

Joshua Abram Kercksmar

# Wolves at Heart: How Dog Evolution Shaped Whites' Perceptions of Indians in North America

## ABSTRACT

This article explores how, as dogs evolved and were bred into distinct varieties in Europe and North America from precontact to the present, whites in America used them to judge both Indians and themselves as natural improvers. When colonists first compared their own dogs to those of Native Americans, they found Indian dogs too wolf-like and vicious. But as ecological pressures in cities and rural spaces threatened to undo European breeds during the eighteenth and nineteenth centuries, many whites came to doubt their status as nature's masters. It was only during the twentieth century, as whites observed the spread of feral dogs on reservations, that they reimagined Indians and their dogs as savage and themselves as potential rescuers. This study highlights the importance of biological evolution to European perceptions of Indians. It also refines the field of evolutionary history by treating biology and history less as distinct forces and more as mutual processes.

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## INTRODUCTION

In 2003 Edmund Russell argued for an “evolutionary” turn in environmental history. “By changing the environments in which organisms live,” he pointed out, “we have changed the selective regimes in which they evolve. In some cases, the resulting evolution has forced humans to interact with versions of those species in very different ways.”<sup>1</sup> This study is an exploration of Russell’s idea, applied to canine evolution, and ultimately to the ways that the changing bodies and behaviors of dogs in America prompted whites to judge both Indians and themselves. Throughout the seventeenth and eighteenth centuries, the dogs that British colonists brought to the New World showed far greater variation in size, shape, and temperament than did their long-muzzled, lupine American cousins. In an evolutionary perspective, these differences were present because Europeans had bred dogs for a wider range of tasks than had American Indians, and in the process they had selected for a broader and less wolf-like array of traits.

Yet from the standpoint of European observers in a pre-Darwin age, the differences made little sense except as evidence of Indians’ inability fully to tame the natural world and unlock its productive potential. Euro-American observers had the opportunity, however, to question their superiority as natural improvers when supposedly civilized European dogs became sheep killers in outlying settlements during the eighteenth and early nineteenth centuries and as stray dog populations multiplied in American cities, spreading fear and disease. According to contemporary writers and lawmakers, however, Euro-Americans might reclaim mastery over nature by killing enemies of improvement on the frontier and by caring for suffering strays in the cities—strategies that found analogues in the human realm as the US government slaughtered or removed Indians from the late 1860s through 1934 and as whites and Native Americans struggled thereafter to deal with feral dog populations on reservations. A combination of social and ecological factors on twentieth- and twenty-first-century reservations, notably poverty and a paucity of food outside of towns, led dogs to adapt in ways that appeared savage to outsiders. This disturbing change in how dogs looked and behaved prompted some observers to wrap an old question in new language: Are Native Americans capable of civility?

This article argues that evolutionary processes have interacted with human history and culture in ways that deserve more attention from scholars in the humanities. It further suggests that the evolution of dogs, which were the only major domesticate common to Europe and America, structured how Europeans understood Indians and themselves; and that understanding European perceptions of Indians within this deeper framework points the way toward broadening

scholarship on Native America, which has rightly focused on Indian adaptations to European colonization but has paid less attention to the evolution of plants (such as corn) and animals (such as beaver, deer, and horses) that provided raw materials for such a wide range of interactions and exchanges among colonists and Indians.<sup>2</sup>

## DOGS IN EVOLUTIONARY PERSPECTIVE

As Europeans traveled and settled along America's Eastern Seaboard, they often noted that Indian dogs looked and acted like wolves.<sup>3</sup> In the process, they tended to draw lines of separation between so-called wild Native dogs and tame European ones. In 1803 the natural historian Benjamin Smith Barton offered a summary of these differences. The "general aspect" of the "Indian dog," he reported, "is much more that of the wolf than of the common domesticated dogs. His body . . . is more slender than that of our dogs. He is remarkably small behind. His ears do not hang like those of our dogs, but stand erect, and are large and sharp-pointed. He has a long small snout, and very sharp nose." Barton also detected savagery in the behaviors of Indian dogs. "His barking is more like the howling of the wolf. When attacked, and when fighting, he does not shake his antagonist, like our dogs. His teeth are very sharp, and his bite sure. When he snarls, which he is wont to do upon the slightest occasion, he draws the skin from his mouth back, presenting all his teeth to view. Our dogs, when once attacked by these Indian dogs, always fear and shun them. For the purposes of hunting, the Indian dogs are very useful; but in other respects, they are by no means so docile as the common dogs." Barton even attacked the characters of Native dogs. "They have less fidelity," he alleged, "for though never so well fed, they will steal from their masters. In short, every thing shows that the Indian dog is a much more savage or imperfectly reclaimed animal than the common dog."<sup>4</sup> By "reclaimed," Barton meant not only tame but also bred in ways that suited the animals for particular jobs.

One of the main differences between Indian and European dogs was that the former maintained loose contact with human settlements and were not bred in controlled environments, whereas the latter had been shaped by domestication into specialized breeds. When Europeans brought these breeds to America and compared them to the semiwild canines that Indians used, it was easy for them to judge whose animals were fully reclaimed for human service and whose were not.

