WATER RECLAMATION
SOLID WASTE MANAGEMENT

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OF LOS ANGELES COUNTY

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August 1, 2008
File No.: 31-380.10B

Ms. Edie Chang
Chief, Planning and Management Branch
California Air Resources Board
1001 I Street
P.O. Box 2815
Sacramento, CA 95812

Dear Ms. Chang:

Comments on June 2008 Climate Change Draft Scoping Plan

The Sanitation Districts of Los Angeles County (Sanitation Districts) appreciate this opportunity to comment on the discussion draft. The Sanitation Districts provide environmentally sound, cost-effective wastewater and solid waste management for about 5.3 million people in Los Angeles County and, in the process, convert waste into resources such as reclaimed water, energy, and recycled materials. The Sanitation Districts' service area covers approximately 800 square miles and encompasses 78 cities and unincorporated territory within the County through a partnership agreement with 24 independent special districts.

This letter is divided into two sections. The first section contains our General Comments followed by specific comments on the draft Scoping Plan. The second section contains the bulk of our more specific comments on the Appendices, including Water Recycling and Waste Management, and other sections of the Appendices. Finally, we have comments on Program Design.

The Sanitation Districts respectfully offer the following General Comments on the draft Scoping Plan proper:

General Comments

1. It appears that the 111th Congress will pass some type of climate change program modeled perhaps after the proposals of Senators Boxer-Lieberman-Warner and/or Representative Edward Markey. We strongly believe that CARB must take affirmative steps in Washington and insert itself into the legislative process to assure

that our early actions here in California will be protected or that our program here will be deemed equivalent. It would be a significant disadvantage to California if the starting point of a federal program were drawn such that California business would have to re-reduce their GHG emissions. One area (of many) that CARB should focus on in Washington is to make sure that any bill that does work its way through Congress has sufficient free allocations assigned to early action programs contained in State programs.

2. The California GHG regulatory program should be considered a transitional program and should be designed to fit into an eventual federal GHG program that can reasonably be expected to have allocations, auctions, credits, and offsets.

3. Many stationary sources in California are already at BACT or BARCT levels and little room remains to do better. In SCAQMD's 2007 AQMP, for example, Multiple Component Sources Control Measure MCS-01 will move most combustion sources in the South Coast Air Basin from BARCT to BACT during the 2010-2023 timeframe. Hence there will be very little opportunity for further in-plant emissions reductions given that BACT is the best that can be done. Most stationary sources therefore, very early into the Scoping Plan regulatory cycle, will be forced to rely heavily on offsets to meet declining caps under a cap-and-trade (C&T) program. The use of offsets will be critical to survive the early stages of a (C&T) environment. These offsets must not be arbitrarily limited either numerically or geographically.

4. The yet-to-be released Environmental Impacts appendix should be expanded to serve as the CEQA document for GHGs for the entire program as laid out by the Scoping Plan. It is not productive for local governments, for instance, to re-hash arguments in favor of a project that is implementing a measure contained in the Scoping Plan when CARB, better than anyone else, understands the big picture and how the specific action fits into the scheme of things. CARB should weigh in on behalf of the local government in defending actions with all state agencies that are consistent with the Scoping Plan as part the obligations imposed by the legislature as a result of AB 32. If an outright Categorical Exemption cannot be negotiated by CARB, then any actions consistent with the Scoping Plan and requiring environmental documentation could rely upon the documentation prepared for the Scoping Plan to satisfy at least the GHG portion or aspect of the associated project EIR. CARB should prevail upon OPR and RA that compliance with the Scoping Plan covers a project's GHG issues, if any, under CEQA.

5. Local governments will need ARB assistance implementing many of the Scoping Plan proposals, as many of them will be controversial and unpopular with constituents. The public may not fully understand or appreciate the nexus between the proposed projects and its GHG benefits. Frequently there is community

opposition to such projects as waste-to-energy or high density, mixed-use infill projects, for example. CARB needs to allocate resources to partner with the local governments that are making good faith attempts to implement the goals and objectives of the Scoping Plan.

