CHAPTER ONE

Where the Buffalo Roamed

Perceptions of the Neutral Hills Landscape and the Creation of Buffalo National Park

PRIOR TO THE MID-19TH CENTURY, THE GEOGRAPHY of the Canadian West was largely unknown to those living outside the region. Prompted by a growing expansionist view of the Canadian North West, however, the 1860s expeditions by Captain John Palliser and Henry Youle Hind and later surveys by Naturalist John Macoun helped redefine the region.[1] They found much of the Canadian West favourable for settlement. Palliser, however, explored the Neutral Hills area and had little optimism for the potential of the land that would one day become Buffalo National Park. The Dominion land surveyors that followed at the turn of the 20th century also found the land south of Wainwright useless for settlement and agricultural purposes.

While perceived by Palliser and the Dominion Land Surveyors to be inferior for agricultural uses, the area north of the Neutral Hills had historically sustained large bison herds. This fact was influential in the establishment of Buffalo National Park. In 1907, the Dominion government sent Homestead Inspector Joseph Bannerman to examine the area south of Wainwright, Alberta, for use as a potential bison reserve. "[W]hile undesirable as agricultural land," Bannerman found this tract to be "eminently suitable for the purpose intended, being well supplied with water and grazing."[2] He recommended the land for a new park.[3] This impression, however, was uninformed. With the onset of settlement, the face of the Canadian West had changed. Very quickly, those involved in the administration of the park would find that the intricate relationship between the bison and the parkland environment was not easily understood.

John Palliser, the son of an elite Irish landowner, and Henry Youle Hind, a geologist contracted by the Canadian government, were both on a mission to explore the Canadian West in search of its potential for resources and, ultimately, for settlement. Palliser, leader of a British expedition funded by the Royal Geographical Society, explored British North America from 1857

to 1860 and Hind led two Canadian expeditions into the interior in 1857 and 1858.[4]

The Palliser expedition was most influential for categorizing the area in the North West into specific districts based on soil fertility. Palliser conceptualized the existence of a "fertile belt" and a desert area in the Canadian Plains, which he outlined in his general report. Hind's report, published in 1860, also incorporated these concepts.[5] Palliser located good land along the valley of the North Saskatchewan and land of poorer quality in the plains to the south. The poorest area occurred where the central desert in the United States extended north of the 49th parallel and formed a small triangle of arid land.[6] Generally, Palliser deemed the land along the Battle River, some of which would be eventually chosen for Buffalo National Park, to be good for the pasturage of livestock. He wrote in his general report:

> The richness of the natural pasture in many places on the prairies of the second level along the North Saskatchewan and its tributary, the Battle River, can hardly be exaggerated. Its value does not consist in its being rank or in great quantity, but from its fine quality, comprising nutritious species of grasses and carices, along with natural vetches in great variety, which remain throughout the winter sound, juicy, and fit for the nourishment of stock.[7]

While Hind never explored as far as the area that would later become Buffalo National Park,[8] it appears from the description in the *Papers of the Palliser Expedition* that Palliser passed as close as five to ten miles from the southern border of the park. In a report to the Royal Geographical Society of London, Palliser's impression of the park area was more negative. He had little to report on the region until he reached Flag Hill, west of the Battle River near present-day Hardisty. In recounting the progress of the expedition through this area, he wrote, "I will not occupy your Lordship's time with minute details of our journey from this [Grand Coulée to the Battle River], as the prairie was neither well provided with wood nor rich in pasture, but will pass on to the period of our arrival at the Battle River."[9] This finding strengthened Palliser's negative view of the land's potential. According to Irene Spry's descriptions of Palliser's 1859 map of the North West, the park would have fallen within the "fertile belt." However, in the 1860 and 1865 maps, the northern border of the arid regions, or "true prairie," had been moved farther north and west.[10] Perhaps the discovery of inferior land, such as the tract found by Palliser in the vicinity of the park, motivated changes

in the area defined as the fertile belt on these subsequent maps.

The influence of Palliser's theory of a fertile belt and a desert triangle is evident in the years following his expedition as his theory appeared in literature about the region. Commissioned by the Canadian government to gather information about conditions in the North West Territories in 1870, William Francis Butler was certainly aware of Palliser and used his theory when describing the "land of the Saskatchewan":

> Its boundaries are of the simplest description…It has on the north a huge forest, on the west a huge mountain, on the south an immense desert, on the east an immense marsh. From the forest to the desert there lies a distance varying from 40 to 150 miles, and from the marsh to the mountain, 800 miles of land lie spread in every varying phase of undulating fertility. This is the Fertile Belt, the land of the Saskatchewan, the winter home of the buffalo, the war country of the Crees and Blackfeet, the future home of millions yet unborn.[11]

