

Water Issues

Following is a list of water issues, most of which deserve discussion. The Water Assembly needs to select a few of them for the initial debate sessions.

1. **96 Hour Rule** – The State Engineer currently requires the release of any captured rainwater within 96 hours, so as to make sure that the greatest possible flow reaches the streams for downstream and interstate users. This prevents harvesting and other local uses which might be more productive. Explore the impact of the 96 hour storm water retention limit on surface water resources and storm water quality. Should the State lengthen the time interval or remove the inhibition altogether?
2. **One-to-one Return Flow Credit** –For pumping ground water into the river, entities are granted a full return flow credit for the pumped water. Because such pumping allows additional seepage depletion of the river, is this a wise method of accounting?
3. **Aquifer Depletion Rate** – State Engineer rules in the Rio Grande allow users to deplete the aquifers by 2-1/2 feet per year. Since ground water is a finite resources, the policy allows total emptying of the aquifer over time. Is this regulation overly short sighted, supporting current interests at the expense of future disaster?
4. **Subdivision Decision Making** – Should the State establish a mechanism to link subdivision decision making to local and regional water plans? For example, identifying ways that subdivision planning could be linked to water planning to assure that development was consistent with water resources.
5. **OSE/MRGCD Disconnect** - How should the State Engineer collaborate with the Middle Rio Grande Conservancy District on their respective data sets to ensure users of District water actually have legitimate rights that have not been sold or leased and that priorities are properly enforced?
6. **Water Mining** – Should the State allow aquifer depletion by ground water users, especially large users? Or should it require users of ground water to keep the aquifers (like the rivers) whole? Explore how the mining laws, and in particular the 1980 Mine Dewatering Act might be modified to limit mining of ground water resources
7. **Aquifer Storage and Retrieval** – Should the regulations encourage using the aquifers as reservoirs? If so, how should this happen, in the context of water quality issues, interstate Compacts, and ownership identification for the stored water? Explore ways of conducting aquifer storage and recovery that are consistent with ASR regulations and can be used to promote subsurface storage of surface water. Identify obstacles that limited success of ASR during Bear Canyon Arroyo pilot project.
8. **Shortage Sharing** - Explore opportunities for share shortage agreements during drought conditions in non-adjudicated basins.
9. **Allotment Adjustments** - Begin a dialog with middle Rio Grande Pueblos on water allotments to Pueblos, irrigators, and municipalities.
10. **Transfer Allocation Procedures** - Explore water allocation procedures (markets, leases, sales) for transfers of water within the middle Rio Grande
11. **Agricultural Conservation Incentives** – Explore mechanisms that create incentives for conservation of agricultural water while protecting irrigators' water rights.

12. **Rights vs. Votes Conflict** – Most senior water rights are held by relatively few people in the rural areas of the State. Most votes are held by the many people in urban areas. This increasing mismatch between votes and ownership will eventually lead to constitutional or price-of-water conflicts between the two groups. What should the State do to head off or react to such a crisis?
13. **Economic Growth vs. Water Limits** - How should water availability or lack thereof affect the State's economic growth? And why is that true?
14. **Acceptable Cost of New Water** - It's been said that New Mexico can get plenty of additional water to meet population growth, if individuals and businesses are willing to pay enough in cash, and in energy, for it. Up to how many times current prices should New Mexico consider an acceptable ceiling for evaluating the practicality of exploiting new potential water resources? And why is that amount the limit?
15. **The Existing Dedications Problem** - Junior water users, mainly cities, have permits to pump groundwater along the Rio Grande on the promise that they ultimately purchase and retire senior surface water rights (i.e., agricultural rights) when the effect of their pumping ultimately reaches the river. State and other experts have claimed that not enough acres exist in irrigation (even counting Indian acres) to meet those long standing, outstanding promises. What should the State do to address this problem?
16. **Population Growth vs. Water Limits** - How should the State Water Plan policies reconcile continued population growth with limited water resources? And why is that the best approach?
17. **Water Transfer Priorities** - Should the State Engineer be intensely bound to take "public welfare" into account in his decisions to allow transfer water from surface, weather-dependent agricultural use to 24/7 urban groundwater use? Or should market-driven transfers of water rights be "expedited" to accommodate population growth and maintain farmers' ability to sell water rights easily? What policies will be put in place to balance these conflicting priorities?
18. **Rural/Urban Competition** – Should it be State policy to pump and/or pipe agricultural water from distant rural areas of the State to feed centralized growth in urban demand? Or should the State's policy be to inhibit such transport of water? And why is that a good approach?
19. **Climate Change** - What specific major steps (if any) should the State take now to ameliorate future climate change effects on water for the citizens of New Mexico? And why should we select those?
20. **New Business – Local vs. Imported** – Besides their direct water use, imported businesses also tend to import people as workers, thus raising water demand. What fraction of the State's economic development funds would New Mexico's water management practices recommend be allocated for importing new businesses vs. fraction being allocated to establish or support new local businesses? And why is that the best ratio?
21. **Ecological Rights to Water** - The State's "prior appropriation" water allocation system fails to explicitly provide water for critical ecosystem needs such as habitat and river health. What should the State do to address this omission?
22. **Conservation** - Since conservation is one of the easier ways to augment water supplies, what specific steps at the State level, such as changes to building codes or rationing criteria, should New Mexico's water management practices recommend?

23. **Water Quality** - More citizens are relying on river water as a source for drinking water. Concerns are rising as to its quality, particularly because of trace pharmaceuticals. What additional actions should be taken so as to assure the citizens of sufficient water quality?
24. **State Engineer** - What primary attributes or characteristics should be declared and/or legislated for selecting the State Engineer? And why are these characteristics the primary ones?
25. **Water and Water Rights Accounting** - There is a range of positions between laissez-faire (let each entity in the State do water accounting its own way) and having the State dictate and enforce a set of accounting practices and their transparency levels for all entities to use. To where, along this spectrum line, should the State strive to move?
26. **Energy-Water Nexus** - How should the State's need for energy and tax receipts from energy development and production be balanced against the impacts of energy development and production upon water uses and supplies?
27. **Adjudication** – How and, more importantly, when should the State address the adjudication of water rights in the un-adjudicated portions of the State (esp. middle Rio Grande)?
28. **Consistency of Planning** – There is a pervasive lack of linkage among plans across the State.. Virtually no water (and non-water) plans take cognizance of other plans – higher/lower level plans, adjacent same level plans, water/non-water plans, agency-a/Agency b plans etc. What should the state do about this lack of connection?
29. **Effectiveness of Planning** –Implementation and compliance with water (and other) plans is almost always voluntary. The result is plans frequently just sitting and gathering dust on a shelf. What should be done about this pervasive irrelevance of plans?
30. **Water and Land Use Disconnect** – Decision about water use and about land use are made by different agencies and usually with each decision type / agency ignoring the other. What should be done about this disconnect, and by whom?
31. **Long/Short Range Thinking** – Some folks think we should exploit water (and other) resources for the present. Others feel we should limit current uses so as to protect future uses. How should the State address this inequality of thinking in making its decisions?