



The September 12, 2002 meeting will be held at:

Sacramento International Airport
Terminal B
Camelia Room (A&B)
6900 Airport Boulevard
Sacramento, CA 95837
Telephone (916) 874-0917

TRI-TAC MEETING

THURSDAY, SEPTEMBER 12, 2002
9:00 A.M. – 12:00 P.M.

Sacramento International Airport
Terminal B
Camelia Room (A&B)
6900 Airport Boulevard
Sacramento, CA 95837
Telephone (916) 874-0917

9:00 A.M. – SPECIAL PRESENTATION

GENERAL MEETING

ATTACHMENTS

1. INTRODUCTIONS
2. APPROVAL OF THE APRIL 11, 2002 –
TRI-TAC MEETING SUMMARY/ACTION ITEMS PAGES 7-15
3. FUTURE MEETING SCHEDULE PAGES 16-17
4. TRI-TAC ROSTER PAGES 18-23
5. COMMITTEE ASSIGNMENTS PAGE 25
6. COMMITTEE ISSUE SUMMARIES PAGES 26-55
7. OTHER BUSINESS/NEW ISSUES

9:00 A.M. – 11:30 A.M. – COMMITTEE MEETINGS

COMMITTEES WILL MEET SEPARATELY

11:30 A.M. – GENERAL MEETING

COMMITTEE REPORTS

- A. AIR
- B. LAND
- C. WATER

Air Committee Agenda Items

- 1. ARB Diesel Retrofit ATCMs**
- 2. OEHHA Toxic Hot Spots Guidance Manual for Risk Assessment & the HARP Software Program**
- 3. Status Update on SCAQMD Composting Rules (1133 Series) & SCAP Compost Emissions Testing Program**
- 4. SCAQMD Proposed Revisions to Minor Source BACT for Compression Engines**
- 5. WERF Odor Study - Update**
- 6. New PM 2.5 Standard/Revised PM10 Standard - Update**
- 7. ARB Final Guidance for the Permitting of Electrical Generation Technologies**
- 8. EPA Development of Model Plants in order to Estimate Emissions using EPA Water 9 Model**
- 9. Walk-in Topics**

LAND COMMITTEE AGENDA
September 12, 2002

	<u>Who</u>	<u>Time</u>
<u>A. Agenda Review and Approval</u>		
<u>B. Committee Action Items</u>		
1. Biosolids Recyclers of CA, status, flyer	Ed McCormick/Bobbi Larson	20 min.
2. SWRCB Biosolids Final EIR & Lawsuit	Layne Baroldi/Bobbi Larson	5 min.
3. POPS/Biosolids Calendar for EPA/CASA	Bob Gillette/Layne Baroldi	5 min.
4. Model Biosolids Contract/RFP	Ann Briggs	5 min.
5. 40CFR 503 Dioxin Regulations/Data	Diane Gilbert	10 min.
6. Radioactivity Testing, Dose Modeling & Guidance	Diane Gilbert	2 min.
7. CIWMB Compostable Organic Mtls. Regs.	Dianne Gilbert	5 min.
8. SCAQMD Proposed Rule 1133-Composting Opns.	Layne Baroldi	5 min.
9. DTSC Mercury Regulations	Layne Baroldi	5 min.
10. AB 2356	Layne Baroldi	2 min.
<u>C. Information and Discussion Items</u>		
Local Ordinances		
• Kern County	Layne Baroldi	5 min.
• Kings County	Layne Baroldi	5 min.
• San Luis Obispo County	Bob Gillette/Diane Gilbert	2 min.
• Riverside County	Anne Briggs/Layne Baroldi	5 min.
• Synagro Facility	Anne Briggs/Layne Baroldi	2 min.
• Alameda County Composting	Ed McCormick	5 min.
• Solano County	Ed McCormick	10 min.
New Biosolids Contracts/Technologies	Ed McCormick	7 min.
NAS Review of Sewage Sludge Regulations	Layne Baroldi	5 min.
.		
<u>E. Other</u>	All	<u>10 min.</u> 120 min.

WATER COMMITTEE AGENDA
September 12, 2002

	<u>Estimated Duration (minutes)</u>	<u>Further Information</u>
A. Committee Action Items		
1. Root Control Discussion/Survey of Membership	15	See email
2. Regulation Changes for SWRCB Petition	10	Tri-tac.org
3. Bacteria Criteria Implementation Plan	5	Attachment 1
A. Updates		
4. NPDES Permitting	20	
➤ EBMUD		
➤ Refineries		
➤ City of Vacaville		
➤ Napa Sanitation District		
➤ City of San Diego		
➤ LACSD		
5. 303(d) List and Total Maximum Daily Load Issues	20	
➤ State Litigation		
➤ SWRCB/RWQCBs 303(d) Listing Process		
➤ PAG Listing Guidance		Tri-tac.org
➤ Bay-Delta Hg TMDL Workshop		Attachment 2
6. Water Quality Standards	15	
➤ Nutrient Criteria Development		Attachment 3
➤ Draft Strategy for Water Quality Standards and Criteria		Attachment 4
➤ Mercury Rule from DTSC		
7. Sanitary Sewer Overflows	5	
➤ Status of Federal Regulations		
➤ FOG Work Group		
8. Enforcement	10	
➤ Mandatory Minimum Penalty Reform		
C. Announcements		
9. ELAP Accreditation	5	Attachment 5
10. Legislation of Interest	10	
11.	5	
 Total estimated duration	 120	

MEETING SUMMARY
THURSDAY, JULY 11, 2002
HOLIDAY INN OAKLAND AIRPORT
OAKLAND, CA

SUBCOMMITTEE ISSUES AND GENERAL MEETING

THE FOLLOWING MEMBERS AND INTERESTED PARTIES WERE PRESENT:

Jack Nelson, Yucaipa Valley Water District	Dave Williams, EBMUD
Roger W. Turner, Eastern Municipal WD	Tom Hall, EOA
Terrie Mitchell, Sacramento Regional SD	Chuck Weir, EBDA
Monica Oakley, LWA	Al Vargas, El Dorado Irrig. District
Jim Colston, OCSO	Jim Kelly, CCCSD
David Tompkins	
Keith Smith	
Steve Medberry, San Francisco PUC	
Terry Schmidtbauer, Solano County EMD	
Jeffrey Bell, Solano County Env. Health	
Maura Bonnarens, EBMUD	
Larry Wasserman, City of SD	
Jim Marchese, City of Los Angeles	
Bob Gillette, Corollo Engineers	
Patricia McGovern, Carollo Engineers	
Phil Bobel, City of Palo Alto	
Valerie Housel, City of San Bernardino	
Bobbi Larson, CASA	
Rich Luthy, Fairfield Suisun SD	
Ben Horenstein, EBMUD	
Bob Reid, West Valley SD	

Announcements and Discussion Items

Approval of Last Meeting's Action Items

Future Meeting Schedule

Announcements

AIR COMMITTEE MINUTES FROM JUNE 13, 2002 MEETING – DANIEL MCGIVNEY AND JAY WITHERSPOON

1. **Review of Annual Meeting w/ARB** – A few weeks ago, members of the air committee met with the ARB concerning the proposed air toxic control measures (ATCMs) for stationary engines (emergency and full-time use). A draft regulation is out and comments were provided. The meeting went well and the ARB is making revisions based on our input. However, there are still some outstanding issues such as the exemption criteria and the definition of emergency. Other ATCMs are being developed for portable engines, on-road mobile sources (heavy-duty trucks), and off-road mobile sources (construction equipment).
2. **SCAQMD Proposed Rule 1133 Regulating Composting Operations & SCAP Aerated Static Pile Compost Emissions Study – Update – The SCAQMD** performed a technology assessment a few months ago that was presented to its Governing Board. Based on SCAQMD Governing Board direction, proposed Rule 1133 will be divided up into a series of rules (separate rules for green waste composting, biosolids co-composting, and chipping and grinding), rather than one comprehensive rule addressing all types of composting and chipping and grinding operations. Currently, the SCAQMD is waiting for the SCAP compost emissions study data to help support its rule development with regard to the biosolids co-composting rule. Regarding the SCAP compost emissions study, SCAP will be building the first formal test pile on July 2. Then an additional 2 piles will be built, each staggered by a week or two. This will allow SCAP to efficiently collect data from different aged piles in our attempt to capture the life-cycle emissions profile of the aerated static pile composting operation. The data collection phase of the study should be complete by the end of September. A final report should be available by late October.
3. **Draft Carcinogenic Risk Assessments/Guidelines** - The OEHHA has proposed for adoption, new guidelines for carcinogenic risk assessment which are proposed for use in the AB 2588 Toxic Hot Spots program. Additionally, these new guidelines will be required for use in permitting as well. The use of the new guidelines will apparently increase a facility's carcinogenic risk as much as 25-30% when compared with that risk generated using the current guidelines. The current guidelines are based on being protective of the average person (50th percentile); the proposed draft guidelines are based on the 95th percentile, so they are being protective of the elderly, asthmatics, and children. Use of the new risk assessment guidelines will have significant impact upon facilities that are at, or near, the AB 2588 risk reduction threshold. It could also have significant impact upon future projects where the local agency requires a carcinogenic risk assessment as part of the permitting process.
4. **SB28XX – SB28XX** requires the State to adopt regulations to establish standards for electrical generating facilities and equipment. Initially, any business doing power generation would have been held to these rules. However, the ARB changed its mind

and now co-gen units and those units combusting bio-fuels will not be covered by this regulation (as long as the electrical generation is for on-site use). All Agencies need to look at the current list of affected companies to determine if they are still on the list, and if so, make a formal request to be de-listed.

LAND COMMITTEE MINUTES FROM JULY 11, 2002 MEETING **LAYNE BAROLDI AND ROBERT GILLETTE**

Committee Action Items

1. **CASA Biosolids Program** – The CASA Executive Committee will meet July 12. Paul Causey prepared a report to the Executive Board presenting different ideas on how to fund the biosolids program. Copies of draft are available. We are hoping that at this meeting the Executive Board will decide to move ahead with this. It looks like there are a number of different ways to fund the program, i.e., fairly minimal dues increase (which hasn't happened since 1993); a grant for which we've developed a draft proposal to EPA, with the assistance of BACWA; and other funding sources. The plan to move ahead for a 2-year funding of the position with some deliverables basically developing a business plan and an approach on how to move forward and what needs to be done in the biosolids arena in California and to develop that into a program that could be extended. This would fund a fulltime position at CASA; the exact nature of employment still has to be determined.

Contact: Ed McCormick – EBMUD, Bobbi Larson - CASA

2. **SWRCB Biosolids Final EIR & Lawsuit** - Adopted by the State Board and challenged by Kern County and South Delta Water Agencies. The court held that the EIR was adequate and it has been appealed to the third district court of appeals. The briefs have been submitted by the complainants - Kern County and and the Central and South Delta Water Agency. CASA filed their brief in June. The State Attorney General is to file their brief in early August. The three judge panel is expected to hear oral arguments early next year.

Contact: Bobbi Larson - CASA

Information and Discussion Items

3. **San Luis Obispo County** – San Luis Obispo County has been having a group get together and discuss an ordinance for the County. That has resulted in them preparing a draft urgency ordinance interim ordinance. They want to make sure there is no increase in land acquisition of biosolids during the preparation of the final ordinance. They think it will take at least a year to complete the final ordinance. As a result, they drafted an interim ordinance that requires that only exceptional quality can be applied, and the applier has to get an approval to apply from the San Luis Obispo County Health Department. In addition, the total amount of land applied biosolids cannot increase above 2,500 cubic yards per year. They expect a permanent ordinance to go into effect in June 2003.

Contact: Bob Gillette - Carollo

4. **Solano County** – Jeff Riddell was here along with his supervisor Terry Schmidtbauer. They will be making a presentation to the board of supervisors, who is considering whether or not to reopen their ordinance. They have asked Tri-TAC, as well as a local

producer, to make a presentation at this meeting to the Board of Supervisors, and develop a presentation for the meeting on August 27 at 2:00pm.

Contact: Ed McCormick – EBMUD, Bob Gillette - Carollo

5. **NAS Review of Sewage Sludge Regulations** – The report has finally been released. It is very interesting read, and the press releases on the NAS's opinion of the adequacy of the 503 regulations vary widely. Some have said that biosolids land application is a horrendous problem which needs to be addressed, and some of them said that EPA's regulations were safe and but that additional research based on new information is needed. The summary report that they came with out says that the NAS did not look at the science EPA used to develop the 503 regulations, they believe that because there is such negative perception, that it would be best to go back and do some further scientific investigation and risk assessment -- specifically on pathogens. We need to work to get the word out that those referring to the NAS report need to read what it says, not only read the press release. Based on what we have seen, this will be an uphill battle.

Contact: Layne Baroldi - OCSD

WATER COMMITTEE MINUTES FROM JULY 11, 2002 MEETING **JIM COLSTON AND MONICA OAKLEY**

A. Committee Action Items

1. **Endocrine Disruptors and Pharmaceuticals** – A conference call will be held with interested parties. There is a lot of good information available and lots of websites with posted information. Margie, Bobbie, Sharon, Roger, Steve, Dave Tucker, Larry, Jim, and Patricia have expressed interest in participating in a work group.
2. **Stormwater Regulatory Options for Construction Sites** –New draft regulations for control of stormwater at construction sites (during land disturbance) were published on June 24, 2002. Final action on those proposed rules is anticipated in March 2004. Maura Bonnarens attended a meeting held by USEPA regarding the new guidelines on July 9 in Burlingame. The meeting was not really a public hearing, so testimony and/or questions were not entered into the record. USEPA is accepting public, written comments on the proposed rule and five similar types of meetings will be held nationwide. Effluent guidelines that are contained in the rule are technology-based, not water quality-based. The proposed rule has three options. The first option is to have no change from the existing requirements. The second option adds a requirement for site inspections. There would be no formal certification process for those inspections. The third option would establish inspection and certification requirements that would be incorporated into the stormwater permits issued by USEPA and the states, with other permit requirements based on the best professional judgment of the permit authority. USEPA indicated that California is already doing a lot of the requirements in the proposed rule, and this rule has been proposed mainly for the states that aren't doing what they should be doing. Written comments on the proposed rule are due October 22. EPA stressed that they didn't have a preference on any of the three options. Call or email Maura if you have questions.
3. **Bacteria Criteria Implementation Plan** – Contact Jim Colston if you want to provide comments. The deadline to submit comments is August 2, 2002.
4. **Blending Guidance Comments** – Detailed comments on this draft guidance released in December, 2001 were sent to EPA by Tri-TAC earlier this year. These comments were also recently sent to other representatives at USEPA, along with an expression of interest in participating in any stakeholder group.

B. Updates

5. **NPDES Permitting**

- **EBMUD** – A workshop was held on the draft remand order issued by the State Water Board on June 6. Subsequent to the workshop, a revised draft order was issued. The final hearing is July 18 in Sacramento. Not much was changed in the revised order.

- **The California Council for Environmental and Economic Balance** – This organization of mostly industries is having a panel discussion on July 25 at Squaw Creek, as part of a longer multi-day conference. The panel discussion will include Dave Williams (chair of Tri-TAC), Alexis Strauss (Water Division Director at USEPA Region 9), and Loretta Barsamian (Executive Officer of SF Regional Water Board), as well as a representative from the environmental community.
- **City of Vacaville** – A draft remand order from the State Water Board is expected by the end of July, with the hearing possibly in August. A field site visit for the Use Attainability Analysis held in June.
- **Napa Sanitation District** – The District has received a stay of effluent limits from both the State Water Board for some items in the NPDES permit, and from the Solano County judge for remaining items that were appealed. However, the SF Regional Board issued a letter preliminarily assessing Mandatory Minimum Penalties (MMPs) recently, including items that were stayed.
- **City of San Diego** – Last month the City of San Diego appealed their new permit that was adopted by the Regional Board because of an arbitrary lowering of mass emission limits from 15,000 metric tons to 14,000 metric tons of TSS. A workshop will be held on July 31 to discuss background information with the State Water Board.
- **San Francisco** – A permit for the City and County of San Francisco was adopted in June, 2002. San Francisco is currently forming an appeals strategy for the permit. While pooled data from around the bay area were used for mercury limits, San Francisco indicates they have sufficient data and don't need pooled data. Also, San Francisco believes the number of special studies in the permit is excessive, including one to lower detection limits for analytical methods. It is felt that this kind of activity is not the responsibility of a POTW but instead should be the responsibility of USEPA.
- **Goleta** – This NPDES permit is scheduled for adoption on July 12 with the Central Coast Regional Board. There will be more to report at the next Tri-TAC meeting.
- **LACSD** – Two permits are expected to be adopted today at the LA Regional Board.
- **OCSB** – Next week the full Board of Directors (25 members) are expected to vote on the level of treatment for permit renewal, in particular – the issue will be whether to maintain the status quo of primary treatment with a 301(h) waiver, or go to full secondary treatment. Also, AB 1892 was signed into law recently. This statute changes the OCSB charter to allow acceptance of urban runoff into its system.

6. 303(d) List and Total Maximum Daily Load Issues

- **State Litigation** – The case is fully briefed, on appeal, waiting for oral arguments. If the court agrees with the arguments about the underground nature of the listing process that was used for the 1998 list, it could have an impact because the 1998 list formed the basis of the 2002 list for many parameters. Otherwise, the case is of limited relevance at this point, but since it has been fully briefed, there's no reason not to go forward with it.
- **2002 Listing Process** – State Board staff are currently reviewing comment letters and testimony that was received at three workshops. There's an AB 982 PAG meeting on July 23 in Sacramento which will include a more detailed update, as well as an outline of the proposed listing policy to be used in the future.
- **TMDL Federal Rule** – EPA is deciding what to do with its much-criticized and litigated 2000 revision to the TMDL rule. EPA is currently floating various proposals some of which are good, and some of which make us a little nervous. Significant changes are being discussed for implementation of TMDLs, permitting, and converting to a more detailed multi-part 303(d) list.

7. Water Quality Standards

- **Effluent Trading** – The deadline for comments on draft USEPA guidance for effluent trading was extended to July 15. Tom Grovhoug has prepared a draft comment letter for Tri-TAC. The draft comment letter were discussed during the meeting. Monica Oakley agreed transmit the comments from today's meeting to Tom for inclusion in the final draft letter.
- **Nutrient Criteria Development** – There is no new development since the last Tri-TAC meeting. The State Water Board will be meeting with folks to discuss a workplan document on July 24 at 2:00 pm.
- **Mercury Rule from DTSC** – There is no news on this item for today's meeting. This rule will continue to be watched.
- **State Implementation Plan (SIP)** – The State Water Board has indicated an interest in looking at the Effluent-Dependent Waterbodies (EDW) policy after they finish proceedings for the Vacaville NPDES permit appeal. The State Water Board is planning to release shortly their procedures for applying case-by- case exceptions to the SIP. The State Water Board is not expecting a lot of exceptions to be pursued. The State Water Board expects to have draft guidance on development of site-specific objectives ready for review and comment in the fall. No update available on mixing zone issues.

8. Sanitary Sewer Overflows (SSOs)

- **Status of Federal Regulations** – There is no news on the federal SSO regulations. The last report was that draft regulations may be issued by the end of the year. However, we have also heard recently that President Bush is trying to prevent any new environmental rules from being issued, and this may apply to the SSO rule.
- **FOG Work Group** – The workgroup met on June 25 at the Hyperion Wastewater Treatment Plant in Southern California. The City of Los Angeles hosted the meeting. A video for educating restaurant staff, produced by the City of Los Angeles, was viewed by the group, and could easily be a good resource for others. The City of Oxnard gave a presentation on their FOG program, which includes collection of grease, and conveyance (by truck) to a digester at the wastewater treatment plant. The restaurants sign up (and pay ahead) to have their grease collected on a regular basis by the City. The City is the waste hauler and the disposal site, but they do compete against other waste haulers. The work group's clearinghouse website (<http://www.casaweb.org/committee/tritac/grease.htm>) now has a total of 70 items related to fats, oils, and grease (FOG). The next FOG meeting will be in either September or October.

9. Enforcement

- **Mandatory Minimum Penalty Reform** – The most recent version of the bill was approved by committee on June 24 by unanimous vote, 7-0. The bill goes next to the appropriations committee where it will be heard after the senate comes back from its recess, August 5. It's a more modest bill than we started with. The environmental community removed their opposition in committee, so we really don't have opposition now. The State Board is OK with the amendments. What we've been able to preserve in this bill are three main reforms: 1) an exception from mandatory penalties for up to 90 days for startup of a biological treatment process and 30 days for any other process. There are some concerns that the criteria in the bill are fairly tight, but we had to give a little bit on that in order to get both the State Board and the environmental communities and the legislators convinced that people were really doing everything they could to avoid violations; 2) the bill doesn't create an exception if you have a single operational upset, but it changes the way that violations are counted for penalty purposes. If you have an upset of a biological process that meets the criteria, you can get it counted as a single violation for up to 30 days. You pay \$3,000 even if the upset continued over the course of a month as long as you meet certain criteria. The next version of the bill will have some specific requirements – that it can't be the result of operator error; negligence; if you are required to have a pretreatment program, you have to have one that's up and running; however, provided you meet those hurdles, you get to count it as one for up to 30 days and then after that you'd have to start counting one per day. 3) The bill will allow greater use of the penalties for supplemental environmental projects. For penalties that are \$15,000 or less, you can do whatever is agreed upon with the

Regional Board; for any penalty amount over the first \$15,000, at least half of this must go to the cleanup and abatement account.

C. Announcements

10. **Update to USEPA Fish Advisories** – They’ve updated their 2000 to 2001. There aren’t any noteworthy changes since the last version. However, the area that is covered by advisories is now expanded.
11. **Federal Court Decision on Pesticides and Fish** – A coalition of environmental groups sued EPA for not conducting a biological consultation with fish and wildlife services over pesticide registration and insufficient conservation efforts. The court held on summary judgment that they had done some conservation efforts. They did find, however, that they had not done biological consultation and had to do so for 55 pesticides or active ingredients in pesticides. The pesticide registration process is an ongoing process and they had an obligation to do the biological review process.
12. **Proposed USEPA Information Collection on Laboratories** – A new notice indicates USEPA’s intention to continue current practices for laboratory certification.

