

Texas Environmental Flows Science Advisory Committee

Wednesday, July 13, 2011 at 9:00 am

Texas Water Development Board

Austin, Texas

Minutes

Call to order

SAC Chairman Bob Huston called the meeting to order.

Approval of meeting minutes from June 8, 2011

Minor revisions were made to the June 8, 2011 minutes. The revisions were accepted and members approved the minutes as amended.

Budget Update

Solis

Dr. Ruben Solis, TWDB, distributed a handout on the remaining 2011 budget showing the SAC has \$36,067 remaining in the budget, representing 28% of the total with one and a half months left in the fiscal year. He discussed the 2012 fiscal year budget and a request received in June from EFAG members Senator Frasier and Representative Ritter requesting TWDB assistance in finding additional funds to complete ongoing SB3/environmental flows work. On July 5, TWDB responded to Chairmans Frasier and Ritter that the agency anticipated having \$260,000 to assist the SB3 process. These funds were taken from budgets of existing mandated programs supporting SB2 and the bay and estuaries studies. Dr. Solis is awaiting a ruling from TWDB legal and finance staff as to whether these funds can be used for per diem reimbursement.

Chairman Huston commended Dr. Solis and TWDB for their efforts. He said the funding will likely be used by the Nueces, Brazos, and Rio Grande BBESTs, as well as the SAC, and no funding will be available to begin activity in the last tier of basins located in the northern part of state. Chairman Huston cautioned members that SAC needs to be conscious of the funding constraints in future activities and use their portion of this budget judiciously.

Chairman Huston discussed the expenses to date and asked members to submit outstanding invoices thru June as soon as possible. He will have individual discussions with each BBESTs Liaison to determine what activity is anticipated before the end of the fiscal year so any excess funds can be disbursed where needed.

Liaison Reports (Guadalupe/San Antonio, Colorado, Nueces, Rio Grande, Brazos) Liaisons

Guadalupe-San Antonio

SAC member Dr. George Ward reported the BBEST is continuing to provide scientific support at the request of the GSA BBASC. He added that the BBEST developed new analyses and revised methodologies in this process and raised concern whether these new approaches will be adequately documented in the BBASC recommendation. Dr. Dan Opdyke, TPWD, noted that the additional analysis by the BBEST was provided to the BBASC. He noted that the stakeholders also considered information presented on the work completed under SB2 and additional studies by the TPWD staff. Dr. Opdyke reported that the BBASC has begun work

on their environmental flow recommendations and made some preliminary decisions for the Guadalupe River at Comfort. Dr. Opdyke anticipated additional progress during the next two day meeting scheduled for July 18-19, 2011. Chairman Huston noted that the BBASC, with assistance from their BBEST, can develop new methodology and analyses in the process of completing their recommendations. Should the SAC deem it appropriate, they could provide comments on the new technical analyses to TCEQ in their rulemaking process. GSA BBASC member Jennifer Ellis reassured the SAC that the BBASC fully intends to document all decisions, methodologies, and data used in deriving their recommendation. Dr. Opdyke mentioned the efforts of the National Wildlife Federation in trying to quantify the SB3 type strategies to increase flows in the basin using three strategies identified by the BBASC.

Colorado-Lavaca

SAC member Dr. Bob Brandes said the BBASC identified several projects and are in the process of evaluating them using the BBEST recommendations. He added that the BBASC is working on how to structure their recommendation and noted it may vary from the BBEST recommendation. Kathy Alexander, TCEQ, stated the BBASC was moving forward and has reached preliminary consensus on some items.