6. ARB should consider an escape clause if things under the Scoping Plan simply become too expensive or cumbersome for Californians. The escape clause should be triggered by obvious indicators, such as the price of consumer goods. If the hurdles become too formidable, California needs to have the opportunity to re-visit the program to avoid voter backlash.

7. The Scoping Plan should contain a discussion of what will happen to California's program in the event of federal pre-emption.

8. Facility audits for the purpose of identifying criteria air pollutants and toxic air pollutants (C-103) is simply not appropriate in a GHG-targeted effort.

9. Estimates of co-benefits associated with a specific control measure are elusive. This is further complicated in that several air districts have already claimed as theirs any co-pollutants reduced as a result of state climate change strategies (see SCAQMD's 2007 AQMP Control Measure MOB-07 where co-benefits of fuel efficiency improvements and renewable energy sources accrue to the benefit of the SCAQMD). Co-benefit calculations in the footnotes in the cost estimates at the bottom of each control measure in the cases above is very likely zero.

10. Implementation should start slowly, akin to putting one's big toe into a tub of hot water before jumping in, so as not to cause irreversible effects by a rush to action. No justification has been offered for the need to "quickly transition" (Page 18) from a system where the state provides some free allowances to a system where the majority of the allowances are auctioned in the trading market. This is especially true if an auction system is implemented. At the outset of a program this large and with such potential financial impacts, only a small amount of allocations should be auctioned initially and then gradually increased until the regulators and the regulated entities become acclimated, and the market matures.

11. ARB should referee the CAT state agencies as they implement their GHG plans to ensure that the Scoping Plan's over-arching goals are accomplished and that agency carbon shadows are minimized. There is a real possibility that other state agencies in their zeal to charge ahead with GHG reduction programs may actually be exacerbating the conditions the Scoping Plan is attempting to control. Only time will tell in some of these situations. A good example would be in water resources, for example, if the SWRCB mandated a fixed percentage of water recycling to occur at

each an every wastewater treatment plant in California. This mandate might not be appropriate at certain facilities where for a variety of reasons the GHG emissions associated with the recycling technology outweigh the benefits of the produced water.

12. Reciprocating engine installation and operation in California as a result of various AQMPs and distributed generation legislation and regulations have all but removed this prime mover as a viable motive force in California. We urge the ARB not to insist upon across the board electrification as this will seriously impact California's ability to respond to emergencies such as earthquakes. Portable equipment will be needed to dig us out and stationary equipment will be needed in the event central utility plants and/or transmission lines are knocked out.

13. Superposing C & T atop command and control rules for the same source categories could increase the overall program cost. Command and control strategies should be used as backstops, to be phased in only if C & T doesn't achieve the required targets within a specific period of time.

14. Permitting actions for projects that are consistent with the Scoping Plan should receive some form of streamlined processing or at the minimum, expedited processing, so that the project can get under construction as soon as possible.

15. Aside from a brief mention on pages 54 and 57 of the document that they will be considered in the final Scoping Plan, the draft Scoping Plan is essentially silent on small business impacts. The offering of incentives by utilities will not be a universal panacea as the businesses in question are so varied in nature. We think the most effective way to protect small businesses in California, that provide most of the jobs in California, is to structure some type of free allocation program or provide funds from the sale of allocations for small business grants to purchase technology to comply the spirit of the Plan.

Specific Comments on the Draft Scoping Plan

1. Introduction, Part A, Section 2, Pages 2-3: The text describing AB 32 should include HSC §§ 38560.5(e) and 38562(b)(9) directing the ARB to take into account the relative contribution of each source or source category. The text should also mention HSC §§ 38560.5(b) and 38562(c) directing the ARB to establish a market-based mechanism to effect the emissions reductions.

2. Introduction, Part A, Section 2,Page 3: The ARB should do more than issue a policy statement encouraging voluntary early actions. Thus far, there are scant assurances that these actions will be protected under the Scoping Plan. Providing an estimate of

the emissions reduction potential of these actions may help support stronger measures.