TRI-TAC MEETING LOCATION & SCHEDULE 2002

TRI-TAC MEETING DATE¹	LOCATION/HOTEL	AFTER TRI-TAC MEETINGS²
JANUARY 16, 2002 (WEDNESDAY)	HILTON ONTARIO AIRPORT 700 NORTH HAVEN AVENUE ONTARIO, CA 91764 909-980-0400	Land Committee Meeting 1:00-3:00
*FEBRUARY 14, 2002	HOLIDAY INN AIRPORT 500 Hegenberger Road Oakland, CA 94621 510-562-5311	
MARCH 14, 2002	SACRAMENTO INTERNATIONAL AIRPORT 6900 AIRPORT BOULEVARD SACRAMENTO, CA 95837 TELEPHONE (916) 874-0917	WATER COMMITTEE MEETING 1:00-3:00
*APRIL 11, 2002	SACRAMENTO INTERNATIONAL AIRPORT 6900 AIRPORT BOULEVARD SACRAMENTO, CA 95837 TELEPHONE (916) 874-0917	Water Committee Meeting 12:30-3:00 1. 303(d) List 2. Nutrients 3. SRF
MAY 9, 2002	HILTON ONTARIO AIRPORT 700 NORTH HAVEN AVENUE ONTARIO, CA 91764 909-980-0400	WATER COMMITTEE MEETING 1:00-3:00 1. STATE WATER RESOURCES CONTROL BOARD DRAFT 303(D) LIST
*JUNE 13, 2002	HOLIDAY INN AIRPORT 500 Hegenberger Road Oakland, CA 94621 510-562-5311	

TRI-TAC MEETING DATE ¹	LOCATION/HOTEL	AFTER TRI-TAC MEETINGS ²
JULY 11, 2002	HOLIDAY INN AIRPORT 500 Hegenberger Road Oakland, CA 94621 510-562-5311	
AUGUST 8, 2002	No MEETING	
*SEPTEMBER 12, 2002	SACRAMENTO INTERNATIONAL AIRPORT 6900 AIRPORT BOULEVARD SACRAMENTO, CA 95837 TELEPHONE (916) 874-0917	
OCTOBER 10, 2002	ONTARIO	
NOVEMBER 14, 2002	SACRAMENTO	
DECEMBER 12, 2002	OAKLAND	
<p>¹ IF YOU WOULD LIKE TO ADD AN AGENDA ITEM OR SCHEDULE A PRESENTATION FOR AN UPCOMING MEETING, PLEASE CONTACT ONE OF THE COMMITTEE CO-CHAIRS AT LEAST 14 DAYS BEFORE THE DESIGNATED MEETING DATE.</p> <p>² If you would like an “after Tri-TAC” meeting noted in the agenda package, please contact Dave Williams at least ten days before the designated meeting date.</p> <p>*The Air Committee will meet on this date.</p>		

Tri-TAC Roster

Name	Company	E-mail Address	Phone Number	Fax Number
Gregory Adams	Los Angeles County Sanitation Districts Air Quality Engineering 1955 Workman Mill Road Whittier, CA 90601-1400	gadams@lacsds.org	562-699-7411 x2113	562-692-9690
Rodney Andersen	City of Burbank 275 E. Olive Avenue Burbank, CA 91502	Randeren@ci.burbank.ca.us	818 238-3931	818 238-3918
Layne Baroldi	Orange County Sanitation District P.O. Box 8127 Fountain Valley, CA 92728-8127	lbaroldi@ocsd.com	714 593-7456	714 962-2591
Jeffrey Bell	Solano County Environmental Health 601 Texas St. Fairfield, CA 94553	jbelle@solanocounty.com	707-421-6765	707-421-4805
James Bewley	South Bayside System Authority 1400 Radio Road Redwood City, CA 94065	jbewley@sbsa.org	650 594-8411 ext 124	650 591-7122
Phil Bobel	Water Quality Control Plant 2501 Embarcadero Way Palo Alto, CA 94303	phil_bobel@city.palo-alto.ca.us	650 329-2285	650 494-3531
Maura Bonnarens	East Bay Municipal Utility District 375 11 th St., MS 702 Oakland, CA 94623	mbonnare@ebmud.com	510 287- 1141	510 287-1530
Anne Briggs	Eastern Municipal Water District P.O. Box 8300 Perris, CA 92572-8300	briggsa@emwd.org	909 928-3777 ext. 6327	909 928-6177
Dan Bruinsma	City of San Jose 777 North first Street Suite 300 San Jose, CA 95112	Dan.Bruinsma@ci.sj.ca.us	408 277-5423	
Fred Burnett	Calaveras County Water District O&M Superintendent 423 E. St. Charles St. San Andreas, CA 95249	fredb@ccwd.org	209-754-3543	209-754-1069
Michelle Buzbee	Larry Walker Associates 250 Lafayette Circle, Suite 200 Lafayette, CA 94549	michelleb@lwa.com	925 962-9700	925 962-9701
Paul Causey	Delta-Diablo Sanitation District 2500 Pittsburg-Antioch Highway Antioch, CA 94509	paulc@ddsd.org	925 778-4040 x204	925 778-8513
James Chen	Union Sanitary District 5072 Benson Road Union City, CA 94587	Jim_chen@unionsanitary.com	510 477-7561	510 477-7505
Gail Chesler	Central Contra Costa Sanitary District 5019 Imhoff Place Martinez, CA 94553	gchesler@ecis.com	925 229-7294	925 228-4624
James Clark	Black & Veatch 800 Wilshire Blvd., Suite 600 Los Angeles, CA 90017	clarkjh@bv.com	213 312-3300	213 312-3399
Joyce T. Clark	Metropolitan Water District of Southern California Operations Support Services P.O. Box 54153 Los Angeles, CA 90054-0153	jttruhan@mwdh20.com	213 217-5593	213 217-6700

Name	Company	E-mail Address	Phone Number	Fax Number
Alex Coate	East Bay Municipal Utility District P.O. Box 24055, MS 704 Oakland, CA 94623-1055	acoate@ebmud.com	510 287-1663	510 287-1330
James Colston	Orange County Sanitation District P.O. Box 8127 Fountain Valley, CA 92728	jcolston@ocsd.com	714 593-7458	714 962-2591
Rodney W. Cruze	City of Riverside 5950 Acorn Street Riverside, CA 92504	rcruze@ci.riverside.ca.us	909 351-6011	909 687-6978
Stan Dean	Sacramento Regional County Sanitation District 8521 Laguna Station Road Elk Grove, CA 95758	deans@saccounty.net	916 875-9101	916 875-9107
Nancy Evans	Central Marin Sanitation Agency 1301 Andersen Drive San Rafael, CA 94901-5339	nevans@marin.org	415 459-1455 ext 141	415 459-3971
Margaret E. Figeroid	Downey, Brand, Seymour & Rohwer 555 Capitol Mall, 10 th Floor Sacramento, CA 95819	mfigeroid@dbsr.com	916 441-0131	916 441-4021
Lauren Fondahl	Environmental Protection Agency Clean Water Act Compliance Office (WTR-7) 75 Hawthorne Street San Francisco, CA 94105-3901	fondahl.lauren@EPA.gov	415 972-3514	415 947-3549
Mary Jane Forster Foley	MJF Consulting, Inc. 7 Phillips Circle Laguna Niguel, CA 92677	mjfconsulting@home.com	949 493-8466	949 374-0912
Tad S. Foster	Tad S. Foster 20 Boulder Crescent Colorado Springs, CO 80903	tadfoster@tsfosterlaw.com	719 632-5240	719 633-4759
Donald Gabb	East Bay Municipal Utility District P.O. Box 24055, Mail Slot 59 Oakland, CA 94623-1055	dgabb@ebmud.com	510 287-1602	510 287-1712
Robert Geyer	City of Watsonville 320 Harvest Drive Watsonville, CA 95076	bgeyer@ci.watsonville.ca.us	831 728-6149	831 763-4060
Robert P. Ghirelli	Orange County Sanitation District P.O. Box 8127 Fountain Valley, CA 92728-8127	rghirelli@ocsd.com	714 593-7400	714 962-6957
Preeti Ghuman	Sanitation Districts of Los Angeles County P.O. Box 4998 Whittier, CA 90607	pghuman@lacsds.org	562 699-7411 ext 2138	562 692-9690
Diane Gilbert	Hyperion Treatment Plant Regulatory Affairs 12000 Vista Del Mar Playa Del Rey, CA 90293	dxg@san.lacity.org	310 648-5248	310 648-5114
Robert A. Gillette	Carollo Engineers 2500 Venture Oaks Way, Ste. 320 Sacramento, CA 95833	rgillette@carollo.com	916 565-4888	916 565-4880
James Gratteau	Sanitation Districts of Los Angeles County 1955 Workman Mill Road Whittier, CA 90601	jgratteau@lacsds.org	562 699-7411 Ext. 2751	562 695-1874
Sharon Green	Sanitation Districts of Los Angeles County P.O. Box 4998 Whittier, CA 90607	sgreen@lacsds.org	562 699-7411 ext. 2503	562 692-5103

Name	Company	E-mail Address	Phone Number	Fax Number
Thomas Grovhoug	Larry Walker Associates 509A Fourth Street Davis, CA 95616	tomg@lwadavis.com	530 753-6400	530 753-7030
Thomas Hall	EOA, Inc. 1410 Jackson Street Oakland, CA 94612	twhall@eoainc.com	510 832-2852	510 832-2856
Kurt Haunschild	East Bay Municipal Utility District 2020 Wake Avenue Oakland, CA 94607	khaunsch@ebmud.com	510 287-1407	510 287-1715
Ben Horenstein	East Bay Municipal Utility District 375 11th Street, M/S 702 Oakland, CA 94607	bhorenst@ebmud.com	510 287-1846	510 287-1530
Valerie Housel	City of San Bernardino Water Department 399 Chandler Place San Bernardino, CA 92408	housel_Va@ci.san-bernardino.ca.us	909 384-5117	909 384-5258
Bonnie Jones	City and County of San Francisco Water Pollution Control Division 3500 Great Highway San Francisco, CA 84132-1000	Bjones5@puc.sf.ca.us	415 242-2231	415 242-2285
James Kelly	Central Contra Costa Sanitary District 5019 Imhoff Place Martinez, CA 94553	jkelly@centralsan.dst.ca.us	925 229 7386	925 689-1232
Jacqueline Kepke	CH2M HILL 155 Grand Avenue, Suite 1000 Oakland, CA 94612	jkepke@ch2m.com	510 251-2426	510 622-9045
Wendell Kido	Sacramento Regional County Sanitation District 10545 Armstrong Avenue, Suite 101 Mather, CA 95655	kidow@sacounty.net	916 875-6529	916 875-6529
Roberta Larson	California Association of Sanitation Agencies 925 L Street, Suite 1400 Sacramento, CA 95814	rlarson@mfdillon.com	916 446-0388	916 448-4808
Kris P. Lindstrom	K.P. Lindstrom, Inc. Planning & Environmental P.O. Box 51008 Pacific Grove, CA 93950-6008	kplinc@redshift.com	831 372-5989	831 372-6168
Leslie Lundgren	San Francisco P.U.C. 1212 Market Street Suite 310 San Francisco, CA 94102	llundgre@puc.sf.ca.us,	415 554-9565	415 554-9404
Richard Luthy	Fairfield-Suisun Sewer District 1010 Chadbourne Road Fairfield, CA 94585	rluthy@fssd.com	707 429-8930	707 429-1280
Stephen Maguin	Sanitation Districts of Los Angeles County P.O. Box 4998 Whittier, CA 90607	smaguin@lacs.org	562 699-7411 x1503	562 695-8660
Chandra Mantecon	Orange County Sanitation District 10844 Ellis Avenue Fountain Valley, CA 92708	cmantecon@ocsd.com	714 593-7471	714 962-2591
Jim Marchese	City of Los Angeles 12000 Vista Del Mar Playa Del Rey, CA 90293	jmarches@san.lacity.org		

Name	Company	E-mail Address	Phone Number	Fax Number
Ed McCormick	East Bay Municipal Utility District P. O. Box 24055 Mail Slot 702 Oakland, CA 94623-1055	emccormi@ebmud.com	510 287-1657	510 287-1530
Steve McDonald	Carollo Engineers 2700 Ygnacio Valley Road, Suite 300 Walnut Creek, CA 94598	smcdonald@carollo.com	925 932-1710	925 930-0208
Daniel McGivney	Eastern Municipal Water District P.O. Box 8300 Perris, CA 92572-8300	dmcgivney@emwd.org	909 928-3777 ext. 6329	909 928-6177
Patricia McGovern	Carollo Engineers 2700 Ygnacio Valley Road, Suite 300 Walnut Creek, CA 94598	pmcgovern@carollo.com	925 932-1710	925 930-0208
Steven C. Medbery	San Francisco P.U.C. 3801 Third Street, Suite 600 San Francisco, CA 94124	smedbery@puc.sf.ca.us	415 695-7310	415 695-7388
Raymond C. Miller	SCAP 30200 Rancho Viejo Road, Suite B San Juan Capistrano, CA 92675-1575	kris@scap.occoxmail.com	949 489-7676	949 489-0150
Traci J. Minamide	City of Los Angeles Hyperion Treatment Plant Harrington Bldg., Fourth Floor 12000 Vista Del Mar Playa Del Rey, CA 90293	tjminami@san.ci.la.ca.us	310 648-5360	310 648-5114
Terrie Mitchell	Sacramento Regional County Sanitation District 10545 Armstrong Avenue, Suite 101 Mather, CA 95655	mitchellt@saccounty.net	916 876-6092	916 876-6160
Anant R. Mokashi	City of Los Angeles Hyperion Treatment Plant Harrington Building, Fourth Floor 12000 Vista Del Mar Playa Del Rey, CA 90293	arm@san.lacity.org	310 648-5385	310 648-5114
Michael Moore	Orange County Sanitation District P.O. Box 8127 Fountain Valley, CA 92728	mmoore@ocsd.com	714 593-7450	714 962-2591
Arleen Navarret	San Francisco PUC Water Quality Bureau 3500 Great Highway San Francisco, CA 94132	anavarre@puc.sf.ca.us	415 242-2201	415 242-2285
Jeremy Neill	Los Angeles County Sanitation Districts Wastewater Monitoring Section 1955 Workman Mill Rd. Whittier, CA 90601	jneill@lacsds.org	562 699-7411 x 2809	562 692-5103
Margaret Nellor	Sanitation Districts of Los Angeles County 1955 Workman Mill Road Whittier, CA 90601	mnellor@lacsds.org	562 699-7411 x 2502	562 692-5103
John "Jack" Nelson	Yucaipa Valley Water District PO Box 730 Yucaipa, CA 92399	jnelson@yvwd.dst.ca.us	909 797-5119 ext 3	909 797-6381
Monica M. Oakley	Larry Walker Associates 250 Lafayette Circle, Suite 200 Lafayette, CA 94549	monicao@lwa.com	925 962-9700	925 962-9701

Name	Company	E-mail Address	Phone Number	Fax Number
Paul Pau	City of Los Angeles Regulatory Affairs Division Harrington Building 12000 Vista Del Mar Playa Del Rey, CA 90293	pcp@san.lacity.org	310 648-5493	310 648-5114
Michele Pla	CH2M HILL 155 Grand Avenue, Suite 1000 Oakland, CA 94612	mpla@ch2m.com	510 251-2888 Ext 2056	510 893-8205
Don Rebeck	SCAP 30200 Rancho Viejo Road, Suite B San Juan Capistrano, CA 92675	drebeck@scap.occoxmail.com	949 489-7676	949 489-0150
Robert Reid	West Valley Sanitation District 100 East Sunnyoaks Avenue Campbell, CA 95008	rreid@wvwd.dst.ca.us	408 378-2407 X 11	408 364-1821
Ruben Robles	Sacramento Regional County Sanitation District 10545 Armstrong Avenue, Suite 101 Mather, CA 95655	roblesr@saccounty.net	916 876-6119	916 876-6160
Terry Schmidtbauer	Solano County EMD	tschmidtbauer@solanocounty.com	707-421-6765	
John Schroeter	East Bay Municipal Utility District Environmental Compliance Division 375 11 th St., MS 704 Oakland, CA 94607	jschroet@ebmud.com	510 287-0345	
Shahrouzeh Saneie	Hyperion Treatment Plant Harrington Building, Fourth Floor 12000 Vista Del Mar Playa Del Rey, CA 90292	ssaneie@san.lacity.org	310 648-5239	310 648-5114
Jennifer Smith	East Bay Municipal Utility District P.O. Box 24055, MS 704 Oakland, CA 94623-1055	jsmith@ebmud.com	510 287-0509	510 287-1712
Keith A. Smith	City of Davis Wastewater Administrator Public Works Department 23 Russell Blvd. Davis, CA 95616	keithsmith@ci.davis.ca.us	530 757-5686	530 758-4738
James Stahl	Sanitation Districts of Los Angeles County P.O. Box 4998 Whittier, CA 90607	jstahl@lacsds.org	562 699-7411 x1501	562 695-8660
Herb Stone	Industrial Dischargers 330 Galli Court Los Altos, CA 94022	herbgalli@aol.com	650 948-6580	650 948-6580
Mike Sullivan	Sanitation Districts of Los Angeles County 1955 Workman Mill Road Whittier, CA 90601	msullivan@lacsds.org	562 699-7411 X2824	562 692-5103
Bonnie Teaford	City of Burbank 275 E. Olive Avenue Burbank, CA 91502	bteaford@ci.burbank.ca.us	818 238-3921	818 238-3918
Warren Tellefson	County of Placer 11476 C Avenue Auburn, CA 95603-2702	wtellefs@placer.ca.gov	530 889-7511	530 889-6809

Name	Company	E-mail Address	Phone Number	Fax Number
Melissa Thorme	Downey Brand Seymour & Rohwer LLP 555 Capitol Mall 10th Floor Sacramento, CA 95814-4686	mthorme@dbsr.com	916 441-0131 X 6376	916 441-4021
Kimberly Toepfer	City of Fresno 5607 West Jensen Avenue Fresno, CA 93706	kim.toepfer@ci.fresno.ca.us	559 498-1704	559 498-1700
Dave Tompkins	City of Vacaville P.O. Box 220 Elmira, CA 95625	dtompkins@ci.vacaville.ca.us	707 469-6400	707 469-6480
Jerry Troyan	Sacramento Regional County Sanitation Dist 10545 Armstrong Avenue, Suite 101 Mather, CA 95655	troyanj@SacCounty.net	916 876-6077	916 876-6160
David L. Tucker	City of Merced 678 W. 18 th Street Merced, CA 95340	Tuckerd@ci.merced.ca.us	209 385-6846	209 725-8775
David W. Tucker	City of San Jose Environmental Services Dept 4245 Zanker Road, Suite L San Jose, CA 95134	david.tucker@ci.sj.ca.us	408 945-3711	408 934-0491
Roger W. Turner	Eastern Municipal Water District P.O. Box 8300 Perris, CA 92572-8300	turnerr@emwd.org	909 928-3777 x 6345	909 928-6115
Ray von Dohren	Carmel Area Wastewater District 3945 Rio Road Carmel, CA 93922	vondohren@cawd.org	831 624-1248	831 624-0811
Larry Wasserman	City of San Diego 4918 N. Harbor Drive San Diego, CA 92106	lwasserman@sandiego.gov	619 758-2370	619 758-2309
Penny Weiland	City of Los Angeles Regulatory Affairs Division Harrington Building, Fourth Floor 12000 Vista Del Mar Playa Del Rey, CA 90293	pow@san.lacity.org	310-648-5437	310-648-5114
Charles Weir	East Bay Dischargers Authority 2651 Grant Avenue San Lorenzo, CA 94580	cweir@ebda.org	510 278-5910	510 278-6547
Brian Whitaker	Las Virgenes Municipal Water District 4232 Las Virgenes Road Calabasas, CA 91302	bwhitaker@lvmwd.dst.ca.us	818-251-2158	818 251-2159
David Williams	East Bay Municipal Utility District 375 - 11th Street, MS 702 Oakland, CA 94607	dwilliam@ebmud.com	510 287-1496	510 287-1351
Jay Witherspoon	CH2M HILL 155 Grand Avenue, Suite 1000 Oakland, CA 94612	jwithers@ch2m.com	510 251-2888 ext 2177	510 893-8205
Bob Witzgall	Brown and Caldwell 2701 Prospect Park Drive Rancho Cordova, CA 95670-6025	bwitzgall@brwnaald.com	916 444-0123	916 635-8805

TRI-TAC SPONSOR REPRESENTATION

League of California Cities	CASA	CWEA
Phil Bobel, Rod Cruze Steve Medbery Dave Tucker Chuck Turhollow Larry Wasserman	Sharon Green, Tri-TAC Vice-Chair Layne Baroldi Jim Bewley Jim Colston Margie Nellor Dave Williams	Gail Chesler Jim Clark Bob Gillette Tom Grovhoug Mike Moore Keith Smith Harry Tow Jerry Troyan Chuck Weir Dave Williams

Tri-TAC Liaison Representation

BACWA	Dave Williams
CASA	Roberta Larson; Sharon Green
SCAP	Ray Miller; Don Rebeck

COMMITTEES

AIR	LAND	WATER	
Committee Co-Chairs: Daniel McGivney & Jay Witherspoon	Committee Co-Chairs: Bob Gillette & Layne Baroldi	Committee Co-Chairs: Jim Colston & Monica Oakley Finance Subcommittee Chair: Jim Gratteau	
Gregory Adams James H. Clark Joyce Clark Alex Coate Margaret Figeroid Preeti Ghuman Jacqueline Kepke Paul Pau John Schroeter Jennifer Smith Brian Whitaker	Jeffrey Bell Maura Bonnarens Anne Briggs Nancy Evan Don Gabb Diane Gilbert Lesley Lundgren Ed McCormick Mike Moore Don Rebeck Rueben Robles Terry Schmidtbauer Mike Sullivan Kimberly Toepfer	Jim Bewley Phil Bobel Fred Burnett Michelle Buzbee James Chen Gail Chesler Joyce Clark Jim Colston Rod Cruze Stan Dean Nancy Evans Tad Foster Jackie Gambl Robert Ghirelli James Gratteau Sharon Green Tom Grovhoug Tom Hall Ben Horenstein Val Housel Jim Kelly Jacqueline Kepke Wendell Kido Roberta Larson Kris Lindstrom Rich Luthy Jim Marchese Steve McDonald	Patricia McGovern Steve Medbery Traci Minamide Terrie Mitchell Mike Moore Arleen Navaret Margie Nellor Jack Nelson Monica Oakley Michele Plá Bob Reid John Schroeter Jennifer Smith Keith Smith Roxanne Stachon Herb Stone Warren Tellefson Dave Tompkins Melissa Thorme Jerry Troyan David Tucker (SJ) David L. Tucker Roger W. Turner Ray Von Dohren Larry Wasserman Penny Weiand Chuck Weir Dave Williams

**TRI-TAC AIR COMMITTEE
SEPTEMBER 12, 2002 MEETING**

ISSUE SUMMARY

1. SCAQMD CLEAN FLEET INITIATIVE

SCAQMD has adopted regulations (see the SCAQMD web-site at http://www.aqmd.gov/news1/Fleet_Rule_Home.htm) that require a public fleet operator with 15 or more vehicles, when replacing or purchasing new vehicles, to purchase either a low-emitting gasoline or alternative-fueled vehicle. Under SCAQMD's clean fleet strategy, a total of eight separate rules have been adopted by the Governing Board:

- Rule 1191 (Clean On-Road Light and Medium-Duty Public Fleet Vehicles)
- Rule 1192 (Clean On-Road Transit Buses)
- Rule 1193 (Clean On-Road Residential and Commercial Refuse Collection Vehicles)
- Rule 1194 (Commercial Airport Ground Access)
- Rule 1195 (Clean On-Road School Buses)
- Rule 1196 (Clean On-Road Heavy-Duty Public Fleet Vehicles)
- Amended Rule 431.2 (Sulfur Content of Liquid Fuels)
- Rule 1186.1 (Alternative Fuel Street Sweepers)

Update: Rule 1196 became effective on July 1, 2002. Affected agencies in the South Coast Air Basin are now limited to purchasing rule compliant vehicles for any planned replacements or new additions to the heavy-duty portions of their fleets. This completes implementation of the SCAQMD's first round of clean fleet rules. Additional rules are on the SCAQMD's planning horizon to bring private utility fleets into the program.