Palliser's theory was so influential that, as the North West began to be considered for settlement, it became necessary to downplay the desert image of the southern Plains. Instead a utopian view of agricultural fertility was promoted, as can be seen in the following excerpt from an 1887 brochure on the North West:

> Much the greatest part of these vast prairies possesses a soil of astonishing fertility, and even in regions less favoured in this respect, there are no great extents as stated by Capt. Palliser, in his report to the Imperial Government, at all approaching to sterility…even in that strip heretofore designated 'the desert' there is comparatively but a small part of the land unfit for the culture of the cereals or for pasture.[12]

This optimism might be attributed to the fact that the Plains experienced exceptionally wet years from the mid-1870s to the early 1880s, when the Dominion Land Surveyors were mapping the area for settlement.[13] Near the Squirrel Hills, the area Palliser reported as the "northern extension of the North American arid basin,"[14] John Macoun, a naturalist who conducted several surveying expeditions of the North West from 1872 to 1881, found the land more favourable than Palliser had reported. After nine years of study, he believed that the climate of the Canadian prairies was influenced by the Great American Desert, which resulted in a generally drier climate but a

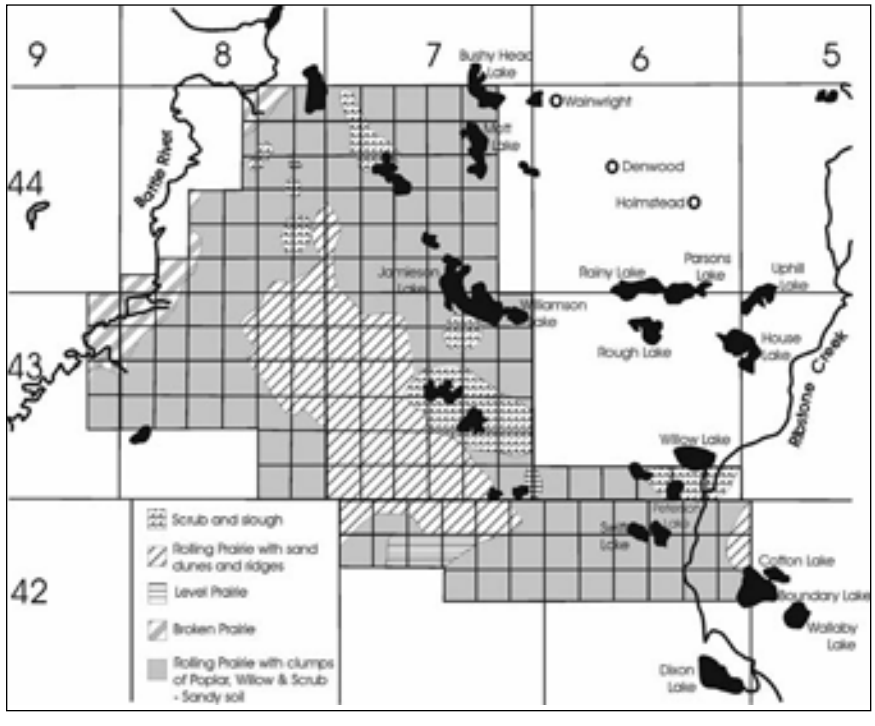
warm summer with an abundance of rain. He praised the fertility of the soil that extended over the boundless region and concluded, "our great North-West is truly a land of 'illimitable possibilities.'"[15]

While Dominion land surveyors favourably documented the southern arid regions, this same confidence is certainly not reflected in the reports of the surveyors who went through the Wainwright region. Both the first block surveys in 1883 and 1884 and the township surveys in 1903 were very candid about the land's unsuitability for settlement.[16] While the field notes from the first block surveys did not include a written report of the area, Tom Kains, leader of one of the 1883 surveying parties, kept a diary recording his expedition's movements and brief comments on the weather and topography. On 1 June, he took notice of the poor soil and wrote, "Sandy Country with growth of stunted poplar."[17] James F. Garden, another surveyor who charted most of the park area, also found sand to be the most prevalent component of the soil. In some areas he even encountered sand ridges.[18] Garden surveyed the area around Ribstone Creek and also found it to be very sandy.[19] Only along the muskeg areas of the Ribstone was the soil found to be wet mould or loam above alkaline clay.[20] Despite the area's sandiness, the flourishing vegetation is surprising. Garden noted dense continuous poplar trees, up to ten inches in diametre, and Balm of Gilead trees growing on a soil of sand.[21]

