



# Final Discussion and Development of Plan Recommendations

# Survey Questions

**Implementation Funding.** The Legislature should fund and SCDES should establish and manage a grant program to help support the implementation of the actions and strategies identified each RBC's River Basin Plan. One example is Georgia's Regional Water Plan Seed Grant Program which supports and incentivizes local governments and other water users as they undertake their Regional Water Plan implementation responsibilities.

12 FOR  
0 AGAINST



Approved by  
Consensus

# Survey Questions

**Promoting Resilience.** The RBC encourages utilities to build resilience to ensure adequate quantity of water through identification of alternative sources including interconnections.



Approved by  
Consensus



## Survey Questions

**Regionalization.** The RBC encourages consideration of regionalization opportunities among water utilities. Regionalization is one tool to better manage the availability of water resources and build resilience.



Suggestion: Parallel AWWA's **Water 2050: One Water Governance** language <https://www.awwa.org/water-2050/governance/>

**Regionalization.** The RBC encourages consideration of regionalization opportunities among water utilities around watersheds. Regionalization is one tool to better manage the availability of water resources and build resilience.

Majority Recommendation (not consensus)



# Survey Questions



**Ensuring Growth Doesn't Outpace Water Availability.** Amend the building permitting process in counties and municipalities to require developers work with water utilities to ensure adequate water availability.

## RBC member comments:

- Before a developer can develop in our area, they are required to get an ability to serve letter which requires the developer work with the utility.
- How will we accomplish this? Each jurisdiction must take policies to their own governing bodies.

**Decision made to remove**



# Survey Questions

**Land/Water Management Laws, Regulations, Policies, and Manuals.** To better manage runoff, encourage infiltration, and reduce sedimentation, the RBC recommends that SCDES perform a benchmark analysis of our statewide water law, regulations, policies, and manuals including but not limited to:

- riparian buffer protection
- aquatic resource alterations
- mass grading construction activities
- other land disturbance activities including small-scale construction, and
- the Storm Water Management BMP Field Manual.

Documents should then be updated/condensed to eliminate redundancy and inconsistencies while incorporating recommendations from each RBC and industry standards. The result should be easily accessible as a guideline for local governments.

**6 FOR**

**2 AGAINST**

**4 FURTHER DISCUSSION  
IS NEEDED.**

**REVISIT IN JANUARY**

## **RBC Comments:**

- Edit and combine this and the “local govt call to action” rec.
- Unsure what “benchmark analysis” means. Benchmark against who?
- OK if riparian buffer requirements and other “green” practices would only apply to new, permanent land disturbing activities and would not be required on agricultural operations.



# Survey Questions

Upon completion of the statewide assessment of land/water management laws, regulations, policies, and manuals, the RBC requests a call to action to each local government within the basin to review and update their ordinances and design guidelines to be concurrent with the State recommendations. Examples include promotion of:

**Riparian Buffers** - A vegetated area of land that is adjacent to a body of water. Riparian buffer help filter pollutants from runoff, reduces erosion, stabilizes streambanks, reduces flooding, and provides valuable riverside habitat for native plant and animal species.

**Green Infrastructure** - The Water Infrastructure Improvement Act of 2019 by the 115th Congress defines green infrastructure as "the range of measures that use plant or soil systems, permeable pavement or other permeable surfaces or substrates, stormwater harvest and reuse, or landscaping to store, infiltrate, or evapotranspire stormwater and reduce flows to sewer systems or to surface waters."

**Tree ordinances** that evaluate tree canopy coverage as a stormwater mitigation tool. Consideration to the Green Infrastructure Center and the US Forest Service's Southern Region Trees 2 Offset H2O studies as a starting point is recommended.

6 FOR

1 AGAINST

5 FURTHER DISCUSSION IS NEEDED

REVISIT IN JANUARY

## RBC Comments:

- Edit and combine this and the "Land/Water Management Laws..." rec.





## RBC Member Suggestion for Combining the Last Two Recs:

**Land/Water Management Laws, Regulations, Policies, and Manuals.** To better manage runoff, encourage infiltration, and reduce sedimentation, the RBC recommends that SCDES perform a benchmark analysis of our statewide water law, regulations, policies, and manuals including but not limited to:

- riparian buffer protection
- aquatic resource alterations
- mass grading construction activities
- other land disturbance activities including small-scale construction, and
- the Storm Water Management BMP Field Manual.

Documents should then be updated/condensed to eliminate redundancy and inconsistencies at the state level while incorporating recommendations from each RBC and industry standards. The result should be easily accessible as a guideline for local governments.

Upon completion of this statewide assessment of land/water management laws, regulations, policies, and manuals, the RBC requests a call to action from SCDES to each local government within the basin to review and update their ordinances and design guidelines to be consistent with the State recommendations. Examples include the promotion of riparian buffer protections\*, green infrastructure\*, and tree ordinances\* that evaluate tree canopy coverage as a stormwater mitigation tool.