Contact: Greg Adams, LACSD

2. WERF ODOR CONTROL TECHNOLOGIES ASSESSMENT

LACSD and CH2M HILL received a WERF Odor Assessment grant for a two-year research program. The primary purpose of this study is to provide a working definition of odors, determine POTWs odor sources, list known odor compounds of concern, provide odor assessment approaches, provide modeling techniques for odor emissions estimating and odor dispersion, and conduct field research on the more promising control technologies. The first year is primarily a literature search that will be used to develop a field research agenda for the second year studies. This study will also be looking at what has been successfully used at industrial and agricultural sites to control odors and whether there is any

AIR COMMITTEE ISSUE SUMMARY

application to POTWs. Other technical areas to be addressed include all potential POTW odor sources - collection system, processes, biosolids handling facilities and combustion sources; odor characterization; the public's perception of odors and complaint trigger levels; and measurement and analysis approaches. This study will be characterizing, assessing, and determining optimal control technologies for odors from collection system influent to final effluent discharges, including biosolids processes associated with each POTW wastewater treatment and collection system.

Update: This summer the team began the second phase of the study, which includes an extensive sampling program. The research aims at determining odor generation resulting from anaerobic digestion and related dewatering, storage, and conveyance processes. General testing protocols have been developed that can be modified for specific facilities. These protocols are available to other facilities interested in conducting the testing on their own to complement the WERF study. Thus far, sampling has taken place at nine facilities across the U.S., with several more planned in the U.S. and Canada. The facilities represent a broad range in terms of size and treatment processes used. Technologies represented include Dissolved Air Flotation (DAF), gravity belt thickening, centrifuges, filter presses, drying beds, and lagoons. At each site, composite samples are taken of primary and secondary solids, and grab samples include digested solids, dewatered solids, centrates/filtrates, and solids after storage or conveyance. Local labs conduct analyses including alkalinity, volatile acids, and ammonia. Onsite, headspace tests are conducted for NH₃ and H₂S. Outside laboratories conduct further headspace analyses and test for organics, cations, anions, and residual biological activity. Additionally, samples of digester gas are taken and analyzed for carbon dioxide and methane. As the sampling portion of the study concludes, the team is beginning the analysis of all the data collected. This includes data collected during sampling as well as information from plant records. Ideally, this research will help to identify technologies that are successful in minimizing odors. Preliminary results will be presented at a workshop concurrent with WEFTEC in October, and a final report will be issued at the end of this year.

Contact: Jay Witherspoon, CH2M HILL; Greg Adams, LACSD

3. CARB ENHANCED VAPOR RECOVERY (EVR) REQUIREMENTS FOR MOTOR VEHICLE GASOLINE REFUELING

On March 23, 2000, the CARB adopted amendments to current regulations governing vapor recovery at gasoline refueling stations. These requirements are

AIR COMMITTEE ISSUE SUMMARY

applicable to fuel dispensing facilities owned and/or operated by public agencies (see attachments in May 2000 agenda packet). There are a number of new requirements, which must be implemented over the next eight years. The new requirements have been categorized into six modules. The six modules are Phase I Vapor Recovery improvements, Phase II Vapor Recovery improvements, Onboard Refueling Vapor Recovery Compatibility, Liquid Retention and Spitting, Spillage and Dripless Nozzles, and finally, In-Station Diagnostics (ISD). CARB's staff report states that "this could result in significant costs" for existing stations. One of the most costly of the mandated retrofits, will be the installation of an computerized in-station diagnostics system which will monitor EVR systems and notify the operator of system failures and vapor leaks (and in some cases, shutdown the pump) such that remedial action can be taken. Facility's which have a throughput of less than 160,000 gallons per year are exempt from the ISD requirements (it is not known at this time whether that threshold is an actual historical throughput or a permitted throughput). Some of the requirements are not even technologically available today and will have to be developed. CARB is scheduled to review the program in 2002 to ensure that technology is advancing to enable implementation of the required EVR improvements. More detailed information can be obtained from the CARB's web-site at <http://www.arb.ca.gov/vapor/vapor.htm>.

Update: The ARB has released for public review, a draft technology review regarding control measures proposed as part of the EVR program. All of the control measures reviewed were determined to be technologically feasible except the dripless nozzle standard. The ARB has scheduled a workshop for September 9 at 1:00 p.m. in Sacramento to present and take comment on the technology assessment. The ARB is proposing to take these EVR amendments to their board in December 2002. The document is available at the ARB's web site listed above. Additional materials that will be discussed at the September 9 workshop will be posted on the web site by August 30, 2002. Also, a workshop will be held on August 20 at 8:30 a.m. in Sacramento to discuss the ongoing effort to draft and adopt EVR regulations for above ground storage tanks. The agenda for this meeting is also available on the ARB's web site.

Contact: Daniel McGivney, EMWD

5. SCAQMD RULE 1113 ESSENTIAL PUBLIC SERVICE TECHNOLOGY ASSESSMENT

SCAQMD Rule 1113 provides for a higher interim VOC limit to essential public services to allow time for these agencies to test low-VOC coating performance. The Southern California Alliance of POTWs (SCAP) has formed a committee to evaluate the performance of low-VOC coatings suitable for wastewater environments. The SCAQMD has an Essential Public Service Coating

**AIR COMMITTEE
ISSUE SUMMARY**

Technology Assessment Committee with the purpose of evaluating the test results of these coatings, and SCAP is represented on that committee.

Update: Field evaluations of the atmospheric and immersion coupons took place in July. Field-testing will continue through December 2002. Copies of the quarterly evaluation reports are available from the SCAP office.

Contact: *Preeti Ghuman, LACSD*

6. CARB DIESEL RISK REDUCTION PLAN

In September 2001, the CARB adopted a plan, which would lead to the reduction of health risk associated with the combustion of diesel fuel in internal combustion engines. The plan lays the groundwork for a number of comprehensive measures to be developed over the next two years, which will reduce the particulate matter fraction of engine emissions. The measures developed will impact stationary engines, portable engines, and on-road and off-road mobile engines. The program will have significant impact on all water and sanitation agencies in the state. Retrofit control costs could be substantial. Additional information regarding this program can be obtained by visiting the CARB web-site at <http://www.arb.ca.gov/diesel/dieselrrp.htm>.

Update: The ARB has scheduled a workshop for September 4 at 9:30 a.m. in Sacramento to discuss proposed changes to the draft ATCMs for new and in-use stationary engines. The agenda and other materials for the workshop will be available on the web site the week prior to the meeting. ATCMs still under development include those for portable diesel engines and mobile (on- and off-road) engines.

Contact: *Daniel McGivney, Eastern MWD*

7. CALIFORNIA CLEAN AIR PLAN

The CARB is preparing a state-wide plan which will document all feasible emissions control measures which may be used in order for all air basins in the state to attain federal and state ambient air quality standards. The measures contained in the plan will cover stationary, area, and mobile source emissions for both criteria and toxic pollutants. These measures may have significant impact upon the operations of water and sanitation agencies. For further information, visit the CARB website at <http://www.arb.ca.gov/planning/caplan/caplan.htm>.

Update: The ARB has released for public review the draft CAP. The CAP contains over 100 proposed control measures to be implemented over the next 15 years. Many of the measures will impact public water and sanitation agencies. The plan has now been pulled off

**AIR COMMITTEE
ISSUE SUMMARY**

the ARB's web site and appears to be in limbo at this time. Apparently, the plan received a lot of late opposition from the agricultural sector, which may have contributed to the plan being set aside for the time being. It is speculated that the plan will not resurface until after the gubernatorial elections.

Contact: Daniel McGivney, Eastern MWD

**TRI-TAC LAND COMMITTEE
ISSUE SUMMARY
SEPTEMBER 12, 2002**

1. SWRCB BIOSOLIDS GENERAL ORDER (GO) & ENVIRONMENTAL IMPACT REPORT (EIR)

The Central & South Delta Water Agency filed a lawsuit regarding the Central Valley General Waste Discharge Requirements (WDR) for biosolids land application. The suit challenged the State Water Resources Control Board's (SWRCB) order that allowed grandfathering of land application projects under the WDR. The judge in the case accepted the proposal from the SWRCB for a statewide EIR, and approved a 3 year, 4 month time line for completion allowing sites permitted under the (WDR) to continue to operate. CASA approved a Memorandum of Understanding with the SWRCB and acts as the conduit of funds between contributing agencies and the SWRCB for the development of the EIR. Craig Lekven and Layne Baroldi were members of the SWRCB Technical Advisory Group (TAG) for this project.

The SWRCB and the TAG selected Jones and Stokes to prepare the EIR on the General Waste Discharge Requirements for the Discharge of Biosolids to Land for Use as a Soil Amendment in Agricultural, Silvicultural, Horticultural, and Land Reclamation Activities (GO), which was prepared by SWRCB staff. The draft EIR and draft GO were released to the public June 28, 1999. Public hearings were held on August 18th in Palmdale, August 17th in Bakersfield, and August 23rd in Sacramento. The 60-day comment period ended September 10, 1999.

Jones and Stokes completed the final EIR and prepared responses to comments on the Draft EIR. The SWRCB made minor revisions to the General Order to resolve comments. Public workshops were held on August 1 in Santa Clarita and August 3 in Sacramento. The SWRCB heard final testimony at their board meeting in Sacramento on August 17, 2000. The Board unanimously adopted the General Order and the Final EIR at this meeting. The Board did incorporate 27 changes from an Errata Sheet and several changes at the meeting before final adoption.

The most significant requirements in the adopted GO are:

- the prohibition that "The application of biosolids containing a moisture content of less than 50 percent,
- a restriction that biosolids less than 75% moisture shall not be land applied when surface wind speed is greater than 25 mph,
- if the ground water is less than 25 feet from the surface monitoring is required including Mo, As, Se,
- plant tissue testing for Mo, Cu, and Se,
- require that residual nitrogen be determined by annual soil testing at 18 inches deep.

The SWRCB incorporated the EIR mitigation measures, the changes contained in the Errata, and items added at the final hearing into the GO. The draft EIR, Final EIR, final GO (Water Quality Order No. 2000-10-DWQ) and Users Manual are available at www.swrcb.ca.gov/programs/biosolids/index.html.

Two lawsuits were filed over the EIR. One by the Central and South Delta Water Agency and one by Kern County. The State Attorney General provided the defense. The two lawsuits were combined and heard by Judge Ron Robie. CASA intervened in these lawsuits. Regional Boards

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 2**

are using the GO and the Lahontan and Central Valley Regional Boards have each issued one Notice of Applicability (NOA) using the GO.

The SWRCB GO and associated EIR lawsuit hearing was held in front of Judge Ronald B. Robie on July 20, 2001 in Sacramento. The draft conclusion by the Court was that the lawsuits were denied. The Court then took testimony on the draft ruling. Following the testimony, Judge Robie took the case under submissions. Judge Robie made his final ruling on August 10, 2001. The final conclusion by the Court was that the lawsuits were denied. One interesting finding is that "The Court finds that there is substantial evidence to support the validity of the findings reached by the EPA in its development of the federal regulations (Title 40, Part 503 of the Code of Federal Regulations)."

On October 5, 2001, Kern County filed an appeal to the Court Ruling. Subsequently the Central and South Delta Water Agencies also appealed. CASA has intervened on behalf of the SWRCB. No dates have been set for the appeal hearing yet. The briefs from Kern County and the Central and South Delta Water Agency were submitted on May 2, 2002. CASA's brief was submitted in June 2002.

Update: The briefs by the State Attorney General was submitted in early August. The hearing will be scheduled early in 2003 before the third District Court of Appeals.

The Central Valley Regional Water Quality Board continues to receive Notice of Intents (NOI) and is apparently now processing them.

*Contact: Layne Baroldi OCSD, Bobbie Larson CASA
Current as of: August, 2002*

2. RADIOACTIVITY

Survey - EPA and the Nuclear Regulatory Commission (NRC) conducted a survey of POTWs to obtain national estimates of the levels of radioactive materials in sludge and ash at POTWs, estimate the extent to which radioactive contamination comes from either NRC/Agreement State licensees or from naturally occurring radioactivity, and support possible rulemaking decisions by NRC and EPA. For the planned survey, NRC/EPA sent the questionnaires to some 600 POTWs associated with NRC licensees having the highest potential to discharge radioactive material to the sewer system. Using the information gathered, NRC and EPA was to identify approximately 300 POTWs for sampling. The NRC proposal states that POTW identities will be kept confidential.

In July 1998, the Office of Management and Budget cleared the joint NRC-EPA survey and has required the two agencies to establish a survey review committee. Two municipal representatives are on the committee: Kevin Aiello of Middlesex County Utility Authority and Tom Lenhart of Northeast Ohio Regional Sewer District. The committee will oversee and monitor the results of the survey.

Of the 366 that responded to the survey, at least 300 and possibly all of the responding POTWs have been selected for the sampling survey, this list will not be made public. Sampling kits were received by some California agencies, though the names are confidential. All of the sampling is complete. The data has been analyzed and the results will be available this coming summer. The preliminary results are that there are no surprises.

Dose Modeling Document– Dose modeling is to be conducted to develop dose-to-source factors that can be used to help interpret the results of analyses of sewage sludge samples for radioactive materials. The consultant hired by AMSA has completed the dose modeling report. POTWs should be able to use the report to determine the level of radioactivity found in their biosolids from the samples forward to the NRC

Guidance Document - AMSA has developed a draft guidance document to assist POTWs in addressing radioactivity potential in sewage sludge and ash.

Draft documents have been developed and issued for public comment dealing with aspects of all three activities. Final reports will be issued in all three areas, hopefully by early 2002. These documents, along with Subcommittee meeting minutes will continue to be posted on the ISCORS website under the postings for subcommittees at "<http://www.iscors.org/sewage.htm>".

Update: As of this date there is nothing new to report.

*Contact: Diane Gilbert City of LA
Current as of: August, 2002*

3. DIOXINS

Draft 40CFR503 Round 2 Regulations, for Dioxins were issued December 15, 1999. The dioxin requirement is 300 ppt TEQ. Similar to the metals contained in the 503 regulation, the proposed dioxin concentration is based on the results of a risk assessment. However, unlike metals, only a ceiling concentration is proposed. The current proposal is 300 nanograms toxic equivalent per dry kilogram. If the dioxin content is over this concentration (0.0003 mg TEQ/kg) the biosolids cannot be used beneficially. The comment period was extended to March 23, 2000. WEF and AMSA are handling comments. The proposed regulations require a minimum of annual testing for dioxins in biosolids for the first five years. This testing costs between \$1,500 and \$2,500 per sample. The draft regulations allow for the test frequency to be extended to every five years if the sample results are below 30 ppt TEQ. The draft regulations include a new dioxin test method that requires that non-detect results be reported at a value of half the detection limit. Based on the current testing procedures this means that non-detects on all cogeners would return a TEQ result of 15 to 20 ppt. This will affect the ability to obtain results less than 30 ppt.

The EPA released a study indicating that dioxins are very carcinogenic. This has resulted in a reevaluation of the draft requirements. Data on the EPA dioxin health risk assessment were posted on their web site on June 12, 2000.

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 4**

The new regulations must be promulgated by December 15, 2001 to meet a court mandate. The reevaluation will not be completed until some time next year. This has EPA in a dilemma.

There is a lack of data concerning the concentrations of dioxin that will be reported with the new EPA test procedure. AMSA has conducted a dioxin testing program and survey. The data will be needed by each agency for land application when the new regulations are promulgated.

It is now thought that the dioxin reassessment being completed by EPA could lower the acceptable limit from 300 to as low as 8 TEQ. Such a change would affect the ability to land apply biosolids. A recently released report is critical of the reassessment.

AMSA dioxin results were forwarded to participating POTWs in July. AMSA collected 199 samples from 171 POTWs located in 31 states and found dioxin concentrations ranging between 7.1-256 ppt-TEQ. A single outlier concentration of 3,590 ppt-TEQ was also found. AMSA is working with this particular POTW to re-test their biosolids to confirm this number. The following table presents the results of the analysis with non-detects set to one half of the detection limits:

	Total	(ppt-TEQ) Dioxin & Furans	PCBs
Average	48.5	38.4	10.0
Median	21.67	15.15	5.70

AMSA has finalized the report concerning the study and it is posted on AMSA's website (www.amsa-cleanwater.org).

On November 30, AMSA and other the consent degree parties agreed to allow the U. S. EPA to extend the deadline for finalizing the proposed dioxin Part 503 rule from December 15 to March 1, 2002. The extension would allow the U. S. EPA time to account for new information obtained from the ASMA survey results and on-going risk assessment.

On December 21, the U. S. EPA listed in the federal register a notice of its final determination that they will not impose numerical standards or management practices for dioxin and dioxin-like compounds in sewage sludge that is disposed of at a surface disposal site or incinerated in a sewage sludge incinerator. In the notice the U. S. EPA stated that the final action to amend the Part 503 regulations for sewage sludge that is applied to land would be published separately at a later date

On April 1, 2002, all parties to the lawsuit agreed to a significant deadline extension for EPA to finalize regulations for dioxins in land-applied biosolids. After extensive negotiations and two interim extensions of the December deadline, the Joint Stipulation filed with the court this week allows EPA to take public comment on the new data, and gives the Agency until October 17, 2003 to finalize the regulations.

EPA published in the June 12, 2002 Federal Register a notice of data availability for the Round 2 Part 503 sewage sludge regulations. This document summarizes the new sewage sludge data and risk assessment for dioxin. Based on a revised risk assessment (probabilistic) for land application of sewage sludge, the Agency estimates that its highly exposed population to land-applied sewage sludge using the current cancer slope factor is very low, ranging from 2×10^{-5} to 1×10^{-6} . EPA had proposed a 300 ppt dioxin limit for land application of biosolids in 1999 and is inviting comment on whether setting such a limit would make no detectable difference in risk or if no further action or rulemaking should be taken. In addition, the Agency is inviting comment on whether a voluntary methodology should be used to identify, reduce, and eliminate sources of dioxin from entering wastewater facilities that contribute to occasional elevated levels of dioxin in sewage sludge.

Update: Tri-TAC is preparing a comment letter which must be submitted by September 10, 2002

*Contact: Diane Gilbert City of Los Angeles
Current as of: August, 2002*

4. CIWMB COMPOSTABLE ORGANIC MATERIAL REGULATIONS

New, draft regulations will make changes that require all composting facilities to have a full facility permit anytime there is any biosolids in the mixture. The question is what action to take next on this. The requirements do treat biosolids, manure, and every other product except green waste composting facilities the same. This was initially heard by the CIWMB on April 23, 2001.

The CIWMB chose not to do anything on these regulations at the April 23 2001 board Meeting. They plan to hold a number of meetings to get more stakeholders involved. This will be brought up again at the Boards June 19, 2001 meeting.

The CIWMB discussed the proposed composting regulations in their August 14-15 2001 meeting. The board decided to move forward with the proposed draft regulations and start the 45-day comment public period. The new draft regulations include biosolids, manure, and other municipal solid waste other than green waste in the same tier. This tier requires that any biosolids composted outside of the treatment facility would require a full solid waste facility permit. Biosolids composted at the treatment facility would require enforcement agency notification. Also research projects using biosolids would require only enforcement agency notification if 5000 or less yards are being composted.

The CIWMB proposed final regulations in early 2002 that essentially treat biosolids like other organics. The only concern is that the proposed regulations include a new low concentration limit for selenium of 36 mg/kg. This should be increased to the current 503-regulation concentration limit of 100 mg/kg. Comments have been made on these regulations and the CIWMB is determining if the selenium limit will be changed.

Update: The CIWMB held a hearing on May 14, 2002 to review the comments on the final regulation and after reviewing the comments decided to make some minor

changes, but did not address our selenium concern. The Board decided to institute a 15 day comment period. The 15-day comment period extends from August 29 through September 13, 2002. The Board must receive written comments on the proposed changes no later than 5:00 p.m. on September 13, 2002

*Contact: Diane Gilbert City of Los Angeles
Current as of: August, 2002*

5. SOUTH COAST AQMD PR 1133

The first draft of Proposed Rule 1133 require best available control technology of the PM10, VOCs, and ammonia for composting sludge drying beds and possibly storage areas. This would mean that all of these facilities would have to be enclosed and with off gas scrubbing.

The second version of the rule dropped sludge drying beds, but requires enclosure of everything at a composting facility. This proposed rule is of major concern to composters and the CIWMB, since it will significantly drive up the cost to compost, especially for green waste composters. The CIWMB met on October 24, 2001 at the SCAQMD to address PR 1133. Composters and POTWs provided comments at this meeting.

A PR1133 Working Group meeting was held on February 19, 2002. This meeting assessed various scenarios for co-composting technologies. SCAP is performing its own studies on biosolids composting in order to provide the SCAQMD with accurate emissions data for the rule development. SCAP's Air Committee is actively involved in the rule development. SCAQMD staff will consider emission reduction effectiveness, costs, affordability, industry impact, public nuisance, health impacts, siting issues, and current industry plans to formulate a proposed rule recommendation.

Update: The AQMD recently held a workshop on PR1133. The AQMD broke this proposed rule into three basic phases. The first phase will regulate biosolids composting and it appears that they will require enclosure of the active composting and possibly full enclosure of curing and storage. The three phases are: 1. Chipping and grinding, 2. Green waste composting, and 3. Co-composting and biosolids composting. In addition, the AQMD is starting to look into regulating odor, noise, and vibration. The measurement of these associated parameters has been added to the SCAP study of composting emissions. In addition, the AQMD is also saying that they're looking at requiring negative pressure aerated static pile inside an enclosed facility. This would be regulating the techniques to meet their requirements.. It would make a lot of sense for the AQMD to hold off on the action until at least the SCAP studies are complete. Tri-TAC agencies are actively commenting and working through SCAP on this issue.

*Contact: Dan McGivney EMWD, Layne Baroldi OCSD
Current as of: June, 2002*

6. NATIONAL ACADEMY OF SCIENCE REVIEW OF 503 REGULATION

The U.S. EPA is sponsoring an NAS Study to review the 40 CFR Part 503 Regulation relating to the management of Class B Biosolids.