While the 1883 and 1884 surveys only mapped the township borders, the 1903 surveys charted and appraised each individual section in the township. Surveyor field notes could not be located for the entire park area, but the information recorded in the existing field notes does not deviate from either the general impressions of Palliser or those of the earlier block surveyors. Except for the Ribstone Creek area, surveyors C. C. Fairchild and M. B. Weekes found the park area to be very sandy and unfit for agricultural purposes.[22] Weekes even expressed reservations about township 44, range 8, one that seemed to have some of the better soil in the park area. He wrote, "This township is not suitable for anything except ranching, and is not very well adapted for that as the grass is not very good."[23]

While the area south of Wainwright was considered unfit for agriculture and settlement, it was well known by those living in, visiting, or exploring the Canadian West that the area was suitable for game, especially bison. John Warkentin notes that traders knew that the land on the North Saskatchewan was more fertile than the Wainwright region farther south, yet they never associated this poorer land with a "desert wasteland" because the region was

This map, compiled from surveyor's observations found in Dominion Land Surveyors records from 1883–1884 and 1903, shows that much of the Buffalo National Park landscape consisted of sandy soil, of which a large area was sand dunes.



known to produce numerous bison.[24] Indeed, vast herds of plains bison had been observed by many explorers that passed through the area. In 1754, Anthony Henday, somewhere near the Alberta/Saskatchewan border, west-southwest of Battleford, encountered "buffalo grazing like English cattle." A few days later and not far from that place, he jotted the following observation: "the Buffalo so numerous obliged to make them sheer out of the way."[25] Palliser also described bison in large numbers in the vicinity of the park. Near Ribstone Creek, he stated, "As the buffalos were very numerous, regulations were made to economize our ammunition, and to prevent the useless killing of animals."[26]

These perceptions reflect what archaeologists and historians today know about the region. Buffalo National Park, located in this parkland belt south of the North Saskatchewan and in the vicinity of the Battle River, was an area where the bison, and thus Natives, wintered. Environmental historian Theodore Binnema notes that "bison concentrations varied seasonally according to regular patterns under normal conditions and in predictable ways under anomalous conditions."[27] The "fescue crescent," the broad parkland belt that runs near the North Saskatchewan River and encompasses the rough terrain of the foothills, was the traditional wintering grounds for the plains bison. The bison wintered in this northern prairie from September until the spring as it afforded the best forage and shelter to survive the winter.[28] Archaeologist J. Roderick Vickers has suggested that the natives who wintered in parklands from November/December to March subsisted on "stalking and communal hunting of bison."[29] Archaeologist George Arthur affirms that "northern Plains tribes used the traditional jumps and pounds from late fall throughout the winter and also at other times of the year."[30]

Not only were bison important for sustaining Native populations, but their migratory behaviour was also important in renewing the landscape. George Arthur argues that many of the bison's behavioural habits, while they appeared destructive, benefited the land. Under normal conditions, trampling (the heavy treading of the bison on the landscape) encouraged the growth of vegetation by prompting the reseeding of natural grasses, and helped to reduce water loss from the soil. Even though wallowing destroyed ground cover, it also created hollows that collected water after other moisture sources dried up. Uprooting or breaking trees by rubbing helped maintain the grassland by keeping trees, specifically aspen, from establishing themselves.[31]

Wild animals, particularly bison, flourished in the park area because it was in the vicinity of a tribal boundary between the Blackfoot and the

