**CASA / EPA meeting Agenda**

**February 27, 2018**

**11:00 AM – 12:30 PM**

**CASA held an informative meeting with USEPA during DC Conference.** CASA members met with numerous EPA staff on February 27th in Washington DC for a productive information exchange on a variety of topics. Attendees included the following:

- Liz Resek (EPA/OST) National Biosolids Coordinator
- Betsy Behl (EPA/OST)
- Bob Bastian (EPA / OW/OW/OWM)
- Thais Fournier (EPA/OST)
- Amanda Jarvis (EPA/OST)
- Christine Bergeron (EPA/OST)
- Carey Johnston (EPA / OECA) - Phone
- Lauren Fondahl (EPA Region 9) - Phone
- Greg Kester (Director of Renewable Resource Programs - CASA)
- Jim Colston (Environmental Services Director – OCSD)
- Tim Becker (Board of Directors – Oro Loma SD and CASA Board of Directors)
- Craig Murray (Board of Directors - Las Gallinas Valley SA)
- Mike Hudson (Board of Directors – Fairfield-Suisun SD)
- Peer Swan (Board of Directors – Irvine Ranch WD)
- Dan Rheiner (Board of Directors – Sausalito-Marin City SD)
- Jeff Kingston (GM – Sausalito-Marin City SD)
- Jim Dunbar (GM - Lystek)

Items discussed and main points are inserted into the agenda below:

1. **Overview of biosolids management, legislative mandates, Kern litigation, and emerging issues in California – Greg Kester (CASA)**

   CASA provided a summary of biosolids. 665 Dry Metric Tons of biosolids were produced in 2015 and CASA provided a summary of biosolids management methods employed, which included 62% of our biosolids being used for land application (42% as Exceptional Quality including 31% as compost, and 20% as Class B, with 13% going to Arizona), 20% as Alternative Daily Cover at landfills; 9% buried in landfills, and 3% each for incineration and surface disposal. CASA provided updates on how the wastewater community can help California achieve its laudable mandates and goals by 2020 and beyond, though noted there are challenges. These include: (1) providing 50 percent of the State’s energy needs from renewable sources by 2030; (2) reducing carbon dioxide equivalent emissions to 1990 levels by 2020 and 40% below those levels by 2030; (3) reducing the carbon intensity of transportation fuel used in the State by 10 percent by 2020 and 20% by 2030; (4) reducing short lived climate pollutants, including methane; in part by diverting 50% of organic waste from landfills by 2020 and 75% by 2025, compared to 2014 values, and reducing methane emissions by 40% below 2013 levels by 2030. The Governor’s Healthy Soils Initiative introduced several years ago is intended
to ensure sustainable agriculture for future generations of Californians and biosolids help meet all of its objectives.

The diversion requirement poses a challenge for the wastewater sector, since 29% of the biosolids produced currently go to landfills either as ADC or for burial. We noted that the wastewater sector can help the state meet its objectives and is recognized by the state as a key partner. We estimate that using mostly existing infrastructure, at least 75% of food waste currently landfilled could be co-digested at wastewater plants. By doing so, we will produce far more biogas and slightly more biosolids. It is critical then that markets exist for both products. We noted how we are working proactively with state agencies as regulations are being developed and believe language will be included to ensure such markets are incentivized. We let EPA know that it is vital for the entire state to be open to land application and any assistance from both the federal and state regulators is both welcome and necessary. We have stressed the need for the state to establish a statewide regulatory standard based on either the 40 CFR 503 federal standards or alternatively, the CA Statewide General Order. Likewise, we have advocated for a procurement requirement to be established whereby Investor (and Publicly) Owned Utilities would need to procure a set volume of biogas from anaerobic digestion. We recounted the legal victory achieved recently in litigation opposing the Kern County ordinance banning the land application of biosolids in unincorporated parts of the county. Kern County site Ph was 10.5 initially and after years of application now has a Ph of 7.8 and black healthy soil. The next iteration of regulations will be released at the end of April or early May and are optimistic that concerns will be addressed.

We also noted various cross media issues and points of conflict between the Clean Air Act and the Clean Water Act. This includes the ability to utilize biomethane produced in our digesters and from co-digestion of other organic waste streams. Some air districts in severe non-attainment for ozone impose extremely restrictive emission limits on internal combustion engines which make it very costly or infeasible to utilize their methane. Likewise the Public Utilities Commission imposes heating requirements on biomethane for direct injection in the pipeline which are prohibitive, though those standards are being re-evaluated this year.

2. Update on risk assessment underway for 10 constituents from 2003 biennial review and the other 135 constituents from last TNSSS – Liz Resek and Betsy Behl (OST)

Liz informed us that the biosolids core risk assessment model screening tool (BCRAM Screening Tool) and the probabilistic risk assessment (PRA) model are being re-evaluated to ensure they are both updated with the most up to date data and research. Therefore, the risk assessment for the 9 constituents from the 2003 biennial review plus molybdenum are on hold until the screening tool and PRA model are finalized and made public (Target completion end of 2018). The 10 risk assessments (pollutants identified in the 2003 biennial review plus molybdenum) are estimated to be available for public comment in 2019.


