## Meeting Summary for the July 9, 2014 Model-Techno-Policy Workgroup:

## **Discussion Items**

- ➤ DEQ submitted a June 11 memo to the workgroup and NPDES-permitted facilities in the valley, requesting estimates of current and future organic component reductions associated with TP reduction scenarios. Received responses are posted on the ftp site and they include:
  - Avimor, Boise, Darigold, Kuna, Middleton, Nampa, Notus, Sorrento, Star, Wilder
  - Robbin and Matt (Brown and Caldwell) to provide DEQ with estimations of treatment technology to be used by facility, and constituent concentrations by technology
    - o DEQ to provide a blank spreadsheet template
  - Robbin (Boise) to provide link to WERF report that also deals with treatment technologies, constituent reductions, and variability
- ➤ DEQ is finalizing the contract for additional assistance from Dick Park (Eco Modeling) and Jonathan Clough (Warren Pinnacle Consulting) during the scenario and allocation development process.
- ➤ Discussion of HDR's 2014\_0703 draft memo: "Characterizing Point Source Phosphorus for the Lower Boise River Total Maximum Daily Load and AQUATOX Water Quality Modeling" (posted on the ftp site)
  - Ben (EPA)
    - There is actually a bioassay 14-day test (e.g. in the Spokane TMDL); reservoirs have a much longer residence time; the speciation is probably more detailed that should be for this TMDL
    - For the Spokane TMDL, they asked the facilities as a whole to develop OP:TP and other constituent ratios in order to produce a common conservative value for all facilities.
  - Matt Chesapeake Bay TMDL also deals with this issue to some extent.
  - Troy (DEQ) DEQ will use all of the information to the extent practicable to help develop an
    accurate and defensible TMDL
- ➤ Darcy (DEQ) working to identify how changes in TP effluent affect other constituents, in order to accurately translate in the model
  - Starting with straw-dog scenario of WWTFs @ 0.1 mg/L TP May-Sept and 0.3 mg/L TP Oct-April; Groundwater and Tributaries at 0.07 mg/L. This is only a starting point as we work through the scenario process these values/timeframes will be adjusted as appropriate to meet the periphyton target for the TMDL.
    - For scenarios, using monthly average water quality WWTF data; using non-detects as the actual value
    - Adjusting TP reductions and other constituents at same rates (only for testing), while waiting for WWTF data identified above from Robbin et al.
    - Working to verify/refine model depths in Segments 8-10 relative to observed (could be an error in the original import)
    - Dick is helping to adjust remineralization rates for organic components that should be used with TP reductions
  - Ben and Jack (HyQual) Concerned that some of these changes may be venturing in to the realm of recalibration

- Darcy so far, this is not a recalibration; changes are being made to fix any potential data errors (similar to the pH fix). Other changes are to boundary conditions that are related to appropriately modeling TP reductions.
- Troy DEQ will share any changes to the model with the group, as well as document them in the model report. Any changes to the initial model boundary conditions that are not part of TP reduction scenario will be measured and compared to the previous calibration, and documented.
- > Darcy working to model changes to tributaries that contain point sources.
  - Jack might be more appropriate to try a standardized approach to changing tributary boundary conditions (e.g. evaluate water quality of tributaries as a group that do not contain WWTFs vs. those that do and develop ratios or some other common measure of WWTF influence).
  - Ben suggests taking the most simple and straightforward approach possible that can adequately answer the TMDL questions when dealing with these issues.
- ➤ Jack wants to the group to also be looking closely at the groundwater and tributary adjustments, and the resulting allocation concentrations, as they will need to be defensible in the TMDL.

## To do's before July 23 Meeting

- Troy
  - Provide Robbin and Matt with template for estimating technologies, constituent reductions, and associated facilities in the valley, to help develop reasonable ratios under TP reduction scenarios.
  - Post WWTF data, and other information on the ftp site and/or LBR WAG webpage
- Robbin (and Matt)
  - Provide DEQ with requested WWTF technology and facility information.
  - o Provide link to WERF report
- Darcy
  - Continue spearheading the modeling process...

## **Next Workgroup Meeting**

Wednesday, July 23 10 to noon.

DEQ State Office, Conference Room F (it will be a cozy meeting!)

Phone: 208-373-0101 Bridge 4

<sup>\*\*</sup>Unfortunately, there will be no remote web access for this meeting, but we will try to email everyone the materials ahead of time (even if just before the meeting).