3. Introduction, Part A, Section 3, Page 4: The text mentions that the Climate Action Team Members submitted more than 100 greenhouse gas reduction measures in March 2008. Please make this available as an appendix.

4. Introduction, Part B, Page.8: The text mentions that the forest sector is unique in that forests both emit greenhouse gases and uptake CO_2. We feel that both the landfill industry and wastewater treatment also share that same capability. Carbon is sequestered in both biosolids products and in landfills, and the application of compost in lieu of industrial fertilizer not only is a net benefit in terms of life-cycle emissions, but also increases soil uptake of carbon. Both sectors may constitute significant sinks for carbon that are currently unaccounted for in the state's inventory. Research is underway to better define the sequestration potential of these industries.

5. Preliminary Recommendations, Section C, Boiler and Engine Efficiency, Page 40: The ARB should recognize, as the SCAQMD has in their Rule 1146.1, that there is often an inverse relationship between fuel efficiency and more stringent criteria pollutant emissions standards. ARB should recognize that a state-wide call for increased efficiency could bump up against criteria pollutant limitations in non-attainment areas; areas that probably contain the majority of the state's stationary sources.

6. Analysis, Section A, Environmental Analyses, Page 58, Table 24: It seems very little is gained here given that the transportation sector has not faced the same BACT and BARCT pressures limiting permitted stationary source emissions.

7. Preliminary Recommendations, Part B, Section 1, Cap and Trade Program, Pages 15-20: We strongly support the state's efforts to implement a cap and trade program. We feel that this approach is the proper mechanism to take the state not only to its 2020 goal but also well beyond. We are also encouraged that the ARB has retained staff from the European Union to bring their experience to the California effort. Nevertheless, although the Draft discusses on how the cap and trade system would work, there is little discussion on the advantages the program would bring. We realize that ARB is under pressures to opt for a carbon tax instead or command and control regulation. To better support cap and trade, the ARB should expand its arguments beyond those mentioned briefly on p. 19 in the Scoping Plan text. These advantages include:

    - Causes less economic disruption than direct regulation or carbon taxes
    - Clear incentive for over-performance

- o Strong driver for technological innovation to achieve that over - compliance
- o Can stimulate emissions reductions in non-covered sectors
- o Achieve emissions certainty – ensures that the targets are met
- o Widely accepted
- o Guarantees that the polluters pay for their emissions
- o Still retains many regulatory aspects such as permits for emissions, verification and penalties for non-compliance

ARB should also make mention of the success of the EU-ETS, specifically pointing out that emissions reductions from this program are expected to exceed 200 million metric tons of CO_2 per year – equivalent to erasing ALL of California's transportation emissions. Bear in mind that the EU program faced many structural hurdles including getting cooperation from over 20 countries with different cultures and languages. If the EU could overcome those obstacles to effect real and significant emissions reductions, there is no reason why California can't do better.

An effective cap and trade system is the only market mechanism considered that will encourage the technology development needed to take California past its 2020 goals and onto 2050. We ask that the state more clearly spell out the advantages of this program if only to better support its own efforts.

8. Page 18: Regardless of their status in the inventories resulting from the mandatory reporting rule, essential public services such as schools, hospital, sanitation, LFG systems, police, fire, etc., should not be included in C&T programs. Taxpayers should not be indirect speculators in the marketplace and be held hostage to market whims. In the event that local governments own facilities that are captured under C&T, with the exception of municipal utilities, they should be given free allocations. This avoids unnecessary competition between government and the business community. Local governments, competing for allocations, raise the cost of the allocations for everyone.

9. Page 19: The limit on offsets is without basis and counter-productive to the larger goal of emissions reduction. Certainly, at a minimum, there should be no limit on offsets generated within the WCI as these would most likely meet the most stringent standards of verifiability, additionality, etc. To place a cap on offsets will restrict innovation and place a further burden on all businesses in the WCI.