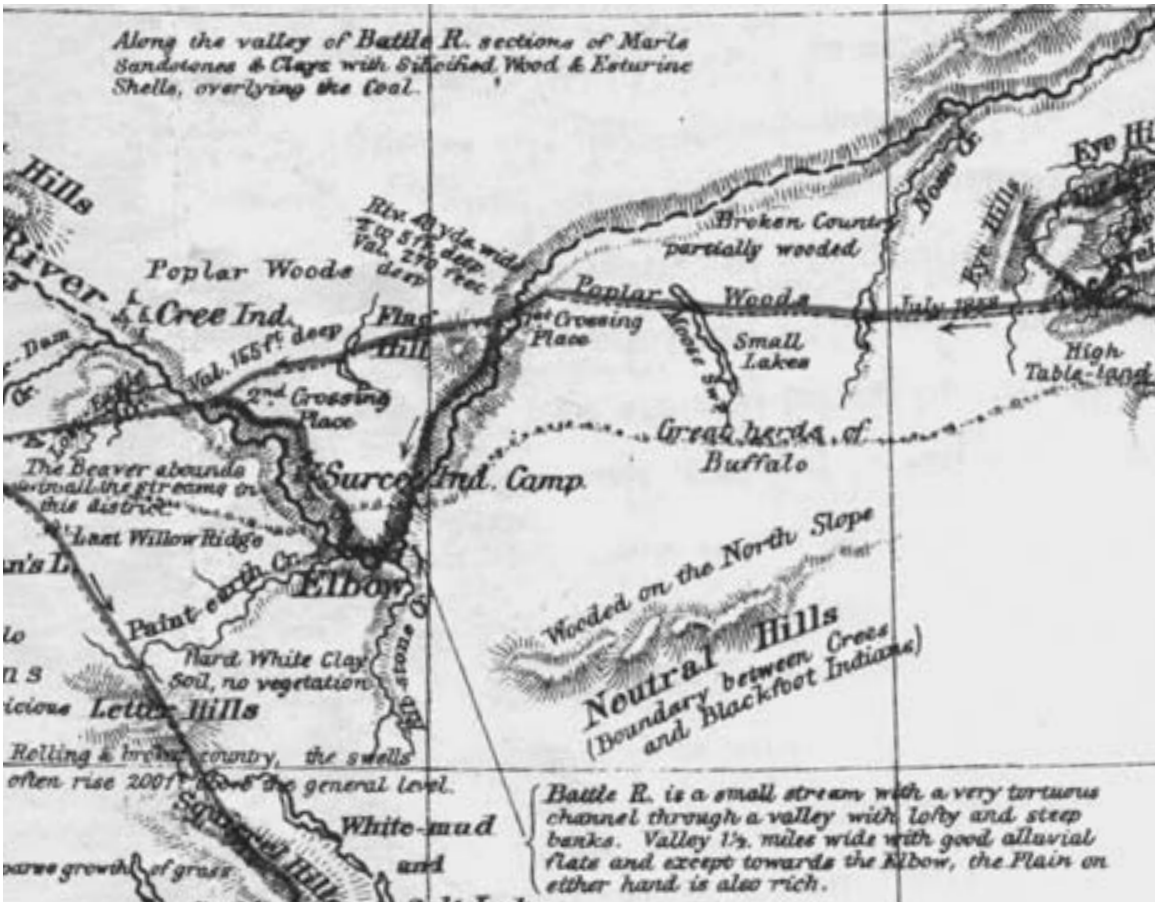
Cree. A "commons" system existed on the North American Plains before the arrival of the Europeans; it had well-recognized tribal boundaries, separated by neutral areas.[32] Just south of Buffalo National Park, the Neutral Hills were a natural, recognized boundary between the Blackfoot to the southwest and the Cree to the northeast.[33] James Hector, the naturalist and geologist with Palliser's expedition, gave a description of the border between these two tribes: "In the latitude of Fort Ellice they sometimes pitch their tents as far west as the Elbow of the South Saskatchewan, and from that point their country may be bounded by a line carried to the Neutral hills, south of Battle River, and thence on to the Beaver hills and Fort Edmonton."[34]

Paul Martin and Christine Szuter's research has revealed that the existence of war zones had a greater impact in determining the size of game animal populations than the quality of vegetation or natural conditions. In the North American context, Martin and Szuter have found that wildlife flourished along the tribal boundary lines separating two hostile tribes because such areas were too dangerous for either tribe to penetrate.[35] During Meriwether Lewis and William Clark's exploration in the United States east of the Rockies, Clark commented on this phenomenon: "I have observed that in the country between the nations which are at war with each other the greatest numbers of wild animals are to be found."[36]

Palliser's observations show a similar occurrence of plentiful wild animals at the boundary between the Blackfoot and the Cree. His notes contain numerous references to the hostilities between these two tribes.[37] The Cree, aware that animal populations thrived between war zones, informed the Palliser expedition on one occasion that they were "not more than two days' journey off from plenty of buffalo out westward; but they said they did not like to go so far, as they would then be in the enemy's country."[38] Three days later, Palliser recorded encountering bison after entering the neutral area between the Cree and the Blackfoot.[39] Proof of the wealth of plains bison in the Wainwright area is perhaps best displayed on a map that accompanied the *Papers of the Palliser Expedition*; "Great herds of Buffalo" is written on the map across the area between the Battle River and the Neutral Hills, right in the vicinity of Buffalo National Park.[40] The area was a haven for bison long before the Canadian government established a reserve for them.

Creating a park for bison seemed an ideal use for this otherwise useless land. North America has a long history of establishing national parks in areas considered unusable for agriculture and development. Alfred Runte

A portion of the "General Map of Routes in British North America Explored by the Expedition under Captain Palliser during the years 1857, 1858, 1859, 1860" map. "Great herds of Buffalo" is written across the area north of the Neutral Hills that would later become Buffalo National Park.

