



RECOGNIZING HISTORICAL INJUSTICES IN MEDICINE AND THE JOURNAL

## Indigenous Americans — The *Journal's* Historical “Indian Problem”

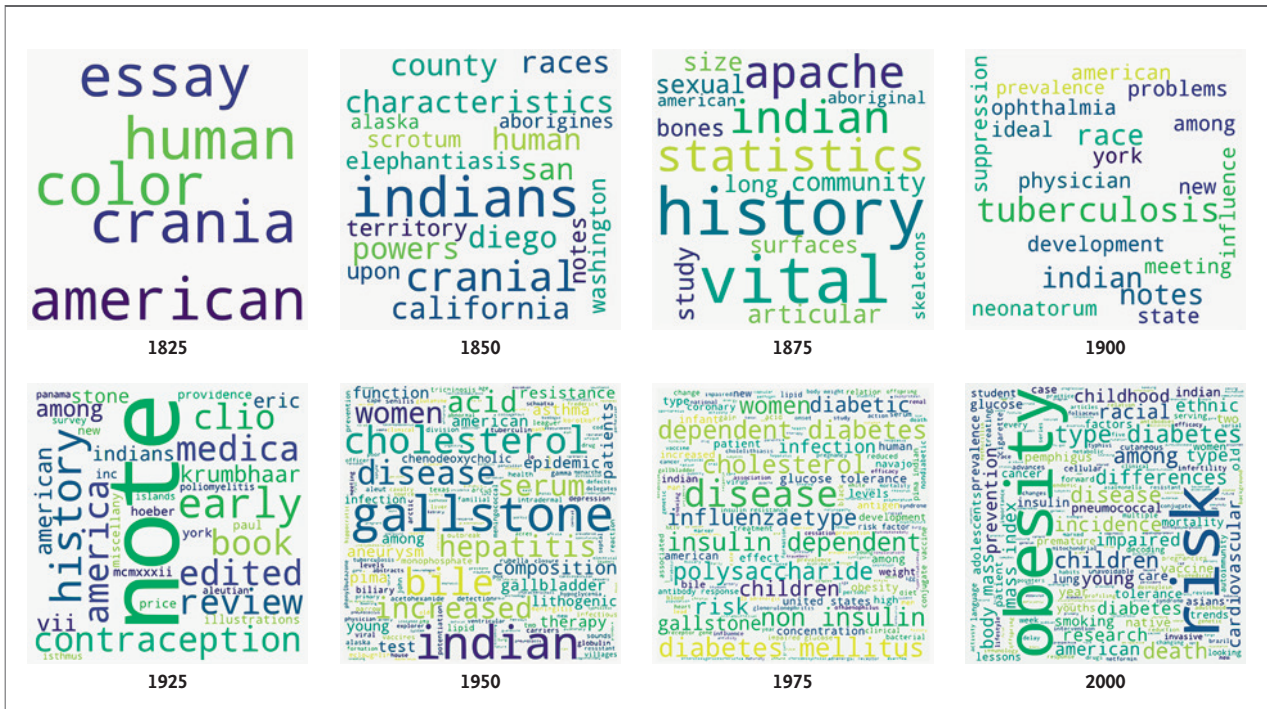
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*This article is part of an invited series by independent historians, focused on biases and injustice that the Journal has historically helped to perpetuate. We hope it will enable us to learn from our mistakes and prevent new ones.*



By the time the *Journal* was launched in 1812, Boston had witnessed two centuries of destructive confrontations between Europeans and Indigenous Americans. Although some Indigenous communities persisted in New England, most conspicuously in whaling, few Indigenous people would have been visible on Boston's streets. But away from the Atlantic coast, North America remained an Indigenous continent.<sup>1,2</sup> Over the ensuing years, the *Journal* published thousands of articles that mentioned Indigenous people, but far fewer that focused on them.

The *Journal*, like American society more broadly, had an “Indian problem.” Racism against Indigenous Americans and settler-colonial strategies shaped centuries of dispossession, war, subjugation, and impoverishment; these attitudes persist today.<sup>3</sup> The *Journal's* authors theorized about the merits of savagery and civilization, decried Indigenous medicines, speculated about susceptibility to epidemics, or prophesized Indigenous extinction. The disdain was often gratuitous. An 1895 article about syphilis slandered Indigenous women who had been sent to assimilationist industrial schools: “A prevalent opinion, especially among philanthropists, is that the Indian s— is a model of chastity. God spare the model! Even some of the girls who have been to the schools on the Atlantic coast are common property for white men. What their habits with the bucks are is not known, but many white devils contract venereal diseases from the ‘blankets.’”<sup>4</sup>



Word Clouds Derived from *Journal* Articles about Indigenous Americans, in 25-Year Increments.

The density of words correlates with the number of publications in each period. The early focus on skin color and cranial shape and size gave way to new concerns by the late 19th century, especially tuberculosis, ophthalmia neonatorum, and race. Publications after 1950 increasingly focused on noncommunicable diseases, especially diabetes and gallstones (reflecting the many articles the *Journal* published about the high prevalence of these diseases among the Akimel O’odham).

