

Dave Uberuaga
Superintendent
Grand Canyon National Park
PO Box 129
Grand Canyon, Arizona 86023

June 3, 2014

Dear Superintendent Uberuaga,

Thank you for allowing the non-profit River Runners for Wilderness (RRFW) to provide scoping comments on a Grand Canyon National Park Bison Management Plan. River Runners for Wilderness has over 2,000 members and our periodic news releases through our RRFW Riverwire reaches well over 10,000 river enthusiasts who care about river running and resource issues pertaining to wilderness rivers.

The members of River Runners for Wilderness are thrilled to know there are bison in Grand Canyon National Park. Bison were re-introduced to the lands that make up present day Grand Canyon National Park (GRCA) in 1906 before these lands became a National Park. We support the continued presence of bison as an integral part of the Grand Canyon National Park high-country ecosystem.

Evidence that bison were on the North Rim includes bison bones recovered at Furnace Flats and Stanton Cave (cite: Mead). Rock art includes Kanab Creek (cite: Rink) on the Esplanade in the Park and at Bluff, UT (cite: Malotki). Sociological evidence includes the fall Hopi bison hunt (cite: Cole, Burkholder). Recent reassessment and identification of museum specimens suggests that bison did exist on the Colorado Plateau during not only the late Pleistocene but also throughout much of the Holocene and into the historic time. (Martin and Mead 2014)

From a regional paleo-history perspective, the default hypothesis should be that bison were present on the North Rim in small numbers for many thousands of years. New data makes it clear that bison were present and the recent bison reintroduction should be considered as a return of these animals to a bison adapted ecosystem. Given the above information, an eradication stance is indefensible for this native species and we do not support bison eradication from GRCA.

Recent concerns have been raised that the North Rim bison may be adversely competing with other species for water and forage. We see this as an easy problem to solve by the control of the bison population within the park and we support the use of population control of a small viable herd at Grand Canyon National Park. A NPS biologist with a high powered tranquilizing dart may have to suffice for missing predators, allowing for translocation further north to areas

near or north of Jacob Lake. Hunting in the adjacent Forest Service land could manage population numbers. Selective culling to reduce herd size could be employed within Grand Canyon National Park. To reiterate, we support population control of a small viable herd at Grand Canyon National Park.

Under ideal conditions wolves would be the keystone species that would keep the bison population in check. We encourage a wolf re-introduction to the high country of the North Rim as an aid in controlling the bison herd's population numbers. At the very least this Bison Management Plan should recognize that at one point in the near future wolves can and should be introduced as a management tool for bison population control at Grand Canyon National Park.

Present NPS successes in bison management at other service units include Wind Cave, Yellowstone, Teton, and Custer National Parks. Grand Canyon National Park has the opportunity to conduct a state-of-the-art bison management plan in conjunction with the United States Forest Service, Bureau of Land Management and Arizona Game and Fish to allow for a bison herd to range all the way from the House Rock Valley in the east to the Hurricane Cliffs in the west, from the Vermillion Cliffs in the north to the Grand Canyon escarpments in the south. It is possible that the North Rim bison could be managed seasonally with in-park culling and outside of GRCA sports hunting to move the herd into and out of GRCA seasonally each year. We support a management plan that uses GRCA land for bison habitat all and or for the majority part of each year.

Historically, bison would have been in this geographical region in small enough levels that the aquatic based vegetation survived the occasional bison visit. We note that recent concerns have been raised that bison are dewatering available water sources. We would like to point out that the lack of snowfall on the North Rim may be playing a much bigger part in the dewatering of water sources than any other reason. We support the use of simple split rail fencing to protect seeps, springs and archeological resources on a case by case basis.

It is our understanding the North Rim bison population at present contains some trace amounts of cattle DNA. We should remember that only 3% of bison in the US are clean of cattle DNA, and over 50% of the North Rim bison herd was missing some nuclear markers found in cattle, while one in 40 had no cattle DNA (cite Wakeling) whatsoever. Selective herd reduction can be used to strengthen the DNA toward a cleaner DNA fingerprint, as can interbreeding with other bison populations from existing North American stock. We note that with a population reduction from over 30 million bison to less than 100 in 1906, a genomic bottle neck has occurred, just as happened with the California condor. As Gear and Gear (2010) note, "Until there is an intensive sequencing of the bison genome that allows us to answer evolutionary questions about this issue... no one should be selecting animals based upon their "purity." Like

the Arizona Game and Fish, we recognize the North Rm bison herd as having “clean” DNA and do not recommend bison removal from Grand Canyon National Park based on genetics.

When we have asked our members what they think about wilderness and the National Park Service, they tell us bison fit perfectly within that management structure. We would encourage Grand Canyon National Park to consider Grand Canyon’s wilderness parklands as a bison adapted ecosystem. Indeed, bison suppression from these lands is what has caused a number of what managers may perceive as adverse impacts today. We urge Grand Canyon National Park to support bison as a component of the wilderness and wilderness values of Grand Canyon National Park.

In regards to human bison interaction, recent data would lead one to believe that bison are a problem on Highway 67 both within and outside of park lands. It is our understanding that vehicle-bison encounters may be a direct result of speeding by drivers. We encourage Grand Canyon National Park to include appropriate signage on Highway 67 educating visitors that they need to share the roadway with bison, especially at night. This may actually help decrease nighttime speeding by drivers.

Bison as a species were adapted to traveling through large areas of wild land. Given the recent alarming concerns about the disappearance of species diversity 1,000 times faster than was occurring prior to the arrival of us as a species (cite Pimm, Science), we encourage Grand Canyon National Park Planners to do everything possible to manage a robust and healthy bison herd at Grand Canyon National Park to encourage the survival of this magnificent species which represents our American heritage.

Thank you again for this opportunity to submit scoping comments on the management of bison in Grand Canyon National Park.

Sincerely,

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