

Instream Flow Advisory Group Meeting #3 Notes

OWRB, 3800 N. Classen Blvd., Oklahoma City

October 7, 2013, 1:30 p.m.

ATTENDEES:

Tom Elkins, Cherokee Nation
Tom Creider, OTRD/State Parks
Mike Mathis, At-large
Brooks Tramell, OK Conservation Comm.
Mark Derichsweiler, ODEQ
Charlette Hearne, OWRP
Jeff Converse, Canton Lake Assn.
Anna Childers, CH2M Hill
Forrest Olson, CH2M Hill
Brandon Brown (for Shannon Brewer), USGS
Jim Barnett, EFO
Beth Rooney, Spring Creek Coalition
Jennifer Owen, Spring Creek Coalition
Nathan Madenwald, OKC
Bud Ground, PSO
Tyler Powell, OK Sec. of Environment
LeeAnna Covington, OK Farm Bureau
Julie Cunningham, OWRB
Bill Cauthron, OWRB

Lindy Clay, OWRB
Jason Childress, OWRB
Rebecca Veiga, OWRB
Lynda Williamson, OWRB
Darla Whitley, OWRB
Mary Nell Bruggen, OWRB
Brian Woodard, OIPA
Angie Burckhalter, Devon
Rick Wicker, OWRB
Owen Mills, OWRB
Bryan Mitchell, CH2M Hill
Derek Smithee, OWRB
Jason Childress, OWRB
Terri Sparks, OWRB
Perry Soltani (for Marsha Slaughter), OKC
Marla Peek, OK Farm Bureau
John Rehring, Carollo
J.D. Strong, OWRB

[bold font indicates Advisory Group members or their delegates present for this meeting]

Welcome

OWRB Executive Director J.D. Strong made opening remarks and asked participants to introduce themselves. John Rehring, Carollo Engineers and meeting facilitator, went over the Agenda and gave a brief summary of the previous meeting.

Baron Fork ISF Case Study *(for PowerPoint presentations, refer to ISF webpage:
<http://www.owrb.ok.gov/supply/ocwp/instreamflow.php>)*

Brief History of the Baron Fork Creek Instream Flow Provisions: Derek Smithee, Chief, OWRB Water Quality Division, discussed Baron Fork's status as a scenic river and went through a chronology of various instream flow provisions applied to the Baron Fork and changes in methodologies since the OWRB Board adopted the first related policy in 1981. While the earliest instream flow provision was apparently set to protect lake levels/prior rights at Lake Tenkiller, the latter provisions were in response to permit applications filed by Adair County RWD #5 for direct diversions from the Baron Fork for public water supply.

In response to a question, Mr. Smithee indicated that the change in 2003 from the technical committee's recommended limit of 35 cfs [i.e., diversions from the Baron Fork were to be restricted when flows went below this number] to 50 cfs was somewhat political [see slide 16]. However, he emphasized that the Board originally favored a 35 cfs limit because they were being conservative, not necessarily because it was a precise technically-derived number. He went on to explain that the numbers were based on figures derived from a study completed by Dr. William L. Fisher in 2000 using an IFIM methodology, with results supporting a range of low-flow limits from 30 to 75 cfs.

General discussion pursued about why some of the numbers were chosen and how they were derived. Mr. Strong followed up by noting that there is really no one correct number; many factors come in to play and the final decision would probably be as much policy-based as science for any instream flow decision anywhere in the United States.

OWRB Permitting Protocol for Recreation, Fish and Wildlife: Rick Wicker, OWRB Permitting Section, discussed the protocol followed by staff in processing permits for recreation, fish and wildlife (RFW) purposes. He noted that there were four kinds of RFW permits issued based on standard industrial classification codes and gave examples of permits issued and amounts under the different classifications.

Several questions followed concerning how the permitted amount of water varied, especially in the case of the Tishomingo National Wildlife Refuge. [This application requested all of the remaining available water in lower Pennington Creek in order to keep the Cumberland Pool filled.] Mr. Wicker stressed that the application was filed in 2005 and has not been approved pending receipt of additional justification.

Another person questioned whether landowners adjacent to a creek could apply for all the water in the creek for fish and wildlife purposes. Mr. Wicker indicated that there is not a precedent for such an application, and an instream flow study would probably need to be completed. Many factors would have to be considered to determine how much water was actually needed for such purposes. He noted that it is up to the applicant to provide justification for the amount of water being requested.

Review of Instream Flow Methods and Application to Baron Fork Creek: The final presentation, given by Forrest Olson, CH2M Hill, summarized the results of his review of instream flow methods and application to Baron Fork Creek. Mr. Olson emphasized that there is not a single answer to questions such as "How much water do fish need?" Rather, "instream flow issues are matters of values more so than science." Mr. Olson provided background on principles critical in considering alternative instream flow regimes and briefly summarized the types of instream flow methods. He also summarized the results of various instream flow methods which were applied to the Baron Fork Creek [see Slide 21].