Far less clear, however, were the ways that dogs' own histories had created those differences. Barton posited an essential hereditary distinction. He suggested that while Native dogs were "the offspring of the wolf and the fox," neither of which he believed were "easily

brought into the domesticated state," European dogs were descended from "jackals," with whose "manners" they seemed to agree.<sup>5</sup> But Barton was wrong. The boundary between dogs of the New and Old Worlds, between "savage" and "reclaimed," was far more porous than he imagined. For all dogs—whether Indian, European, or otherwise—came from gray wolves. According to the geneticist Robert K. Wayne, dogs and gray wolves vary by just 0.2 percent in their mitochondrial DNA—a distance twenty times closer than that between wolves and coyotes. "Dogs *are* grey wolves," Wayne writes, "despite their diversity in size and proportion."<sup>6</sup>

An evolutionary perspective brings to light how wolves developed diversity in Europe even as they remained largely wolf-like in America. The point in bringing this perspective to bear on European-Indian encounters is not to impugn scientists like Barton (who could not have known evolutionary theory fifty-six years before its classic Darwinian formulation). Rather, it is to suggest that processes operating on scales of time reaching back thousands of years shaped the parameters of Euro-Indian encounters in ways that historians have not yet explored.

In the case of dogs, this story begins 15,000 to 32,000 years ago when hunter-gatherers began to domesticate wolves.<sup>7</sup> Biologists continue to debate whether dogs were first domesticated in Europe, the Middle East, or China; whether they came from one wolf population or many; and whether humans or wolves took the lead in making contact with each other.<sup>8</sup> But they agree that the formation of a loose hunting partnership between the two introduced selective pressures among wolves that began to change their behaviors. The new reality for adopted wolves was that too much aggressiveness toward humans or domestic livestock would lead to untimely death. What humans really wanted in their wolves was playfulness. As a result, individuals that acted like puppies got to pass on their genes while those that killed or injured people were destroyed.<sup>9</sup> Repetition of this pattern over millennia barely touched the genetic profile of the animals, which remains that of a wolf, but it did bring out certain traits that formed the basis of breeds.<sup>10</sup>

Breeds developed and died out at different times and places throughout the dog's history. At any given time or place, their existence depended on humans segregating groups of wolves or dogs from wild populations over several generations and selecting for particular behaviors. For reasons that geneticists are still trying to work out, the process of changing how wolves acted altered their bodies as well. Wolves that were bred to act puppy-like also tended to retain juvenile physical features into adulthood.<sup>11</sup> In practical terms, this meant that early dogs were smaller versions of wolves. These lupine dogs were the ones that accompanied hunter-gatherers who crossed into America via the Bering Land Bridge ten thousand years ago.<sup>12</sup> The

first several millennia of the animals' history were marked by intermixture with local wolf populations, which meant the absence of much breed-specific variation.<sup>13</sup> The offspring of early dogs, however, diversified into many forms, particularly during the Neolithic Revolution five to seven thousand years ago when people began selectively to breed dogs for various working roles.<sup>14</sup> Although Neolithic breeds died out during subsequent famines or wars, new ones took their place. Indeed, by the time Europeans reached North America in the seventeenth century it was home to at least nine distinct types of dog, most of which lived in northern, southern, and western regions.<sup>15</sup>

Many of these breeds served specific human ends. Eskimo and Hare Indian Dogs pulled sleds, and the latter were sometimes fatted and eaten. Plains Indian and Sioux Dogs dragged loads behind them. Short-Legged Indian Dogs were beaver hunters. Tahltan Bear Dogs were quick small-bodied canids that tracked bear and harried them until hunters could close in for the kill. A single breed, the Common Indian Dog, dominated the North and Southeast and ranged in a variety of forms throughout the trans-Mississippi West as well.<sup>16</sup> The preeminence of this one variety, an all-purpose predator that Indians used to track game, gave Europeans the impression that Native peoples did not know how to breed dogs for more than this basic purpose. But in fact, the long history of dog breeding in America shows otherwise.

Everywhere in America—from Alaska, to the Great Plains, to the Eastern Woodlands—dogs tended to look like wolves because most American dogs remained semiwild throughout their evolutionary history. As geneticists have pointed out, animal populations diversify in form when humans divide them into subpopulations and limit gene exchanges among them.<sup>17</sup> American dogs experienced the opposite. They received food, shelter, and companionship from humans, who in turn let them interbreed with wolves, foxes, and other dogs.<sup>18</sup> In many cases, Indians maintained this fluid relationship with dogs well after their acquaintance with European husbandry. In 1792, for example, the naturalist William Bartram noted during his travels among the Creeks and Seminoles in Florida a “single black dog” that belonged to an Indian. When the dog became “hungry or wants to see his master, in the evening he returns to town,” Bartram reported. But, he added, the dog “never stays home at night.”<sup>19</sup>