10. Preliminary Recommendations, Section C, Carbon Fees, Page 41: Carbon fees should target strictly *anthropogenic* emissions from fossil fuel combustion and exclude biogenic CO_2 emissions from carbon-neutral fuels like landfill gas and sewage or manure based digester gas. This treatment recognizes that the carbon-neutral fuels

add no new carbon to the atmosphere but rather complete the natural, short-term cycle of carbon of atmosphere-plant-human and back to atmosphere. Moreover, proceeds of carbon fees should only be spent to further reduce GHGs.

11. Preliminary Recommendations, Section C-3, Compliance Offsets, Page 43: A lot of emissions reductions opportunities will be forgone if we have to wait for the rigorous protocols called for under the "Compliance Offsets" paragraph. Perhaps certain well-documented projects could get categorical or pre-approvals to fast-track emissions reductions. We ask that ARB find a way to expedite the approval of offset projects so that emissions reductions can occur now, when they are most needed.

12. Preliminary Recommendations, Section C-3, Voluntary Offsets, Page 45: ARB should do more than issue a supportive policy statement encouraging early reductions of GHG emissions. These actions need recognition and protection from a loss of crediting. Better support and protection would stimulate more voluntary reductions.

13. Preliminary Recommendations, Section C-4, Use of Possible Revenues, Page 47, Direct emission reductions: ARB should only purchase and retire offsets as a last resort. Once those permits are retired, they cannot be re-issued which limits the resiliency of the market.

The following are the Sanitation Districts comments on the Appendices of the Scoping Plan:

Cap and Trade Program

1. Page C-12: New facilities that begin operation in sectors included in a cap-and-trade program should NOT need to purchase allowances either through an auction or from other allowance holders. This is akin to South Coast's RECLAIM "structural buyers" provision that, in our opinion, is fundamentally unfair to new entrants into the regulatory program. A permanent set aside or bank of allocations should be funded by CARB to allow new businesses to be covered in the same fashion as the original entrants to the program. Without such a provision, new business development is discouraged. Earlier versions of the Lieberman-Warner bill had such protective provisions.

2. Page C-12: It is unclear how the cap-and-trade program will cover 85% of California's emission sources by 2020. Please provide a chart showing how sources will fall under C&T with time. The time-weighted average of emissions under the C&T program seems much less than 85%.

3. Page C-15: ARB may be adopting regulations to implement cap and trade well before the other members of the WCI have implemented inventory programs. The European experience in Phase I of their EU-ETS has shown how dangerous it is to implement cap and trade without having a reliable emissions estimate. We suggest that the cap and trade program be voluntary until the other parties in the WCI are ready to fully participate to minimize the potential for market disruptions.

4. Page C-17: The draft recommendation for the WCI calls for allowance auctions in the first year to constitute between 25 to 75 percent of the total cap. We feel that even the 25% number is too high and will cause significant economic hardship. We urge the ARB to consider carefully the economic duress that may be created if too high an auction value is chosen or if free allowances are rapidly phased out.

5. Page C-18: Exactly how will the auction process encourage voluntary early reductions by firms, municipalities and individual consumers? Free allowances should be distributed to entities that undertake early actions. More importantly (see our general comments) CARB must actively protect California early actions under a federal climate change program.

6. Page C-19: As we stated in our general comments, we do not understand how the ARB can say with certainty that allowing offsets outside of California would reduce co-benefits inside California. It is difficult to envision the type of projects that would be offered up as offsets, and therefore this conclusion seems speculative to us. Take for example, the application of biosolids-derived compost from California on agricultural land in Arizona. This project could generated offsets by reducing nitrous oxide emissions relative to the use of commercial fertilizer and increased carbon retention in the soil. This kind of project could create an offset outside of any co-benefit considerations and should be encouraged by the ARB.

Transportation Strategies

7. Page C-27: The Low Carbon Fuel Standard (LCFS) needs to be modified to include more credit generation opportunities for waste-derived fuels especially sewage biosolids, a large potential energy source. Please see the LACSD comment letter on this subject dated July 15, 2008 in the LCFS docket.