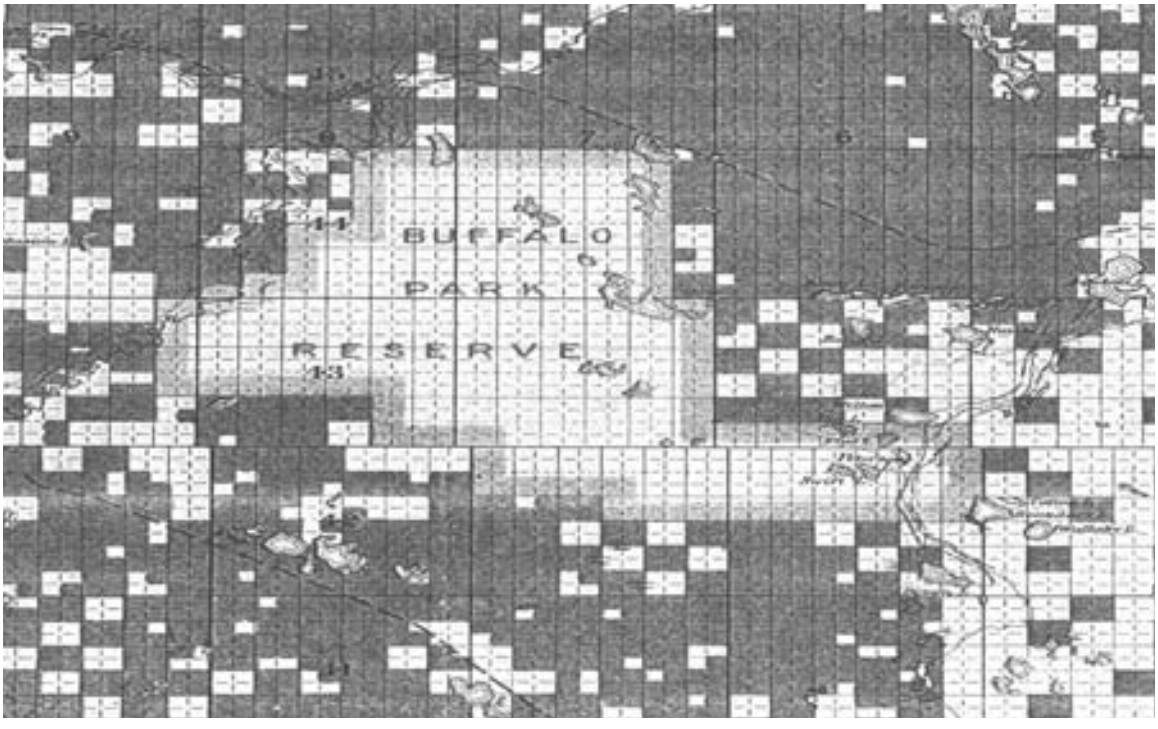


argues that the United States Congress had an unwritten policy that only lands that were considered worthless were set aside as national parks.[41] A similar trend is also noticeable in the establishment of early national parks in Canada, including Buffalo National Park.[42]

Homestead Inspector Joseph Bannerman assumed that the land south and east of the Battle River was not valuable for agriculture as very few had settled in this area.[43] This scanty settlement is apparent on the map titled *Ribstone Creek Sheet* that shows the land disposed of in the park area before 15 October 1907. Although the park was already designated on this map, it clearly shows that much of the land outside the park had yet to be patented.[44] The first superintendent, Edward Ellis, believed no more than 10 per cent of the land in the park was adaptable to farming purposes.[45] Clues about the state of the land in Buffalo National Park played out in the 1912 editorial columns of the *Wainwright Star*[46] in a debate over whether the area would be more profitable if the park area was opened for farming. John Thompson stated that proof of the inferior quality of the land in the area could be seen on a homestead map of the area before its appropriation for the park; it showed that "people were not willing to have [the land as] a gift."[47]

Yet even with the knowledge that the region had historically sustained large herds of bison, it is curious that the land south of Wainwright was even considered for a bison reserve. Originally Elk Island Reserve, now Elk Island National Park, had been earmarked for the bison herd purchased from Michel Pablo. The first two shipments of Pablo bison were in fact transported to Elk Island. However, a letter from Superintendent of Rocky Mountains Park Howard Douglas to Deputy Minister of the Interior William Wallace (W. W.) Cory reveals that it was at Pablo's suggestion that the Dominion government found a new location for the bison effort. Douglas wrote, "In looking over the Elk Park at Lamont Mr. Pablo stated that he did not think it suitable for Buffalo as there was [too] much bush, and the grass is not what the Buffalo are accustomed to. I would strongly recommend that some other location be obtained before the next shipment."[48] Pablo's preference for an area with less bush seems to have been based on his familiarity with the Flathead Valley in Montana. West of the Mission Mountains, Pablo raised his bison in a valley that sported a vegetation primarily of grasses. The Wainwright area, and not Elk Island National Park, seems to resemble more closely a 1908 description of the topography of the Ravalli Hills and Meadows in the Flathead Indian Reservation, an area adjacent to Pablo's bison range: "On the steeper slopes the grazing is