The NAS Study Scope includes:

- Review the risk-assessment methods and data used to establish concentration limits for chemical pollutants in sludge to determine whether they are the most appropriate approaches. The committee will also consider the NRC's previous (1996) review and determine whether that report's recommendations have been appropriately addressed. Issues to consider include: (a) how the relevant chemical pollutants were identified; (b) whether all relevant exposure pathways were identified; (c) whether exposure analyses, particularly from indirect exposures, are realistic; (d) whether the default assumptions used in the risk assessments are appropriate; and (e) whether the calculations used to set pollutant limits are appropriate.
- Review the current standards for pathogen elimination in sludge and their adequacy for protecting public health. The committee will consider: (a) whether all appropriate pathogens were considered in establishing the standards; (b) whether enough information on infectious dose and environmental persistence exists to support current control approaches for pathogens; (c) risks from exposure to pathogens found in Class B sludge; and (d) new approaches for assessing risks to human health from pathogens in sludge.
- Explore whether approaches for conducting pathogens risk-assessment can be integrated with those for chemical risk-assessment. If appropriate, the committee will recommend approaches for integrating pathogen and chemical pollutant risk-assessments.

Susan Martel, is the National Academy of Sciences' liaison to the project. The Committee met on October 3 and 4, 2001 in Woods Hole, MA and began drafting the report. The committee met on December 10-11 in Irvine, California to work on the draft. The meeting was closed to the public. The goal is to have the report ready for peer review shortly after the meeting. If the committee feels that an additional meeting is needed to complete the report, another meeting will be scheduled in January to complete the draft. It is anticipated that the report will undergo peer review in February. NAS expected to deliver the final report to EPA by the end of May 2002.

Update: The National Academy of Sciences' Report was released on July 2, 2002 entitled "Biosolids Applied to Land: Advancing Standards and Practices." The report's overarching finding are that "there is no documented scientific evidence that the Part 503 rule has failed to protect public health" further reinforcing what many years of operating history at numerous biosolids facilities have shown. The report also finds that there is a need to update the scientific basis of the Part 503 rule and the report's key recommendations to: use improved risk assessment methods to better establish standards for chemicals and pathogens; conduct a new national survey of chemicals and pathogens in sewage sludge; establish a framework for an approach to implement human health investigations; and increase the resources devoted to EPA's biosolids program. The press release issued on this report was negative and is being used by anti-biosolids groups.

*Contact: Bob Gillette Carollo Engineers
Current as of: August, 2002*

7. CALIFORNIA DEPARTMENT OF TOXIC SUBSTANCES MERCURY REGULATIONS

The Department of Toxic Substances has prepared a Draft Mercury Report which shows that there is a significant problem with mercury in the environment especially in fish tissue. Though the majority of the mercury is from legacy pollution i.e. gold and mercury mining they believe that there is a need for new mercury regulations. They have proposed five options:

1. Regulate all mercury containing waste as hazardous.
2. Regulate all waste with intentionally added mercury as hazardous waste.
3. Regulate all mercury containing consumer products—at the time they are discarded—as hazardous.
4. Develop a non-hazardous waste regulatory threshold number.
5. Status quo.

The staff prefers option 1. A hearing was held on November 19, 2001 in Sacramento, additional meetings to follow in Los Angeles – December 12, 2001, Oakland – December 3, 2001 and Fresno January 9, 2002. The Land Committee has submitted a letter and comments in support of sound science and option 4.

Tri-TAC members have provided verbal and written comments at the Sacramento, Oakland, and Los Angeles DTSC Mercury regulation workshops. It appears that DTSC understands the concerns

Update: In mid August of 2002, DTSC opened for public comment their proposed rule for mercury (see URL below). In recent months, DTSC has eliminated some earlier options that could have caused biosolids and waste to energy ashes to be classified as hazardous. Their proposed rule focuses on source control, which we recommended as being far more effective, and on mercury recycling. A quick rule summary follows. I'll have staff review in detail.

Four new categories of mercury-containing hazardous wastes are created:

- 1 Automotive switches. Auto dismantlers would be required to remove all undamaged mercury switches.
- 2 Non-automotive products with mercury switches. The entire product would be listed as a hazardous waste unless and until the switches are removed.
- 3 Mercury containing lamps. Certain high intensity and conventional fluorescent lamps are already regulated as hazardous or universal wastes. Low mercury content "non-hazardous" lamps would now also become subject to universal waste regulations. It is not expected that landfill operators could effectively exclude such lamps. Consequently, it is anticipated that generators will need to develop infrastructure to intercept and properly dispose of the lamps.
- 4 Mercury-added novelties. Novelty items containing mercury switches, button batteries or paint would be regulated. Such novelties will be banned by state law. This portion of the regulation repeats verbatim provisions from SB 633 and would take effect one year after the ban begins.

Universal waste rules would apply unless a waste is regulated as hazardous under federal requirements. Universal waste rules allow common carrier transportation with bills of lading rather than hazardous waste manifests. They also allow waste accumulation for up to one year without a permit. Universal waste rules had already been adopted for batteries and lamps, so the proposed rules are consistent with these.

Comments are due by September 30th; a public hearing will be held that day in Sacramento. From a quick reading, it does not appear that we would have significant concerns with this regulation.

http://www.dtsc.ca.gov/LawsRegulationsPolicies/Mercury/Mercury_prop_regs.html

*Contact: Layne Baroldi OCSD, Margie Nellor LACSD
Current as of: August, 2002*

8. AB2356

This is proposed legislation dealing with pesticides in compost and specifically chlopirolid now. This law will help to regulate chlopirolid, study it, and determine what the problems are and what ought to be done to keep it and other pesticides from causing problems with compost. We encourage everyone to get copies of the bill, review it, and support the bill. It hasn't been moved to committee yet, but it is close to going to the appropriations committee for hearing and we need to support this bill.

Update: CASA provided comments in support of this bill and it appears to be moving through the Senate committees without opposition.

*Contacts: Layne Baroldi OCSD, Bobbi Larson CASA
Current as of: June, 2002*

9. LOCAL ORDINANCES

Kern County has developed a County Ordinance that will ban land application of all but exceptional quality biosolids by January 1, 2003. The Southern California Alliance of POTWs (SCAP) and several major POTWs in Southern California tried to work with Kern County to assist with development of the ordinance that addresses the need for local control and oversight of biosolids land application in a logical manner. This effort has been largely unsuccessful. The permanent ordinance is available on the Internet at <http://www.co.kern.ca.us/rma/rma.htm>. Controversial provisions include: \$8,000/year fee, \$3.37/ton road impact fee, soil sampling every 40 acres, dioxin concentrations must be below 10 ppb, no class B application after January 2003, 10 mph wind limit for spreading, etc. Exceptional quality biosolids products are exempt from the provisions of the ordinance.

A draft negative declaration (County of Kern (R0027)) for the adoption of the Biosolids Ordinance began circulation on August 13, 1999. The Board of Supervisors met on October 5, 1999 and adopted the Negative Declaration. The Board adopted the ordinance on October 13, 1999 and it became effective on January 1, 2000. The ordinance has onerous requirements for soils background monitoring (which may include every 40 acres for dioxins, PCBs, phosphorus, potassium, etc). Some tests are annual, and some are once every three years.

The City of Los Angeles, LACSD, OCSD, CASA, SCAP, and Responsible Biosolids Management filed a lawsuit against the new Ordinance on November 8, 1999. On December 7, 1999, a motion was filed to transfer the case out of Kern County. The judge agreed to move the trial to Tulare County. The hearing date was originally scheduled for May 15, 2000.

Kern County has filed a lawsuit against the agencies applying biosolids in the county for failing to perform an adequate EIR before application began. Judge Paul Vortmann ruled that Kern County complied with CEQA requirements during the development of the ordinance. The judge also ruled that the agencies had complied with CEQA. The judge did not rule on the other aspects of the case related to the validity of the ordinance.

A trial date is set for June 3, 2002 to hear the non-CEQA causes of action. There is concern that regulation of Class A biosolids may not be far behind. Generator representatives have recently met with the County staff who indicate that there are concerns with issues related to land application of Class A biosolids.

The draft summary judgment and motions was issued on May 22. Judge Vortmann provided a tentative ruling against all three of our causes of action. The case began to be heard on May 23

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 11**

in Visalia. The following is a brief description of the causes of action and the court's tentative ruling. The entire tentative ruling is also attached:

1. The ordinance is invalid and unconstitutional because it violates the Commerce Clause: The tentative ruling said that the application of the ordinance to only unincorporated land reflects the constitutional limits on Kern County's police powers, and as such does not have a discriminatory effect on interstate commerce. The tentative ruling also stated that Kern County's decision to allow only EQ biosolids to be land applied cannot run afoul of the commerce clause because this legislative policy choice is explicitly authorized by the federal Clean Water Act, Part 503, and state law. The Commerce Clause protects the interstate market, not particular firms, from burdensome regulations.

2. Ordinance is invalid and unenforceable because it conflicts with state and federal regulations "permitting" application of biosolids and because it is barred by the Equal Protection and Due Process clauses of the U.S. and California Constitutions: The tentative ruling denied the claim that the ordinance is invalid and unenforceable because it conflicts with state and Federal regulations permitting application of biosolids. The court found that Federal and State law has not preempted this field. Federal and State law expressly authorize the local regulation of biosolids. The Federal Part 503 regulations set minimum standards for the use or disposal of biosolids. The Federal Clean Water Act states the determination of the manner of disposal or use of sludge is a local determination. Although there may be language in the cases cited about an outright ban is prohibited when regulated use is already permitted, the regulation being considered in those cases completely banned either firearms, fireworks, or electroshock. None of the cases cited on this issue pertained to the application of biosolids. Additionally, the ordinance herein does not completely ban the applications of biosolids, just Class B biosolids. Thus, the court does not find that the ordinance is in conflict with Federal and State law. The court finds that there was a rational basis to a legitimate state purpose. Kern referenced its health and safety concerns and the fact that a local road was having to be closed because of the damage caused by trucks hauling biosolids. A "study" determined the relationship of the damage to the road by the haulers of biosolids and the proposed fee to pay for the maintenance needed. Having found a rational basis for the ordinance, the court found that the ordinance did not violate the equal protection and due process clause.

3. The impact fees are invalid and unenforceable because it constitutes an illegal general and special tax, which required voter approval prior to adoption.: The third cause of action alleges the Biosolids Impact Fee provision of the Ordinance is invalid because it is a special tax, a general tax, an invalid assessment, improperly uses revenues for unrelated purposes, and violates the Equal Protection and Due Process Clauses of the state and federal constitution. The tentative ruling found that the impact fees are bona fide regulatory fees, i.e., the record needed only demonstrate a reasonable relationship between the fees to be charged and the estimated cost of the service or program to be provided.

Update: The trial was held on June 3, 2002. No oral testimony was taken and the administrative record was originally to be the basis of the decision. The judge

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 12**

then decided to allow a written brief, which is due July 15, 2002. Kern County will have until August 9, 2002 to respond to the brief.

*Contact: Layne Baroldi OCSD
Current as of: June, 2002*

Kings County has decided to implement local regulation of biosolids. Kings County has 23,000 acres permitted for biosolids land application. The Kings County Agricultural Commissioner initially proposed a form of agreement between his office and land appliers to allow local inspection and record keeping. Kings County only has two permitted biosolids land application sites. Kings County circulated a draft ordinance among staff which allow land application of Class B biosolids. The Draft Ordinance did restrict biosolids application to sites in only a portion of the County and at least 2 miles away from schools and sensitive receptors. Kings Co. Agricultural Commissioner held a meeting with the Kings Co. Farm Bureau, County Counsel, Biosolids appliers, and water interests on September 26, 2000 to discuss the ordinance.

The ordinance was drastically changed so that it now bans Class B biosolids in February 2003. The current ordinance allows for the use of Class A EQ biosolids until February 2006 and then only Class A EQ Biosolids in the compost form will be allowed. This was essentially adopted pending completion of CEQA documentation.

A lawsuit was been filed against the ordinance, which was heard on November 16, 2001. An appeal by the Orange Co. Sanitation District for extended time on their permit was heard on Nov. 6, 2001, and in December.

There is discussion that the ordinance's definition of Class A EQ biosolids could be expanded from having compost being the only type of acceptable Class A EQ biosolids to include any of the initially adopted 503 Appendix B PFRP processes.

The lawsuit against the ordinance was heard, on November 16, 2001. The court found in favor of the County and the ordinance. The Orange Co. Sanitation District request for extended time on their permit was denied. The court decision on the adequacy of the CEQA compliance document was appealed.

Orange County filed an appeal on the Board of Supervisors decision to not extend their use of Class B biosolids land application. This appeal was denied.

Update: McCarthy Farms has submitted a request for a Class B permit extension which was to be heard on July 15, 2002. This request has been withdrawn by McCarthy Farms pending a tour of the ranch by the Kings County Supervisors. Orange County filed a lawsuit on the ruling on their appeal on the Board decision to not extend their use of Class B biosolids land application. There is also a composting facility that is presently going through the CEQA process. On a related matter, there are hearings on the dairy elements of programmatic EIR

where pathogen issues could be related biosolids.

Contact: Layne Baroldi OCSD

Current as of: August, 2002

–*Riverside County* - In response to complaints and local demonstrations during biosolids land application at some sites, Riverside County is considering a revision of their ordinance that could possibly ban Class B biosolids. Regulators, generators, and applicers are meeting to address and resolve issues.

On March 20, 2001, after almost three hours of testimony, the Riverside County Board of Supervisors (Board) postponed their vote on two biosolids related agenda items; the approval of the Riverside County Health Services Agency's report on the "Health Effects Related to the use of Pesticides and Sewage Sludge" (Report), and the proposed prohibition of land application of biosolids on County owned land. The Report affirmed that the existing regulations provided adequate health and safety measures to protect the citizens of Riverside County finding that "[t]he minimal risk of disease transmission or causation makes the adoption of any additional mitigation, up to and including a full ban, a policy decision based on the quality of life issues as opposed to a Public Health necessity." The Report also determined that the quality of life issues "apply equally to the similar uses of manure." Subsequent to the Report, Riverside County staff concluded that virtually all complaints attributed to biosolids were the result of manure use.

The Board instructed staff to form a "Blue Ribbon Committee" to address the issues surrounding the land application of biosolids. The Committee will be limited to eight individuals, formed by the Board, from a pool of representatives of the Riverside County Farm Bureau, scientist from the University of California at Riverside, Riverside County regulators, concerned citizens and the biosolids industry. It is anticipated that the committee will provide a report to the Board within sixty days of its formation.

The "Blue Ribbon Committee" was to look at two issues: 1) a ban on land application of biosolids on publicly owned land and 2) a review of the Health Department Report. A preliminary report was due out of the group by June 5 2001 with the final due June 15, 2001. A draft ordinance banning land application of Class B biosolids was made available October 24, 2001. Staff implemented a policy requiring half-mile setback of application of Class B material from all buildings. This effectively implemented a ban on all but 600 acres in the County. The final ordinance banning land application of Class B biosolids has been enacted. Land application in the County has ceased except for some in-County Class A solar dried biosolids. The Ordinance banning Class B biosolids land application was adopted in November 2001. Riverside County is in the process of developing a Class A biosolids ordinance which will probably include buffer zones. The County would like to do is distinguish between Class A biosolids that is objectionable to neighbors and Class A biosolids that is not objectionable.

Update: An ordinance regulating Class A has been drafted and is being reviewed.

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 14**

The Board of Supervisors is not actively pushing the implementation of a Class A ordinance at this time. In response to local anti-biosolids activist comments on the National Academy of Science (NAS) biosolids Report, the Riverside County Board of Supervisors directed its Community Health Agency to review the NAS Report and to report back on August 13th on the Report's implications with regard to land application of biosolids in Riverside County. Specifically, staff recommended:

1. That the Prohibition of the land application of Class B Sludge, instituted under Riverside County Ordinance No. 812, and codified as County Code Chapter 8.129 remain in effect, and;
2. Riverside County Ordinance No. 812, codified as County Code Chapter 8.129, be amended, or an additional Ordinance be developed, to prohibit the land application of bulk (un-bagged) quantities of all Class A material.

Riverside County staff chose to emphasize the many "uncertainty" (i.e., need for additional research only, etc.) quotes found in the NAS report as a basis for their recommendation. These "uncertainties" included:

1. That the "unanswered questions about the safety, environmental effects and propriety of land application of sewage sludge" referenced in the 2001 Prohibition of Land Application of Class B Sludge remain unanswered, thus confirming support for the continued prohibition of the practice, and
2. Similar unanswered questions are raised regarding the safety of Class A sludge processing and application, which suggest consideration of restrictions, if not a similar outright prohibition.

In its staff report, Riverside County stressed that "additional scientific work is needed to reduce persistent uncertainty about the potential for adverse human effects from exposure to biosolids. There have been anecdotal allegations of disease, and many scientific advances have occurred since the Part 503 Rule was promulgated. To assure the public and to protect public health, there is a critical need to update the scientific basis for the rule to (1) ensure that the chemical and pathogen standards are supported by current scientific data and risk assessment methods, (2) demonstrate effective enforcement of the 503 rule, and (3) validate the effectiveness of biosolids management practices".

"In Summary [Riverside County stated]:

- 1 We are unable to determine that the practice is safe,
- 2 We are unable to determine that the practice is unsafe, unhealthy or is otherwise responsible for public health impacts,
- 3 Standards must be developed using currently accepted, up-to-date scientifically valid analytical methods."

The staff report went on to say "while there are a wide variety of processes that can be used to achieve Class A standards, none reduce heavy metals or chemicals; and with regard to the adequacy of the chemical risk analysis, the Report makes no distinction between Class A and Class B sludge. Absent other restrictions, there is a real potential that past or future applications of Class A sludge may include harmful chemicals for which the standards have not been established using current risk analysis standards, or for which standards were never adopted."

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 15**

During the public comment period, the Board heard from several speakers in opposition to a ban on Class A biosolids. No anti-biosolids comments were made. The speakers represented Synagro, Coachella Water District, the City of Corona, the Riverside County Farm Bureau, the University of Arizona (Dr. Chuck Gerba), Industrial Recycling Services, and Precision Soil Products. The speakers stressed waste diversion, lack of biosolids management options, increase in truck traffic, adverse impact on business, increased costs, etc... The Board, especially Supervisor Buster, was concerned over the importation of Class A biosolids and stressed that each county should manage its own biosolids....

The Board concurred with Staff's first recommendation to continue the ban on the land application of Class B biosolids but continued for 180 days a decision on the second recommendation, pending additional review of the NAS report by a yet to be assembled committee to be chaired by Dr. Gary Feldman, Director of the Riverside County Community Health Agency. It is expected that Dr. Ian Pepper, microbiologist from the University of Arizona and a member of the 16-member NAS Report team will be on Dr. Feldman's committee. As with the Class B biosolids committee, the committee to consist of members from farming, local POTWs, anti-biosolids activist, Synagro, Riverside County staff, and academia.

*Contact: Anne Briggs EMWD, Layne Baroldi OCSD
Current as of: August, 2002*

The *San Luis Obispo County* Board of Supervisors has instituted a six months process to develop an ordinance for land application of biosolids. The Board has established a committee made up of 27 individuals including County Staff, Cal Poly Academicians, farmers, business leaders, and several from a group in opposition to biosolids land application. They have hired several consultants to work with them in the preparation of this ordinance.

The County Department of Environmental Health is charged with putting out regulations of land application of biosolids. They have put together a panel that is very divided and covers the range from anti biosolids activists to land appliers. All of these will have a vote. They have recently brought in a new facilitator, John Wallace. It appears that as a minimum the final ordinance will be more restrictive then the 503 regulations and the Statewide General Order.

The Task Force has completed their work, and the facilitator has prepared draft recommendations for submission. The draft recommendations were voted approval at a September 19, 2001 meeting. The recommendations have been given to the Environmental Health Department for presentation to the Board of Supervisors and development of an Ordinance. The recommendation should be going before the Board of Supervisors in December.

The recommendations will allow biosolids land application with some restrictions beyond the current requirements. The recommendations should allow reuse of all of the biosolids generated within the County on existing sites until a formal ordinance is prepared and adopted. The recommendations were be presented to the Board of Supervisors on March 12, 2002.

Update: Staff has prepared a draft interim ordinance that has been circulated once for review. This interim ordinance sunsets in one year, limits land application to

**LAND COMMITTEE
ISSUE SUMMARY
PAGE 16**

Class A EQ biosolids only, and limits the amount that can be applied to 2500 cubic yards a year.

*Contact: Bob Gillette Carollo, Diane Gilbert City of LA
Current as of: July, 2002*

Solano County, A local anti-biosolids activist has requested that the current County Ordinance be revised to prohibit land application of Class B biosolids. The Board of Supervisors requested that this be brought back to them in August with staff recommendations.

Update: The Solano County Board of Supervisors meeting August 27, 2002 ended with a 5-0 vote to impose a County moratorium on the land application of Class B biosolids, beginning October 15, 2002. This was despite Solano County staff's recommendation to continue the existing ordinance, which they consider as protective of public health. The Supervisors are placing the "onus" of scientifically demonstrating that biosolids do not cause public health issues on Synagro and the generators, before the moratorium would be lifted.

Dr. Ian Pepper's bioaerosol research, conducted earlier this month in Solano County (as well as 16 other sites in California and Arizona) has yet to find any human pathogens transported from biosolids sites....the study will be completed next spring.

Lauren Fondahl (EPA), Johnny Gonzalez (SWRCB), Dr Ian Pepper (Univ of Arizona), Vallejo Sanitation & Flood Control's GM, A Fairfield-Susun manager and several folks from Synagro spoke, as well as 4-5 farmers supporting Class B biosolids recycling. Tri-TAC submitted a letter supporting the current ordinance and staff's recommendation.

There were about 15 speakers, mostly residents of Rio Vista, who spoke out against land application.....concerns ranged from odors to horses, cats, goats and dogs who had died, as well as people who think it's causing asthma, flesh-eating bacteria, etc. There was no scientific evidence at all that biosolids caused any of these incidences. Ultimately, the Board of Supervisors appeared to be responding to a roomful of people (~75), most of whom were against biosolids, cheering loudly after each person spoke in opposition to land application.

*Contact: Ed McCormick EBMUD, Bob Gillette Carollo
Current as of: August, 2002*

**Tri-TAC WATER COMMITTEE
JULY 11, 2002 MEETING**

ISSUE SUMMARY

1. 303(d) LIST/TOTAL DAILY MAXIMUM LOAD (TMDL) ISSUES

Background: Under Section 303(d) of the Clean Water Act and associated USEPA regulations, States are required to list water bodies for which water quality standards will not be met after application of technology-based controls, establish priorities for action among the listed water bodies, establish total maximum daily loads (TMDLs) that each listed water body can receive to meet water quality standards, and determine reductions in pollutant loads from point and non point sources to achieve the TMDL. The next 303(d) list is required to be submitted by April, 2002. Under the new regulations (which are expected to go into effect by that time) the 303(d) lists will be prepared every 4 years.