# A Separate RBC Member Suggestion:

**Land/Water Management Laws, Regulations, Policies, and Manuals.** The RBC recommends:

- A state-wide riparian buffer law (see next slide)
- Local jurisdictions adopt riparian buffer ordinances
- Land disturbance permits be required for over 5,000 sq ft of disturbance
- Stormwater regulations be revised to minimize increase in stormwater runoff volume from construction sites
- Tree ordinances be adopted
- Requirements for open space protection be adopted
- Green infrastructure in development designs be incentivized
- Local funding source for land conservation be developed



# RBC Member Suggestion for Statewide Riparian Buffer Law:

Riparian buffers are naturally vegetated areas next to streams, rivers, and wetlands that provide a number of valuable services, including:

- Temporary storage of floodwaters
- Streambank stabilization and erosion control
- Water quality and source water protection
- Sediment trapping and other pollutant removal
- Protection from stormwater runoff
- Shade and temperature control
- Fish and wildlife habitat and food source
- Groundwater infiltration

Riparian buffer requirements are absent at the state level in South Carolina and are fragmented across local jurisdictions. Protection of riparian buffers is needed to ensure the function of these critical water resources and to help build watershed resiliency. We recommend a statewide riparian buffer law that requires a minimum riparian buffer width of 50 feet for all Waters of the State. Consideration may be given for additional riparian buffer protections for larger streams and rivers to protect floodplain areas, for sensitive aquatic habitats like trout waters, and for other specific circumstances.

# Common RBC Recommendation “Themes” in the Policy, Legislative, and Regulatory Category


# Save Our Saluda Proposed Recommendations

- Require permits statewide for all existing and new water withdrawals over 3 MGM, including those before 2011 and all registered users. All users must be evaluated for reasonableness and must meet minimum instream flow (MIF) requirements
- Remove “safe yield” (SY) entirely as a metric in the SC water withdrawal law and implementing regulations.
- Revise minimum instream flow (MIF) standards based on best available science to adequately protect designated uses and recognize regional differences.

*These were proposed as a package*



# Reasonable Use

-  The South Carolina Surface Water Withdrawal, Permitting, Use, and Reporting Act should allow for reasonable use criteria to be applied to all **new** surface water withdrawals, like those that currently exist for groundwater withdrawals.

Adopted by the B, US, LSS, PD and E RBCs. The US specified “new” surface water withdrawals.

12 For

5 against

3 abstain

*Decision made to including recommendation, based on majority vote*



# Reasonable Use in Groundwater Regulations

1. Based on the current and/or proposed withdrawal rates, provide reasonable and appropriate documentation that the proposed water use is necessary to the anticipated needs of the applicant to include, but not limited to, the following:
  - a. **Public Water Supply**- by system, population served, anticipated growth, annual water use statistics (e.g., monthly average, peak summer/winter consumption);
  - b. **Industrial Water Supply**- by industry type, anticipated growth, and annual water use statistics (e.g., monthly average, peak summer/winter consumption);
  - c. **Irrigation Water Supply**- irrigated acreage, major crops (with irrigated acreage for each crop), water use by crop (per acre), calculated irrigation requirement (including available precipitation), critical period growth requirements, growing season, and nutrient and pest management strategy;
  - d. **Golf Course Irrigation Water Supply**- irrigated acreage (differentiating actual golf course areas and aesthetic landscaping), water use per acre, calculated irrigation requirement (including available precipitation), annual water use statistics (e.g., monthly average, peak summer/winter consumption), and nutrient and pest management strategy;
  - e. **Aquaculture Water Supply**- pond capacity (acre-feet), make-up water requirement, drain-fill periodicity, (e.g., monthly average, peak summer/winter consumption).

# Improve Laws to Allow for Effective Management



- Improve the current laws that allow for regulation of water use so that they are enforceable and effective. The current water law, which grandfathers most water users, needs to be improved to support effective management of the state's water resources.

Adopted by the US, LSS, and B RBCs

11 for

5 opposed

5 abstain

*Decision made to including recommendation, based on majority vote*



# Permits and Registrations

- **Water law and implementing regulations should not distinguish between registrations and permits.** All water users that withdraw above the identified threshold should be required to apply for a water withdrawal permit. Current law allows for agricultural surface water users and all groundwater users withdrawing water outside of CUAs to register their water use rather than apply for permits.

**Adopted by the Broad RBC and a slim majority of the Edisto RBC. The Edisto RBC rec simply said that “*all water withdrawer should be subject to the same rules*”**

**8 For**

**8 Against**

**3 abstain**





# Alignment with Existing Water Plans

- The water withdrawal permitting process should specifically assess the permit application's alignment with the current River Basin Plan, particularly regarding proposed withdrawals, returns, resource conservation, and drought response.

