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Bison Myths, "Natural Regulation," and Native Hunting: A Solution to the Yellowstone Bison Problem

by Charles E. Kay, Ph.D.

The Park Service contends that thousands of bison have always inhabited Yellowstone. For under "natural regulation" management, ungulate populations are food-limited and predation has no significant impact on the number of bison or other animals. It is also assumed that present conditions in the park are similar to those in the past. Now if this were true, then early explorers should have found Yellowstone teeming with wildlife, and the range should have been as overgrazed in the past as it is today. Historical data, however, paint an entirely different picture.

Between 1835 and 1876, 20 different expeditions spent a total of 765 days in the Yellowstone Ecosystem on foot or horseback, but they reported seeing bison only three times, none of which were in Yellowstone Park itself. Today there are over 4,000 bison in the park, as well as an estimated 100,000 elk in the ecosystem. Yet those same explorers reported seeing elk only once every 18 days and their journals contain 45 references to a lack of game or a shortage of food.

Similarly, early photographs show that when Yellowstone Park was first established, the vegetation was virtually ungrazed. Based on over 120 repeat photosets that I have made, dating to as early as 1871, tall willows and aspen have declined by more than 95% due to excessive ungulate browsing. Today, Yellowstone contains some of the worst overgrazed riparian areas in the entire West, but that was not true in earlier times.

What then kept bison and elk numbers low historically? One factor could have been wolves and other carnivores, but during the 765 days explorers spent in Yellowstone between 1835 and 1876, no one saw or killed even a single wolf. Instead, I suggest that Native American hunting once kept game populations at very low levels. Similarily, Dr. Valerius Geist, one of North America's leading ungulate ecologists, recently reported that hunting by native peoples was the factor that drove bison evolution and behavior for the last 12,000 years. Dr. Geist, as have others, also concluded that there never were 60 million bison on the American prairies - another myth.

Space precludes a thorough discussion of my Aboriginal Overkill hypothesis (see Human Nature 5:359-398 and Western Journal of Applied Forestry 10:121-126), but native people had no effective conservation practices, as regards bison, elk, and other large mammals. In fact, Native Americans harvested ungulates the exact opposite of any conservation strategy. As world renowned historian Dr. Richard White recently noted, the view that native peoples had little impact on their environment, while intended as flattery is in reality an act of "immense condescension." I would call it racism. Prior to European-introduced disease, such as smallpox, there may have been as many as 100 million native people in North America.

What then is the solution to Yellowstone's bison problem? Most environmentalists favor giving the bison more land. That is to say, they want bison to roam freely outside the park. But inadequate land has never been the problem. Instead, the present situation is a direct result of "natural regulation" management under which the Park Service assumes that bison populations will self regulate, and that predation is unimportant in limiting ungulate numbers.

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No matter where the line is drawn, under "natural regulation," bison populations will continue to increase until they are forced by overgrazing and starvation to again cross that line. Giving bison additional land has everything to do with hidden political agendas and absolutely nothing to do with solving the current bison crisis.

So, is there a solution to Yellowstone's bison problem? I suggest that we simply permit Native Americans to hunt bison in the park. Various tribes already claim hunting rights under treaties that predate the establishment of Yellowstone, so all that is needed is for the government to honor its previous commitment to Yellowstone's original owners. After all, native people successfully managed the ecosystem for at least the last 12,000 years, and while they were not conservationists as that term is commonly used, by keeping ungulate populations low, Native Americans actually promoted biodiversity.

Beaver, for example, were once common in the park numbering in the thousands, but now beaver are ecologically extinct on Yellowstone's northern range because excessive grazing has virtually eliminated the tall willows and aspen beaver need for food and dam building materials. Native hunting = fewer bison and elk = more aspen and willows = more beaver = greater biodiversity. Native Americans were the ultimate keystone predator and their absence has completely changed the Yellowstone Ecosystem until today it is little more than an ecological slum, and we have a bison overpopulation problem that never existed in the past.

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