Mr. Olson was asked to elaborate on how drought conditions can be predicted. He indicated that many western states rely on snowmelt from the mountains to feed streams and rivers. If there is low snowpack in the winter, then you can assume the rivers will have decreased streamflow in the summer. The snowpack relationship may help predict droughts in a large stream like the Arkansas River but not in the other smaller streams in Oklahoma.

Mr. Strong noted that the IFIM flowchart [refer to Slide 15] shows a process, not just looking at fish habitat, thus bringing in all considerations and concerns in an effort to provide more balance on water issues. Derek Smithee said that some states set instream flow requirements using a single number, such as 30% of mean annual flow, to make the process less complicated, but then usually provide an opportunity to do more detailed studies, such as an IFIM.

Discussion/Questions: Mr. Rehring then indicated that the Agenda allowed time for additional discussion and questions, which are summarized below:

- Was there any follow-up to see whether diversions on the Baron Fork (specifically Adair County RWD #5's) ceased when the gage at Eldon dropped below 50 cfs?
 - Julie Cunningham, Chief of the OWRB's Planning and Management Division, said that permit compliance relied on self-monitoring like other water right permits. She noted that if there were any complaints or allegations that the District was using water contrary to their permit conditions, the OWRB would investigate and could enforce the permit. However, there have not been any such complaints to her knowledge.
 - It was noted that all permit holders must, by statute, report their annual water use to the OWRB.
- Was there any economic impact analysis conducted regarding how Adair RWD #5 would meet their water demands when diversions were restricted?
 - An economic analysis of alternatives was conducted when the limits on diversions were first considered, with a conclusion that off-stream storage would be the best approach to providing supplies under such conditions. OWRB staff will check files and put any information found on the instream flow website and/or e-mail.
- We would like to know the economic impacts of a minimum instream flow limit, i.e., tourism impacts.
 - This is one of the parameters we would want to evaluate with a watershed-specific pilot study.
- CH2M Hill's report shows that the domestic use set aside would not provide as much instream flow as might be recommended by various methods. Therefore, we cannot assume that the domestic use set aside meets instream flow needs in every basin. It may or may not provide sufficient instream flow in other basins.
 - However, it was also noted that the degree to which domestic use set aside meets the agreed-upon target would depend on the instream flow requirement you set through a combination of technical analyses and policy decisions.
- Perhaps all the questions and concerns show why a pilot study would make sense.
- A process needs to be developed for a pilot study in the Baron Fork, from start to finish, which includes monitoring.
- Should we expand the pilot study to rivers other than the Baron Fork, such as the Illinois which is facing faster growth, has impoundments, wastewater discharges, etc? Then the pilot could address a bigger array of issues in a basin with greater population and potential impacts on consumptive users, rather than the limited ones encountered on a stream such as the Baron Fork.
- What is the idea of a pilot study? Is it to develop a process? The Baron Fork does not have a lot of issues, so it won't help address various issues that we see elsewhere.
- While the Illinois may be more complicated, it is certainly less complicated than many other basins in other parts of the state.
- We still have not determined that there is even a need to look at instream flow provisions. How do we determine if there is a need?
 - The impacts of having, and not having, an instream flow program can best be evaluated in the context of a specific basin. A pilot study would help assess those.
- Maybe we could look at what might happen if there were no flows in several basins, as shown in the OCWP surface water shortage analyses; we could use the Oklahoma H2O Tool to run some different scenarios.

Path Forward: Status and Next Steps

John Rehring went over the OCWP Priority Recommendation for instream flows, briefly noting the steps in the path developed by the previous instream flow work group that have been fully or partially accomplished and those that have not. After some discussion, J.D. Strong suggested that we should be more concerned about developing a process, such as shown in the IFIM flow chart presented by Mr. Olson [Slide #15], rather than developing a specific number. He suggested developing a process for a pilot study which incorporates a process for addressing any outstanding concerns/issues, including economic impacts associated with the setting of instream flow requirements in Oklahoma. It was agreed that OWRB and consultants would develop a suggested piloting approach/process for review prior to the next instream flow meeting, which is tentatively scheduled for January 2014. The process should be geared toward assessing the list of benefits, issues, and concerns identified in previous meetings by the Instream Flow Advisory Work Group. OWRB staff will also distribute the Corps of Engineers' study on alternative water supply for Adair County RWD #5 if it is available.

Public Comment

Representatives from the Spring Creek Coalition voiced their concerns that diversions from Spring Creek [Grand River Dam Authority jurisdiction] by Peggs Water Company would adversely impact the stream flow.