Dogs in Europe lived similar lives through many thousands of years. They, too, had close enough contact with hunter-gatherers to form mutually beneficial relationships but were not bred in captivity. Yet with the advent of settled agriculture, livestock domestication, urbanization, and all manner of attendant cultural transformations, niches formed that required new kinds of dogs. Mastiffs, perhaps brought to Britain by the Phoenicians in the first century AD,

hunted and were used in war. By the sixteenth century, their main function was to guard property.<sup>20</sup> Greyhounds, probably bred from shepherding dogs by the ancient Celts in eastern Europe, hunted game by sight through open fields.<sup>21</sup> Bloodhounds, or “lymers,” were used in England during the Middle Ages to pursue game through forests, and, as enclosure spread during the sixteenth and seventeenth centuries, to chase poachers from private parks.<sup>22</sup> Foxhounds, terriers, beagles, and English spaniels were comparatively modern responses to the demands of aristocratic hunting cultures; greyhound-sheepdog crosses called “lurchers” served English farmers as both hunters and shepherds.<sup>23</sup> Bulldogs, raised as bull baiters in the seventeenth century, entertained urban spectacle goers throughout England.<sup>24</sup> Because Europeans bred dogs for function rather than form, they cared less about reproducing an arbitrary set of physical traits and more about qualities like size, speed, or scenting ability. Many of the features that define modern breeds, such as collies’ elongated heads or bulldogs’ excess facial skin, trace their origins to the Victorian era dog fancy, not to ancient lineages.<sup>25</sup> Nevertheless, by selecting for particular characteristics and minimizing dogs’ contact with wild canids over time, Europeans did bring out distinct physical types.

Indians and Europeans probably developed different ways of relating to dogs for a variety of reasons. The persistence of hunter-gatherer cultures in America, itself a response to the absence of domestic livestock, obviated the need among many tribes to breed herding or guarding dogs.<sup>26</sup> Furthermore, Native religious beliefs, which tended to see all animals as interconnected and wolves as some of the most powerful animals, may have militated against isolating dogs from wolves.<sup>27</sup> It is also possible that Indians would have developed a greater number of specialized breeds had their populations not declined through war and disease. But whatever factors shaped evolutionary divergences in America and Europe, it is clear that those divergences shaped each side’s view of the other. Indians and Europeans sought not to study each other’s dogs, but to know each other through their dogs: to see in their dogs’ bodies and behaviors—their evolutionary profiles—some evidence of the moral qualities of their masters.

## DOGS IN MORAL PERSPECTIVE

That Indians and Europeans understood dogs in moral terms is itself part of a much longer evolutionary history. As dog burials and the 26,000-year-old fossilized footprints of a boy standing next to his dog suggest, an early bond developed between humans and dogs that extended beyond the physical and into the mental world.<sup>28</sup>

Supporting that bond was a remarkable set of evolutionary developments. When wolves and humans joined forces to hunt, both species had already evolved in ways that allowed them to benefit each other. Wolves were experts in detecting, tracking, and wearing down prey, and they now applied these skills in hunting with humans. Humans, whose ingenuity enabled them to develop weapons like spears, atlatls, bows and arrows, and various traps, used these technologies to deliver death blows more quickly than could wolves alone. When humans and wolves began to cooperate in hunting, share food, and live in the same environments together, their digestive, metabolic, and neurological processes evolved in parallel so that each became more like the other.<sup>29</sup>

Their evolutionary histories converged not just in physical, but also in social ways. Dogs developed an ability to understand pointing gestures, follow human gazes, seek people's help in solving problems, and (perhaps also through domestication) read human facial expressions.<sup>30</sup> So powerful was this social bond that it may have led humans and dogs to change in response to each other—a process biologists call “coevolution.”<sup>31</sup> A recent study showed that when dogs and their owners make eye contact, the oxytocin levels of each rise, whereas the same does not occur with wolves and their owners. These differences suggest that over the long course of canine domestication, dogs and humans learned to trust each other in a way that wolves and humans did not—a trust that made it even more difficult to understand when human–dog relationships broke down.<sup>32</sup>

From the perspective of Indians along the Atlantic Coast, interactions with European dogs offered a vicious lesson in how human–dog relationships might go awry. Some of these encounters took place when colonists sent ferocious dogs after Natives. Martin Pring and his men, who explored Maine and New Hampshire in 1603, set mastiffs on Indians “when we would be rid of the Savages Company.” According to the Puritan minister William Hubbard, colonists used bloodhounds to track Indians through unfamiliar forests during King Philip's War. In a similar vein, Benjamin Franklin wondered whether Pennsylvania authorities should keep mastiffs on hand to chase down and kill Indians during the Seven Years' War.<sup>33</sup> That colonists included Indians among these breeds' usual quarry—runaway slaves and wolves—reflects not just their view that Native Americans were “savage” but also their assumption that Indians, like so many other social outsiders, deserved death rather than an opportunity for redemption.<sup>34</sup>

Whether Indians knew (or cared) about these notions of savagery and irredeemability, they recognized an opportunity in European dogs.<sup>35</sup> Here were animals that could hunt, guard livestock, and perhaps even learn to trust indigenous peoples as their own dogs did. Over the course of the seventeenth century, for example, tribes in the



Eastern Woodlands and Chesapeake traded for European dogs. Fredericksburg, Virginia, where Indians first bartered for European hunting dogs in 1698, became the site of an annual dog-trading tradition between Europeans and Indians that would last until the Revolutionary War.<sup>36</sup> These positive encounters should lead us to question colonial observers who implied that Indians feared, or could be made to fear, European breeds.<sup>37</sup>