Local Government Actions and Regional Targets

8. Page C-42: We remain very concerned about how local governments will allocate responsibility for emissions inventories and emissions reductions to sources under their jurisdictions without a significant possibility of double-counting. This seems to be particularly the case as the local government source category is further refined into

"community" level analyses. To examine a case in point, please provide some explanation of how a regional local government program meshes with Community Energy and Community Waste and Recycling concepts articulated on this page. Local community actions can also be difficult to calculate from a credit standpoint in the case of regionally operated waste disposal facilities. Energy recovery from these programs needs to be allocated on some basis to the respective communities under the regional government umbrella. Please see our July 18, 2008 comment letter on CCAR's Local Government Operations Protocol on this issue. We think it is very important that CARB abide by its promise at the very bottom of page 32 of the Draft Scoping Plan that "ARB will work with local governments to reconcile local level accounting with state and regional emissions tracking as the Scoping Plan is implemented."

9. C-45: We strongly believe that CARB should input into California Office of Planning and Research and the Resources Agency that actions taken in accordance with the Scoping Plan should be categorically exempt from a GHG analysis component of any environmental document that is prepared for a project.

10. C-51: The ARB has stated many times that if push comes to shove, compliance with health-based criteria pollutant regulations will have priority over GHG considerations. With that in mind, we wonder about the benefit of performing GHG calculations as part the *Subsurface Cleanup Technology* discussion that the SWRCB may implement. Irrespective of the amount of GHG emitted by RTOs, for example, the elimination of groundwater contamination will always take precedence. The ARB should weigh in on decisions like these made by other state agencies and at least attempt to streamline or reduce unnecessary exercises required by other state agencies.

Electricity and Natural Gas Strategies

11. Page C-58: The energy sector overlaps with many other GHG sectors including Local Government, Water, Recycling and Waste Management, etc.

12. Page C-62: On-site clean distributed generation (DG) to accomplish "zero net energy" buildings will be limited in the South Coast Air Basin because of stringent regulations that in effect remove reciprocating engines from the DG prime mover list.

13. Page C-64: Regulation of water efficiency by the CEC is redundant.

14. Page C-73: Besides market barriers, significant regulatory barriers stand in the way of CHP reaching its full market potential, not the least of which is availability of emission reduction credits (ERCs) and local AQMPs that make it difficult to install

reciprocating engines running for any length of time during the day in small CHP systems. The Scoping Plan economic analysis needs to account for the reality of what "ultra-clean CHP" (Page C-75) really means.

Water Sector Strategies

15. Appendix C Section W-2 of the Climate Change Draft Scoping Plan (Scoping Plan) contains recommendations for reduction of GHG emissions from increased usage of recycled water. We fully agree that increased implementation of recycled water is an important strategy for reducing GHG emissions, due to the much lower energy demand to supply recycled water versus imported water in many parts of the state.

However, Appendix C Section W-2 of the Scoping Plan proposes that increase usage of recycled water should be accomplished by amending National Pollution Discharge Elimination System (NPDES) permits to require preparation and implementation of water recycling plans at wastewater treatment plants in communities that rely on imported water and communities where water recycling would otherwise require less energy than current supplies. We disagree with this proposal because it is overly focused on forcing change through regulation of recycled water producers. It is overly simplistic to impose mandates on wastewater treatment plants and expect these mandates to lead to increased water recycling. Use of such a strategy presumes that the major reason that greater water recycling is not occurring in these areas is because the wastewater agencies have failed to plan for it or are somehow recalcitrant. We submit that this is generally not the case. For the majority of agencies, preparation of a water recycling plan would not serve as a useful tool to increase recycled water usage. The only case where it might do so is when agencies face significant obstacles to expansion of recycled water usage that are of a political nature, and that is rarely the case.

