

MAY 20, 2016 – BACWA EXECUTIVE BOARD MEETING

California Wastewater Climate Change Group Update



Driver: Governor's 2030 target of GHG levels 40% below 1990 levels

Governor's Office - "Five Pillars"

- 50% renewable energy
- Reduce short-lived climate pollutants
- 50% reduction in petroleum use in vehicles
- Double energy efficiency in existing buildings
- Increase carbon sequestration on farms, rangelands, forests, and wetlands



Activity in 2016 has focused largely on mitigation and funding ...

- 2030 Target Scoping Plan Update
- Cap-and-Trade Revenue Allocations for 2016/17
- Short-Lived Climate Pollutant (SLCP) Reduction Strategy
- ARB Research Plan (under AB 32)
- Mandatory GHG Reporting and Cap-and-Trade Regulations
- Bay Area AQMD
 - POTW greenhouse gas emissions
 - Organics diversion projects
 - Climate Change Conference



Sectors are preparing for 2030 Target Scoping Plan Update

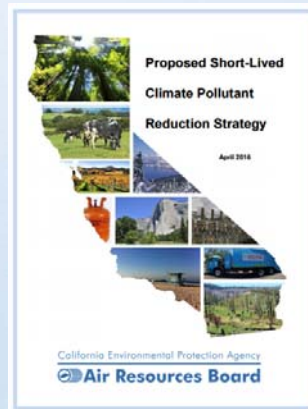
- Agriculture and Natural & Working Lands Sectors (ARB, CNRA, CDFA, CalRecycle)
 - Vision 2030 and 2050
 - Forest Carbon Plan (focus on C-sequestration)
 - “Climate-Smart Ag Practices”
 - Heathy Soils Initiative
 - Water management (involve Water Boards)
 - Nitrogen management (UC Davis Research Forum)



DRAFT Scoping Plan Update to be released....this year?

Issues in Draft SLCP Reduction Strategy that remain in the revised version...

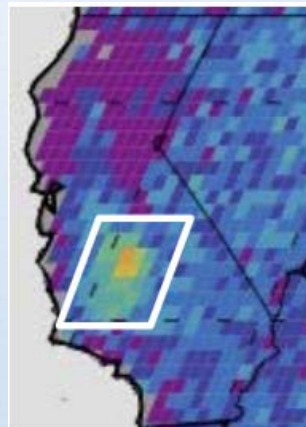
- Funding allocation
 - CalRecycle: \$100M per year for 5 years
 - CDFA: \$100M per year for 5 years
- Use existing anaerobic digestion capacity
 - ‘Require’ capture and utilization of biogas
- Biosolids/digestate utilization
 - Highlights use of compost and other soil amendments, but does not state biosolids
 - Eliminate ‘organics’ from landfills by 2025
 - Healthy Soils Initiative to identify research needs – ARB and CDFA to collaborate with other agencies including ‘water districts’



©2014 California Air Resources Board

Proposed SLCP Reduction Strategy

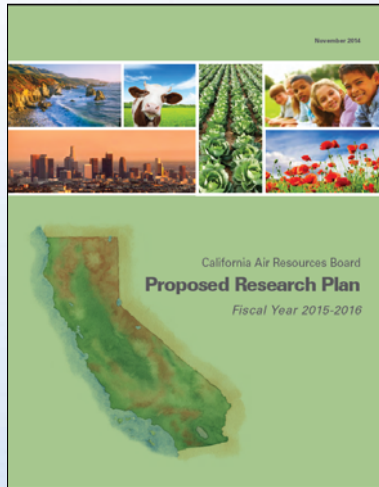
- “WWTPs...create useful byproducts such as electricity, biofuels and soil amendments”
- Identify/remove financial and regulatory barriers
- **Require** capture and effective utilization of methane generated from wastewater treatment
- Build market certainty for compost and other soil amendment products
- Develop regulation by 2018 to eliminate organics disposal in landfills by 2025
- ARB and NASA's Jet Propulsion Laboratory to identify "hot spot" methane sources using aerial and ground measurement



Satellite methane concentration enhancements observed from the period 2003-2009. Image Credit: NASA, JPL-Caltech, U. Michigan.

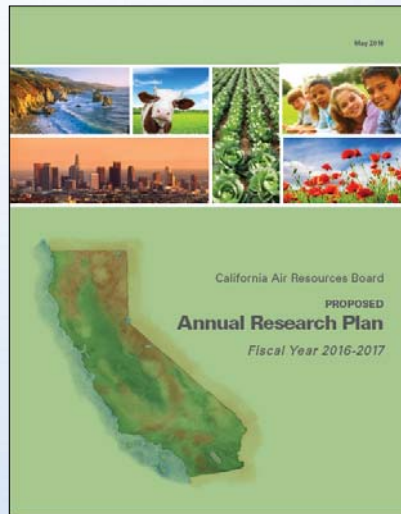
©2014 California Air Resources Board

N₂O emissions from POTWs – survey to characterize liquid treatment trains



- Goal: Develop N₂O emissions estimates and/or emission factors for landfills, golf courses, and POTWs
 - Provided ARB:
 - Information on typical solids management strategies
 - Draft survey (to characterize liquids treatment across CA)
- We will need your help responding to the survey!*
- Your feedback will also inform
 - CA Nitrogen Assessment (UC Davis)
 - Healthy Soils Initiative

Proposed Research: California Methane “Hot Spot” Survey



- Goal: Conduct aerial & ground-level survey of CH₄ emissions to understand sources and largest emitters
- Issue: Fugitive CH₄ plumes identified from individual emission point sources associated with oil and gas production, natural gas pipelines, landfills, **wastewater management**, dairies, natural seeps, etc.
- Co-funded by CEC
- Collaboration of JPL and ARB

Bay Area AQMD – POTWs and Climate Change

- Board wants to move faster than ARB on wastewater GHG related issues
- Organics diversion projects
 - Since January 1, 2015 >5,000 odor complaints
 - Sewage treatment plants, waste transfer facilities, solid waste disposal landfills and other waste treatment facilities
 - Sources of volatile organic compounds, toxics, GHGs, and odors that impact neighborhoods, the region, and *the world*
- Climate Change Conference
 - Tentatively scheduled for October
 - Mission Bay Conference Center in San Francisco
 - Recommended 2 panels on wastewater related topics



Questions?

Sarah Deslauriers
Program Manager
California Wastewater Climate Change Group
(925) 977-3148
sdeslauriers@carollo.com
<http://www.casaweb.org/>

**Next CWCCG meeting:
June 16th**

(Attend via GoToWebinar)