Call to Order
The 198th meeting of the ORSANCO Technical Committee was called to order by Chairman Frevert at 1:00 pm EDT on Tuesday, February 7, 2012. Eight states, three federal agencies and four Commission advisory committees were represented. (For Roster of Attendance, see page 8.)

Minutes of 197th Committee Meeting

ACTION: Motion passed to accept the minutes of the 197th Technical Committee meeting.

Chief Engineer’s Report
Mr. Tennant reported on a number of items:

Total Dissolved Solids – This one year monitoring project conducted under the River Users Program involves collecting weekly samples at sixteen sites which are being analyzed primarily for total dissolves solids and bromide. The study is recently underway and detection rates for bromide have been low thus far. At the request of OEPA, we are considering installation of an additional monitoring site on the Mahoning River near the Ohio-Pennsylvania border.

National Response Center – Staff continues to work towards receiving complete spill reports from the NRC. Senator Rockefeller as well as the USEPA has supported this initiative however options appear to be running out at this time. Staff is able to get the necessary responsible party information but it requires additional steps.

Farm Bill Letter – Mr. Tennant passed out a letter that ORSANCO has been asked to sign from a coalition of organizations including NACWA regarding Farm Bill Programs. The intent of the letter is to encourage Congress to continue funding conservation practices under the Farm Bill. TEC was asked to provide any input regarding ORSANCO signing the letter within two weeks, and to add this issue to the next meeting.

Water Resources Permits for Shale Gas Drilling – ORSANCO was contacted by WVDEP regarding processing water withdrawal permits for shale gas drilling. Staff will be convening a conference call of Ohio, Pennsylvania, West Virginia and the Corps of Engineers on to discuss the availability of flow data and to support these permitting activities.
**Fish Consumption Advisory Protocol** – Ohio, West Virginia and ORSANCO have signed a protocol for developing fish consumption advisories that was developed by a work group of the states. Signatures by the remaining mainstem states are still needed.

**Staff Reorganization** – With Alan’s retirement and Mr. Tennant becoming Executive Director, staff will be required to assume new responsibilities.

**Technical Committee Meeting Reporting** – Mr. Tennant suggested that reporting of Technical Committee meetings would be streamlined in the future and asked for any input from TEC.

**Abatement of Wet Weather Sources**
Ms. Cochran provided an annual status report of CSO abatement. The committee indicated that this reporting is useful and should be continued, but indicated that additional information should be presented which would show actual improvements such as tracking the number of annual overflow events by community. Mr. Elmaraghy indicated that he would like to update OEPA’s information.

Mr. Braun provided the first annual status report of storm water abatement. The intent was to begin tracking progress on storm water abatement similarly to the CSO abatement report. This report will be developing further in the future.

**Mercury Studies**
Mr. Hobbins reported on the status of two mercury monitoring studies: 1) Mercury-Methyl mercury characterization study of flue gas desulfurization discharges from four coal-fired electric power plants which also includes sampling ash pond discharges, and 2) Mercury-Methyl mercury bioaccumulation factor (BAF) study being conducted near Hannibal Dam which is also providing ORSANCO with the capability to conduct river sampling using the USGS’s flow-weighted cross-sectional sampling method (Equal Discharge Increment method).

Mr. Thomas presented on the monitoring program for mercury in fish tissue. Staff will be investigating mercury trends in fish tissue which is anticipated to be a complex evaluation due to the many complicating factors. Mr. Reash suggested using a length-standardized approach which Mr. Thomas indicated staff would be considering.

Mr. Reash presented an evaluation of temporal variability in MeHg fish tissue sample results and presented some specific recommendations for analyzing fish tissue data for making impairment decisions.

**Ohio River Water Quality Assessment**
TEC approved the 305b biennial assessments of Ohio River water quality conditions for aquatic life, contact recreation, and public water supply uses. The entire river has been designated as fully supporting the aquatic life and public water supply uses. Approximately 2/3 of the river is designated as impaired for the contact recreational use.
Regarding the fish consumption use, the entire river will be designated impaired due to PCBs and dioxin. There were questions as to the use of fish tissue data from outside entities, particularly regarding the fish consumption use assessment based on mercury data. The Power Industry has asked that their data be included in ORSANCO’s assessment. Staff has been directed to consider incorporation of outside entities’ fish tissue mercury data in the current assessment, but because of states’ timing needs, assessment based on mercury in fish tissue is being deferred. In addition, staff has been directed to work with the 305b workgroup to develop a protocol for using outside data in future assessments.