EPA's TMDL Regulations: EPA issued draft regulations pertaining to 303(d) listing and TMDL development in August 1999. Numerous changes to the existing TMDL program have been proposed in the draft regulations. Comments on the draft EPA regulations were made in January 2000. EPA received an enormous volume of comments on the proposed regulations. A number of congressional hearings have been held to hear testimony on this topic. EPA issued the final regulations on July 13th, 2000 and a 60-day Congressional Review period went into effect after the regulations were issued. The regulations have a delayed effective date of April 30, 2003. In 2001, EPA held numerous listening sessions throughout the Country to get input on potential revisions to the adopted regulations. Draft regulations are expected to be released sometime in 2002 for review. With regard to listing, in November 2001, EPA released its *2002 Integrated Water Quality Monitoring & Assessment Report Guidance* ("integrated report guidance") that for the first time integrates state development and submission of the Clean Water Act's 305(b) water quality reports and 303(d) lists of impaired waters. The release of the integrated report guidance was one of several reasons EPA listed for extending the deadline for the next state 303(d) lists until October 1, 2002.

California's 1998 303(d) List: The SWRCB adopted the statewide 1998 303(d) list on May 27, 1998. EPA took final action on California's 1998 303(d) list in May 1999, adding 37 water bodies and 12 pollutants for other water bodies, including dioxin for San Francisco Bay.

Development of California's 2002 303(d) List: On April 2, 2002, the State Water Resources Control Board issued a draft of the section 303(d) list for 2002. The SWRCB held three hearings on the proposed list in May and accepted written public comments through June 15, 2002. SWRCB staff is in the process of reviewing the comments and will release a revised draft list in late summer. The SWRCB is expected to approve the final 2002 list in October for submittal to the USEPA.

Tri-TAC submitted two comments letters on the draft list (dated May 17, 2002 and June 17, 2002) and presented testimony at the May 23, 2002 hearing.

California 303(d)/TMDL Lawsuits: In December 1997, the Natural Resources Defense Council (NRDC) and two other environmental groups sent a Notice of Intent to Sue the EPA over the failure of the Los Angeles RWQCB to adequately implement the 303(d) and (e) program. As a result of a settlement agreement between the parties, EPA adopted a consent decree establishing a schedule for completion of TMDLs in Region 4.

In northern California, the San Francisco Baykeeper filed a similar Notice of Intent to Sue with EPA Region 9 in October 1998 for the San Francisco and Central Valley Regions. On January 12, 2000, the San Francisco Baykeeper, San Diego Baykeeper and CalPIRG filed a lawsuit against EPA alleging failure to properly implement the TMDL and NPDES permit programs in California. CASA filed a similar suit against EPA regarding a failure to properly implement Section 303(d), 305(b) and other sections of the Clean Water Act. The Cases have been consolidated by the Court, which denied the BayKeeper's Motion for Summary Judgment to establish TMDL schedules for all waters in California that are not already subject to consent decrees. BayKeeper has appealed the decision. The Ninth Circuit upheld the trial court on appeal, and Baykeeper has filed a motion for re-hearing... CASA's remaining claims are scheduled to be briefed this Fall. CASA has dismissed its remaining claims.

In June 1998, Sacramento Regional County Sanitation District (SRCSD) filed a lawsuit against the SWRCB and Central Valley and San Francisco RWQCBs, alleging that the 1998 303(d) list is invalid due to the states failure to comply with provisions of the Clean Water Act, the Porter-Cologne Act, the Administrative Procedures Act, and the California Environmental Quality Act. CASA and SCAP joined as plaintiffs in this lawsuit; NRDC intervened on behalf of the State. A hearing for summary adjudication on two issues emerging from the CASA/Sacramento lawsuit against the SWRCB over the 1998 303(d) list was held in Sacramento Superior Court in November 1999. The court ruled in favor of the State on both issues. The remaining issues were heard by the court in August 2000, and the court ruled in favor of the State on all issues. CASA, SCAP and Sacramento have appealed. The case is fully briefed and pending oral argument in the Court of Appeal., and filed their opening briefs with the Court of Appeal.

The Farm Bureau filed a federal lawsuit seeking to have a TMDL for the Garcia River (north coast of California) overturned, based on the Administrative Procedures Act. This lawsuit questioned whether non-point sources fall under the 303(d) and TMDL regulations. AMSA intervened in the lawsuit in support of EPA's authority to address non-point sources under the TMDL program. Forestry associations also intervened, in support of the Farm Bureau. A federal court found in favor of EPA in March 2000. The Farm Bureau's appeal in the 9th Circuit Court of Appeals is proceeding. The 9th Circuit Court of Appeals upheld the trial court in a decision issued on May 31, 2002.

TMDL Legislation: State legislation (AB 982) was enacted requiring the formation of an advisory group to evaluate the California TMDL program. A Public Advisory Group (PAG) has been established under this authority. Bobbi Larson of CASA and Vicki Conway of LACSD are the POTW member and alternate, respectively. The group is has developed consensus recommendations regarding a statewide ambient monitoring program and is finalizing its report on other elements of a TMDL program for California. The PAG submitted its report evaluating the State's program to the Legislature in February 2001. The PAG is continuing to meet, including subgroups who are offering recommendations to the SWRCB on the listing process.

CASA is working to develop proposed language for a federal Clean Water Act amendment to address TMDL issues.

TMDL Guidance in California: EPA Region IX released a public draft of TMDL guidance for California. Tri-TAC provided formal comments on the draft TMDL guidance document in a letter dated November 30, 1999. The guidance reflects EPA's legal view of minimum federal requirements for TMDLs and fails to require or endorse positions advocated by Tri-TAC and CASA.

TMDL-related Permit Issues: New NPDES permitting procedures emerged in the San Francisco Bay region for pollutants contained on the 1998 303(d) list. EPA Region IX indicated that it would object to permits issued by the Regional Board that did not contain the following elements:

(1) no dilution allowance for 303(d)-listed pollutants in performing reasonable potential analyses or setting final effluent limits; (2) mass limits for bioaccumulative 303(d)-listed pollutants based on current performance; and (3) final mass limits of zero (“no net loading”) for bioaccumulative pollutants. These requirements are similar in many respects to positions advocated by the San Francisco Baykeeper in numerous appeals filed on Bay area permits. In February and March, 2000 two Tosco refinery NPDES permits were adopted with these provisions in place. Each of these permits was appealed.

The San Francisco Regional Board has included in many subsequently issued NPDES permits for POTWs provisions similar to those contained in the Tosco permit. The Central Valley Regional Board placed similar requirements in Sacramento Regional's permit, and draft permits prepared by the LA Regional Board have proposed even more onerous requirements. It is hoped that these provisions will be removed upon remand or permit modification.

USEPA Region IX issued draft permit guidance dated April 20, 2000, which sought to codify the above-described permitting approach for California for 303(d)-listed pollutants prior to the adoption of TMDLs. Tri-TAC submitted comments on the draft guidance. Western State Petroleum Association (WSPA) filed a federal lawsuit challenging EPA's draft guidance document for NPDES permitting procedures prior to adoption of a TMDL. In addition, both Congress, Chuck Fox, the former Assistant Administrator for Water, directed EPA regions not to implement regional guidance in advance of a national policy/guidance on interim permitting, but Region IX has ignored these directives. At that time, EPA indicated it intended to issue national guidance on this topic, but this effort wanted in 2001. However, in the Spring of 2002, EPA intends to issue guidance on development of ambient mercury criteria, which will include a section devoted to interim permitting.

The SWRCB conducted a two-day evidentiary hearing on the challenged “Tosco” permits in September 2000. On March 7, 2001, the SWRCB issued its decision in the appeals of the Tosco permits. The decision addressed the interim permitting issues in a way generally favorable to the regulated community's positions. The findings included:

- The no-net loading and criterion end-of-pipe limits in the findings of the permits are inappropriate; instead, the permit findings should simply state that the final WQBEL will be based on the TMDL.
- 303(d) listing alone is not a sufficient basis to conclude that a water body lacks assimilative capacity
- The arguments related to allowing dilution in the reasonable potential analysis have been mooted by the adoption of the SIP;
- Interim, performance-based mass limits for refineries are appropriate, but should be calculated using different statistical methods that account for historic variability in the effluent.
- The decision left open the question of whether interim performance-based mass limits are appropriate for POTWs, as that issue was not specifically before the SWRCB in the appeal of these industrial permits. However, in the subsequent Napa Sanitation District appeal decided Dec. 5, 2002, the SWRCB held that interim performance-based mass limits are appropriate for POTWs. That decision has been appealed to Superior Court.

Update: USEPA did not meet its stated goal of issuing its revised draft TMDL (or “Watershed Rule”) by June 20, 2002. EPA staff briefings on the revisions being considered have highlighted the following proposed changes to the 2000 Rule:

? Intergated 305(b) water quality assessments and 303(d) lists are to be submitted evry 4 years rather than every two years;

? Waters are to be included on a multi-part list that incorporates the concept of a “watch/need more information” category;

? Permits for discharges to impaired waters may allow special considerations if total point source contributions are “inconsequential.”

? Each TMDI must demonstrate that nonpoint source load allocations are “technically achievable” in order to provide reasonable assurances.

The RWQCBs were directed by the SWRCB to submit their draft 2002 303(d) lists to the SWRCB by the end of October, 2001. The RWQCBs submitted their lists as compiled by the staffs of each of the RWQCBs without formal action by the individual boards. The SWRCB is expected to put the final list out in early 2002 for public comment, and make an October 1, 2002 deadline for submission to EPA.

WSPA dismissed its lawsuit on the interim permitting guidance after the Tosco decision and EPA’s subsequent “repeal” of its guidance.

*Contacts: Melissa Thorme, Downey Brand; Margie Nellor, LACSD; Bobbi Larson, CASA;
Current as of: March 6, 2002 June 29, 2002.*

2. CALIFORNIA TOXICS RULE (CTR) / PROPOSED STATE IMPLEMENTATION POLICY (SIP)

The State Water Resources Control Board (SWRCB) was required to adopt water quality objectives for priority pollutants under the Clean Water Act, Section 303(c)(2)(B). SWRCB originally adopted the Inland Surface Water Plan/Enclosed Bays and Estuary Plan (ISWP/EBEP) in 1991, but both plans were rescinded in 1994 in response to a court order. As a result, USEPA began efforts to promulgate the California Toxics Rule (CTR), which was published a draft in the Federal Register on August 5, 1997, and finalized on May 18, 2000. The draft CTR included proposed numeric water quality standards for those EPA priority pollutants, which were not covered by the 1992 National Toxics Rule. An economic assessment of the effect of the proposed standards (primarily looking at point sources) was also developed.

EPA conducted a formal consultation process with the U.S. Fish & Wildlife Service and the National Marine Fisheries Service to resolve issues regarding the draft CTR for several years. This protracted process was the result of a finding by the Services that the CTR standards would be likely to jeopardize the continued existence of numerous endangered and threatened species found in California.

In conjunction with the CTR, the SWRCB developed released a thedraft Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bay, and Estuaries of California (State Implementation Policy, or SIP) and functional equivalent document (FED), which became for public comment during Fall 1997.

SWRCB issued a Second Draft SIP and FED in November 1999 for public review. The SWRCB prepared a revised economic analysis for the Second Draft SIP. SWRCB issued a Third draft of the SIP in January 2000. A fourth draft of the SIP was provided to attendees of a March 2, 2000 Board meeting, at which time the SWRCB adopted a Revised Version of the fourth draft, which became effective upon USEPA promulgation of the CTR in May 2000 (*Federal Register*, May 18, 2000, following an extensive public review process). NPDES permits now must be written to incorporate the provisions of the SIP and CTR.

When the SIP was adopted, dischargers raised concerns about their inability to find laboratories that could perform analyses that met all of the minimum levels (MLs) adopted in the SIP. The SWRCB conducted a survey of laboratories in October 2000 to gather additional information about this issue. This is also a concern for the California Ocean Plan amendments adopted by the SWRCB in November 2000.

Environmental groups filed a lawsuit against the SWRCB in May 2000 challenging the SIP. CASA and the Western States Petroleum Association both joined the suit as intervenors on the side of the State Board. The judge ruled in favor of the SWRCB, CASA and WSPA on all claims. The environmental groups have appealed. The only issue remaining in the lawsuit is the legality of the use of MLs for compliance determination.

In early May of 2000, EPA issued its a letter conditionally approving the SIP. EPA approved most provisions of the SIP, subject to its understanding of the proper interpretation, but withheld action on the compliance schedules provisions which allows up to 15 years for a TMDL to be developed and 5 years for compliance with the wasteload allocations derived from the TMDL (for a total of up to 20 years). In light of EPA's action, the status of these compliance schedule provisions is unclear.

State Board staff began work on Phase II of the SIP, which will include policy provisions relating to effluent dependent waters (EDWs), as well as the development of technical guidance regarding

site-specific objectives and mixing zone delineation. Two public meetings were held regarding EDWs on February 28, 2001 in Los Angeles and March 14, 2001 in Sacramento. Additional information about Phase II efforts can be obtained from Chris Bailey, SWRCB Freshwater Standards Unit, 916/341-5571.

Update: None The State Board will release a document shortly that will contain procedures for applying for a case-by-case exception to the SIP. The intent is to provide a roadmap so there are no surprises. The State Board expects to release a draft of the SSO guidance for comment in Fall 2002. As for the EDW policy development, State Board staff expect to resume efforts on this front following a decision on the Vacaville permit appeal, which is expected in late summer or early fall. State Board staff are also beginning to work on the development of an implementation policy for EPA's methylmercury fish tissue criteria.

*Contacts: Bobbi Larson, CASA; Sharon Green, LACSD;
Current as of: June 27/March 6, 2002*

3. ENFORCEMENT ISSUES – Mandatory Minimum Penalties

SB709: SB 709, which established discretionary pollution prevention programs and mandatory minimum penalties for NPDES violations, became effective as law on January 1, 2000. SWRCB issued guidance on SB 709 implementation in December 1999.

Tri-TAC sent a letter to the SWRCB regarding chlorine residual limit compliance determinations and reporting. SWRCB has responded to say they are considering this issue. In the Bay Area, Regional Board staff has indicated a willingness to consider additional monitoring information (e.g. sulfur dioxide or bisulfite monitoring) in defining chlorine violations.

SB 2165: The follow-up legislation, SB 2165 (Sher) was chaptered on September 28th, 2000. This bill modified the original law by allowing for some relief for dischargers issued Time Schedule Orders. The SWRCB issued an updated Question and Answer memorandum for the implementation of Minimum Mandatory Penalties in 2001. The document is located on the SWRCB website at http://www.swrcb.ca.gov/water_laws/index.html.

In October 2000, the SWRCB issued a draft enforcement policy. Tri-TAC and CASA submitted extensive comments and testified a hearing in early 2001. In October 2001, the policy was re-released with extensive revisions, many of which incorporated Tri-TAC and CASA's recommendations. The document was revised again in December 2001, in advance of a hearing held in January 2002. Tri-TAC and CASA submitted comments again, including specific wording changes for the remaining issues of concern.

Update:

The SWRCB adopted amendments to the Enforcement policy on February 19, 2002. The final version can be viewed at <http://www.swrcb.ca.gov/plnspols/index.html#waternews>. It incorporated essentially all of the Tri-TAC and CASA recommendations. A summary of the key provisions can be found (we should put Bobbi's memo on the Tri-TAC website).

*Contact: Margie Nellor, LACSD
Current as of: March 6, 2002*

4. OFFSETS/POLLUTANT TRADING

The concept of pollutant offsets and/or pollutant trading has re-emerged in numerous forums as a by-product of the 303(d) and TMDL process. Pollutant offsets are being discussed as one of several options that dischargers may have to comply with restrictive wasteload allocations resulting from TMDLs. A major issue is whether pollutant offsets will be voluntary or required. In its proposed NPDES regulations to address permitting while TMDLs are being developed, USEPA proposed a mandatory offset program. Some NPDES permits in the San Francisco Bay area still include a finding that suggests that “no net loading” is a feasible wasteload allocation decision for specific pollutants. The concept of “no net loading” presumes that existing and future loadings from a discharger to a 303(d)-listed water body would be offset by reductions in other sources of the pollutant in question. For practical purposes, this is being viewed as a mandatory offset approach for many dischargers. A draft mercury TMDL wasteload allocation document prepared by Regional Board staff includes a discussion of a pollutant offset program that may be considered for the San Francisco Bay area.

Tri-TAC formed a workgroup to produce a position paper on pollutant offsets. The work group started with the 1996 Tri-TAC pollutant trading document and modified it to address current issues and approaches. Workgroup meetings have been held and drafts produced for comment. The current draft of the offset position paper is dated September 11, 2000.

Based on the actions of some regional boards to place offset requirements in discharge permits, the Tri-TAC Water Committee addressed this issue to the SWRCB at its presentation to the Board on October 4. Terry Oda, from EPA Region IX, has asked members from POPS to discuss the development of an offset program with EPA and the USGS. No meeting dates have been set yet.

Update:

At this time, the SWRCB is not planning to adopt an Effluent Trading Program; however, the Office of Chief Counsel drafted guidelines for trading. Tri-TAC will work from our set of principles in hopes of helping the state to develop reasonable guidelines for effluent trading in California. These guidelines could then be used for the voluntary development of site specific trading plans to approach specific problems. Meanwhile, EPA is developing a water quality trading policy that may be modeled after regulations being developed in Michigan. Tri-TAC provided input to AMSA on key issues that should be addressed in the policy. It is expected that that EPA policy will be released in the summer of 2002.

*Contact: Monica Oakley, LWA; Phil Bobel, Palo Alto; Jim Colston, OCSD
Current as of: August 10th, 2000*

5. CALIFORNIA OCEAN PLAN AMENDMENTS/FUNCTIONAL EQUIVALENT DOCUMENT

The Draft California Ocean Plan Amendments were issued for public comment during early September, 2000. Issues included the adoption of an Acute Toxicity Objective to replace the current acute toxicity technology based standard; new water quality objectives, new compliance determination using minimum levels; formatting and administrative changes; and new uses and proposed use nomination process for ASBS, OSRW and ONRW. Tri-TAC submitted comments jointly with SCAP and CASA in September and October 2000 .

Tri-TAC members attended the adoption hearing which occurred on November 16, 2000. All draft amendments to the COP were adopted except those related to the development and nomination of OSRW and ONRW. Tri-TAC, in conjunction with other interested dischargers,

submitted detailed comments related to the development and nomination of OSRW and ONRW. This issue was held over for further consideration at a January, 2001 hearing, which was later extended indefinitely. The final COP did include replacing the former freshwater acute toxicity test with an updated marine acute test that uses a mixing zone.

Update: The amended COP was adopted by the SWRCB and approved by OAL. In December 2002, the EPA issued final approval of the plan. The amended plan is available at <http://www.swrcb.ca.gov/plnspols/oplans/op2001.pdf>.

*Contact: Margie Nellor, LACSD; Sharon Green, LACSD; Jim Colston, OCSD
Current as of March 6, 2002*

6. PERMIT ISSUES

A. Appeals

The majority of recently issued POTW permits throughout the State have been appealed, challenging, among other things, the regional boards' use of narrative water quality objectives to impose stringent effluent limitations.

The City of Los Angeles/ Burbank appeals yielded a favorable initial ruling from a Los Angeles Superior Court judge, who determined that the regional board failed to consider economics, potential environmental impacts and other public interest factors when adopting the permits, as required by the Porter-Cologne Water Quality Control Act and Clean Water Act. The judge also found that the regional board failed to "bridge the analytical gap" between narrative standards and numeric limits, and failed to state how it intended to translate narrative water quality objectives into numeric permit limits, as required by federal regulations (40 CFR 131.11(a)(2).)

The Attorney General (AG), representing the SWRCB and LARWQCB, appealed of the LA/Burbank decisions. The cities has simultaneously filed an appeal of the judge's denial of attorney's fees. Hearings are expected late 2002. The AG did not appeal all of the issues decided in the case. Issues not appealed included the overruling of daily max permit limits for POTWs, the invalidation of language prescribing particular manner of compliance, and the determination that the regional board failed to "bridge the analytical gap" between narrative standards and numeric limits. These unappealed items are now "law of the case" and will apply to the reissued LA and Burbank permits (and arguably any other similar permits issued by the Regional Board (and State Board?) as they are parties bound by the decision. How this decision will be used by the state when issuing new permits remains to be seen.

Similar issues regarding the use of narrative criteria were at issue in a lawsuit filed by the University of California, Davis, challenging a permit issued by the Central Valley Regional Water Quality Control Board. The judge in that case upheld the permits, reaching a conclusion opposite to that in the LA/Burbank case. The judge ruled that the use of federal advisory [304(a)] criteria was "within the [regional board's] discretion," and that the permit was "an application of the narrative toxicity objective, not an interpretation of it."

The City of Turlock has filed a petition for writ of mandate with the Stanislaus County Superior Court and received a temporary stay and order to show cause why the stay should be lifted. The case and the judicial stay were dismissed because the State Board acted to

independently stay the permit pending decisions in other similar cases (e.g., Napa and Vacaville).

After receiving a dismissal of its stay request by the SWRCB, the Napa Sanitation District filed a petition for writ of mandate with the Napa County Superior Court along with a Motion for Stay of portions of the permit. The case was subsequently transferred to Solano Superior Court and the Bay Area Clean Water Agencies have been added as a Petitioner. An administrative stay from the SWRCB and a supplemental judicial stay are in place until the writ appealing the permit and the SWRCB's order on the permit is decided.

The SWRCB heard the City of Vacaville's Permit appeal on September 11-13th. CASA/SCAP/Tri-TAC were consolidated as one party in this evidentiary hearing. Other parties include the City of Turlock, LACSD, DeltaKeeper, and Heal the Bay/Southern California Keepers.

Update:

The Vacaville Permit Appeal continued with a site visit for State Board staff and Member Pete Silva in February 2002. A draft decision is not expected to be released in Summer until mid-2002.

Southern California dischargers sued EPA over approval/disapproval of the 1994 Basin Plan for Los Angeles. The favorable decision and subsequent re-issued EPA approval letter ruled the condition MUN use designation had no legal effect. Thus, permits in the LA region no longer require MUN-based effluent limitations. The decision and letter also reviewed the narrative standards for toxic pollutants. EPA upheld the PCB narrative, but disapproved the bioaccumulation narrative due to the lack of a translator required by 40 C.F.R. §131.11(a)(2). EPA also stated that the narrative toxicity standard was approved.