A 1913 essay by Ernest Codman about appendicitis included a striking caption: “There is no good Indian but a dead Indian and there is no safe appendix but a completely obliterated one.”<sup>5</sup> This adage, a relic of frontier wars, endured for decades.<sup>6</sup> Equally striking are the erasures: decades could pass without the *Journal* seriously engaging with problems of Indigenous health.

Although it’s simple enough to mine the *Journal*’s archive for slanderous commentaries, the challenge is to strike a balance among documenting what authors said, conveying empathy and outrage, and suggesting productive interpretation. The *Journal*’s historical commentaries about Indige-

nous Americans reveal more about authors’ and editors’ values and priorities than about Indigenous communities themselves. Such racist discourse reflected, perpetuated, and legitimated settler-colonists’ faith in the righteousness of their mission. It’s essential that readers understand these dynamics if they are to recognize and repudiate similar processes at work today.

There is no simple way to characterize the *Journal*’s representations of Indigenous Americans. Searches for “Indigenous,” “Native American,” or “Indian” yield thousands of articles, many of which are not actually about Indigenous Americans. It’s also im-

portant to search for terms that, regrettably, were once in common use, such as “savage.” To generate an overview, we collected a subset of articles that focused on Indigenous Americans and used it to train a machine-learning classifier that identified 212 relevant articles. The rate of publication steadily increased, from 0 to 2 articles per year in the mid-19th century to 0 to 12 articles per year by the late 20th century. We divided those articles into 25-year groups and generated a word cloud for each period, which revealed major themes and associations (see figure). The analyses that follow are drawn from articles we identified using many strategies.

### Curiosity and Respect in a Time of Appropriation

Even as Europeans pushed west across America, commandeering lands and displacing Indigenous communities, they remained curious about what they could learn. They hoped, for instance, to learn local remedies from Native populations.<sup>7</sup> In 1817, the *Journal* published six articles about the medicinal powers of the Saratoga springs, recommended by Indigenous communities.<sup>8</sup> An 1831 account praised garden sage, "one of the most celebrated Indian remedies" for cancer and ulcers.<sup>9</sup> Such praise was often qualified: physicians argued that though Native healers had great powers of observation, they had no understanding of disease or therapeutic mechanism.<sup>10</sup>

Settlers did respect aspects of Indigenous life. Many accounts in the early 19th century contrasted the hardiness and fortitude of "savage life" with "the evils of civilized life."<sup>11</sup> Indigenous Americans were capable of feats that would kill White people: "the savage, in northern climates, is said to plunge with impunity, at every season of the year, into the coldest stream, yet the health, if not the life of an individual, reared amid the luxuries and refinements of civilized society, would be endangered, were he to attempt a similar course."<sup>12</sup> Such accounts cast civilized life in stark relief. An Illinois physician warned in 1839 about its perils: "The rude Indian of the forest breathes the balmy air of his native abode, partakes of his simple repast, and rarely lays the sickened head to rest. Not so with the man whom education and refinement have placed in the high

circles of life." When "artful man" interferes with nature, "he suffers the penalty of sickness."<sup>13</sup>

Early authors were also fascinated by skin color. One doctor argued in 1844 that skin color reflected the wisdom of God, with each complexion suited to its climate, "intensely black to the purest white, as you recede from the equator to the frigid zone." Indigenous Americans were darker than they should have been, perhaps because they had come from the south and had not lived long enough in the north to whiten.<sup>14</sup> Another wondered whether complexion reflected diet, ways of living, or the diversity of the first humans. He asked readers to set aside their "repugnances or preferences" and accept the wisdom of nature.<sup>15</sup> Doctors also examined Indigenous (and Black) people who lost their color. An 1821 account described a "full blooded Indian" whose skin became "remarkably clear and white."<sup>16</sup> Physicians worried about the malleability of race.

### Conflict and Scorn

As land seizures increased over the 19th century, Indigenous people were portrayed as obstacles and threats. An 1817 account described how "mortal epidemics" waged "irregular warfare against the human species, and resemble the barbarous nations of the earth, as the Algerines in Africa, and the Indians of the American wilderness, who pillage and destroy after having given assurances of peace and friendship."<sup>17</sup> Fear was not abstract. The *Journal* published death notices of doctors, including many killed by Indigenous people. An Army doctor was "massacred by the Indians" in Florida in 1836.<sup>18</sup> Another was

captured and initially spared for his expertise, "but a young savage who had lost a brother in the battle" shot him dead.<sup>19</sup> Such language served to justify and facilitate further conflict.<sup>3</sup>

