

DRAFT

BACWA National and San Francisco Bay-Delta Nutrient Trading Frameworks and Treatment Technologies Symposium

- Draft Agenda and Speaker Ideas -

<proposed September 4, 2013>

8:30 am to 4 pm

Symposium Synopsis:

- Segment 1: Nutrient case studies from around the country, including general experiences along with trading/offset schemes: what has worked and what has not.
- Segment 2: Conventional nutrient treatment technologies.
- Segment 3: Newer approaches and research: how to treat centrate, nutrient mining, and wetland/natural systems treatment.
- Segment 4: Bay-Delta Regional studies/activities updates.

Welcome and Symposium Overview (5 min – BACWA).

Segment 1 – National Nutrient Case Studies and Trading Frameworks (8:35 to 10:00 am)

1. Overview of Nutrient TMDL Trading Frameworks (30 min – Paul Freedman, LimnoTech).
2. Case Study Briefs: Long Island Sound, Hampton Roads, DC Water, Denver Metro (30 min - TBD).
3. Hampton Roads Sanitation District Program (25 min – Charles Bott, HRSD).

4. Chesapeake Bay/Neuse River Case Study (30 min – Ken Reckhow, Duke University).

<Morning Break -20 min (10:00 am to 10:20 am)>

Segment 2 – Conventional Nutrient Treatment Technologies (10:20 am to 12:00 pm)

5. Overview of Conventional Nutrient Reduction Technologies (25 min – JB Neethling, HDR).
6. Fixed Film Processes (MBBR, TF/AS, IFAS) (25 min – Denny Parker, Brown & Caldwell).
7. Side-Stream Treatment Technologies and Experience (25 min – John Fraser, Carollo Engineers).
8. Truckee Meadows Water Reclamation Plant /Truckee River TMDL Update – (25 min – TBD).

<LUNCH – 30 min (12:00 pm to 12:30 pm)>

Segment 3 – New Technologies and Research (12:30 to 1:30 pm)

9. ReNUWIt Research Highlights (20 min - David Sedlak, UCB; or Richard Luthy, Stanford).
10. Nutrient Capture and Recovery (20 min – Steve Wirtel, Ostara)
11. Wetlands, Natural Systems, and “Green Technologies” Alternatives (20 min – Bry’ Sarte, Sherwood Engineers).

<Afternoon Break -20 min (1:30 pm to 1:50 pm)>

Segment 4 – Bay-Delta Regional Case Studies/Activities (1:50 to 3:50 pm)

1. EBMUD Update (15 min – Ben Horenstein).
2. San Jose/Santa Clara Update (15 min - TBD).

3. Sacramento Regional Update (15 min – TBD).
4. EBDA (15 min – Mike Conner).
5. CCCSD (15 min – TBD).
6. Discovery Bay (15 min – TBD).
7. DDS (15 min – TBD).
8. SBSA (15 min – TBD).

Summary and Wrap-up (10 min – BACWA)