Contacts: Melissa Thorne, Downey, Brand; Monica Oakley, LWA
Current as of March 7/June 27, 2002

Tri-TAC
Jointly Sponsored by:
League of California Cities
California Association of Sanitation Agencies
California Water Environment Association

Reply to: 10844 Ellis Avenue
Fountain Valley, CA 92708
(714) 593-7458
E-mail: jcolston@ocsd.com

August 2, 2002

William Morrow, Assistant Branch Chief
Water Quality Standards Branch (Mail Code 4305T)
U.S. Environmental Protection Agency
1200 Pennsylvania Avenue, N.W.
Washington, D.C. 20460

bacteria.guidance@epa.gov

**SUBJECT: Comments Regarding Implementation Guidance for Ambient
Water Quality Criteria for Bacteria (Draft)**

Tri-TAC appreciates the opportunity to provide comments regarding the Implementation for Ambient Water Quality Criteria for Bacteria (Draft). Tri-TAC is a statewide organization comprised of members from public agencies and other professionals responsible for wastewater treatment. Tri-TAC is jointly sponsored by the California Association of Sanitation Agencies (CASA), the California Water Environment Association (CWEA), and the League of California Cities. The constituency base for CASA and Tri-TAC collects, treats, and reclaims more than two billion gallons of wastewater each day and serves most of the sewered population of California.

1. EPA recommends dropping recreational water quality standards based on total and fecal coliform and replacing them with *E. coli* standards for freshwater beaches and enterococci standards for marine beaches. Tri-TAC agrees that enterococci are the best indicator bacteria demonstrating the presence of water born pathogens in marine waters.
2. EPA's criteria are based on epidemiological studies comparing illness rates between swimmers and non-swimmers. Tri-TAC suggests that in the future, EPA use a design where the swimmer illness rate is related to different indicator densities among swimmers as opposed to non-swimmers. This methodology is more appropriate for setting the microbial standards for the protection of swimmers at a chosen level of protection.

3. EPA suggests using Appendix D to adjust maximum indicator densities for beaches that might have fewer swimmers. California Department of Health Services Beach Sanitation Standards¹ require monitoring at marine beaches with attendance of 50,000 or more users during the swimming season. Tri-TAC suggests that EPA explore this idea more thoroughly. The Santa Monica Bay Epidemiological Study² suggested that bacteria indicator levels associated with a specific source (storm drains) correlated with an identifiable rate of swimmer illness. EPA should recommend a strategy whereby sources of bacteria indicator organisms are specifically determined for a waterbody to show an association with the proposed or adopted water quality standard. The better the correlation between the source and the water quality standard, the more likely that beneficial uses will be both protected and available to beach users. One suggestion is to use epidemiological investigations to establish wet weather standards at waterbodies with only the indigenous animal population as the contributor of indicator bacteria.
4. Tri-TAC supports the use of both the single sample standard and the geometric mean standard; however, the manner in which each of these types of standards is used is important to successful beneficial use protection. The single sample standard is appropriate as an indicator of an acute water quality problem, such as a sewage spill, and it should trigger an immediate re-sampling of the waterbody to confirm or refute a water quality problem. The geometric mean standard is a more appropriate indicator to determine whether a waterbody is consistently supporting recreational uses. Both types of standards are useful for water quality protection, but they must be used in their proper context.
5. The document states that long-lasting closures or advisories can be prevented by increasing sampling frequency at a given beach (page 20-21). Tri-TAC disagrees with this statement. Monitoring data from Southern California POTW's in 2001 demonstrated that bacteria indicator values are extremely temporal in nature, and more frequent monitoring might actually cause more closures or advisories depending on the thresholds of response. This relates directly with the comments in #4 above that standards need to be properly correlated with the water quality of a certain waterbody. Transient, unrepeatable exceedances of some beach sanitation standards have been detected, despite any indication of continuous or long-term beach contamination.
6. EPA is concerned about the use of chlorine as a disinfectant due to the formation of disinfection by-products (page 25). Chlorine has proven to be an effective disinfectant of water and wastewater throughout the world. Proper use of chlorine can assure that waste discharges meet water quality standards for the protection of human health, aquatic organisms and other beneficial uses. POTW's should be encouraged to use methods of

¹ See California Assembly Bill (1997)

² *The Health Effects of Swimming in Ocean Water Contaminated by Storm Drain Runoff*, Robert W. Haile, et al., *Epidemiology*, July 1999, Volume 10 Number 4, pp. 355-363.

disinfection that meet the community's needs based on the wastewater treatment planning and processes and the protection of beneficial uses.

Thank you for your consideration of our comments.

Sincerely,

James E. Colston, Co-chair
Tri-TAC Water Committee

Monica Oakley, Co-chair
Tri-TAC Water Committee

JC:MO:jq

G:\wp.d\ts\620\GENERAL DATA\350\Letters\JC_BacTImpCommentsD2_8-1-02.doc

c: ECM Files

Announcement of Two Workshops to Develop a Mercury Science Strategy for the Bay-Delta System

A Mercury Science Strategy (Strategy) is being developed to provide an integrated framework for evaluating mercury contamination in the Bay-Delta System and watershed and for linking mercury investigations to ecosystem management and ecological restoration projects. Two workshops are being convened to facilitate development of the Strategy. Environmental decision makers, resource managers, scientists, and other stakeholders involved with mercury issues in the Bay-Delta System and watershed are encouraged to attend one or both workshops and to provide input to the Strategy. The workshops will also provide an opportunity to learn about the results of recent mercury investigations in the Bay-Delta System and in other, intensively studied ecosystems. The workshops will be held at the Moss Landing Marine Laboratories, 8272 Moss Landing Road, in Moss Landing, California. The draft Strategy is to be completed in early 2003.

First Mercury Workshop, September 16-17, 2002

The first day of this workshop, Monday, September 16, will be devoted to a series of presentations summarizing final scientific findings of the CALFED project "An Assessment of Ecological and Human Health Impacts of Mercury in the Bay-Delta Watershed." Tuesday morning, September 17, will be devoted to open discussion of these findings and to descriptions of other, ongoing or planned studies of the transport, cycling, fate, transformations, and food-web transfer of mercury in the Bay-Delta System and watershed. Tuesday afternoon will be devoted to discussions of the Mercury Science Strategy, providing an opportunity for participants to provide input. The workshop agenda can be accessed via the Science Program section of the CALFED website <http://calfed.water.ca.gov/Programs/Science/Science.shtml>.

Second Mercury Workshop, October 8-9, 2002

The second workshop will include an assessment of the state of our knowledge regarding mercury in the Bay-Delta System and watershed; the identification of key management questions and goals pertaining to mercury in the Bay-Delta System and watershed; the identification of critical information gaps concerning the distribution and behavior of mercury in the ecosystem; the identification of potential linkages between ecological restoration projects and mercury cycling in the basin; and the formulation of goals and objectives for mercury investigations. The agenda for this workshop, when finalized, will be posted on the Science Program section of the CALFED website <http://calfed.water.ca.gov/Programs/Science/Science.shtml>.

Registration and Registration Fee

There will be a registration fee of \$40 per person for each workshop attended. The registration fee will cover the cost of refreshments and food during morning breaks, lunches, and afternoon breaks, all of which will be served at the meeting site. The pre-paid registration fee is necessary because the workshop organizers cannot use state funds to cover costs of food and refreshments.

The registration deadline for the September workshop is **September 6**. The registration deadline for the October workshop is **October 1**. There will be no on-site registration at the workshops.

Registration can be done on-line through the University of Wisconsin-La Crosse Continuing Education web site: www.uwlax.edu/conted. If you experience difficulty registering on-line or would prefer to register by phone, please call 608-785-6508. The registration fee can be paid with Visa, MasterCard, or American Express.

Lodging

A block of rooms was not reserved for the first workshop (September 16-17), and we encourage attendees to make room reservations as soon as possible. A listing of area hotels is available at the web site of the Monterey County Convention and Visitors Bureau

www.info.monterey.wegov2.com.

For the second workshop (October 8-9), a block of rooms has been reserved for the dates of October 7-10 at the Casa Munras Garden Hotel in Monterey at a rate of \$94 plus tax per night for a room with one or two occupants; the Hotel will charge an additional \$15 per night for each additional occupant. Parking at the hotel is free for registered guests. Reservations must be made by **September 5** to qualify for the group rate. When making your reservation with the Casa Munras Garden Hotel, be sure to inform them that you are with the “Mercury Workshop.”

Casa Munras Garden Hotel
700 Munras Avenue
Monterey, CA
Phone: 831-375-2411

The Casa Munras Garden Hotel is located in the heart of downtown within walking distance of the Monterey Bay Harbor, Fishermen's Wharf, the Custom House Plaza, the First Theatre, the Monterey Bay Aquarium on John Steinbeck's historic Cannery Row, and other local attractions.

Transportation

The Monterey Peninsula airport is located about 4 miles from the Casa Munras Garden Hotel. Travel time by auto from the Monterey airport to the hotel is about 10 minutes, and taxi service costs approximately \$10 one way. Rental cars are available at the Monterey airport. Ground shuttle service is available to and from the airports in Monterey, San Francisco, and San Jose.

Travel time by auto from downtown Monterey to the Moss Landing Marine Laboratories (new building at 8272 Moss Landing Road, Moss Landing, CA), where the workshops are being held, is about 30 minutes. Directions to the Moss Landing Marine Laboratories are available at the Laboratories' web site <http://www.mlml.calstate.edu/>. For directions to the Laboratories' new building, access the web site and click on “How to Find Us.”

For Further Information

For further information concerning the Mercury Science Strategy, please contact one of the three principal investigators for the project.

James Wiener
University of Wisconsin-La Crosse
La Crosse, Wisconsin
phone: 608-785-6454
email: wiener.jame@uwlax.edu

David Krabbenhoft
U.S. Geological Survey
Middleton, Wisconsin
phone: 608-821-3843
email: dpkrabbe@usgs.gov

Cynthia Gilmour
The Academy of Natural Sciences, Estuarine Research Center
St. Leonard, Maryland
phone: 410-586-9713
email: gilmour@acnatsci.org



David R. Williams
Tri-TAC Chair
EBMUD
375 11th Street
Oakland, CA 94612
(510) 287-1496
dwilliam@ebmud.com

August 16, 2002

Chris Bailey, Chief
Freshwater Standards Unit
State Water Resources Control Board
1001 I Street
P.O. Box 100
Sacramento, CA 95812-100
Via U.S. Mail and Electronic Mail

Dear Ms. Bailey:

**Comments on Workplan for Development of Nutrient Criteria
within California, Arizona, and Nevada**

With this letter, Tri-TAC, the California Association of Sanitation Agencies (CASA), and the Southern California Alliance of POTWs (SCAP) wish to express our concerns and submit comments on the nutrient criteria development workplan (workplan) with an emphasis on the application of the workplan in California (State). CASA, SCAP, and Tri-TAC are statewide organizations of local public agencies responsible for wastewater collection, treatment, disposal, and reclamation. Tri-TAC is an advisory group including representatives from CASA, the California Water Environment Association, and the League of California Cities. CASA's membership includes 92 agencies responsible for the operation of publicly owned treatment works (POTWs). SCAP's membership includes over 50 water and wastewater agencies serving more than 16 million people in southern California. Together, the constituent agencies of CASA, SCAP, and Tri-TAC serve most of the sewered population of California.

As we have expressed earlier, we have significant concerns about the basic methodology proposed in the workplan. While we believe specific elements of the workplan methodology may lead to improved understanding of the influence of nutrients on water quality and would provide valuable information on nutrient conditions in Region 9 waterbodies, the knowledge obtained through the workplan methodology would have limitations. Because of these limitations, we do not think this methodology is the best approach for developing nutrient criteria within California or other Region 9 states. This methodology would be expensive and time-consuming, and we do not

Vice Chair
Sharon Green
Sanitation Districts of Los Angeles County
P.O. Box 4998
Whittier, CA 90607
(562) 699-7411 ext. 2503
sgreen@lacsdc.org

Water Committee Co-Chairs
Monica Oakley
Larry Walker Associates
250 Lafayette Circle,
Suite 200
Lafayette, CA 94549
(925) 962-9700
monicao@lwa.com

Jim Colston
Orange County Sanitation District
P.O. Box 8127
Fountain Valley, CA 92728
(714) 593-7458
jcolston@ocscd.com

Air Committee Co-Chairs
Daniel McGivney
Eastern Municipal Water District
P.O. Box 8300
Perris, CA 92572
(909) 928-6177
dmcgivney@emwd.org

Jay Witherspoon
CH2M Hill
1111 Broadway, #1200
Oakland, CA 94607
(510) 251-2888
jwithers@ch2m.com

Land Committee Co-Chairs
Layne Baroldi
Orange County Sanitation District
P.O. Box 9127
Fountain Valley, CA 92728
(714) 593-7456
lbaroldi@ocscd.com

Bob Gillette
Carollo Engineers
2500 Venture Oaks Way,
#320
Sacramento, CA 95833
(916) 565-4888
rgillette@carollo.com

believe the end product of this effort would be scientifically sound numeric criteria that could be applied to individual waterbodies without further site-specific consideration. Through the proposed methodology, the stated intent is to apply regional nutrient criteria at the site-specific level, but this cannot be accomplished because nutrient levels vary highly from site to site. We are very concerned that the consequences of imposing the proposed nutrient criteria on individual waterbodies as enforceable water quality standards would be an array of compliance actions, including the construction and use of expensive engineering controls and best management practices, with little guarantee of an environmental benefit. Therefore, we believe the RTAG should choose an alternate methodology that will more effectively address nutrient enrichment.

The Use of Reference Waterbodies is Not a Scientifically Sound Approach

Our greatest concern with the workplan methodology is the use of reference waterbodies for developing nutrient criteria. One option presented in the workplan is determining criteria levels for groups of waterbodies based on reference sites and using these criteria without further study or investigation for determining when waterbodies are nutrient “impaired”. This option is not scientifically sound because reference sites cannot be sufficiently representative of other waterbodies with respect to nutrient enrichment. The factors that play a part in determining whether a waterbody is impaired due to nutrients are so numerous that site-specific analysis is the only way to appropriately determine what criteria levels should be applied to a particular waterbody. Despite recognition in the workplan that there are a wide range of nutrient levels found in minimally impacted aquatic systems in Region IX, and that a single numeric nutrient criterion is not appropriate for all waterbodies, the approach outlined in the workplan continues to closely reflect that used by EPA for developing the 304(a) nutrient criteria. This concerns us because any attempt to choose criteria based on reference waterbodies will necessarily rely on the arbitrary selection of numbers. Since the RTAG has already determined that EPA’s methodology is not scientifically valid and should not be used in California, the State and the RTAG should take serious pause before embarking on the same path as EPA. That the RTAG is going to conduct additional research and use references at a finer scale than EPA ecoregions does not change the fact that using reference sites for an ecological condition that does not predictably replicate itself does not make sense. It is this arbitrary selection of criteria levels that has prompted us to ask how the criteria will be implemented and leads us to advocate that the State and RTAG consider implementation issues along with the scientific issues, instead of after the fact. Too much is at stake in terms of adequately protecting the environment and responsibly spending the public’s resources to delay consideration of how the criteria levels will be selected and applied.

The reference issue also concerns us because there is an emphasis on using minimally impacted sites in choosing the criteria levels. Not only could requiring all waterbodies to meet nutrient levels in minimally impacted waterbodies limit the assimilative capacity of all waterbodies to unrealistically low levels, but minimally impacted sites are not the correct focus for the nutrient criteria program. The focus should be on the attainment of beneficial uses and waterbodies where uses are attained. This idea is supported on page 9 of *EPA’s Technical Guidance Document for Rivers and Streams*, which states the following:

“A water quality standard defines the goals for a waterbody by designating its specific uses, setting criteria to protect those uses, and establishing an antidegradation policy to protect existing water quality...Once designated uses of a waterbody have been established, the State or Tribe must adopt numeric or narrative criteria to protect and support the specified uses.”

Protecting beneficial uses should be the goal of the nutrient criteria program, and the workplan should be geared toward reaching this goal. We provide specific wording changes to the text of the workplan in Attachment A in order to shift the focus from minimally impacted sites to sites that are attaining their beneficial uses.

Modeling Should Take a Subordinate Role to the Statistical Analyses

Another area of concern to us is the use of modeling in developing nutrient criteria. We acknowledge the possible value of using models in combination with statistical analyses and consideration of site-specific studies, but we are concerned that the models will be used beyond their limitations. Specifically, we are skeptical that periphyton models can be used to develop the classification categories and determine which variables play the biggest role in nutrient impairment. While they have been used reliably on a site-specific basis, they have not been tested enough through repeated applications to many rivers to reliably determine on a generic basis what river and stream factors play the biggest role in determining nutrient impairment. Periphyton models require a great deal of site-specific curve fitting in order to be useful, and we do not see how they can be useful on a generic basis where there will be no calibration. Because the BATHTUB model for lakes has been more extensively tested, we have more confidence in the use of generic models for determining the importance of waterbody variables for lakes. However, our concerns regarding generic modeling for all types of waterbodies are considerable. Because generic models cannot be compared to actual waterbodies, it cannot be known if generic models accurately reflect reality, and their use would force the RTAG and State to place their faith in the results of the generic models with no way to assess their validity. If models are to be used in this effort, we believe their best use would be for prioritizing waterbody classifications and specific waterbodies for further data collection and analysis. We do not believe the results from the modeling should be used to develop any specific waterbody classifications or criteria.

Because of our concerns about the use of modeling in this effort, we believe it should take a subordinate role to the statistical analyses using real data and the consideration of site-specific studies. There is no substitution for using real data, and the State should not feel compelled to rely on modeling tools beyond their capabilities. In particular, the State and RTAG should not resort to filling in data gaps using models as stated in the workplan. We do not understand what this would entail but want it to be known that we are adamantly opposed to using the generic models to add to the waterbody database. We are especially concerned that the generic models will be used to supplement the reference waterbody database. Without question, the reference waterbody database must only include real data because the criteria levels must only be based on real data. It may be less time-consuming and less expensive to try to make up for the shortfall in real data with modeling, but the opportunities to misuse models are numerous. To avoid this, the State should take advantage of the flexible deadline for adopting nutrient criteria and take the time to collect more data so that the criteria are based on the most reliable source of information, real data.

The Methodology Should Focus on Response Variables

Due to the above-stated concerns, we suggest addressing nutrient enrichment by focusing on response variables and developing procedures and protocols for investigating enrichment problems where they occur or are foreseen. This could be done by identifying the levels at which algae or DO signal a current or impending problem. These algae and DO levels would act as triggers for further study into the causes of the enrichment and how to address the problem if a problem is found to exist. Resources would have to be spent developing the triggers for different

waterbody types and beneficial uses and for developing the investigative procedures, but this approach would consume less time and money than the workplan methodology as it would not require extensive research into the cause-effect relationships between nutrients and the response variables. Conclusions and determinations would always be ground-truthed at the site-specific level, and for this reason, controls put in place as a result of this methodology would bring about defined environmental benefits as opposed to the approach in the proposed workplan, for which the environmental benefits would be questionable.

The alternate methodology we are proposing is not intended to invoke “a stalling process” by calling for further study when existing or potential nutrient impairments are found. In fact, nutrient enrichment problems would probably be addressed more quickly because the root of the problem would be sought out and identified instead of trying to make regional nutrient criteria fit where they are not appropriate. As a result, the engineering controls and other solutions put in place as part of this alternate methodology would more effectively address nutrient enrichment problems. In addition, with this methodology, the nutrient criteria development effort might be completed and in effect much sooner than with the workplan methodology. We believe this methodology is more direct in trying to solve nutrient enrichment problems and should be viewed as a targeted, results-oriented approach. Our proposal for an alternate methodology is included in the attached memo (Attachment B), which has already been reviewed and discussed by the RTAG.

The Workplan Approach Could Be Used to Develop “Triggers” to Translate Narrative Objectives

Despite our concerns with the methodology proposed in the workplan, we believe some of the tasks in the work plan could potentially be used to develop triggers. Similar to our alternate strategy mentioned above, the workplan discusses the possibility of applying the nutrient criteria as triggers as part of a tiered approach. This tiered approach would call for further study on a site-specific basis if the nutrient criteria for one or more parameters were to be exceeded. The role of various causal and response factors involved in nutrient enrichment such as sunlight and substrate in addition to nutrients could be examined, and a variety of treatment and control options could be considered based on their potential efficacy at a particular site. If the State and RTAG choose to adopt the tiered approach mentioned in the workplan (p. 9), we believe this might be acceptable if the triggers were used in the context of translating narrative water quality standards already included in basin plans (e.g. narrative objectives for biostimulatory substances) rather than as separate numeric criteria (i.e. water quality objectives). Under the option of adopting procedures for translating narrative criteria, the triggers would act as translators for the narrative criteria, and a procedure for conducting site-specific studies could act as a translator from the triggers to nutrient levels. This would be a practical compromise in that it would allow the State to investigate the grouping of waterbodies and develop regional nutrient triggers while providing some assurance that a site-specific scientific process would be followed to determine the effects of, and the appropriate implementation strategy for, exceedances of the triggers. This approach would also be in agreement with Geoff Grubb’s memo on page 8 (dated November 14, 2001) which states that “States and authorized tribes also have the flexibility to adopt numeric criteria to protect designated uses or to adopt methods and procedures that translate narrative criteria to protect designated uses.”

In addition to our concerns with how the trigger levels would be set and used, another important issue is how the State’s legal requirements would apply to such an approach. Under the Porter-Cologne Act, when Regional Boards or the State Board establish water quality objectives, they are required to ensure the reasonable protection of beneficial uses and the prevention of nuisance and to consider a number of factors including: the past, present, and probable future beneficial uses of water; the environmental characteristics of the hydrographic unit under consideration; the water quality conditions that could reasonably be achieved through the coordinated control of all factors which affect water quality in the area; economic considerations; the need for developing housing; and the need to develop and use recycled water. Cal. Water Code § 13241. Presumably, under the proposed workplan, the State intends

to meet these and other legal requirements, either at the State or Regional level, when nutrient criteria are adopted. Under this option of using triggers, we believe that the State would still have to fulfill these requirements, but it is possible that they could be met in a different sequence or manner. For instance, the provisions of Section 13241 are also required to be met under Cal. Water Code Section 13263(a) when a Regional Board adopts waste discharge requirements, so perhaps these requirements could be addressed on a site-specific basis.¹ Additionally, in cases where water quality standards are not being attained, presumably waters have been or will be included on the State's 303(d) list, and the development of a Total Maximum Daily Load (TMDL), which must meet various legal requirements, will be triggered. We would be interested in discussing these issues further with the State should the RTAG recommend that the State consider pursuing this option.

Conclusion

In summary, we continue to have significant concerns about the proposed methodology. We believe our suggested alternate approach would be preferable, and we believe that a third alternative involving the use of triggers as part of a tiered approach to activate site-specific studies might also be workable if the legal and technical issues can be satisfactorily resolved. We look forward to continuing to work cooperatively with the RTAG, State, and their consultants on this effort. We believe the outcome of the nutrient criteria effort should be an approach that is practical, leads to achievable goals, and results in significant improvements to the environment. Our involvement and input as we work with the State and RTAG in the future will reflect this expected outcome.

In addition to our general comments above, we also have comments about specific sections of the workplan included in Attachment A.

We would be happy to discuss any and all of our comments with the State, RTAG members, and their consultants. Please contact Sharon Landau at (562) 699-7411, extension 2820, or Michelle Buzbee at (925) 962-9700 if you have any questions or comments.