Native peoples' experiences with their own dogs suggest that in many cases, they would have seen new breeds not as enemies but as potential companions and spiritual protectors. In 1639 one Jesuit observer wrote that Huron dogs were "held as dear as the children of the house, and share the beds, plates, and food of their masters."<sup>38</sup> In 1637 another missionary noted that when a Huron lost his dog, Ouatit, to a bear, the Indian cried out, "Ah! it is true . . . that I dearly loved Ouatit; I had resolved to keep him with me all his life; there was no dream that could have influenced me to make a feast of him,—I would not have given him for anything in the world."<sup>39</sup> Huron women fed puppies as they might feed infants, by filling their own mouths with boiled corn and spitting it into the puppies' mouths.<sup>40</sup> According to Nicolas Denys, a seventeenth-century French explorer, Micmacs cherished dogs so much that "if they have little ones which the mother cannot nourish, the women suckle them; when they are large they are given soup."<sup>41</sup> Caring for dogs did more than secure their friendship. It also secured their guardianship. Among ancient Algonquians in Virginia, archaeologists have found that dogs and humans were buried together. In one case a dog was found atop a severed arm, perhaps intended to guard the arm against the man's spirit coming to take it back. In another, five dogs were buried slightly above a woman, so they could accompany her into the afterlife.<sup>42</sup> On Long Island, New York, during the Woodland period, dogs were often buried near hearths, probably as symbolic watchdogs to protect homes.<sup>43</sup> To be sure, these beliefs and practices would not have led Indians to trust European dogs that chased or threatened to kill them. But Indians' favorable associations with their own dogs may have opened their minds to the possibility of befriending European breeds, contrary to what Pring, Hubbard, and Franklin suggested.

To European colonists, American dogs signified that Indians were unable to improve nature, to turn wild and unproductive beasts into tame and useful ones. Colonists throughout the seventeenth and eighteenth centuries lambasted Indian dogs as wild and ill-mannered, lupine and gaunt, the inevitable products of ignorant and neglectful Indians.<sup>44</sup> Even Barton, who defended Native peoples against these aspersions, linked the lupine nature of American dogs to the low



nature of their masters. “We ought . . . to remember,” he wrote, “that the master of the Indian dog is a savage. It may readily be conceived that this circumstance will influence the genius of our animal. Living in the woods, and too frequently badly treated by his master, the dog must often leave the huts of the Indians, and, perhaps, imbibe from his parents [the wolves] . . . a new tincture of their aspect and their manners.”<sup>45</sup> In the same way, Barton thought the bodies and behaviors of European dogs reflected the qualities of their owners. “Even in our cultivated towns,” he exclaimed, “how much do the manners of the dogs seem to depend upon the calling of their masters! It is a fact, that the dogs of our frontier settlers have a much more savage aspect than the dogs ([of] the same variety) in the villages and populous towns.”<sup>46</sup> In the view of Barton and others, canine biology reflected human morality. In a larger view, it is clear that biological divergences within a single species, as much as larger environmental or ecological factors, informed white perceptions of Indians and themselves.

## DOUBTING IMPROVEMENT

Barton’s late eighteenth-century uneasiness over “savage” European dogs reflected the massive changes that had reshaped America’s social landscape over the previous several decades. From 1718 through 1775, over 200,000 migrants from Ireland, Scotland, and northern England poured into America. Bypassing cities, they tended to settle the backcountry regions of Pennsylvania, Maryland, Virginia, and the Carolinas, and to eke out livings as farmers and traders on an ever-expanding frontier.<sup>47</sup> Meanwhile, cities boomed. Between 1700 and 1820, the population of Philadelphia grew from 2,000 to 118,000; New York City, Boston, and Charleston saw gains in the tens of thousands over the same period.<sup>48</sup> Even as these demographic shifts brought new waves of ethnic and religious diversity, social stratification, and Euro-Indian conflict, they also brought large numbers of Old World breeds to America. Frontier settlers brought along hounds and stock dogs that hunted game, located feral livestock, and protected homes and crops. Migrants to cities brought a range of breeds. A perusal of runaway dog advertisements in urban areas during the late eighteenth and early nineteenth centuries reveals the presence of terriers, spaniels, Newfoundlands, pointers, lapdogs, bulldogs, greyhounds, setters, mutts, and many others.<sup>49</sup> These dogs guarded property and drew carts; fought against rats, bears, and bulls for sport; and lived in homes as pets. Yet humans never maintained complete control, and dogs often pursued opportunities outside the bounds of domestication. In the Ohio River Valley and Louisiana territory, English dogs mixed with French and Spanish

breeds and perhaps with Indian dogs as well. The result was the “cur,” a tough dog that weighed thirty pounds or more, had a yellow or brindled coat, and provided stock for later breeds such as coonhounds and bear hounds.<sup>50</sup> The cur was Barton’s “savage” frontier dog, but he alluded to its counterpart in “cultivated towns,” where a concentration of humans, dogs, poverty, and garbage created ideal environments for the explosion of feral dog populations.