This Department of the Interior map, the Ribstone Creek Sheet, from 15 October 1907 shows the land disposed of in the vicinity of Buffalo National Park. Much of the land on the east side of Buffalo National Park, which had not yet been claimed, has since proved to be the least desirable for agricultural purposes.



scanty. In the ravines, on the protected slopes, and in the wide heads of gulches, the vegetation is luxuriant."[49]

After Homestead Inspector Joseph Bannerman found a suitable location south of the Battle River, arrangements were made to have an area of approximately 170 square miles set apart for a bison reserve. In 1908, the government spent around $60,000 fencing the park, including a paddock in the northeast corner of the park to display bison for visitors. They needed approximately 70 miles of fence to enclose the area.[50] The first shipment of 325 bison was transferred from Elk Island Park and arrived at the new reserve on 16 June 1909.[51]

While the area north of the Neutral Hills had at one time supported great herds, proponents of the national park little understood the bison's interactions with the land and ecosystem. Before the Europeans arrived, the vast herds of plains bison used enormous territory. As Douglas Bamforth's ecological study of the Great Plains proves, the vegetation's growing seasons and the migration of the bison allowed large herds to subsist on these lands. The plains bison moved according to the availability of grass, which was determined by climate and moisture. However, vegetation was also arranged in a composite, yet mutually dependent, pattern. Bamforth states, "The greater dominance of later-blooming warm-season species in southern [rather] than northern grassland communities also indicates that the bulk of forage production in the south begins later in the year and continues for a shorter period of time than in the north."[52] Although Bamforth studies the Great Plains as a whole, Binnema confirms his theory on a smaller scale in his argument about bison migration in the northern Plains. After wintering in the broad fescue crescent in the northern prairie, the area in which the park was later established, the bison migrated to the moist-mixed prairie in the spring. Although generally dry, this area was wettest in May and June, which allowed protein-rich grasses to tolerate heavy grazing while moisture was present. By July, the blue grama, a protein-rich grass, beckoned the bison to the dry-mixed prairie. In late summer, when the cool weather had slowed the growth of grasses and the range had been depleted, the bison again returned to the moist-mixed prairie where new growth had been encouraged by grazing, summer fires, and falling temperatures. By September, the herds returned to the fescue grassland, found in the parkland, the foothills, or deep river valleys, in preparation for the colder weather and winter storms.[53] Seasonal migration was key to the environment of the Plains, which was intricately arranged to sustain such large herds and at the same time permit the land to recuperate.

Unloading the Pablo bison at the new national park in Wainwright. Photo by J. H. Gano.

Establishing Buffalo National Park was a means for the Dominion government to use non-arable land while at the same time restoring bison to the modern Canadian West. Those administrating the bison effort at Buffalo National Park would soon realize that this task would be more difficult than first imagined. While reports of early explorers had shown the Wainwright area had been productive as a bison range in the past, with the onset of settlement, how the land north of the Neutral Hills could be used had changed. The necessity for a fence around the park created a closed ecosystem, which did not take into consideration the most important characteristic of the bison species—its migratory nature. Those involved in planning the park did not understand the intricacies and fragility of the parkland environment and how bison interacted with this environment.

The ignorance about the importance of interactions between bison and their environment (the flora, landscape, and predators) shows the limitations of the wildlife science in the early 20th century. While it would have been impossible to establish a park on the Prairies that accommodated traditional bison migration patterns, an understanding of this facet of bison ecology could have restrained park officials from allowing the herd to grow so quickly. Shortly after the effort began, the rapidly increasing bison herd proved too much for the resource base in the area to bear.

1. John Warkentin, ed., *The Western Interior of Canada: A Record of Geographical Discovery 1612 to 1917* (Toronto 1964), 147.

2. Library and Archives Canada, Ottawa, ON (hereafter LAC), Certified Copy of a Report of the Committee of the Privy Council, approved by His Excellency the Governor General on the 7 March 1908, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt. 2.

3. LAC, Minister of the Interior to F. T. Griffin, 7 Aug. 1907, J. W. Greenway to J. B. Harkin, n.d., and J. A. Bannerman to Frank Oliver, 20 Aug. 1907, Parks Canada Files, Buffalo National Park [BNP], RG 84, Vol. 981, File BU2[548608], pt. 1.