Nueces

SAC member Dr. Paul Montagna reported the BBEST was on schedule as of the last meeting on June 24, 2011. The BBEST had tentatively scheduled a presentation of the preliminary report to the BBASC on July 20, 2011. However, the meeting was cancelled. Dr. Montagna stated that the three subcommittees are meeting independently and the BBEST still anticipates finishing the review and data analysis part of the charge by August 31, 2011. Upcoming meetings of the BBEST are scheduled for July 29, 2011 and August 15, 2011. Dr. Montagna added that recent work of the estuary subcommittee still suggests that current conditions in the bay do not support a sound ecological environment. However, the hydrology and instream subcommittees' work is leaning toward support of a sound ecological environment in the upper basin. Dr. Dan Opdyke, TPWD, stated the BBEST is making progress on how to address the intermittent streams. Dr. Montagna noted that no recommendations are planned for Baffin Bay and Laguna Madre since there are no inflows, and Corpus Christi Bay since it is essentially a marine environment. Members asked several questions of Dr. Montagna and Dr. Opdyke on specific areas of investigation.

Rio Grande

Dr. Brandes stated the Lower Rio Grande BBEST met June 20- July 1, 2011 and the Upper Rio Grande BBEST met July 11- 12, 2011. He reported that both BBESTs are in the data assemblage and assessment mode. The Lower BBEST had an extensive presentation on TxBLEND and members are deciding whether to include it in their analysis. He noted seagrass is a driving factor in their study. The Lower BBEST is still concerned with Mexico's contribution to the Rio Grande and is working on a better understanding of these flows and the policies and statutes governing them.

The Upper Rio Grande BBEST received a presentation on HEFR and is working on a better understanding of this process and how it can be applied. They discussed historical flow periods and are studying the impacts to flow over time. Dr. Brandes said they are also concentrating on the Devils and Pecos Rivers. Dr. Opdyke discussed the unique flow regime

of the Rio Grande and how the Upper Rio Grande BBEST is looking at potential agreements with Mexico and future changes in delivery time to potentially implement BBEST recommendations. Chairman Huston reminded all that the statute has specific provisions requiring the BBEST to develop flow recommendations that are consistent with the international treaty. Chairman Huston suggested considering time changes in releases as a potential strategy, but such action should not be assumed within the BBEST environmental flow regime recommendation report.

Cory Horan, TCEQ, relayed that the Lower Rio Grande BBEST has requested that a representative of Mexico attend future BBEST meetings for information sharing purposes. He noted that the Upper Rio Grande BBEST will develop their recommendations outside of any coordination with Mexico, but which might be used in future coordination efforts. Chairman Huston cautioned that the BBEST not stray from within the confines of the SB3 language regarding the International Treaty.

Brazos

SAC member Dr. Paul Jensen reported the BBEST was doing very well and presented an update on the BBEST activities from the last meeting held June 13, 2011. Members have made progress on choosing the period of record, selecting gages and defining seasons. He expects a presentation on the preliminary results at the next meeting of the BBEST on July 19, 2011. He added that the BBEST made a presentation to the BBASC at their meeting on June 28, 2011 in Waco. He was pleased with the results of the BBASC meeting which addressed organizational issues and included a presentation by the conflict resolution process. Dr. Opdyke added the HEFR analysis is going well. He noted that the BBEST includes three seasoned biologists which have experience on other BBESTs and have done a lot of work in the basin. He anticipates interesting results from the geomorphology efforts due to the high level of sediment transport found in the basin.

Geomorphology Subcommittee Report

Ward

Chairman Huston discussed the SAC subcommittee formed to revisit the Geomorphology guidance document. Dr. Ward presented an overview of the memo summarizing the results of the subcommittee. The subcommittee reviewed the guidelines and the role of geomorphology in defining habitat in the SB3 process. The subcommittee looked at how flows can modify geomorphology and focused specifically on sediment transport. Subcommittee members addressed the definition of use of effective discharge, use of geomorphology as an indicator, and recommended the SAM model as the desktop methodology. Dr. Ward referred to concerns with the BBEST reports from the Colorado/Lavaca and Guadalupe/San Antonio regarding interpretation of sediment yield calculations and their use in defining flow recommendations. The increased significance of geomorphology in the flow recommendations raised several questions related to effective discharge, equilibrium of the stream channel, use of "10% criteria", and predictable biological response to geomorphologic changes. The subcommittee suggested several actions for the SAC's consideration.