There are many factors that influence the ability to reuse water, including the level of treatment of the water, proximity to customers and use areas, and permitting requirements imposed by the Regional Water Quality Control Boards and the California Department of Public Health. Wastewater agencies alone cannot determine how and where their recycled water is used. There are a number of statutory provisions that limit a wastewater agency's ability to unilaterally maximize recycled water (e.g., Public Utilities Code Section 1501 and Water Code Sections 13579-13583). Water recycling involves a number of agencies to make a successful project. A wastewater agency produces the recycled water, a water wholesaler transports it, a water retailer sells it, and an end user buys and uses it. Local, state, and federal entities participate in funding. Regulators permit the use of the recycled water and assure the protection of public health and water quality. If any one of these partners does not participate fully, it is unlikely that a recycled water project will be

successful. Finally, it is important to recognize that the cost of obtaining and serving recycled water in relation to the costs of alternatives, including local groundwater, conservation, and other supplies, is one of the most important drivers that determines how much water recycling occurs.

In lieu of proposing to increase recycled water usage by putting the entire burden on wastewater agencies, we believe that the approach to increasing recycled water usage should align with the approach to increasing water use efficiency proposed in Appendix C Section W-1. That is, The DWR should coordinate with the appropriate parties, such as the Water Boards, the California Department of Public Health, and affected stakeholders, to develop a Recycled Water Action Plan. This Plan should utilize a range of tools, including funding and other incentives, technical assistance, public education and outreach, permitting flexibility, and regulatory approaches to increase recycled water usage. For wastewater treatment plants located in areas using energy intensive water supplies, development of a Water Recycling Plan could be required when significant institutional obstacles to otherwise feasible recycled projects or expanded recycling projects are identified.

16. Appendix C Section W-5 of the Scoping Plan addresses increased renewable energy production from water. We fully agree that production of available renewable energy from the water sector should be maximized. In particular, gases generated during treatment of solids at wastewater treatment plants should be used for energy production to the maximum extent possible. However, state and local air quality rules governing distributed generation of energy hamper efforts to maximum this renewable source of energy. In particular, these rules limit usage of reciprocating engines to harness the energy due to stringent emission standards on this equipment. The Scoping Plan should include an effort to review such rules and determine whether they can be amended to better encourage usage of this energy source. Further, for clarity, references in the Scoping Plan to "gases emitted from decomposing organic wastes" should be changed to "gases emitted during treatment of solids at wastewater treatment plants." The term "gases emitted from decomposing organic wastes" is overly broad and could be interpreted to include, say, gases produced at landfills during waste composition.

17. Appendix C Section W-6 proposes a Public Goods Charge for Water to raise funds for reducing GHG emissions resulting from capturing, storing, conveying, treating, and disposing of water. We would like to note that the proposed funding such a charge would provide of $100 million to $500 million per year is only a very small fraction of the funds that would be necessary to accomplish the actions proposed for reducing GHG emissions from the water sector. If agencies are to be encouraged with generating more tertiary treated effluent as part of the Scoping Plan, some of the monies should go to support those efforts.

18. In the Scoping Plan Appendices Water Strategies, W-5: The text mentions the CEC's PIER program estimates statewide generation potential from undeveloped in-conduit hydroelectric and wastewater treatment renewable energy resources at a total of 2,100 GWh per year. The water/wastewater renewable potential components should be kept separate to better focus the strategies being considered.

19. Page C-81: We believe it is necessary for CARB to review the actions taken by other state agencies under the umbrella of climate change to make sure that they are consistent with the goals of the Scoping Plan. We truly wonder if the WATER section accomplishes the goal stated in the **Overview** to develop additional [water] supply reliability and would like to see more discussion of this in the Scoping Plan.

20. Page C-82: The wastewater treatment renewable energy resources estimate of 2,100 GWh/yr. is very optimistic given that continuous duty reciprocating engine drivers, the primary choice of wastewater treatment plant operators, are very difficult to install under today's AQMPs and distributed generation regulations.

21. Page C-84: Should the Scoping Plan ultimately approach water system energy efficiency using an energy intensity basis much like the LCFS, the options to comply with water cycle energy intensity targets should be no less creative than what exists for the LCFS including averaging of supplies and use of credits in addition the tools (shifting loads offpeak, intermittent renewable generation, etc.) mentioned on this page.