**ACTION:** Motion passed to designate impairment as described above for the 2012 Biennial Assessment of Ohio River Water Quality Conditions, and direct staff to work with the appropriate work groups to develop a protocol for using outside data in future assessments.

**ORSANCO Pollution Control Standards**

Mr. Tennant briefed the Committee on proposed revisions for the 2012 Pollution Control Standards which are to be finalized at the Commission’s October, 2012 meeting. Ms. Lodor presented specific recommendations of the POTW Advisory Committee regarding the Commission’s bacteria criteria for the protection of human health from contact recreation including adoption of USEPA’s draft recommended criteria for E. coli as well as river stage-based modifications. Representatives of PPG Industries, Natrium, WV facility addressed the committee and answered questions regarding their application for a variance from the Commission’s future elimination of mixing zones for bioaccumulative chemicals of concern (mercury in this case).

TEC was requested to submit any additional questions regarding the PPG application or the variance review process to Mr. Heath by February 24.

**ACTION:** Motion passed directing staff to move forward with proposed revisions, develop specific language to be included in the 2012 revised standards, and release a public notice of the proposed revisions.

**Report of the Biological Water Quality Subcommittee**

Mr. Thomas reported on the status of biological pool surveys, macroinvertebrate index development, and an update on development of a diatom index. Fish population studies will be conducted in four pools in 2012 while water quality monitoring will be dropped from the fish population monitoring sites.

**Nutrients**

Mr. Youngstrom reported on the status of development of numeric nutrient criteria as well as the Interstate Water Quality Trading Program which is in the process of developing several pilot trades over the next two years.

TEC directed staff to delay convening an expert panel on numeric nutrients criteria development until staff completes the draft macroinvertebrate index.
Report of the NPDES Subcommittee
Mr. Tennant provided a report of the NPDES Subcommittee’s January 19, 2012 conference call including development of NPDES permit limits for criteria that apply a drinking water intakes, review of the proposed variance application and review process, effluent monitoring requirements for nutrients, and the trading project.

FY13 Program Recommendations
Two primary recommendations came out of the program prioritization process.
1) Look at the opportunities available to increase the fish tissue program budget.
2) Development of a protocol for use in utilizing outside entities’ data in 305b assessments as discussed earlier.

Member Reports

Kentucky
Mr. Payne reported that KYDOW continues to have significant issues related to reduced staffing. They are in the process of updating the monitoring and assessment plan and are completing the 303(d) list. Coal permitting has been held up by USEPA resulting in mining operations being significantly curtailed or mines closing. KYDOW is receiving USEPA grant monies for wetlands work. USEPA is proposing antidegradation rules that waters remain in high quality status even if one parameter is not meeting criteria, which represents a significant change.

Indiana
Ms. Selvaratnam reported that IDEM has recently held a stakeholder meeting and will be proposing revised chloride criteria to the water board next month which are hardness and sulfate-based (essentially Iowa’s criteria). They are expecting their antidegradation rule will also be adopted by the water board next month. IDEM is in the process of proposing nutrient criteria for natural lakes including total phosphorus and chlorophyll a and they are currently meeting with stakeholders. They are collaborating with USGS to develop nutrient criteria for streams, and data analysis will be completed shortly.

United States Coast Guard
Mr. Simpson reported that the USCG is working closely with USEPA on developing tactical plans for spill response on the Ohio River. ORSANCO is hosting a meeting next week to facilitate this effort. Last year the USCG began enacting an MOU with USEPA concerning reporting compliance in NPDES permitting of inspected vessels. They are working with USCG headquarters on dealing with shipping of frac waste on the water and what types of vessels should be used for this activity.