Curs and stray dogs elicited fear among Euro-Americans who wished to consider themselves nature’s improvers. In rural areas, they often raised the specter that European breeds were unstable, that even well-bred dogs could become wolves. During the late eighteenth century, the idea that climate could transform people or animals into better or worse versions of themselves still animated discussions of natural improvement on both sides of the Atlantic. Because many European thinkers imagined that America was filled with swamps, wilderness, and savage Indians, they assumed that all animals, including dogs, would lose strength and civility when transplanted to the New World. That assumption led George Louis Leclerc, the Comte de Buffon, to charge that American dogs had “degenerated” from their European state and “returned to their primitive species.”<sup>51</sup> Thomas Jefferson tried to prove Buffon’s “degeneracy” theory wrong by presenting him with tangible evidence of powerful American animals, such as panther skin, mastodon bones, and a seven-foot-tall stuffed moose.<sup>52</sup> Meanwhile, at Monticello he bred his own dogs from Bergère, a *chien de bergère* or shepherd’s dog, boasting that her offspring were some of “the most careful and intelligent dogs in the world.”<sup>53</sup> Jefferson’s good fortune aside, however, it was difficult to ignore that dogs were finding new ways to thwart America’s improvement.

As settlers, slaves, and livestock moved west in ever greater numbers, dogs found a ready food source in the flocks of sheep that proliferated on the frontier. Thus in 1752, Virginia’s Assembly passed a law that ordered sheep-killing Negro dogs to be put to death, and in 1769, residents of King and Queen County in Virginia petitioned the House of Burgesses to remedy “the great injury and loss that we sustain in our flocks of sheep, by the dogs which are suffered to run at large.” “‘Tis notorious,” the petitioners added, “that the dogs are worse than” wolves.<sup>54</sup> Nor were common farmers the only victims. In 1810 Richard Peters, a close correspondent with Jefferson and president of the Philadelphia Society for Promoting Agriculture, suffered an attack on his prized Tunis flock that led him to deliver a tirade against sheep-killing dogs, which he thought should be dealt with in the same manner as white-killing Indians. “The flagitious sagacity of dogs is almost incredible,” he fumed, “when they are addicted to sheep-killing. They often kill both in the day and night; but more commonly in the grey of the morning, as do the human savages of

our wilderness. Of this vice, when it is once fixed, they are never cured while living: death is the only effectual remedy."<sup>55</sup> While Peters also supported an 1809 law that levied taxes on dog owners to keep stray populations in check, he probably knew that such laws were hard to enforce and that more drastic measures might sometimes be necessary.

Yet Peters's willingness, in the last resort, to kill dogs and Indians raised troubling questions. Was Buffon right about the capacity of American environments to corrupt dogs? Perhaps Presbyterian efforts to convert Indians on Pennsylvania's western frontier or Pennsylvania Quakers' missions among the Wyandots were misguided, since the wolfish natures of Native peoples were "fixed" and beyond cure? The doubts that lurked beneath the surface of Peters's address were conditioned by interactions among biological, ecological, and historical processes that humans themselves helped to direct. When animals that were genetically on par with wolves strayed from humans, whose response to urban market demands was to raise ever larger and meatier flocks of sheep, dogs did what they had evolved to do and killed for food or pleasure. Humans could hurl accusations, make petitions, or doubt their ability to improve nature as they wished, but the biological and ecological pressures that gave rise to sheep killing would continue to play a role in America's nation-making process as long as humans, livestock, and dogs multiplied in rural spaces.<sup>56</sup>

Urban strays, products of a different set of ecological pressures, prompted fears among whites concerning natural improvement and public health, but they also gave middle-class and well-to-do citizens an opportunity to demonstrate civility. In cities such as Philadelphia, Boston, and New York, where people could not always afford to feed dogs or refused to chain their animals, dogs fended for themselves, scavenging food from piles of trash that householders dumped onto city streets.<sup>57</sup> While this practice saved families money and trouble, it also led, as one Philadelphia critic put it in 1785, to "vast numbers of [stray] dogs," whose "perpetual barking and fighting, [was] a very great nuisance."<sup>58</sup> Another observer that same year criticized the "careless inattention" of those who let such dogs run wild, as well as the "fatal consequences" that might result.<sup>59</sup> This writer was referring to rabies, a virus that had evolved millennia ago to attack the central nervous systems of its hosts, killing them within days. Rabies had developed a canine-specific lineage perhaps before the Little Ice Age; diversified into European and other strains around fifteen hundred years ago; traveled to America in the bodies of European dogs; and thrived from time to time, particularly when large numbers of dogs concentrated in small areas, as they did in early American cities.<sup>60</sup> Partly in response to rabies outbreaks that swept through

northeastern cities in 1785, 1797, and 1810, and partly because newspaper reports inflamed fears over “mad dog” attacks, city authorities tried (often without effect) to make dog ownership less appealing by requiring residents to pay a tax on every dog they owned.<sup>61</sup> Sometimes they took a more direct approach, paying people to roam the streets with clubs and beat stray dogs to death, or hiring dog catchers to round up strays and take them to crude pounds, where pound keepers drowned the animals or bludgeoned the life out of them.<sup>62</sup>

Authorities’ efforts to control dogs embroiled cities in class warfare. They pitted poor dog owners against officials who would tax them, and positioned dog-killing citizens, whom authorities often drew from the ranks of the poor, against middle- and upper-rank animal welfare advocates.<sup>63</sup> Among the higher classes, talk of “war” against dogs was common. In 1785 George Washington, writing from Mount Vernon in Virginia, heard rumors that “war is declared against the canine species in New York” and requested that Senator William Grayson tell him more.<sup>64</sup> By 1858 the “war” had grown so regular and acute that *Frank Leslie’s Weekly*, a popular illustrated magazine, published a long article denouncing abuses at a New York pound on First Avenue. Even as it highlighted “Andy,” a club-wielding “dog-broker” who took “a most fiendish delight” in “dashing out the brains of the unhappy animals” (figure 1), it also included an image of a “romantic rescue,” embodied by a young woman who rushed away from these brutish humans, an “imprisoned puppy” in her arms (figure 2).<sup>65</sup> In an age when civility, particularly among middle- and upper-class women, was equated with caring for the vulnerable, the argument of the piece was clear: New York’s dog problem could tell humans something about their own moral constitutions. Would readers embrace the cause of civility and fight against animal cruelty, or would they give in to darker versions of themselves, as Andy had done, and let dogs die?