22. Page C-86: Energy recovery from decomposing organic wastes in wastewater systems typically face a lot of community opposition. CARB's inserting themselves into the permitting and public review process as a resource to the project proponent would assure a higher percentage of renewable resource projects actually get built.

23. As water quality regulations overall become increasingly stringent and with increased pressures for water recycling, treatment plants are driven towards more advanced treatment standards, often beyond the tertiary treatment considered "advanced" not too many years ago. The extra effort required to reach these water quality targets greatly increases plant energy usage with subsequent increases in GHG emissions. When assessing the advantages of local use of reclaimed water vs. imported water, the actual greenhouse gas reductions may fall short of initial expectations unless the extra energy needed for advanced treatment is taken into consideration. The ARB and WET-CAT should not neglect the extra energy requirement needed for advanced treatment in their estimates of the greenhouse gas benefits of reclaimed water over imported water.

Industry Sector Strategies

24. Page C-102: We question the value of energy efficiency and co-benefits audits for large industrial sources. As stated previously, given control measure MCS-01 in SCAQMD's 2007 AQMP, most stationary combustion sources in the South Coast will be forced to BACT levels so there will be little margin left for improvement. To conduct an audit specifically to find co-benefits is not appropriate as the focus of AB 32 is greenhouse gas reduction.

25. Page C-115: In the South Coast, boiler efficiency may actually drop and GHGs increase as result of control measure MCS-01 which, in driving boiler NOx lower, is also lowering boiler efficiency thereby increasing the amount of fuel that needs to be burned to deliver the same usable output. See the Environmental Assessment for Rule 1146.1. The goal of increasing boiler efficiency and thereby reducing GHG emissions is thwarted by AQMPs that are solely focused on criteria pollutant reduction. CARB needs to be the arbitrator in these situations.

26. Page C-116: In the South Coast, it is difficult to install stationary internal combustion engines as prime power. We are also concerned about across the board electrification of motors as this reduces the region's ability to respond to emergencies such as earthquakes.

Recycling and Waste Management Sector Strategies

27. The Draft Scoping Plan calls for a reduction of 1 MMTCO$_2$ eq. from the Solid Waste and Recycling Sector. As we and other industry representatives have continually stated to CARB in the past, the assumptions underlying this value are incorrect causing the projected reductions from this Sector to be too high. The Draft Scoping Plan assumes that landfills are only able to capture 75% of the methane they generate in gas collection systems. This is based upon a highly uncertain US Environmental Protection Agency estimate of landfill gas systems nationwide. Furthermore, this assumption does not reflect the more aggressive regulatory system that exists in California, nor does it reflect our drier climatic conditions, both of which affect landfill gas generation and collection efficiencies. In fact, we believe that most California landfills with gas collection systems operating in compliance with Air District regulations are capable of achieving 90%+ landfill gas collection efficiencies. Here at the Sanitation Districts landfills, we have determined collection efficiencies up to 99%.

28. In addition to faulty assumptions in determining fugitive methane emissions from landfills, the Draft Scoping Plan fails to provide a complete accounting of overall emissions from solid waste management activities, but chooses only to focus on

landfills emissions. The simplistic approach taken by CARB will lead to an undue burden on landfill operators, misstate the true impact of this sector on climate change and lose opportunities to identify real reduction strategies. CARB needs to take a comprehensive approach examining the complexity of all the sources within a sector from a life cycle perspective, and carefully examining all GHG emissions and sinks.

A comprehensive evaluation should look at factors such as carbon sequestration at landfills, recycling, composting, transportation, and use of renewable energy. When considering the total life-cycle analysis of the solid waste management industry, we believe that the net GHG emissions from our industry are neutral or even negative. The assessment should be performed on the industry as a whole, but even looking at individual components of the sector more completely paints a different picture. For example, landfills are targeted solely for emission reductions because they are viewed as a significant source of GHG emissions, however, if more appropriate assumptions are made for collection efficiencies, and credits are allowed for carbon sequestration that occurs at all landfills, GHG emissions from this source would be considered carbon neutral or negative. Carbon sequestration in landfills is a well-established fact, recognized by the IPCC, EPA, and CARB. In preparing the most recent inventory of emissions, CARB has determined that annual carbon storage in California landfills is equivalent to about 5 million tons of carbon per year. If converted to CO_2 equivalents, this would be equivalent to approximately 19 $MMTCO_2eq.$ – vastly exceeding the estimate by CARB for GHG emissions released by California landfills.