United States Geological Survey
Mr. Griffin reported that the FY12 USGS budget was only reduced by 1.5 percent overall, which was better than many federal agencies, while its stream gauging and coop programs had small increases. The Indiana and Kentucky Science Centers, under the leadership of Bill Guertal, have developed a joint five-year science strategic plan which is unique within the agency that pools the resources of both science centers.
**Water Users Advisory Committee**

Mr. Bargiel reported that the WUAC was pleased with ORSANCO’s initiation of the TDS/Bromide study in which water utilities are participating. PADEP is asking utilities to provide data on speciation of their trihalomethane monitoring results which will provide additional information regarding the impacts of source water bromide levels on trihalomethanes in finished drinking water. There is a current trend in larger communities to consolidate their waste water and drinking water services which could be a concern to drinking water utilities. A new ODS station has been established at the Ashland, KY water utility, and the Evansville, IN ODS is receiving a new GC/MS.

**Power Industry Advisory Committee**

Mr. Reash reported that the USEPA is scheduled to issue the 316(b) fish impingement/entainment final rule in July which will require power plants to submit a comprehensive report on operations, receiving stream, biological studies, etc. within six months of the rule being finalized. The steam electric effluent guidelines are scheduled to be released in draft by USEPA in July. The focus has been on developing treatment standards for discharges from FGD scrubbers regarding mercury, selenium and TDS. The coal combustion byproduct rule will be issued by USEPA in 2012 may require phase out of wet ash disposal and regulation of coal combustion byproducts as a hazardous waste.

**Virginia**

Mr. Newman reported that VADEQ is decreasing staffing, consolidating duties, and reducing water quality programs. VA similarly to KY is also not issuing any coal permits. A study plan has been developed by VA, TN and EPA regions 3 and 4, and various resource agencies to address declining mussel populations in the Clinch/Powell river system.

**United States Army Corps of Engineers**

Ms. Lee reported that the Great Lakes Ohio River Division has a new Commander, Brig. Gen. Margaret W. Burcham. Ohio River districts are being directed to revise non-federal hydropower MOUs requiring them to conduct real-time monitoring for dissolved oxygen and temperature. The HEC-RAS flow model is being adapted for use on the Ohio River and may be used by USEPA for the bacteria TMDL. The Corps is working with the Council on Environmental Quality in managing freshwater resources in a changing climate and they would like to partner with ORSANCO and the states to develop pilot projects. The next Ohio River Basin Alliance meeting is March 27-28 in Nashville, TN. Ms. Lee provided an update of dam safety issues in the Ohio Basin.

**New York**

Mr. Konsella reported that a water resources bill was enacted in August, 2011 which requires permits for all water withdrawals over 100,000 gallons per day, while agriculture is exempt from the rule. A phosphorous TMDL has been finalized for Chautauqua Lake. There was a recent state court ruling requiring NYDEC to revise its MS4 general permit. An enforcement action was filed against US Energy for water quality violations caused by drilling activities in Allegheny National Forest. The moratorium on shale gas drilling has expired and a revised draft EIS has been issued, and NYDEC is currently responding to thousands of public comments.
Pennsylvania
Mr. Schwartz reported that commercial dredging permits are being reissued this year and a protocol has been approved for fish and mussel pre-dredging surveys. PA Congressman Mark Critz has agreed to be the Democratic Chair of the Ohio River Basin Caucus and tours of the Ohio River are being organized for him. PADEQ has provided their water withdrawal review procedures to ORSANCO for informational purposes within the water resources program. PADEQ is investigating the potential use of acid mine discharge water as a source for frac water which could reduce the use of fresh water for such purposes.

Public Interest Advisory Committee
Mr. Janelins reported that PIACO was meeting this afternoon in an effort to promote increased committee interaction with the Commission. At its November meeting PIACO made recommendations to the Pollution Control Standards Committee regarding the Commission’s standards and new ways to interface with the public. ORSANCO currently has an email data base of 7,000 addresses and the committee has established a goal to increase that number to 12,000 email addresses by the end of 2012. The Ohio River Sweep is scheduled for June 16, 2012.