In later decades, this ethical concern would merge with a political one: How much power should the American Society for the Prevention of Cruelty to Animals, a private entity, have to grant dog licenses, enforce dog laws, and operate pounds?<sup>66</sup> These questions arose not just from human relationships with dogs at a given historical moment, but from the adaptation of long-term biological processes to local cultures and ecologies. The development of wolves’ scavenging behaviors, coupled with the evolution of rabies into a multihost pathogen, worked in urban spaces to undermine Euro-Americans’ pretensions to natural improvement, confront them with the prospect that they were brutal, and raise vexing questions about police power and the public–private relationship.

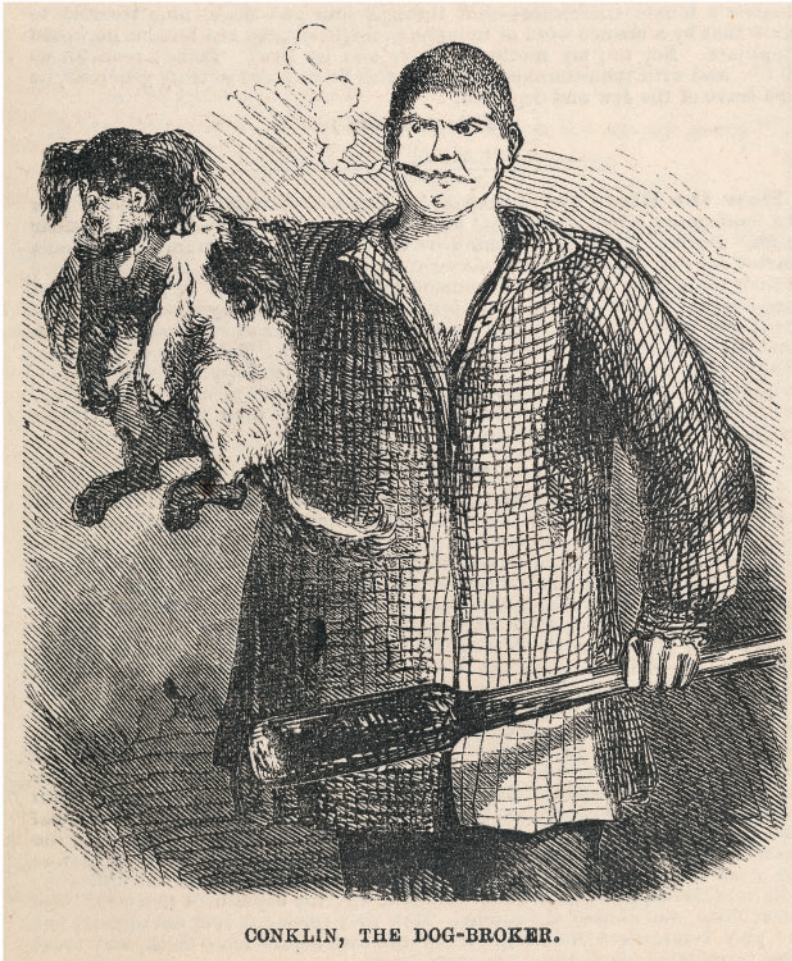


Figure 1. "Conklin, the Dog-Broker," *Frank Leslie's Weekly*, August 14, 1858, p. 166. Credit: Rare Book and Manuscript Library, University of Illinois at Urbana-Champaign.

## DISAPPEARING NATIVE BREEDS?

In 1869, a little more than a decade after New York readers were confronted with the need to prove their civility by rescuing puppies from pounds, Samuel Bowles, a journalist from Massachusetts, concluded from his travels in Colorado that whites ought to prove their civility by rescuing Indians from their agricultural ineptitude. "We know they are not our equals," Bowles wrote, and "we know that our right to the soil, as a race capable of its superior improvement, is above theirs." Therefore, "let us say to him, you are our ward, our child, the victim of our destiny, ours to displace, ours to protect. We





Figure 2. "Romantic Rescue of an Imprisoned Puppy," *Frank Leslie's Weekly*, August 14, 1858, p. 166. Credit: Rare Book and Manuscript Library, University of Illinois at Urbana-Champaign.

want your hunting grounds to dig gold from, to raise grain on, and you must 'move on.'" Indians should be put on reservations, Bowles thought, but "when the march of our empire demands this reservation of yours, we will assign you another; but so long as we choose, this is your home, your prison, your playground."<sup>67</sup> According to the standard account of the American West, Bowles's statements were prophetic. Over the next two decades, a web of cultural, economic, and ecological processes altered Plains societies in ways that drove bison to near extinction, an outcome the Sioux leader Sitting Bull

famously called “a death-wind for my people.”<sup>68</sup> Meanwhile, the combined force of US Army attacks, railroads that brought millions of Euro-Americans westward, the elimination of the treaty system in 1871, and the passage of the Dawes Act in 1887 were too much for tribes to withstand. By 1890 the vast majority of the remaining Indian population had been removed to reservations scattered across the western states. In the half century after Congress passed the Dawes Act, Indians lost 86 million of the 138 million acres of land they had held in 1887—a loss that led to the erosion of Native cultural traditions.<sup>69</sup>