Thank you for your consideration and this opportunity to comment.

Yours very truly,

Sharon N. Green
Vice-Chair, Tri-TAC

cc: Bill Reeves, State Water Resources Control Board
Suesan Saucerman, EPA Region IX
Clayton Creager, Tetra Tech

¹ See State Water Resources Control Board, Memorandum from William R. Attwater, Chief Counsel, to Regional Water Board Executive Officers and Regional Water Board Attorneys, "Guidance on Consideration of Economics in the Adoption of Water Quality Objectives" ("A Regional Water Board is under an affirmative duty to consider economics when adopting water quality objectives in water quality control plans or, in the absence of applicable objectives in a water quality control plan, when adopting objectives on a case-by-case basis in waste discharge requirements.")

Attachment A Comments on Text of Workplan

Our comments on specific excerpts and sections of the workplan are shown below. The comments are divided by topic, and the page indicating the location of the concerned text is indicated above each comment.

Formatting Suggestions

Cover

The conceptual model diagram should be modified or eliminated. The diagram fails to show atmospheric sources, phosphorus cycling to and from sediments, or riverine or estuarine processes. The conceptual model and legend also highlights the effects of ammonia, which has its own USEPA 304(a) criteria to deal with aquatic toxicity and is not the focus of the nutrient criteria effort.

Page 1

The dual use of the word “criteria” throughout the document is confusing. We understand that occurs due to the dual usage of the word to reflect (1) science-based advisory “criteria” and (2) enforceable numeric “criteria” which are part of enforceable standards. We request that the document either use different terms for these two applications or make consistent use of the qualifiers “304(a) advisory” and “enforceable” throughout the document.

Use of Reference Sites

The workplan appears to focus on minimally impacted reference sites as opposed to all types of reference sites. While it has been stated that causal and response variable levels will be examined at all types of sites equally and taken into account for criteria development, this does not seem to be the case when reading particular parts of the workplan. The presumption appears to be that the attainment of nutrient concentrations at minimally impacted sites will somehow produce the “acceptable condition”, but it cannot be assumed that nutrient concentrations above the levels found at minimally impacted sites will cause an “unacceptable” condition to exist at other sites.

Suggested wording changes are shown below in order to make it clear that all types of sites will be considered when determining criteria levels. We believe this is the best approach for determining criteria levels in order to achieve the goal of determining at what levels beneficial uses are protected at all types of sites.

Page 3 – bottom paragraph.

The technical support team will compile all available water quality data related to nutrients and nutrient impacts, along with corresponding watershed information and hydrologic data from the receiving waters. **A portion of this database will provide the analysis with a perspective on reference systems that are expected to span a broad range of conditions. For this workplan, referenced systems are those that are meeting their beneficial uses.** In addition, the project team will also compile data sets of non-referenced waterbodies that will include a greater range of conditions for use in other data analysis approaches. **The focus of the data collection will be on waterbodies that are known to be minimally impacted by human-induced nutrient loads because of a lack of data on these systems.**

Page 4 – first paragraph under criteria parameter development

A comparative analysis will initiate the development of criteria parameters through use of information compiled on ~~minimally impacted~~ aquatic systems **that are meeting their beneficial uses** and a general population represented by systems that are included within the STORET database. This analysis will illustrate the usefulness of comparing nutrients and response parameters from ~~minimally impacted~~ waterbodies **attaining their uses** to those within the general population of all waterbodies in a particular classification category.

Page 11 – second to last paragraph

The development of nutrient criteria will require the use of existing data. Water quality and watershed data will be needed for each regional classification unit. The data collection task will require direct contact with agencies and entities that have collected water quality data not reported to EPA's STORET database. The technical approach requires information from ~~minimally impacted~~ water bodies that are fully supporting their beneficial uses.

Page 12 – last paragraph

The goal of the EPA nutrient criteria development process is to find the most appropriate **nutrient causal and response variable** levels for reference conditions (**beneficial use attainment**) in water bodies. It is generally understood that reference levels of ~~nutrients- causal and response variables~~ will be different for different regions of a state or EPA region as well as for different water body characteristics. Therefore, when numeric nutrient criteria are defined, we must also define the best regionalization and water body classification that goes with the numeric criterion.

Development of Nutrient Criteria

Page 4 – top of page

The workplan states that the most nutrient-sensitive beneficial uses will be established and included in the database for criteria development. We have been told that aquatic life is probably the most sensitive beneficial use and will probably drive the criteria for all the waterbody groupings. It seems there is an assumption that the use requiring the lowest levels of nutrients or algae is the most sensitive, but this is not necessarily the case. For example, if a waterbody is used for fishing and swimming, which use is considered the "most sensitive"? Fish might require higher nutrient and algae levels to maintain their production while swimming might require lower nutrient and algae levels for aesthetic reasons. Which use will be considered the most sensitive or most important? Conflicts like this need to be considered and a methodology proposed to resolve them.

Page 4 – middle of page

It is stated that the foundation for the proposed approach to development of nutrient criteria will be the results from statistical analyses (i.e. regression equations) which relate nutrient concentrations to algal biomass and algal biomass to other response parameters, e.g. low dissolved oxygen, odors, aesthetic problems, etc. This presumes that such relationships exist. If such relationships do not exist or have poor correlations, the proposed approach will not produce meaningful criteria.

Page 7 - top of page

The proposed approach stops short of identifying steps required to adopt and implement proposed nutrient standards. Establishment of water quality objectives and a program of implementation have specific legal requirements under the California Water Code (i.e. Cal. Water Code § 13241 and 13242) as well as CEQA, and these requirements should be acknowledged in the work plan, even if not specifically tasked.

Page 8 – middle of page

The workplan states that “it is essential to ... provide decision-makers with the capability to discriminate when impacts are due to cultural nutrient enrichment or to other factors.” We agree. However, it is not clear to us how the methodology or the criteria developed through it would accomplish this.

Page 21 – bottom of page

The workplan discusses the use of site-specific studies for “ground truthing” the findings of the modeling and statistical analyses. We fully support the use of site-specific studies for this purpose and believe that site-specific studies should be given a larger role in this process. Instead of focusing efforts so highly on modeling hypothetical watersheds, the RTAG should collect data on as many waterbodies as possible, and use this real data to confirm or reject the findings of the statistical analyses. Given that TMDL development is already underway for a number of waterbodies that have been included on the State’s 303(d) list for issues related to nutrients, low dissolved oxygen, and algae, there will hopefully be a body of information and analyses available shortly that can be used as a starting point for this purpose.

Form of the standard

Page 1 – Sidebar

The statement is made that “numeric criteria provide distinct interpretations of acceptable and unacceptable conditions.” We do not believe that nutrient concentrations in ambient waters can unilaterally meet this fundamental test, i.e. that a particular nutrient concentration will always be acceptable or unacceptable. The acceptability of a particular nutrient concentration is dependent upon numerous other factors, such as substrate, amount of light, flow rate, etc. Given this limitation of numeric nutrient criteria, they either should not be described this way, or else they should be used as triggers for further study and investigation rather than as regulatory criteria.

Page 6 – middle of page

The workplan states that “a full definition of the variance condition policy is not an objective of this work plan. Variances will be addressed during the implementation phase of the nutrient criteria process.”

As we have expressed in conversations with the RTAG, State, and their consultants, we believe defining variance conditions and determining how to address them should be a part of the workplan. Delaying consideration of variance conditions by placing them in the category of implementation issues to be addressed at some future date does not make sense because there will be scientific considerations in addition to policy issues in determining how best to deal with variances. In addition, scientific issues associated with exceptions and variances could affect

what additional data is collected as a part of the workplan and the form of the standard for all types of waterbodies.

Page 7 – bottom of page

The workplan states that a range of values rather than a single point for criteria development would need to be considered. How would a range be chosen and used?

Page 9 – middle of page

We are in full support of the discussion on the form of the standard. We believe seasonal, temporal, and spatial considerations need to be taken into account, and we like the discussion on the tiered approach. We do not understand the statement about developing and applying a translator. Translators are not mentioned elsewhere in the document.

Page 13 - bottom of page

With respect to determining compliance, the workplan states “the term location refers to sampling within the stream channel or lake-depth profile rather than another location downstream that is not proximate to the discharge.” This statement confuses us. While we understand that point sources will be a major category sampling and monitoring for compliance purposes, nonpoint sources will also need to be measured. Limiting sampling to discharge points that are proximate to a discharge does not make sense.

Page 13 – bottom of page

The workplan states “we will broaden the potential metrics to include, in addition to various chemical species of nitrogen and phosphorus, dissolved oxygen, turbidity, chlorophyll a, and indices of biological integrity.” As written, it is unclear whether the intent is that nitrogen and phosphorus are going to be definite nutrient criteria parameters and the others will be considered, or whether all of them are potential metrics, but none have been decided upon. We believe periphyton cover should also be considered as a potential metric. We suggest this sentence be reworded to the following:

“For the purpose of defining nutrient criteria, the potential metrics include various chemical species of nitrogen and phosphorus, DO, turbidity, chlorophyll a, periphyton cover, and indices of biological integrity.”

Page 15

We support the discussion on the determination of the numeric criterion, but the regulatory and legal bases of the various options should also be explained. If ranges are to be used, we believe it would be appropriate to insert an explanation in this section on how ranges would be developed and used.

Lack of Data on Potential Criteria Parameters

Page 4 – middle of page

We are very concerned about the proposed reliance on data from STORET for this nutrient criteria development effort. Use of data from the STORET database has historically been

problematic due to concerns regarding quality control and quality assurance of the data in this system. Data from STORET should only be used if supported by adequate QA/QC.

Page 14 – middle of page

The workplan states “the RTAG must balance the advantages of using the historical database against coming up with a new metric (or combination of metrics) that may not have been measured in the past, but one which scientists think is a more accurate reflection of nutrient-related impairment.” We believe the RTAG should determine which parameters best measure nutrient-related impairment and use those parameters for developing criteria regardless of data availability. If there are not enough data for the best parameters, then the workplan should be refocused to ensure that the necessary data are obtained. Although it may take some extra time to get this data, we feel that the time and effort would be warranted to ensure that the criteria are truly rigorous and scientifically defensible, as is the goal of the workplan (as stated on p. 2). We believe EPA has made it clear that there is flexibility in the timeframe for nutrient criteria development, as long as the State is making substantial progress towards adopting nutrient criteria (see Geoff Grubbs memo, p. 9).

Page 16 – middle of page

The workplan states “A major limitation of developing a finer classification is the paucity of data at appropriate scales and resolutions.” As we have said above, if insufficient data is found to be a limitation, more data should be collected instead of developing standards based on classifications that are overly broad.

Page – 22 top of page

The workplan lists sources of site-specific studies and does not mention SCCWRP’s research in Malibu Lagoon. This might be a good addition to the list of data sources on page 22. As a sidenote, we would be interested in seeing the results and getting an update on the Malibu Lagoon study.

Development of Regionalization Classification Units

Page 9 - middle of page

The workplan states that the regionalization units are intended to reduce the inter-waterbody variability present at the ecoregion level. While it is likely the regionalization units will reduce the variability, it is also likely they will not reduce the variability enough. What will the RTAG do if the variability is still found to be too high?

Page 22 – last paragraph

According to the workplan, the recommendations in the final report are to include the regional classification hierarchy but not all of the criteria for each regionalization unit. This report is to be available within one year. We question if it is possible to develop all of the regional classifications within one year due to the data gaps that are mentioned throughout the workplan. The purpose of classifying waterbodies is to reduce the variability between waterbodies, and if the data to do this is found lacking, then it will not be possible to develop classifications that are

useful. Significant progress toward developing regionalization units might be made, but the RTAG should not expect this effort to be completed within a year.

Use of Site-Specific Studies

Page 5

One of the proposed tasks in the work plan is to interview research teams that have performed or are performing long term research studies regarding nutrient effects on aquatic ecosystems. It is requested that a listing of the research teams be included in the work plan. It is also suggested that these interviews be performed earlier in the process to evaluate the proposed approach to nutrient advisory criteria and nutrient standards development.

Page 21 – bottom of page

The review and synthesis of existing water quality studies appears to be out of sequence. Such work should be done as an early step in the work plan to provide actual data and information for use in model calibration and case study evaluations.

Modeling

Page 17

Two options are identified for proposed modeling: use of generic theoretical case studies or use of actual case studies. We strongly suggest that real world case studies that are supported by actual data be used in the modeling exercise instead of generic models for reasons we have already discussed in our letter.

Page 17 – bottom of page

We question the need for the proposed watershed and stream modeling effort for purposes other than the evaluation of attainability of nutrient standards in keystone watersheds where results can be verified through comparisons with actual data. We do not favor the use of generic models, which rely on use of default values.

Attachment B
Alternate Methodology for Developing Nutrient Criteria

DATE: July 12, 2002

TO: RTAG

FROM: Michelle Buzbee and Sharon Landau

SUBJECT: A nutrient criteria development strategy for RTAG consideration

Introduction

The text following this introduction is a proposed methodology for developing nutrient criteria in California. This proposal is an alternative to the methodology presented by Tetra Tech at the RTAG meetings. The main difference between the two proposals is that our alternative focuses more on response variables and specifically excludes the development of numeric criteria for nitrogen and phosphorus. This alternative proposal is being provided for your consideration before the workplan submitted to you for your review commits the state and the RTAG to any specific methodology.

We expect there will be aspects of our proposal that individual members of the RTAG will agree and disagree with, and we are open to changing our proposal and only using parts of it based on feedback from the RTAG. We hope, however, that the major concepts and options included in our proposal will be given due consideration by the RTAG in order for the state's criteria development effort to have a strong scientific underpinning, to be thorough and comprehensive, and to be focused and cost-effective. These concepts include concentrating on response variables more than causal variables, limiting the scope of the nutrient criteria development process to addressing eutrophication, and considering implementation issues throughout the nutrient criteria development process instead of limiting this to an "implementation phase" after the numeric criteria have been established.

We would be happy to discuss our proposal with any of the RTAG members, and hope that this proposal will engender thoughtful consideration of what the best strategy will be for the development of State nutrient criteria. Please contact Sharon Landau at (562) 699-7411 if you have any questions or comments, or alternatively, you may provide them to Tetra Tech for dissemination to the RTAG along with your comments on the draft workplan.

Thank you in advance for your time and consideration.

What is the motivation for “nutrient criteria”?

EPA has issued recommended criteria for some of the variables that can cause eutrophication (phosphorus and nitrogen) and for some of the indicator variables associated with eutrophication (chlorophyll-a and turbidity). The criteria are empirically derived to represent conditions of surface waters that are minimally impacted by human activities and protective of aquatic life and recreational uses. These water quality criteria have been developed under section 304(a) and are based solely on statistically-derived levels of water quality in ambient water. These criteria values are not linked to the beneficial uses or endpoints they are trying to protect.

As an alternate to adopting these criteria, each State can each come up with its own plan for developing nutrient criteria. EPA had previously required States to either adopt the EPA recommended criteria or develop their own criteria by 2004. In his November 14, 2001 memorandum, however, Geoffrey Grubbs (Director of the Office of Science and Technology) stated that States needed to develop a nutrient criteria plan and make “substantial progress” toward adopting nutrient criteria by 2004. EPA recognizes that States and Tribes have several options available to them in adopting their own nutrient criteria. According to Geoffrey Grubb’s foreword to the *Ambient Water Quality Criteria Recommendations* documents for nutrients, the EPA recommends the following approaches, in order of preference:

- (1) Wherever possible, develop nutrient criteria that fully reflect localized conditions and protect specific designated uses using the process described in EPA’s Technical Guidance Manuals for nutrient criteria development. Such criteria may be expressed either as numeric criteria or as procedures to translate a State or Tribal narrative criterion into a quantified endpoint in State or Tribal water quality standards.
- (2) Adopt EPA’s section 304(a) water quality criteria for nutrients, either as numeric criteria or as procedures to translate a State or Tribal narrative nutrient criterion into a quantified endpoint.
- (3) Develop nutrient criteria protective of designated uses using other scientifically defensible methods and appropriate water quality data.

What has happened so far?

The Region 9 RTAG and the State have agreed not to adopt EPA’s criteria numbers or methodology. They have agreed to develop their own criteria based on scientifically defensible methods, exercising flexibility offered by EPA in options (1) and/or (3).

What are we really trying to achieve?

The purpose of developing nutrient criteria is to prevent problems associated with eutrophication. Nutrients are linked to eutrophication by their ability to promote

excessive algal growth. However, excessive algal growth can be caused by other factors even under very low nutrient conditions. Therefore, we need to develop a broader process for addressing eutrophication and shift the focus from controlling nutrients to controlling algae. While nitrate can cause problems with drinking water and ammonia can be toxic to aquatic life, there are separate criteria and standards that protect against these toxic endpoints, and the nutrient criteria program is not the appropriate place to address these problems.

A shift from controlling nutrients to controlling algae is necessary because nutrients (mainly nitrogen and phosphorus) in themselves are not a water quality problem. Nutrients (at some levels) are natural to a system and necessary for ecosystem functioning. EPA's *National Strategy for the Development of Regional Nutrient Criteria* (EPA, 1998) acknowledges that "Nutrients, in the appropriate amounts, are essential to the health and continued functioning of natural ecosystems. ...Insufficient nutrients will result in less than optimal growth of primary producers (i.e., plants, including phytoplankton and submerged aquatic vegetation). Adequate primary productivity is essential to support all the other trophic levels and a healthy, diverse, and productive ecosystem."

While excessive nutrient concentrations can contribute to certain problems associated with excessive algal growth (e.g. depressed levels of dissolved oxygen, unsightly algal mats, and taste and odor problems), solving problems associated with algae is not as simple as applying nitrogen and phosphorus limits. Algae levels are affected by numerous interacting causal variables, including macro and micro nutrients, sunlight availability, substrate, flow and scouring conditions, grazing populations, and temperature, to name a few. Often it is not possible to reduce algae to acceptable levels by reducing nitrogen and phosphorus, and consequently, focusing too narrowly on nitrogen and phosphorus criteria to control algae may be ineffective and impede development of more effective remedies (e.g. restoration of riparian shading or restoration of native flows to restore scour velocities)

What protections are already in place?

Basin Plans already include water quality objectives for the response variables of concern that impact beneficial uses - numerical criteria for dissolved oxygen and narrative criteria for biostimulatory substances and taste and odor. If we set nitrogen and phosphorus criteria to prevent lowered DO and protect against problems associated with biostimulatory substances, we will be creating criteria that are duplicative of existing objectives, and we will not necessarily be solving the problems related to biostimulatory substances. If we look at the State's existing water quality standards program and the eutrophication problem as a whole, there is only one gap in the system for measuring eutrophication-related problems numerically: numeric criteria for nuisance algae.

What should we do?

We should focus on addressing this gap in California's water quality standards program for nutrients and create a process for addressing identified eutrophication problems. The process should begin with EPA's preferred option of developing procedures to translate existing narrative criteria (biostimulatory and taste/odor) into quantified endpoints for

nuisance algae. The quantitative thresholds developed using translators for nuisance algae would address problems relating to recreation, aesthetics, and taste and odor. We already have numeric criteria for DO that protect aquatic life.

Secondly, we should set up a process that addresses nutrients if DO and algae thresholds are exceeded. What should be done if a waterbody is deemed to have depressed oxygen levels or too much algae? We can create a process that defines, for each response variable of concern, what causal factors to consider (e.g. nutrients) and what scientific studies to conduct to determine the causal factors to control. This would enable us to control the causal factors without taking the step of formally adopting nitrogen and phosphorus criteria.

The advantages of this approach are that it would focus resources on areas that actually need them, rather than adopting nitrogen and phosphorus criteria for all waterbodies, which may not solve the problems and may result in unintended consequences. This approach would also be acceptable to EPA given that Geoffrey Grubbs, in his November 2001 memorandum, reiterated the example that “a state or authorized tribe could establish numeric criteria for response variables such as dissolved oxygen, chlorophyll-a, and a measure of water clarity and also adopt a procedure to quantitatively address causal parameters (i.e. nitrogen and phosphorus) and determine nutrient loads in specific water body segments that will achieve the response variable criteria.”

How would this look?

The RTAG could develop a State Nutrient Policy for adoption by the State Board that would define translator mechanisms for existing narrative criteria relating to nuisance algae (e.g. biostimulatory, aesthetics, etc.) and the process to be followed if those numeric endpoints are exceeded. The policy would also address DO problems and how to assess whether excessive algae is suspected to be the cause and whether nutrient inputs are the controlling variable. For both depressed DO and nuisance algae, a study methodology would need to be developed for investigating the problem, identifying the causal variables, and choosing the appropriate controls, of which there could be a range of options. The chosen controls could include lowering nutrient levels, channel modification, or planting trees. Of course, all chosen controls and solutions would have to be compatible with the beneficial uses and existing uses of the waterbody.

To translate the narrative objectives for nuisance algae into numeric endpoints, a panel of experts could be assembled to determine the acceptable amounts of algae to protect the various beneficial uses. The acceptable levels could apply statewide or on an ecoregion basis, but implementation options would vary locally depending on the costs to implement the controls if the numeric thresholds are exceeded. New Zealand has also tried to quantify an acceptable level of algae for aesthetic and recreational uses in rivers and streams and has developed a standard that requires periphyton cover to be less than 30% to protect these uses. While California might also want its numeric standard to be in the form of percent periphyton cover for rivers and streams, a more in-depth study would have to be conducted in California to determine the acceptable threshold here. For lakes

and reservoirs it would be more appropriate for the standard to be in a different form such as chlorophyll-a concentrations or transparency standards.

What should the RTAG do now?

We believe the RTAG should include this approach in the workplan submitted to the State Board, either as the recommended approach or as an alternative option to developing subcoregion numeric criteria for nitrogen and phosphorus. This approach would address nutrient problems when and where they exist and would minimize the amount of work and time the state will need to expend on this problem. Under this approach, waterbodies would be 303(d) listed only where dissolved oxygen or nuisance algae problems exist and not where nitrogen and phosphorus exceed levels that may or may not be resulting in adverse responses. When waterbodies are 303(d) listed, resources can be focused on identifying and controlling the causative factors. Neither resources nor time will have to be spent on the process of formally adopting statewide nitrogen and phosphorus criteria necessary to address EPA's mandate.

Tri-TAC
Jointly Sponsored by:
League of California Cities
California Association of Sanitation Agencies
California Water Environment
Association

Reply to: James Colston
Orange County Sanitation District
10844 Ellis Avenue
Fountain Valley, CA 92708

August 16, 2002

Fred Leutner, Chief
Water Quality Standards Branch
U.S. Environmental Protection Agency (4305T)
1200 Pennsylvania Avenue, N.W.
Washington, D.C. 20460

Subject: Draft Strategy for Water Quality Standards and Criteria: Strengthening the Foundation of Programs to Protect and Restore the Nations Waters.