Ohio
Mr. Elmaraghy reported on OEPA’s attainment of aquatic life for large rivers in the 2012 Integrated Report. OEPA has formed two work groups to develop a statewide nutrient strategy framework. They have developed a pilot in-lieu fee program regarding the 401 certification program for wetlands mitigation. They are proposing language to ask for delegation of the federal 404 certification program. OEPA issued a draft NPDES permit for the City of Warren, OH which does not allow their acceptance of oil and gas waste water and includes TDS limits which the city is attempting to adjudicate. OEPA is working with ORSANCO to establish a monitoring station on the Mahoning River at the Ohio-Pennsylvania border. Ohio has 177 operating Class II injection wells that are permitted by ODNR that can accept frac waste water. An area near Youngstown, Ohio has experienced several minor earthquakes which might be attributed to one of the injection wells that is in contact with subsurface faults. Updates on OEPA rulemaking, CSO communities, and selected discharges were provided. OEPA carried out a $3.5 million project on Grand Lake St. Marys last year and is conducting a $5 million project using Alum treatment this year to address significant water quality problems regarding harmful algal blooms.

POTW Advisory Committee
Ms. Lodor reported that Cincinnati MSD and SD1 of Northern Kentucky, in conjunction with ORSANCO, are working on a project for predictive modeling of bacteria conditions in the Ohio River. They are also working on a smart phone application to inform the public. USEPA is holding listening sessions on integrated planning for watershed management for compliance with the Clean Water Act which includes establishing priorities based on financial capabilities.
**West Virginia**

Mr. Mandirola reported on USEPA’s approval of WV’s triennial review of its standards. Pertinent items were two exceptions to WV’s ½ mile rule for discharges upstream of Ohio River drinking water intakes, approval of lake nutrient criteria, disapproval of listing criteria for total phosphorus, adoption of a cold water total iron criterion which were increased to 1 mg/L, adoption of a harmonic mean design flow exception which would apply to Ohio River miles ORM 68-70, and delisting of significant portions of the Ohio River for total iron. WV has adopted new oil and gas legislation which includes new water management plan requirements for permitting including details on use of source water and disposal of frac water, and certain water well testing requirements. WVDEP does not have permitting authority for water withdrawals. WV is more recently having better success with issuing coal mining permits.

**Next Meeting**
The next meeting of the Technical Committee will be held on June 12-13, 2012 at Oglebay Resort and Conference Center in Wheeling, West Virginia.

**Adjournment**
The 198th meeting of the ORSANCO Technical Committee was adjourned on Wednesday, February 8, 2012.

Approved:

[Signature]

Toby Frevert, Chairman

Prepared by Jason Heath, P.E., BCEE

(Tape recording of proceedings available at Commission Headquarters)

PowerPoint presentations from this meeting are available on the Commission web site at www.orsanco.org.
### Roster of Attendance

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<td>US Coast Guard</td>
<td>Doug Simpson</td>
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<td>US Corps of Engineers</td>
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<td>US Geological Survey</td>
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<td>ORSANCO Chief Engineer</td>
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### Commissioners

Stuart Bruny, Doug Conroe, Chuck Duritsa, Tom Easterly, David Flannery, Sandy Gruzesky, Ken Komoroski, Phil Morgan, Scott Nally, Greg Phillips, Ron Potesta, Paul Tomes, Mike Wilson. Ross Wales - Commission Legal Counsel

### Staff

Ryan Argo, Dave Bailey, Steve Braun, Stacey Cochran, Sam Dinkins, Tracey Edmonds, Joe Gilligan, Jason Heath, Eben Hobbins, Jeanne Ison, Jeff Thomas, Jerry Schulte, Rob Tewes, Greg Youngstrom, Lila Ziolkowski

### Guests

Jeff Boyle
Cheri Budzynski
Tim Cobaugh
Patrick Coyle
Brian Dillemuth
Erich Emery
Tom Horan
Shawn McGuigan
David Langseth
Lori Leffler
Judy Petersen
Ron Riecken
Jim Rock
John Spaeth
Jamie Wisenall

Shumaker, Loop, and Kendrick
PPG
Duke Energy
Rex Energy
US Corps of Engineers
PPG
Rex Energy
Gradient
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