On the surface, histories of Native breeds seem to follow the same narrative line that runs through the myth of the vanishing Indian. Along the Atlantic Coast, Indians’ willingness to trade for European dogs only encouraged the genetic exchanges that had already been occurring as Native and European dogs interbred. Thus while the Common Indian Dog still existed as part of a distinct breed toward the end of the eighteenth century, their populations had thinned.<sup>70</sup> An engraving titled *Dog of the American Indians*, etched during the late eighteenth or early nineteenth century, is suggestive. It shows a black-and-white dog whose face resembles European hunting strains (figure 3). Euro-American writers sometimes commented on these vanishing canines. As James Sullivan remarked in 1795 after making “particular inquiry” of the dogs’ presence in Maine, “there has been none of this mongrel species of animal found lately in the woods, and old Indians have said that they never heard of any such.”<sup>71</sup>



Figure 3. *Dog of the American Indians*, n.d. Credit: Violetta Delafield-Benjamin Smith Barton Collection, Ser. IV, Mss. B B284d., American Philosophical Society Library.



Similarly, when he wrote on Savannah Town, South Carolina, in 1859, two decades after the Cherokee had endured their forced march westward, John Henry Logan bid his readers imagine the “outskirts” of town, where “the smoke from a hundred camp-fires curl[s] above the thick tops of the trees, and the woods resound with . . . the barking and howling of hungry Indian dogs.”<sup>72</sup>

Even in regions such as the Sub-Arctic, Great Plains, and Pacific Northwest, where Native breeds such as the Hare Indian Dog, Plains Indian Dog, Makah Dog, Salish Wool Dog, and Tahltan Bear Dog survived well into the nineteenth or twentieth century, the dominant story became one of decline and disappearance as Native peoples came under pressure to assimilate. To take the Bear Dog, for example, in 1956 W. G. Crisp praised the one that he “acquired . . . from the Indians” as “the quietest and most obedient dog we have owned,” before lamenting that the breed “has by now become mongrelized to the extent that it is unrecognizable as a distinct type.”<sup>73</sup> In 1982 Leslie Kopas, a Canadian author who wrote, as he put it, during the “Last Days of the Tahltan Bear Dog,” observed that the breed’s disappearance “seemed preordained, almost as though people willed it to happen.”<sup>74</sup> In 2002 anthropologist Bryan D. Cummins called the fate of the Bear Dog “one of the saddest in the history of the domestic animal in this country,” for the breed “quickly died” after it “fell into non-Native hands” and left its northwest coastal “homeland.”<sup>75</sup>

These narratives of disappearance, while correct in the sense that European incursions into Native communities prompted new mixtures of canine genes, obscure the ways that dog bodies resisted or adapted to colonization. Native breeds that remained geographically isolated from Europeans, such as the *Qimmiq* in Arctic regions and Carolina Dog in parts of the Southeast, have survived to the present day, with little or no genetic input from European breeds.<sup>76</sup> Yet even in the majority of cases where contact did occur, the genes that Native Americans had isolated would continue to express (albeit in different variations of visible traits) in crossbreeds such as the Native American Shepherd and Feist Dog, as well as some populations of free-ranging dogs.<sup>77</sup> In this connection, it is worth noting that while the face and ears of *The Dog of the American Indians* suggests European influences, the curvature of the tail indicates the presence of Native dog genes. In the same way, traits that were common to certain Native breeds could reappear in successive generations—particularly when breeders tried to select for those traits, as two of them have recently done in an effort to bring back the Tahltan Bear Dog.<sup>78</sup>

Narratives of breed disappearance also obscure that, in many cases, Indians did not expect dogs to have physical traits beyond what was needed for them to do a particular job. Buffalo Bird Woman, a Mandan Hidatsa Indian who lived through much of the nineteenth century, recalled how pack dogs were bred for nothing more than size

and strength in the North Central Plains: “As we wanted only big dogs, and those of the first litter never grew large, we always killed them, sparing not even one. From the second litter, we kept three or four of the puppies with large heads, wide faces, and big legs, for we knew that they would be big dogs; the rest we killed.”<sup>79</sup> The Pawnee, who lived further south in the Central Plains, probably used similar breeding techniques, but they did not rely exclusively on large dogs, particularly after the introduction of horses, which now did most of the heavy hauling.<sup>80</sup> Yet armies of small village dogs proved as useful in hauling cargo as did their larger counterparts. An 1858 painting by Alfred Jacob Miller, based on an earlier sketch from his travels among western tribes in 1837, shows how the Pawnee put anything with legs, even small dogs, to work (figure 4).

