

Safe Yield Meeting #2 Summary

February 18, 2020

Alex Butler (SCDHEC): Welcomed group. Agenda setting items. Follow up from last meeting: only DNR submitted alternative method for discussion for Meeting 2. DNR will present their method.

Timeline Ahead:

March 17: Evaluation of Alternative Calculations

April 14: Discussion-Wrap Up

May 15: Summary Report

Attendance:

Alex Butler: SC DHEC

Leigh Anne Monroe: SC DHEC

Jocelyn Brannon: SC DHEC

Kristy Ellenberg: SC DHEC

Alex Pellett: SC DNR

Frank Eskridge: Columbia Water

Hugo Krispyn: FRED, ERK

Greg Carbone: USC

John Baker: International Paper

Jesse Cannon: Santee Cooper

Tommy Lavender: Attorney, Chamber of Commerce

Charles Wingard: Farm Bureau

Jill Miller: SCRWA

Scott Harder: SC DNR

Jeff deBessonnet: WEC

David Wilson: Farm Bureau

Mike Caston: Citizen, Retired SJWD

Doug Busbee: Citizen, Aiken County

Rebecca Haynes: CVSC

Jeff Allen: Clemson

Eric Krueger: TNC

Courtney Kemmer: SC DHEC

Rob Devlin: SC DHEC

Lance Foxworth: SC DHEC

Reminder of Goal: To evaluate safe yield and what the Department should consider as possible alternatives. Any decision will have to come by a regulation change; not a law change.

Alex Butler (Slides): A refresher on focus of workgroup. Here to discuss safe yield and what SC DHEC would have authority to change in regulations. Not: IBT, exemptions, permit duration, grandfathered permits, etc. SC DNR, the Water Planning Process, and the Legislature are the entities to deal with law changes and other concerns regarding Surface Water Withdrawal Act. Focus is on how water is managed the majority of the time; not based on extreme circumstances (ie. Drought Act)

Workgroup Assumptions:

- Changes to the SY calculation may cause stream segments to become over allocated
- No SY calculation can guarantee MIF will be present 100% of the time
- Changes to the SY formula will not impact existing permitted users or registrations

Assumption Proposal and Discussion: *A statewide formula may not be tenable. Stream classification is varied across SC and one formula may not be the best way to evaluate every stream. Does law/reg allow for this? Is this an assumption or a scientific argument standard?*

Alex Butler (slides): How alternatives will be evaluated.

- Is it allowable under current law?
- Is it scalable to statewide permitting process?
- Is calculation protective of the resource, while still allowing for use of the resource, across varied stream types?
- Can the evaluation be done given the Departmental Resources? (*staff of 2*)

Rob Devlin: Remember, Dr. Marcus (BOW Chief) stressed, "If we do something different, then it has to be better. Not just different."

Discussion on Safe Yield Formula: *Statewide or basin type formulas? Over vs under protective? Difference in nature of flow dynamics could affect outcome of formula. The right formula should take into account these differences, however. Some states have different management systems based on parts of the state. DHEC already operates one-size fits all permitting programs in the state. I'll push back on that. Just because we have one size fits all in other programs in DHEC doesn't mean we can't evolve beyond that. Site specific studies?*

Alex Butler: if the onerous is on Department, that might not be able to be done effectively. Remember scalability, and that we have two staff dedicated to program. Refocus. Introduces Rob Devlin for presentation.

Rob Devlin (slides): Presentation on the three categories of permits/registrations (New Permits, Grandfathered Permits, and Registrations). Rob briefs on other water quantity programs in division and historical information. Surface Water Regulation history and a breakdown of number of each of the three surface water withdrawal category types. The following information is discussed for the three categories: permit duration, permitting amount basis, public notice, MIF requirements, reasonableness criteria, safe yield applicability, operation/contingency plans.

Discussion on Rob's Presentation: *Conversation on how gauges are used in permitting and SWAM Model. Also how would a monthly breakdown on a permit be checked/enforced? Percent of withdrawers we have control over is 4%. How much can we really do without a law change? Is the squeeze here worth the juice? We are trying to prepare for the future. Not trying to fix any permitted problems currently. **We cannot deal with law changes in this group.** One outcome of this meeting is that there is no real good way to do this in this setting. My hope, has always been, with all these stakeholders, that part of the process, is that we say these are the recommendations we have. Clarity surrounding this law in just this inner stakeholder group has improved drastically. Imagine how unclear it is for those outside of this group.*

Alex Pellett (SC DNR; Presentation and Comments): The law does specify a safe yield calculation. It says safe yield is excess of MIF, so Safe Yield = current streamflow - MIF. This means safe yield is not a static number. It is a dynamic number. The regulatory safe yield does not reflect the definition in the law. The law says leave 20%, the reg. says you can take 80%. Remember, streamflow is usually not a 100% average during the summer. BUT, safe yield itself is defined in relation to MIF. The last line in the legal definition of MIF refers to specific part of act that has big implications: MIF is only thus defined for new permits, not registrations or grandfather permits. MIF, if you go back to safe yield definition, then it means MIF for registrations is undefined. The way the regs are applied right now, I don't see anything preventing a new upstream registration from causing a shortage for a downstream registration.

Discussion on DNR Comments: *Safe yield seems to be a misnomer. Group agreement. With new upstream permits, has potential to affect grandfather permits/registrants downstream? Even with water that might not be available? That's the difference, the law cares little about flow, it is just about legally available water. That is hard to describe safe for yield. DNR decided going back that the 20, 30, 40, the best information at the time, that it would be protective. Now you're saying that it's all BS cause of this line in the reg. It is disappointing.*

<Break>

Alex Butler (slides): Alex presents graphs for alternative calculations on state gauges. The slides will be provided. Alex presents Edisto basin scenarios as examples. Alex presents on percentile method.

Discussion: *Allocated vs. used water and the effects that has on permitting decision and assumptions made about withdrawal. DHEC is obligated to protect existing users and amount allocated to them. Edisto July example discussed in depth. Implications of scenario on upstream users from Charleston intake. Changes in industry and practices have shifted from when laws like this were written, such as industry installing its own water plants vs. locating where water delivery infrastructure already exists. This is a finite resource. We know the days are coming when we have to say no. Whether for a day, or a period of time, to eventually just saying no year round. Concerns and conversation about withdrawers and water security, especially water they are already allocated; not giving it up. Department can bring withdrawers to conversation about reducing permit amounts but no authority to actually do so; cooperative, not coercive. Conversation about how state is not actively managing the water.*

Alex Butler: Remember, we are not here to change any laws. We have to stay focused on purpose of this group. Returns to graphs and discussions on them.

Discussion: *Give safe yield a science basis. Ecological basis. Science is the opposite of the law here. Reconcile science and law is important, but that's a long way to go. Looking for an incremental improvement. Eric's group is looking bio-flow standards and a wholistic standard. The 20 30 40 and 20 30 60, that rubric was developed on ecology and flow science of the 80s. Things have come along way and there is a lot of advance in those relationships. We can't do anything worthwhile with the tools available to us here. We may find we can't do anything. this is a good interdisciplinary group. Should we put it on paper and be willing to sign in on it and on paper about our thoughts here. We can have a good statement with some effect to help DHEC instead of leaving them out in the wind. To what extent are these formulas we are discussing arbitrary calculations and to what extent are they based on science? To what extent are we deciding here based on who might be affected instead of what is protective of the resource?*

Action Items:

- Workgroup should submit any new alternative calculations by March 3rd.
- Those interested in law changes: get involved in DNR Water Planning Process (PPAC)

12:02PM Adjourn