ascertainment of air pollution constituents most strongly linked to disease, and 2) the identification of subpopulations most vulnerable to the impacts of pollutants (e.g. young children, the elderly, low socioeconomic status individuals).

DISCUSSION

The Bay Area Air Quality Management District anticipates an ongoing discussion with OEHHA and the Advisory Council regarding approaches to mitigation of local health effects due to particulate matter.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Complexity of Particulate Matter and its Effects on Human Health

RECOMMENDED ACTION

None; receive and file.

BACKGROUND

Although the Bay Area is near attainment for criteria air pollutants, many local concerns remain, especially for certain disproportionality affected communities. The Air District employs its Community Air Risk Evaluation (CARE) program to characterize and address the disproportionate air quality impacts around the Bay Area. Particulate Matter (PM) may have the largest air quality impact on public health in these areas.

Particulate matter (PM) is a broad designation for a complex set of materials. PM may include dry solid fragments, solid cores with liquid coatings and small droplets of liquid, as well as varying combinations of these forms. The shape, size and chemical composition extend across a wide range including sources related to soot, soil, dust and combustion.

DISCUSSION

Professor Michael Kleinman will discuss the role of toxic organic components of ambient particles in the development of inflammation and oxidative stress that leads to damage of the heart, lung and brain. Studies demonstrate neurological and cardiopulmonary effects of inhaled particles, including nanomaterials and ultrafine, fine and coarse ambient particles in humans and laboratory animals. Professor Kleinman's recent health effects studies have demonstrated that inhalation of combustion-generated particles can promote airway allergies and accelerate the development of cardiovascular disease and that these effects may be associated with organic and elemental carbon components of the ultrafine fraction of the ambient aerosol. His studies have also demonstrated that inhalation of ambient particles is associated with persistent inflammation in the brain and that particles associated with manganese can alter dopamine and serotonin levels in the brain and can cause changes in nerve structure during brain development. Professor Kleinman's recent work also includes studies of firefighter exposure to particulate matter.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Advisory Council Deliberation: Beyond Attainment – Prioritization for Local Health
Impacts

RECOMMENDED ACTION

None; receive and file.

DISCUSSION

Following presentations regarding the Bay Area attainment status for criteria pollutants and particulate matter, the Advisory Council will deliberate on the information provided, and on next steps to inform the Council further on these topics

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay

BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Memorandum

To: Chairperson Stan Hayes and Members
of the Advisory Council

From: Jack P. Broadbent
Executive Officer/APCO

Date: October 10, 2017

Re: Advisory Council Terms

RECOMMENDED ACTION

None; receive and file.

DISCUSSION

Per the Health and Safety Code Section 40263, each Council Member shall hold office for a term of two years and until the appointment and qualification of his/her successor.

Respectfully submitted,

Jack P. Broadbent
Executive Officer/APCO

Prepared by: Jeff McKay