Adopted by the B RBC



- The water withdrawal permitting process should specifically assess the permit application's alignment with the legislatively-approved State Water Plan.

Adopted by the US and LSS RBC



# State Support for Water Education Programs



- The State should support and fund RBC-led and statewide water education programs that include all sectors of water use and promote the types of water management strategies recommended in River Basin Plans. The RBC can provide guidance on topics that are important.

**12 FOR 0 AGAINST 5 ABSTAIN (was also adopted by the US and PD RBCs)**



- The Saluda RBC will support and promote outreach and education to increase awareness with the general public around watershed-based planning (as read out loud by Katherine during the meeting)

**12 FOR 0 AGAINST 6 ABSTAIN**

*Decision made to including recommendation, based on majority vote*



# Collaboration to Educate About Water

What is the RBC's role and SCDES's role in education and citizen science initiatives and how can those be funded? How can we build off existing success (like adding CMOR to Adopt-A-Stream?)

- CoCoRaHS? – promote this citizen science tool? It's already being widely used in SC – not sure who is already promoting this <https://maps.cocorahs.org/>
- Photo comparison with QR coded sign? <https://www.chronolog.io/> Consider pilot at Unity Park with City of Greenville/Friends of the Reedy River.
- Statewide educational strategy? – We could consider endorsing several specific educational tools and determine our role in getting the word out (<https://www.projectwet.org/>)
- The city of Greenville has a stormwater credit policy (NOTE – Friends of the Reedy River is going to help them update this policy during the FY24/25 fiscal year. The current policy endorses several educational tools – I'm sure that list will be updated. <https://www.greenvillesc.gov/DocumentCenter/View/1265/Stormwater-Fee-Credit-Policy-PDF?bidId=>



# “Last Call” Recommendation Ideas

# Flow Statistics

Is there value in a periodic review of basin flow characteristics (over a more condensed recent past ~30ish years)?

Does 7Q10 really make sense as we plan for the future, especially as we consider the distant (75+ year) past data?

Stream and river systems change over time, if we are incorporating stream data within the 7Q10 analysis that experienced significant change (installation of a dam, channel straightening, significant land use change) are we really getting an understanding of what could be the future flow?

Use of median flow rather than mean for water allocation...

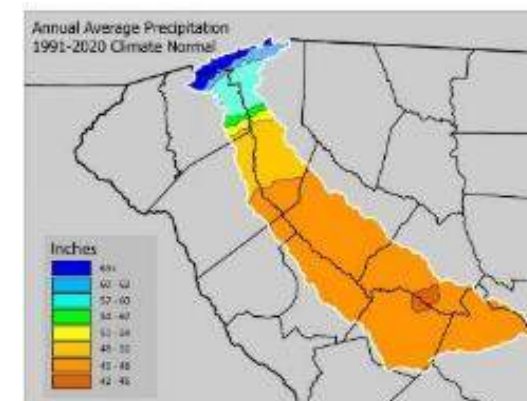
## RBC DISCUSSION NOTES

- There was discussion regarding a recommendation about focusing the analysis using hydrologic data from only the past 30-years, recognizing that land use changes and climate trends over the last 30 or so years may be more useful for modeling purposes, than using hydrologic data from 30-90 years ago.
- The September RBC meeting will resume with this discussion.



# Potential Data Gaps to Fill:

- Better understanding of agricultural resilience with their farm ponds?
- Better understanding of the “non-consumptive” users and the quantity returned to the system?
- What data in SWAM is the most inaccurate? How can we fix that through better data gathering?
- How can we think forward about water quality concerns and gathering data that benefits both quality and quantity implications and is more efficient?
- Data transparency for allocated versus used for water permit holders
- Data transparency for both groundwater and surface water withdrawal reporting with a clear list of who is compliant for users withdrawing greater than 3 MGM.
- Would data from those withdrawing less than 3 MGM be helpful?
- More sampling? – what and where?
- A lot of gaps in this report – how often could this be updated? Needed? Changes to it?  
<https://des.sc.gov/sites/des/files/media/document/Safe%20Yield%20Report.pdf>
- We have little data on flow characteristics, and the tributaries midway and lower in the basin have substantially lower annual rainfall than the headwaters (see map).





## Data

Could SCDES improve upon the SC Watershed atlas to include additional permit/registration information including violations, consent orders, consent decrees, for public consumption and transparency?

## Collaboration

Did we experience anything with the recent drought this summer and subsequent heavy rains from Debby or Helene that should aid us in considering any specific recommendations?

Cross basin collaboration. Who, what frequency, intent – we talked about this at the June meeting but need to further develop.