This comprehensive life cycle approach is especially important in the Draft Scoping Plan recommendation that local and regional governments "*change the carbon footprint of their jurisdiction's waste and recycling operations ... as well as through the promotion of waste reduction and recycling to community businesses and residents.*" It makes sense for communities to tackle various components of their waste management decisions, while working with the State, but it is very important from an accounting standpoint in the Draft Scoping Plan that no double counting occur between the Local Government Sector, and the Recycling and Waste Sector. Local governments and communities in performing their waste management evaluations should rely on a comprehensive life cycle approach to develop an accurate picture of how waste reduction and recycling should be promoted in the community. An example was provided above of accounting for carbon sequestration when determining landfill GHG emissions. Another example would be the management of green waste within a community. From a GHG perspective, only, the Sanitation Districts have determined that both composting and using green waste as an alternative daily cover (ADC) at landfills provide GHG benefits, but using green waste as an ADC provides more than a four fold reduction in GHG emissions relative to composting. Both are important waste diversion techniques, but only a

comprehensive life cycle analysis can provide accurate GHG emission data to be considered by decision-makers.

In conclusion, the Draft Scoping Plan provides a limited and incorrect view of the Recycling and Waste Sector. Although the solid waste industry as a whole represents a small fraction, and in some cases a de minimis amount of GHG emissions in the State's inventory, a comprehensive life-cycle assessment would likely reveal the industry's net emissions to be zero, or substantially less.

29. Page C-126: Composting of greenwaste and biosolids have the benefits as stated but also have specific rules in several air districts to comply with. In the South Coast, for example, the requirement to cover biosolids composting facilities caused this rulemaking (Rule 1133.2) to be the most expensive VOC control measure in SCAQMD's history at that time. ARB cannot realistically expect significantly more composting projects in develop in these areas given the already burdensome and costly control measures in place.

30. Page C-127: Anaerobic digestion generally requires making a pumpable fluid to transport it into the digester. Tank-type digesters, in many cases, will require that a municipal or industrial sewage treatment plant be located nearby to treat the high-strength liquid waste that accompanies the digestion process unless it can be lagooned and evaporated.

Agriculture Sector Strategies

31. Page C-157: It may be overly optimistic to think that farmers may wish to operate combustion turbines.

32. Page C-158: Tank digesters are more feasible where there is a municipal sewage treatment plant nearby to handle the high-strength liquid waste.

33. Research/Opportunities: We believe that biosolids applied to agricultural lands will result in net carbon sequestration and be a win-win situation for both farmers and the municipal wastewater community. This potential synergy should be mentioned in the Scoping Plan.

State Government Sector Strategies

34. GHG reductions from state bond funded projects should not be used to retire allocations but instead should be used as seed money to stimulate new technologies that will provide continuous or regular reductions of GHGs.

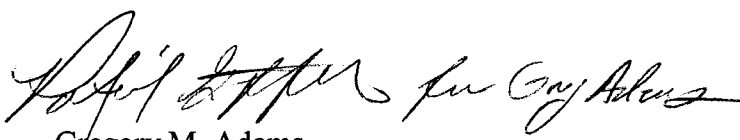
Appendix F

35. Page F-6: Under Agriculture, we presume that SB 700 by state Senator Florez, et al have been taken into account that cause open burning in the San Joaquin Valley to cease by July 2010.

Thank you for the opportunity to comment on the Draft Scoping Plan. Please do not hesitate to contact Mr. Patrick Griffith at (562) 908-4288, extension 2117 if you have questions or comments.

Very truly yours,

Stephen R. Maguin



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