4. Irene Spry, Introduction, in John Palliser, *The Papers of the Palliser Expedition, 1857–1860*, (Toronto 1968), xv, xxii–xxiii; John Palliser, *The Papers of the Palliser Expedition, 1857–1860,* (Toronto 1968), 1; W. L. Morton, *Henry Youle Hind, 1823–1908* (Toronto 1980), 30, 58.

5. Hind's report was published three years before Palliser's report was released. Also commissioned to draw the maps for the Palliser expedition, John Arrowsmith had access to Palliser's data; thus, some of this information was incorporated into Hind's map even before the data were published in Palliser's *Further Papers*. John Warkentin, "Steppe, Desert and Empire," in A.W. Rasporich and H.C. Klassen eds. *Prairie Perspectives 2* (Toronto 1973), 118–19.

6. Palliser, *Papers*, 9, 18–20.

7. Palliser, *Papers*, 16.

8. Henry Youle Hind, *British North America: Reports of Progress Together with a Preliminary and General Report on the Assiniboine and Saskatchewan Exploring Expedition* (London 1860).

9. John Palliser, James Hector, and J.W. Sullivan, "Progress of the British North American Exploring Expedition," *Journal of the Royal Geographical Society of London* 30 (1860), 286.

10. Irene Spry writes that the border between the true prairie and fertile belt on the 1859 map was "an irregular curve running northwest across the South Saskatchewan, upstream from modern Saskatoon, to near modern Unity and thence westward, south of Battle River, and across the Red Deer, swinging to the south again a few miles east of today's No. 2 Highway from Edmonton to Calgary." Spry, Introduction, *Papers*, cviii.

11. William Francis Butler, *The Great Lone Land: A Narrative of Travel and Adventure in the North-West of America* (Edmonton 1968), 230.

12. *North West of Canada: A General Sketch of the Extent, Woods and Forests, Mineral Resources and Climatology of the Four Provisional Districts of Assiniboia, Saskatchewan, Alberta and Athabasca* (Ottawa 1887), 5–6.

13. Warkentin, "Steppe, Desert and Empire," 127; Doug Owram, *Promise of Eden: The Canadian Expansionist Movement and the Idea of the West, 1856–1900* (Toronto 1980), 150.

14. Palliser, *Papers*, 138.

15. John Macoun, *Manitoba and the Great North-West: The Field for Investment; The Home of the Emigrant* (London 1883), 57–59, 76, 171.

16. Dominion land surveyors mapped out the North West into one-square-mile sections. A township is thirty-six sections together in a six-mile by six-mile block.

17. Provincial Archives of Alberta, Edmonton, AB (hereafter PAA), Tom Kains, Diary, 1883, Dominion Land Surveyor Records, File 79.27, Box 2825.

18. PAA, James Garden, Field Notes of Block Survey West of the Fourth Initial Meridian, (hereafter Field Notes), North-West Territories, Surveyed by James Garden, 21 Jul.–22 Aug. 1884, Dominion Land Surveyor Records, File 83.376, Box 904.

19. PAA, James Garden, Field Notes, 27 Jun.–19 Jul. 1884, Dominion Land Surveyor Records, File 83.376, Box 903. In fact, Garden's field notes record rolling sand ridges just east of the Ribstone Creek, on section 36 of township 42, range 6.

20. PAA, James Garden, Field Notes, 21 Jul.–22 Aug. 1884, Dominion Land Surveyor Records, File 83.376, Box 904.

21. PAA, James Garden, Field Notes, 27 Jun.–19 Jul. 1884, Dominion Land Surveyor Records, File 83.376, Box 903.

22. PAA, C. C. Fairchild, Field Notes of Township 42, Range 5, West of the 4th Mer., Surveyed by C. C. Fairchild, 1–17 Sept. 1903, Dominion Land Surveyor Records, File 83.376, Box 1776a.

23. PAA, M. B. Weekes, Field Notes of Township 44, Range 8, West of the 4th Mer., Surveyed by M. B. Weekes, 18 Sept.–17 Oct. 1903, Dominion Land Surveyor Records, File 83.376, Box 1910.

24. Warkentin, "Steppe, Desert and Empire," 106.

25. Anthony Hendry, *The Journal of Anthony Hendry, 1754–55: York Factory to the Blackfeet Country*, Lawrence J. Burpee ed. (Toronto 1973), 26, 27.

26. Palliser, *Papers*, 243.

27. Theodore Binnema, *Common and Contested Ground: A Human and Environmental History of the Northwestern Plains* (Norman 2001), 39.

28. Binnema, *Common and Contested Ground*, 40, 45, 47–48.

29. J. Roderick Vickers, *Alberta Plains Prehistory: A Review* (Edmonton 1986), 7–8.

30. George W. Arthur, *An Introduction to the Ecology of the Early Historic Communal Bison Hunting Among the Northern Plains Indians* (Ottawa 1975), 106.

