



PO Box 466 • Moab, UT 84532 • 435-259-1063

February 4, 2018

To: Bureau of Reclamation

RE: Water Rights Exchange Negotiations for Lake Powell Pipeline, Contract No. 17-WC-40-656 and Water Rights Exchange Negotiations for the Green River Block No 17-WC-40-655

Dear Esteemed Employees at the Bureau of Reclamation,

Thank you for the opportunity to provide comments on the Water Rights Exchange from Flaming Gorge to Lake Powell for the Lake Powell Pipeline and for the Green River Block.

Living Rivers is a nongovernmental organization whose mission is to restore the biological integrity of the Colorado River. We have been working on Colorado River issues since our founding in 2000 at Moab, Utah, which is next to the Colorado River and 60 miles above Lake Powell. Moab is the County Seat of Grand County, and the western boundary is formed by the Green River. The Green River provides water for agriculture in Grand County, and also to the Department of Energy's Uranium Mill Tailings Remediation Action (UMTRA) site near Crescent Junction. Proposed extraction projects in Grand County include potash, bitumen (tar sands), and kerogen (oil shale) would unwisely consume, in these water scarce times, the entire proposed allocation for the Green River Block.

We are writing to draw your attention to major discrepancies between credible predictions for streamflow in the Colorado River basin and the water rights on paper that Utah Division of Water Resources holds for the Lake Powell Pipeline and for the Green River Block.

It is widely accepted in the scientific community that increased temperature and evaporation will increase drought severity in the Colorado River basin in the near future. For example, we encourage you to read *The twenty-first century Colorado River hot drought and implications for the future* by Udall and Overpeck. This 2016 study lays out a strong prediction, based on conservative data, that Colorado River streamflow at Lee's Ferry will likely decrease by 20-30% by mid-century. The baseline is data from 1906-1999, which averaged 15.2 million acre-feet per year. Since 1999, streamflows were reduced by 19%. In response to pending shortage declarations, the upper and lower basin states are belatedly preparing drought contingency planning documents. In 32 more years, for example, in the heyday of the potential Lake Powell Pipeline, the basin will be dealing with another 20% reduction in streamflow. It is a contradiction for Utah to plan for short-

ages of 20%, while simultaneously planning to increase its consumption by 15%.

Bear with us as we assess the following numbers:

A mid-range prediction of 20% decrease in water in the Colorado Basin would leave about 12.16 million acre-feet to divvy up between stakeholders. We believe it likely that the Lower Basin would adopt the current drought contingency plan and decrease water consumption to 7 million acre-feet per year. The Upper Basin would then have to divide the shortage among the states (minus Arizona's steady 50,000 afy and half of the USA obligation to MX which might drop as low as 1,375,000 afy under the current drought contingency plan). The total for the Upper Basin would be 516,000 afy, including the amount to be deducted for evaporation from the CRSP. That would leave Utah with, at most 1,017,000 acre feet yield per year by mid century.

This number is shocking because, according to the Utah Division of Water Rights, we already deplete 1,007,500 acre-feet per year with current projects, namely the Central Utah Project that provides water to the bulk of Utah's population in the Wasatch Front. The State of Utah also has outstanding obligations to settle the federal water rights claims of two major tribes, the Northern Ute and Navajo. Agreements are still the formational stage with these tribes, but it seems likely that parties might agree on 105,000 afy and 81,500 afy respectively.

In addition to the Lake Powell Pipeline water rights exchange of 86,249 is also the ongoing negotiation of water rights exchange for the Green River Block of 72,641 afy for increased industrial and agricultural use. The federal tribal water rights mentioned above, and the Central Utah Project have priority over the 1957 water rights that would be used in the Lake Powell Pipeline and the Green River Block.

As you can see, shortages will come, and Lake Powell Pipeline the Green River Block will be the first to lose out. It is not likely that the pipeline will see the full water allotment for more than a few measly years.

Taking all of this into account, these water rights transfers are not in the public interest. It is important to recognize that this \$1.8 Billion project would still have to be paid for by the taxpayers and water users of Utah, even if it wasn't able to serve anyone or generate the expected revenue.

REQUEST FOR A CURRENT HYDROLOGIC DETERMINATION

Reclamation should complete a current Hydrologic Determination for the Upper Basin that includes important information about known impacts from a changing climate and future drought before allowing this contract to go into effect. It is important to factor the increased likelihood of drought into regional plans for water development so that we can be smart about development before the shortage occurs. In the 2007 Hydrologic Determination relating to the Navajo Settlement, Reclamation concluded that the Upper Basin could safely divide up and use 6,280,000 afy (including evaporative loss from the

CRSP). With even a 10% decrease in streamflow, there would begin to be shortages if the Upper Basin fully develops this, which it is trying to do. This is why a new hydrologic determination that includes relevant climate data is essential before the completion of this contract.

The Bureau of Reclamation should take sound science into account and participate in smart planning. We have a lot to contend with in these changing times, let's not waste your time and our money on pipe dreams that couldn't possibly pan out.

REQUEST FOR AN ENVIRONMENTAL IMPACT STATEMENT

Living Rivers & Colorado Riverkeeper formally ask the Bureau of Reclamation to prepare an Environmental Impact Statement for the Green River Contract for Lake Powell Pipeline and the Green River Block. This diversion is a major federal action that will negatively impact 2007 Interim Guidelines, the Drought Contingency Planning under preparation by the seven states of the Colorado River basins, Minute 323 of the Mexican Treaty, and the federal trust obligations with the numerous tribes of the Colorado River basin.

Thank you for your consideration,

Sarah Stock, Program Director

John Weisheit, Conservation Director

“Recently published estimates of Colorado River flow sensitivity to temperature combined with a large number of recent climate model-based temperature projections indicate that continued business-as-usual warming will drive temperature-induced declines in river flow, conservatively 20% by midcentury and 35% by end-century, with support for losses exceeding 30% at midcentury and 55% at end-century,” Udall, B. and J. Overpeck (2017), *The twenty-first century Colorado River hot drought and implications for the future*, Water Resour. Res., 53, 2404– 2418, doi:10.1002/2016WR019638