Pawnee dogs, despite their small size and European appearance, made possible the survival of social patterns that had long been part of Plains cultures. These dogs could haul loads, communicate and build relationships with humans, and sound warning barks when visitors approached camps. Furthermore, they allowed women to retain their traditional role as dog trainers and *travois* builders, a role that is visible in the foreground of Miller’s painting, where a woman bends down to adjust a *travois* strap while another looks on.<sup>81</sup> These jobs were not breed specific, which meant that while gene exchanges



Figure 4. Alfred Jacob Miller, *Pawnee Indians Migrating*, 1858. Credit: Walters Art Museum.

occurred among Indian and European dogs, such exchanges did not erase what Plains tribes valued in their dogs. For what they valued were not the characteristics of particular breeds, but rather traits such as endurance, intelligence, and trainability, which are found across a large swathe of the canine world.

Perhaps the most vexing problem with stories of Native breed disappearance, much like the myth of the vanishing Indian, is that such stories put Native dogs comfortably out of mind. After Indians were removed to reservations, they no longer needed dogs to pull *travois* or aid in hunting. Far from disappearing, however, dogs that families kept as pets multiplied. As tight-knit working relationships between humans and dogs unraveled, and as poverty kept reservation dwellers from consistently feeding their dogs, Indians, like urban whites who had faced a similar situation decades before, found it convenient to let dogs roam freely. As a result, feral dog populations exploded on reservations, a problem that continues today.<sup>82</sup>

Like that of their white counterparts decades earlier, Indians' feral dog problem rests on interactions among dogs, local ecology, and human culture. Since most reservations lie in the arid West, straddle high-elevation land, and remain far from other human settlements, it is difficult for large, naturally reproducing dog populations to find enough food to sustain themselves outside of towns.<sup>83</sup> Bounded by the land, dogs tend to remain among local humans and scavenge. Yet because of poverty and a lack of veterinary care, and because reservation dogs form packs and come into regular contact with other wild animals and each other, the spread of rabies is common. Starvation among humans and dogs can also be a threat. Food insecurity is common on many reservations, and families struggling to feed children are not likely to spend resources on dogs. These factors combine to create dysfunctional ecologies in which dogs and humans, reversing millennia of cooperation, are often enemies rather than allies. Reservation dogs struggle with a host of ailments including mange and ticks. They bite humans, spread disease, and kill children. Humans, meanwhile, fight violence with violence. According to a recent report, "Ogalala Sioux tribal officials rounded up and killed 'a horse-trailer full' of dogs" on the Pine Ridge Indian Reservation in South Dakota after a pack of dogs allegedly attacked and killed an eight-year-old girl.<sup>84</sup> Such reports are themselves problematic, for they depict reservations as savage places and implicitly reproduce the idea that Native Americans are less than civilized—an image that finds its counterpart in projects such as Rescue Operation for Animals of the Reservation (ROAR) and *Dogs with No Names*, the "romantic rescuers" of our century.

## BIOLOGY, HISTORY, OR BOTH?

In one sense, the problems that Indians faced on reservations were problems that whites themselves created. By dispossessing Native peoples and forcing them to reside with their dogs in places where it was difficult to sustain a living, whites laid the ecological foundations for social failure. In a deeper sense, however, reservation life was only the most recent moment in a long, and often difficult, history of human and canine adaptation. Throughout that history, a pattern emerged in which the particular shape of human–dog interaction, coupled with the particular ecologies each inhabited, influenced the ways dogs looked and acted, and in turn the ways that whites perceived Indians and themselves. This way of telling history can itself be troubling, for it risks reducing human events to natural processes, thereby eliding elements such as politics and culture—and even blame—that animate stories of the past.

In light of this, I suggest that one of the main challenges facing the field of evolutionary history is to tell stories that emphasize the unique methods of history and biology while also reducing the distance between them. To be sure, environmental historians are experts in telling such stories. But given the many approaches that now animate our field, from the materialist, to the cultural and intellectual, to the ecocritical, it has sometimes been difficult to come to terms with each other's methods and contributions, let alone reduce the distance between them.<sup>85</sup> Faced with this challenge, we may wish to collapse all distinctions by defining evolution as a historical “force,” as though genetic mutation and the development of cultures over time were equivalent. But here we must be careful. The causal principles that governed dog evolution, namely natural selection and genes' responses to environmental pressures, are categorically different from the ones that led Richard Peters to conflate dogs with Indians, namely the rise of sheep breeding in rural Pennsylvania and the construction of race that attended Europe's imperial expansion. Nevertheless, evolution is a historical process. It results from pressures that species, climates, and geographies exert on each other over time. Because humans are evolutionary actors, the best of these histories will take seriously not only biology, but also the ways that human ideas and cultures interact with different versions of plants or animals at different times. In so doing, they can push us to embrace our field's methodological diversity even as they root us in the material world.

Like genes, the traits of these histories will depend in part on their local settings. My analysis might have tacked north to probe how dogs, Inuits, and white settlers shaped and reshaped each other on the Arctic tundra. Or it might have explored how different groups of Indians responded in different ways to European dog breeds, opening

broader questions about the role that dog evolution played in Native adaptation and survival. If these stories (or the many others that await telling) treat evolution as both biology and history, they can refine Russell's model of evolutionary history even as they recalibrate our understanding of familiar events. Moreover, as this study has sought to do, they can help answer a question that presses the world now more than ever: How do the ways humans relate to nature shape how they relate to each other?

**Joshua Abram Kerckmar** is a Lilly Postdoctoral Fellow and Lecturer in History at Valparaiso University.

## Notes

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