Members discussed the issues raised and suggested actions proposed by the subcommittee. Dr. Mark Wentzel, TWDB, recommended broadening the literature review to consider other criteria besides environmental flow such as channel design. He added that the 10% criteria

and SAM type of analysis are a “rule of thumb” used by the US Army Corps of Engineers. He considers the flow recommendations submitted to date are adequate to maintain the environment wanted by the BBEST given the channel does not change. Dr. Ward reiterated the subcommittee’s concern that over time, proposing quantitative criteria as a guideline has the potential of becoming more significant than a suggested guideline.

Members suggested additional work on the memo so the results of the review can be posted as an addendum to the guidance document for future reference. Any additional literature search will be done by SAC members with the assistance of TWDB staff so that the document can be published within the next six weeks. Chairman Huston asked for a progress report at the next meeting.

EFAG Meeting and Agenda

Chairman Huston announced that the date for the next EFAG meeting is September 8, 2011. The EFAG requested the chairs from the Colorado/Lavaca and Guadalupe/San Antonio Stakeholder groups present a brief overview of their comments on the BBEST reports for their respective basins at the September 8th meeting. The EFAG also requested an overview of the work plans submitted for the Trinity/San Jacinto and Sabine/Neches basins.

Chairman Huston said he met with the chairs of the Sabine/Neches BBEST and BBASC. BBEST and BBASC members received the SAC draft comments on the Sabine/Neches workplan, and are making a concerted effort to address these comments in their review. He asked the Sabine/Neches BBEST and BBASC to provide any response to these comments by August 15, 2011 so that a final SAC review document can be submitted to the EFAG by August 31, 2011.

He added that the EFAG anticipates having the workplan for the Trinity/San Jacinto by this meeting. The Trinity/San Jacinto stakeholders have asked the SAC to postpone any review of this document until the final workplan has been submitted. The BBASC has released the draft workplan to the stakeholders for review and will consider approving the workplan at their next scheduled meeting on August 3, 2011. It is anticipated that the workplan will be finalized, approved and submitted to the EFAG the first part of August. If the SAC is unable to complete a thorough review of the final workplan before the scheduled EFAG meeting, Chairman Huston expressed a preference to delay the review so as not to compromise the review because of the time constraints.

Chairman Huston noted the EFAG also requested a status report from the SAC and TCEQ.

Water Rights Advisory Group – Eflows Implementation

Brandes

Bob Brandes reported the TCEQ was directed to develop a guidance document on how the adopted environmental flow rules will be implemented. TCEQ is presently reviewing the comments. Mr. Brandes offered to forward electronic copies of the comments to interested members. He will keep the SAC abreast of the status of the draft guidelines and any other related developments.

Other Discussion Items

All

Chairman Huston summarized the upcoming tasks and reminded members that if the Nueces BBEST completes their report by September 1, 2011, the SAC should have a review of the BBEST recommendations by October 15, 2011. He asked for clarification as to when the Nueces stakeholders six month "clock" will begin if the recommendations are submitted as anticipated. Reports from the Brazos and Rio Grande are not expected until March, 2012.

Members discussed the status of the work plans for the Colorado/Lavaca and Guadalupe/San Antonio. Jennifer Ellis, NWF, reported that the Guadalupe/San Antonio anticipates having a preliminary work plan by September 1, 2011. Chairman Huston mentioned his discussion with Dr. Solis, TWDB, concerning SAC deliverables expected in 2012 and other potential expenditures for the 2012 fiscal year.

Public Comments

None

Next Meeting – Schedule (August 10, 2011 – TPWD) and Agenda

The next meeting will be on August 10, 2011 at TWDB, Airport Annex. The following meeting is scheduled for Wednesday, September 14, 2011 at TCEQ. The agenda for the next meeting will include a presentation on market approaches. Chairman Huston noted meetings could be less frequent after October.

Adjourn