31. Arthur, *Introduction to the Ecology of Bison Hunting*, 13–16.

32. Irene Spry, "The Great Transformation: The Disappearance of the Commons in Western Canada," in Richard Allen ed. *Man and Nature on the Prairies* (Regina 1976), 21.

33. Palliser, *Papers*, 242.

34. *Transactions of the Ethnological Society of London,* vol. 1 (London 1861), 249. While the Neutral Hills were believed to be a boundary, it is clear that such borders were not inflexible. Jack Brink, in *Dog Days in Southern Alberta* (Edmonton 1986), 56, has argued that the Blackfoot territory went as far north as the valley of the North Saskatchewan River. In fact, Palliser encountered a Blackfoot medicine lodge southwest of the park, two miles on the east side of the Battle River near Hardisty, Alberta. Palliser, *Papers*, 244.

35. Paul S. Martin and Christine R. Szuter, "War Zones and Game Sinks in Lewis and Clark's West," *Conservation Biology* 13 (February 1999), 38, 42–44.

36. Martin and Szuter, "War Zones and Game Sinks," 43.

37. For example, see *The Journals, Detailed Reports, and Observations Relative to the Exploration, by Captain Palliser, of that Portion of British North America, which, in Latitude, Lies Between the British Boundary Line and the Height of Land of Watershed of the Northern or Frozen Ocean Respectively, and in Longitude, Between the Western Shore of Lake Superior and the Pacific Ocean During the Years 1857, 1858, 1859, and 1860* (London 1863), 52, 53, 55.

38. *Journals, Detailed Reports, and Observations,* 52.

39. *Journals, Detailed Reports, and Observations*, 53.

40. See "A General Map of the Routes in British North America Explored by the Expedition Under Captain Palliser During the years 1857, 1858, 1859, 1860," in Palliser, *Papers*.

41. Alfred Runte, *National Parks: The American Experience* (Lincoln 1979), 49.

42. Robert Craig Brown, "The Doctrine of Usefulness: Natural Resource and National Park Policy in Canada, 1887–1914," in J. G. Nelson ed. *Canadian Parks in Perspective* (Montreal 1969), 48–49.

43. LAC, Memorandum to W. W. Cory, 6 Apr. 1918, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt. 2.

44. *Ribstone Creek Sheet*, 15 Oct. 1907, Map Collection, G3471, G4, s380, 266, Glenbow Archives, Calgary, AB. A patent was the right or title to an area of land granted by the Dominion government.

45. LAC, Edward Ellis to J. B. Harkin, 4 May 1912, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt. 2.

46. See, for example, *Wainwright Star*, 20 Dec. 1912, John Thompson, "Farmer Argues That Buffalo Is Bird in Hand"; *Wainwright Star*, Dec. 1912, "'Are Rural Residents to Suffer for This Paltry Tourist Trade?' He Asks," and others, LAC, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt, 2.

47. *Wainwright Star*, 20 Dec. 1912, John Thompson, "Farmer Argues That Buffalo Is Bird in Hand," LAC, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt, 2.

48. LAC, Howard Douglas to W. W. Cory, 11 Jun. 1907, Parks Canada Files, BNP, RG 84, Vol. 51, File BU209, pt. 1.

49. Morton J. Elrod, "The Flathead Buffalo Range," in *Annual Report of the American Bison Society, 1905–1907* (n.p.: American Bison Society, 1908), 29.

50. LAC, Minister of the Interior to F. T. Griffin, 7 Aug. 1907, J. W. Greenway to J. B. Harkin, n.d., and R. H. Campbell to C.U. Ryley, 21 Sept. 1908, Parks Canada Files, Buffalo National Park [hereafter BNP], RG 84, Vol. 981, File BU2[548608], pt. 1; LAC, Certified Copy of a Report of the Committee of the Privy Council, approved by His Excellency the Governor General on the 7th March 1908, Parks Canada Files, BNP, RG 84, Vol. 982, File BU2[548608], pt. 2; LAC, Mr. Courtice to J. B. Harkin, 13 Nov. 1916, Parks Canada Files, BNP, RG 84, Vol. 53, File[BU232], pt. 1.

51. LAC, A. G. Smith, "Statement of Original Shipments of Buffalo into Buffalo Park, Wainwright," 14 Sep. 1926, Parks Canada Files, BNP, RG 84, Vol. 51, File BU209, pt. 3.

52. Douglas B. Bamforth, *Ecology and Human Organization on the Great Plains* (New York 1988), 65.

53. Binnema, *Common and Contested Ground*, 40–43, 45, 47.