Dear Mr. Leutner:

Tri-TAC appreciates the opportunity to provide comments regarding the USEPA's Draft Strategy for Water Quality Standards and Criteria. Tri-TAC is a statewide organization comprised of members from public agencies and other professionals responsible for wastewater treatment. Tri-TAC is jointly sponsored by the California Association of Sanitation Agencies (CASA), the California Water Environment Association (CWEA), and the League of California Cities. The constituency base for CASA and Tri-TAC collects, treats, and reclaims more than two billion gallons of wastewater each day and serves most of the sewered population of California.

Our organization agrees that there is a clear need for renewed focus on water quality standards. Water quality standards are the foundation of the TMDL and NPDES programs under the Clean Water Act. Without a proper foundation, these programs will not lead to appropriate resource expenditures or necessary water quality improvements.

Tri-TAC supports a number of the Strategic Actions proposed in the Draft Strategy. We have specific recommendations regarding the priority that should be given to those actions. We also strongly recommend that the strategy include tasks to evaluate and modify the current water quality standards program as a high priority, ahead of activity on new policy initiatives.

Our specific comments on the Draft Strategy are presented below.

SPECIFIC COMMENTS ON DRAFT STRATEGY

The Vision Statement should be deleted or modified. The Vision Statement for the strategy should be entirely consistent with existing State and federal policy. We believe that the portion of the Vision Statement that provides “all waters of the United States will have water quality standards that include the *highest attainable uses* (italics added)...” is a significant new policy statement which has not been properly evaluated or considered through a public review process. Tri-TAC’s concern with this policy statement is that it ignores consideration of the resource commitment to attain such *highest* uses.

Tri-TAC believes that the vision statement should either be deleted or should be modified to replace “highest attainable uses” with alternative wording such as “highest uses that are reasonably attainable”, where reasonableness would involve consideration of a full range of public interest values and be consistent with the goals of the Clean Water Act¹. This change should also be made in the Table of 28 Strategic Actions (1a) and in the text on page 7.

304(a) advisory criteria for Drinking water parameters should not be established. Strategic Action 2d suggests that EPA intends to develop 304(a) advisory criteria to protect drinking water uses and then requires States to adopt State standards based on the 304(a) criteria. Tri-TAC does not support this approach. Public water supply, in contrast to fishing and swimming, is not an in-stream use. It is a use that can be protected by means other than regulating in-stream water quality, i.e., through water treatment. In fact, the Safe Drinking Water Act already requires that all surface waters to be filtered prior to domestic use. If additional treatment is needed beyond that currently required, source water protection is an option that should be considered. However, source protection may be infeasible or ineffective in comparison to other risk management alternatives. For that reason, the decision on how best to protect the drinking water use should be made case-by-case on a watershed basis.

304(a) advisory criteria for nutrients and sediment parameters should not be established. Strategic Actions 3b and 3c are aimed at developing and/or implementing 304(a) criteria for nutrients and sediments, respectively. Tri-TAC does not support this approach. Chemical specific 304(a) criteria for nutrients or sediment parameters cannot be derived using the methods established for toxic pollutants and other water quality parameters (e.g., dissolved oxygen, temperature, ammonia, etc.). Toxic pollutants, dissolved oxygen, ammonia, etc. are directly predictive of effects on aquatic uses. Nutrient and/or bulk sediment chemical concentrations, in isolation, are not predictive of adverse effects. Nutrients and sediment quality are only one of numerous factors that may contribute to eutrophication or sediment toxicity. We urge EPA not to establish regional default numeric criteria. It is more appropriate to address undesirable observed conditions directly on a waterbody basis (e.g., through the TMDL process) and to control nutrient or sediment quality as necessary to achieve the desired condition.

Strategic Actions Need to be Prioritized. The current Draft includes an un-prioritized list of actions. Tri-TAC believes that some of these actions are far more important than others in terms

¹ Section 101(a)(2) of the Clean Water Act states that: “it is the national goal that **wherever attainable** (*emphasis added*), an interim goal of water quality which provides for the protection and propagation of fish, shellfish, and wildlife and provides for the recreation in and on the water be achieved by July 1, 1983.

of strengthening the standards program and recommends the following prioritization of identified actions:

High Priority Actions

- Strategic Action 2a (guidance for applying criteria in TMDLs and permits).
- Strategic Action 2b (guidance on target levels in TMDLs and effluent limits in permits).
- Strategic Action 4a (coordinating standards and TMDLs).
- Strategic Action 4c (provision of technical tools for site-specific criteria modifications).
- Strategic Action 4e (encouraging States to use watershed approaches including consideration of standards in watershed planning process).
- Strategic Action 4f (promotion of biological and ecologic evaluations to address watershed protection).
- Strategic Action 1c (federal actions regarding approval of standards).

Medium Priority Actions

- Strategic Action 2c (complete national consultation with FWS and NMFS on existing criteria).
- Strategic Action 3f (advancing development and implementation of biological criteria).
- Strategic Action 3g (strategy for waterborne microbial disease).
- Strategic Action 3i (sediment and water quality criteria to protect wetlands and wildlife).
- Strategic Action 4d (address inter-jurisdictional differences in standards).
- Strategic Action 5a (obtain early FWS, NMFS involvement in review of standards).
- Strategic Action 5b (sponsor meetings workshops and electronic dialogs with stakeholders).
- Strategic Action 5d (expand water quality standards academies and training).
- Strategic Action 5e (expand on-line services and data bases).

Low Priority Actions

- Strategic Action 1b (guidance for implementing antidegradation policies).
- Strategic Action 1d (review and update the 1994 Water Quality Standards Handbook).

Strategic Action 3a (guidance on implementing bacteria criteria).

Strategic Action 5c (establish clearinghouse for information on EPA policies and guidance).

Actions that Should be Deleted from the Strategy

Strategic Action 1a (guidance supporting adoption of highest attainable designated uses) for reasons stated above with respect to the vision statement.

Strategic Action 2d (integrate drinking water and pesticides needs with Clean Water Act needs when adopting or revising criteria) for reasons stated above.

Strategic Action 3b (guidance on nutrient criteria) for reasons stated above.

Strategic Action 3c (research efforts on developing sediment criteria) for reasons stated above.

Strategic Action 4b (evaluate whether drinking water uses have been adopted) for reasons stated above.

EFFORTS THAT ARE RECOMMENDED TO STRENGTHEN THE STANDARDS PROGRAM

Although current water quality standards have been in place for a number of years, serious efforts to implement the standards for toxic pollutants have only recently begun (through adoption of water quality-based permits and TMDLs). The experience to date with water quality-based permitting and TMDLs has raised serious questions about the ability of current standards (numeric "criteria" and uses) to provide a firm foundation for programs to protect and restore the nation's waters.

The burden for achieving standards under the Clean Water Act falls squarely on local interests – municipalities, industry, and landowners. The clean water goals of the Act will not be achieved if local governments, industry, and agriculture have serious questions regarding the reasonableness of water quality standards or the manner in which standards are implemented. Fiscal responsibility at the local level requires an examination of the benefit of major compliance expenditures. Experience indicates that local agency representatives will pursue available legal options if their analysis of costs and benefits does not support the direction mandated by the regulatory program. Typically, water quality standards, including use designations, are at the root of this analysis.

Part of problem we are facing today is that standards were not developed, nor are they being implemented, as envisioned by the Clean Water Act and early EPA guidance. Had the timetable and provisions of the Act been followed, States would have completed section 305(b) reports to Congress every two years that assessed the attainability and the costs and benefits of attaining EPA's 304(a) criteria before adopting State standards. When EPA adopted its initial 304(a) criteria in the 1980's without considering attainability or costs and benefits, EPA indicated the

States should consider such factors prior to adopting State standards. Likewise, EPA's 1991 Water Quality Standards Handbook indicated that States should consider such factors prior to adopting State standards. In fact, most States have been encouraged to adopt designated uses without proper consideration of attainability and have adopted EPA's 304(a) criteria as enforceable standards without adequately evaluating the means by which the standards would be achieved or the costs of attaining the criteria. As a result, we have designated uses and State criteria that are unrealistic. Furthermore, the elaborate processes that EPA has established to modify uses and criteria make it extremely difficult to correct this situation. As a result, EPA and the States are proceeding to implement standards and significant resistance to this action is occurring where required actions by municipalities are unreasonable.

The following actions are needed to strengthen the standards program to the point where it can serve as a sound foundation for programs to protect and restore our nations waters:

1. EPA needs to identify and propose measures to correct problems with the current standards program, including current use designations, current State criteria, and current implementation policies. Because designated uses are the foundation of the water quality standards program, EPA's guidance should provide direction on how to refine, update, and remove designated uses where necessary to insure that the water quality regulatory program is based on appropriate, achievable standards.² In developing this guidance, EPA needs to encourage states to routinely review all use designations to assure attainability and whether the use assigned to a particular water is appropriate and scientifically valid. States should also evaluate whether the criteria established to support its designated uses are attainable or valid (e.g., whether the original basis was scientifically sound). EPA should also provide guidance on modifying states' continuing planning processes (CPP) to specify the procedures and protocols for conducting and successfully completing UAAs, updating standards as part of Triennial Reviews or other standards revision processes, or development of statewide or site specific criteria. This guidance should indicate that states may make refinements in designated uses without going through a UAA process for uses not related to the "fishable" and "swimmable" goals in the Act. In fact, states should be allowed to remove fishable/swimmable uses for a water body where no fish are present or where swimming is restricted. Finally, there are some recommendations from the National Research Council (NRC) Report that EPA should incorporate into the water quality standards program. For example, the NRC Report recommends that states recognize that the assignment of designated uses based on conditions before the waterbody was altered by development is not always appropriate. EPA's guidance should include methods to determine whether attainment of pre-development conditions is possible. The NRC Report also recommended that designated uses be specific as possible, so that waters can be assigned uses that are appropriate for their characteristics. EPA must expedite the development of guidance on refining or removing designated uses, including fishable/swimmable uses. Moreover, EPA should make it clear that States have the authority to and should consider attainability, costs, and benefits in adopting and revising State criteria.

² This is supported by the National Research Council's report on the TMDL program (*Assessing the TMDL Approach to Water Quality Management*, June 2001) and by the General Accounting Office (*Inconsistent State Approaches Complicate Nation's Efforts to Identify Its Most Polluted Waters*, GAO-02, January 11, 2002).

2. EPA should endorse and promote the water quality-based approach to pollution control set forth in Section 7 of EPA's Water Quality Standards Handbook (See for example, Figure 7.1.) That approach recognizes that for waters listed as impaired, statewide standards need to be reviewed for site-specific appropriateness (and if necessary adjusted) prior to the development of TMDLs, and that TMDLs need to be developed prior to establishing water quality-based effluent limits in permits and developing water quality-based nonpoint source control programs. This process is consistent with the reasonable reading of the Clean Water Act, but is inconsistent with EPA's current permitting practices.
3. As noted in our first point, EPA should modify its water quality standards regulations to remove the unnecessary and unreasonable constraints on designation and de-designation of uses. In California, we are currently facing a dilemma that has arisen because many uses were designated without a full appreciation of the long-term consequences. This example pertains to an EPA-imposed "tributary rule" that has been applied to designated uses in specifically identified waters to all unidentified upstream waters. Under this rule, drains constructed for the purpose of conveying urban storm water runoff and agricultural tail waters have been designated as having primary contact recreation and municipal drinking water uses. In other cases broad use designations have been developed for "minor" surface waters, which are then applied to all waters without identified beneficial uses without going through a process to determine if the uses are attainable or appropriate. In fact, permits and TMDLs have been developed based on such erroneous designations. No reasonable person, for example, would be willing to pay the enormous costs necessary to treat urban runoff discharged to a constructed channel to the point that it meets primary contact recreation and municipal drinking water criteria. As it now stands, the EPA regulations make it very difficult to de-designate even clearly unrealistic uses, as evidenced by the few successful de-designations that have occurred since the water quality standards regulations were adopted in 1975. The issue of attainment is critical to the entire program. EPA plans to issue guidance by 2003 on the duration and frequency issues when measuring attainment. This should have a high priority with stakeholder input. The attainment guidance should also support a weight of evidence approach for impairment determinations and listing decisions. For example, chemical-specific data indicating that a generally applicable numeric criterion is being exceeded should not lead to a finding of nonattainment, when other evidence exists that the use is not impaired.

EPA should support watershed programs as a means to address water quality standards development, modification, and implementation, including TMDL development, consistent with the Watershed Rule currently under development by EPA. By watershed programs, we mean programs in which stakeholders consider the water quality issues, identify pollutant sources and linkages, and evaluate alternative control measures and the attainability of the standards. Per the Draft Strategy, EPA intends to issue guidance concerning the application of narrative criteria in TMDLs and permitting, but has not set a definitive date for action. These are very important issues that should be resolved as soon as possible, and we urge EPA to expedite development of this guidance in 2003. In addition, narrative criteria should not be used directly to evaluate attainment, develop TMDL targets, or derive permit limits. EPA should encourage states instead

to adopt procedures for developing numeric translators to use for these purposes. Narrative criteria should not apply to all waters and all flow conditions.

4. EPA should require States to develop 305(b) reports, in conformance with the requirements of the Clean Water Act that assess the costs and benefits of achieving the goals of the act, including achievement of State water quality standards. This will allow States to identify in advance potential State standards that need to be reassessed prior to implementation. (Several cooperative State-local stakeholder watershed programs here in California are currently developing this type of information.).
5. EPA should modify its current 304(a) criteria so that it represents a risk-based range rather than a single numeric value that represents a level that will not generally result in adverse impacts. This will facilitate State adoption of criteria that are attainable and reasonable, based on a balancing of costs, benefits, and other public interest factors. In concert with modifying its 304(a) criteria, EPA should modify its terminology so as to eliminate the current confusion generated by use of the term "criteria" to represent both non-regulatory 304(a) criteria recommended by EPA and regulatory criteria adopted by the States.
6. With regard to human health criteria, EPA intends to issue a bioaccumulation field guidance manual by 2004. There is a great need for the manual inasmuch as there are considerable problems with the existing methods for developing bioaccumulation factors. We urge EPA to expedite this project. Also, EPA should encourage states to base human health criteria on reasonable fish consumption rates for the general population. Protection of specific groups that consume large amounts of fish (or conversely small amounts of fish) should be addressed through site-specific criteria.
7. For site-specific criteria, EPA's guidance should indicate that modifications can be made for all forms of criteria. EPA should provide guidance that will assist states with developing procedures for making site-specific decisions. Finally, ephemeral, intermittent and effluent-dependent waters should be recognized as unique types of water bodies. EPA should expedite the development of guidance to assist states in tailoring criteria and uses to address the unique characteristics of such waters.

Again, Tri-TAC appreciates the opportunity to comment on the draft guidance. Please contact me at (714) 593-7458 if you have any questions regarding our comments.

James E. Colston
Tri-TAC Water Committee, co-chair

JC:wh

G:\wp.dta\ts\620\GENERAL DATA\310\Letter\JC_TriTAC letter on EPA WQS strategy 8-16-02.doc

c: Celeste Cantu, SWRCB Executive Officer
Roberta Larson, California Association of Sanitation Agencies
Ken Kirk, AMSA

Environmental Laboratory Technical Advisory Committee

August 5, 2002

Dr. Paul Kimsey,
Assistant Deputy Director,
Division of Laboratory Sciences
Department of Health Services
850 Marina Bay Parkway
Richmond, CA 94804

RE: Performance Testing Sample Instructions

Dear Dr. Kimsey

In February of this year, letters were sent to the Environmental Laboratory Accreditation Program (ELAP) management expressing concern about an important aspect of laboratory accreditation (see Attachment 1). These letters were from the Laboratory Accreditation Work Group, the California Association of Public Health Laboratory Directors, the California Water Environment Association, and the Association of California Water Agencies.

Of major concern is to these groups is Performance Testing (PT, previously known as Performance Evaluation or PE). This is the process by which laboratories analyze samples with unknown quantities of accredited parameters (Code of California Regulations, Title 22, Division 4, Chapter 19, Article 5 (**§64809**)). Most of the instructions for the drinking water and wastewater parameters were written by the United States Environmental Protection Agency (USEPA) and were published in December 1998 as "National Standards for Water Proficiency Testing Studies – Criteria Document". However, for some drinking water and wastewater parameters and all parameters for solid waste accreditation there are no USEPA instructions. Instead, various governmental and non-governmental groups have begun proposing standards and criteria under the auspices of the National Environmental Lab Accreditation Program (NELAP).

For those chemicals that are not regulated under Federal regulations but are regulated under California regulations, ELAP has issued its own set of instructions (for "California Only" parameters). The above-mentioned organizations were concerned that these instructions, while being used for regulatory compliance, had not received public review and thus constituted underground regulations. To the extent that these instructions have become public, they appear to be in conflict with ELAP's own existing regulations. Furthermore, they appear to be of questionable legal and scientific standing, possibly because concentration ranges and acceptance criteria have not been

made clear to the providers, leading to differences among providers rather than differences among laboratories.

ELAP has maintained a position that these instructions are "secret" and cannot be made public, even though the majority of PT samples used by ELAP are covered under USEPA's instructions, which are public. After review of some of the recent information provided on selected analytes by a few providers, it appears this desire for "secrecy" is due to the very narrow concentration ranges allowed. We feel this narrow approach does not constitute a true PT, which is supposed to be at a sufficiently broad range to challenge a laboratory over a variety of concentrations.

Despite ELAP's claims to privacy, the above-mentioned organizations requested that these instructions, beginning with the December 1999 version and including several updates, be made public and posted on ELAP's homepage to be consistent with the Public Records Act of California (Government Code 6250-6270).

On March 25th, Dr. Kulasingam kindly responded to each of these letters. He noted in his response that he agreed with the point being raised and indicated that ELAP would post on its web site the instructions to the PT providers (see Attachment 2). However, to date ELAP has yet to post these instructions.

Recently, ELAP posted a new document on its web site under the heading of Performance Evaluation (<http://www.dhs.ca.gov/ps/ls/elap/html/elapinfo.htm#pe>) and titled "California Specific PE Study Samples (Drinking Water)". However, we are not clear what this document is. It gives the impression of being an update to the original set of PT instructions for drinking water PT samples. Yet, this document has no letterhead, no date, no title, no signature, and is not addressed to anyone (see Attachment 3). Further, most of the analytes listed are not drinking water analytes (the phthalates and PAHs). Most of the "California Only" analytes for drinking water are not listed (e.g., Calcium, Magnesium, Aluminum, etc.).

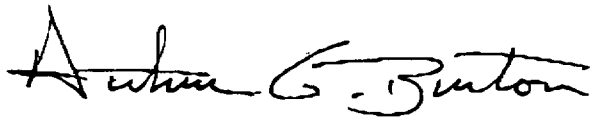
After contacting various PT manufacturers, it was discovered that in the past, the PT instructions and updates were sent directly to the PT manufacturers on official ELAP stationary. However, the posted document has been sent to none of the PT manufacturers. Despite its appearance, this document cannot possibly have any sort of official standing in regards to PT samples.

We request that ELAP honor its commitment in the March 25 2002 letter to post all PT instructions and updates on its web site in accordance with the Public Records Act. We also request that ELAP begin the process of rule-making as described in the Administrative Procedures Act (Government Code section 11346.45 (a) and 11346.4 (a)(6)) to update its PT sample regulations. Specifically, ELAP should use the Environmental Laboratory Technical Advisory Committee (ELTAC H&SC 100863) as a resource to develop these new

regulations. The concept of a public/private partnership to speed up the process and ensure wide acceptability has many precedents in other California regulatory actions. Thank you for your attention.

Sincerely,

Ken Bouchand
American Water Works Association, California-Nevada Section
10574 Acacia Street, Suite D6
Rancho Cucamonga, CA 91730
909.481.7200

A handwritten signature in black ink that reads "Art Burton". The signature is written in a cursive style with a large initial 'A' and a long horizontal stroke.

Art Burton
Sequoia Analytical
885 Jarvis Drive,
Morgan Hill, CA 95037
408.776.9600x167

A handwritten signature in black ink that reads "Miriam Cardenas". The signature is written in a cursive style with a large initial 'M' and a long horizontal stroke.

Miriam Cardenas
Laboratory Accreditation Work Group
City of Santa Monica Water Division
1228 South Bundy Drive
Los Angeles, CA 90025
310.434.2659

A handwritten signature in black ink that reads "Andrew Eaton". The signature is written in a cursive style with a large initial 'A' and a long horizontal stroke.

Andrew Eaton
MWH Laboratories
555 East Walnut

Pasadena, CA, 91101
626.568.6425

Bruce Fujikawa, Dr. P.H.

Bruce Fujikawa
California Association of Public Health Laboratory Directors
c/o City of Long Beach Public Health Laboratory
2525 Grand Ave. #260
Long Beach, CA 90815
562.570.4077

William Gedney
California Water Association
Southern California Water Company
630 E. Foothill Blvd.
San Dimas, CA
91773-9016
909.394.3600x624

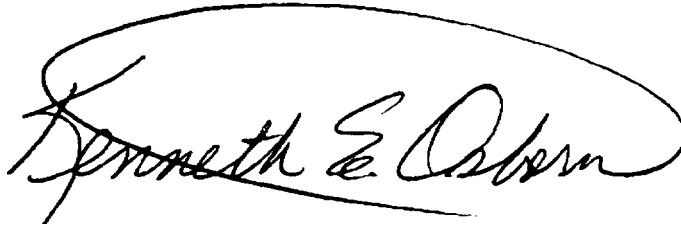
DE Kimbrough

David Eugene Kimbrough
Laboratory Accreditation Work Group
Castaic Lake Water Agency
27234 Bouquet Canyon Road
Santa Clarita, CA 91350-2173
661.297.1600
DavidK@clwa.org

Steve Meyer

Steve Meyer
Metropolitan Wastewater Department
City of San Diego
5530 Kiowa Drive, La Mesa, CA 91942
619.668.3212

smeyer@sandiego.gov

A handwritten signature in black ink that reads "Kenneth E. Osborn". The signature is enclosed within a hand-drawn oval.

Kenneth Osborn
East Bay Municipal Utilities District
PO Box 24055 Mail Slot 59
Oakland, CA 94623
510.835.3000

A handwritten signature in black ink that reads "Dave Sandusky".

Dave Sandusky
Forensic Analytical Specialties
3777 Depot Road, Suite 409
Hayward, CA 94545
510.887.8828

A handwritten signature in black ink that reads "Betsy Shepherd".

Betsy Shepherd
Metropolitan Water District of Southern California
700 N. Moreno Ave.
La Verne, CA
91750-3399
909.392.5070

Dan Smith
Association of California Water Agencies
910 K Street, Suite 100
Sacramento, CA
95814-3512
916.441.4545

Kathy Suter
California Water Environment Association
South Bayside System Authority

Redwood City, CA 94063
650.594.8411x152

CC: Barbara Yonemura, DHS Office of Legal Services,
Allison Branscombe, DHS Office of Regulations,
George Kulasingam, DHS Environmental Laboratory Accreditation Program