Since both the risk screening model and the probabilistic risk assessment tool are being re-evaluated as noted above, it has slowed the release of the biennial reviews. However, the 2013 and 2015 reviews are proceeding through internal review and are expected to be released by the end of 2018. At this time, they are not expecting to recommend any additional constituents as needing
regulation. However, Betsy and Liz note that they have identified gaps in the data which preclude them from performing credible risk assessment. Efforts are underway to fill those gaps. Work is underway on the 2017 biennial review and they expect that to also be complete by the end of 2018.

4. Perfluorinated Compounds (PFCs) – Liz Resek and Betsy Behl (OST)

Betsy noted that PFCs are constituents of interest for which data is lacking. PFCs are being evaluated throughout the agency. The chemicals are ubiquitous and used in many household items, including fire retardant materials (and fire fighting foams), pizza boxes, popcorn bags, fabrics, carpets, etc. They have mainly been discontinued in the US but legacy issues remain. Betsy acknowledged that concentrations are much higher (exponentially) in household dust and other exposures than in biosolids. The exception is where PFCs were manufactured and waste was poorly managed or improperly discharged to sewerage systems and all recognized that it is primarily a source issue and not a biosolids issue. We stressed the need for accurate and sensitive communication so as not to sensationalize the issue or inappropriately indicate a problem where none exists. Much work will continue in this area across the agency and research world.

5. Electronic reporting rule for biosolids, update on how it went and next steps – Carey Johnston (EPA / OECA)

Carey and Lauren both noted that the electronic reporting went much better in its second year. Many of the issues identified in the first year of use (for 2016 activity) have been addressed. This included an ability to enter multiple analytical data points when more sampling was done than required. Data was accepted as maximum and average values. Far fewer problems were identified and many more facilities, 2,200 facilities, successfully reported. CASA has offered to beta test any new modifications as desired in the coming year. Carey noted that a change will be occurring to the underlying database used for the electronic reporting system in April. He does not anticipate it having significant impact on the way the report is viewed or how agencies interface with the system as it will be a more “behind the scenes” impact. NOTE: After the meeting, Region 9 has already shared the summary report of how California biosolids were managed in 2017. This confirms that the reporting went much better since no summary ever was provided last year.

Of critical importance is that all data will be publicly available around the end of March through the Enforcement and Compliance History Online (ECHO) website. A message was sent to all CASA members to review their data to ensure its accuracy. Data can be tracked at Echo@EPA.gov. If any errors are identified, contact should be made with the Region 7 Center of Excellence at R7_Biosolids_Center@EPA.gov to correct them.

6. Demonstration project for using biosolids to reclaim fire ravaged land – support and insight on funding opportunities. – Greg Kester (CASA)

CASA provided a brief overview of our anticipated research/demonstration project to use biosolids to reclaim fire ravaged land. The project has been accepted as a targeted collaborative research project with the Water Environment & Reuse Foundation who is now administering it. EPA remains very interested in this project and recognizes its value. $70,000 has been raised from CASA members and partners out of a budget of $200,000.

7. Using biosolids to reclaim other degraded sites – Kester (CASA)
We highlighted numerous other opportunities to use biosolids to reclaim degraded sites such as brownfields, overgrazed rangeland, superfund and other mine sites, and in San Francisco Bay Restoration efforts. Noted work with EPA Region 9 (Harry Allen), Nick Basta (Ohio State), and California Department of Toxic Substance Control to execute such projects. None have occurred yet, but we are hopeful of doing so this year.

8. In addition, CASA members provided brief overviews of their projects and proactive approaches they are taking. Discussion on need for Communication especially with regulators and on project benefits. CASA discussed engagement of University partners and seek Water Board and Cal Recycle support to fund research. Discussion on recent examples such as the Marin County Carbon Project and Marin Ranch Carbon Sequestration and look now at other ranches. Las Gallinas Valley SD is attempting to produce low carbon transportation fuel as well as provide power for on-site use. Orange County SD recently completed an exhaustive biosolids master plan. Sausalito-Marin City is a small facility at the base of the Golden Gate Bridge and will be considering options for biosolids management moving forward. They are also considering other upgrade options but are very space limited. Irvine Ranch WD is in the middle of a major expansion which includes anaerobic digestion, co-generation, FOG receiving, and a biosolids heat dryer. Fairfield-Suisun SD has partnered with Lystek International on a biosolids treatment technology which completed its first full year of operation as a Class A-EQ production facility. Over 45,000 wet tons of biosolids were received and processed from 8 different San Francisco Bay Area wastewater agencies. As a result of the Lystek technology, the biofertilizer end-product was land applied to almost 2,700 acres in Solano County in 2017. Lystek continues to support SF Bay Area agencies in meeting their diversification goals and achieve long-term diversion/recycling credits for biosolids beneficial use.