As Europeans gained confidence in America, their fears gave way to scorn. A graduation feast at Geneva Medical College included a speech by Dr. Waowawanaonk, a Seneca chief and "an educated physician," given in his native language. The *Journal's* editorialist noted sarcastically that the speech "must have been vastly edifying to a company of gentlemen who never heard a word of that dialect before. However, it was a capital talk, and all the better for not being understood."<sup>20</sup> An 1854 review of craniometry placed the "Barbarous tribes of American Indians" one step above Africans and well below the larger-brained English, Anglo-Americans, and Germans.<sup>21</sup> By century's end, Indigenous Americans had become emblems of ignorance. In 1892, an Alabama physician complained that too many physicians attempted abdominal surgery without proper training: "they knew no more about intestinal surgery than a wild Indian about school-teaching."<sup>22</sup>

Curiosity about Indigenous therapeutics was replaced by disdain. A New Hampshire physician in 1849 issued a scathing diatribe: "of all the gross and palpable impositions upon the public credulity, the pretence that the Indians understand the healing virtues of roots and herbs is the most absurd and monstrous." Their "'medicine men,' as they are called, are the greatest impostors living. They surpass their civilized imitators. They 'out-Herod Herod' in



knavery.”<sup>23</sup> When the Bureau of Indian Affairs sent physicians to reservations, their job description included inducing “the Indians to discard the practices of their native medicine men, and to substitute civilized treatment for superstitions and barbarous rites and customs.”<sup>24</sup>

### The Contest of Savagery and Civilization

The balance of power shifted decisively after the Civil War. By 1900, expanding White settlement exerted its will on the lands and peoples of the United States. Pursuing policies of appropriation, White communities repeatedly drove Indigenous peoples from their lands and pushed them beyond the boundaries of the United States, only to expand those boundaries and subsume them again. The consequences were dire: high mortality, population decline, and confinement on marginalized reservations. These harms occurred in parallel with the emancipation of enslaved Africans, massive immigration from Europe and Asia, and furious debates about who was American and what that meant. Physicians joined other scientists in buttressing assumptions of White supremacy.

Conceptions of the healthfulness of Indigenous life shifted in the mid-19th century. An 1851 account dismissed romantic notions of “savage life,” especially “the idea that they enjoy immunity from sickness.” This notion was false: “The weakly die, the robust live, and hence their paucity in numbers.”<sup>25</sup> As White people’s confidence in the superiority of their civilization grew, federal policy sought to civilize Indigenous Americans — creating a new

threat. An 1892 article noted that “it is the ‘transition period’ in which the Indian constitution suffers. If he could be given at once a knowledge of the laws of health and then have the best hygienic surroundings he would undoubtedly be better off than in a state of savagery.” Too often, however, Indigenous people experienced the “evils of imperfect civilization and misapplied efforts at civilization.”<sup>26</sup>

Similar shifts occurred in many areas of medical thought, perhaps most dramatically in writings about race and differential susceptibility to disease. Since first encountering Indigenous Americans, Europeans had asserted that they were uniquely susceptible to epidemics.<sup>27</sup> In 1836, George Catlin “witnessed the frightful effects of smallpox amongst the Winnebagoes and Sioux” with both sympathy and disdain. They suffered a “ghastly death,” “hideously howling their death song in utter despair, affectionately clinging to each other’s neck with one hand, and grasping bottles and tin pans of whiskey in the other.”<sup>28</sup> Smallpox killed 10% of Nevada’s Indigenous population in 1853: “The Indians are totally helpless when thus attacked.”<sup>29</sup> The 1918 influenza epidemic “was extremely severe among the Indians.”<sup>30</sup>

Recurrent dire epidemics fueled narratives of Indigenous extinction. After a smallpox epidemic in 1838, a St. Louis newspaper reported that “The Assineboines are said to be extinct, and most of the Blackfeet have fallen victims.”<sup>31</sup> Alcohol contributed as well. In 1860, a British newspaper reported that an “intelligent American physician” had blamed “the gradual extinction of this remarkable people” on their addiction to “fire-

water”: “They have a degenerate and comparatively imbecile progeny, who indulge in the same vicious habit with their parents. Their progeny is still more degenerate, and after a very few generations the race ceases altogether.”<sup>32</sup>

Reports of differential susceptibility fueled centuries of theorizing. An 1873 French treatise speculated that it is “the invasion of a new territory that renders epidemics destructive”: “When an epidemic falls upon a people for the first time, most of the persons disposed to receive its effects are attacked. It destroys a large number.” Children of the survivors “will be less disposed to suffer.”<sup>33</sup> Doctors invoked imagery of “virgin soil.”<sup>34</sup> An 1884 report noted that when cholera first arrived in Europe in 1830, it “reached virgin soil and comparatively rapid modes of transit, and soon availed itself of its privileges.”<sup>35</sup>

The phrase, however, eventually came to be reserved for epidemics in Indigenous communities. An 1890 article, for instance, discussed the impact of leprosy and syphilis on the “virgin soil” of the Sandwich Islands.<sup>36</sup> Alcohol caused similarly dire problems. A 1910 essay contrasted “the comparative immunity which English-speaking races possess toward alcoholism” and “the annihilating effects which it has when newly introduced into savage races like the American Indians.”<sup>37</sup> Virgin-soil theory offered a compelling, intuitive explanation for the disproportionate suffering of certain communities, but it relied on a reductionistic logic of evolutionary inevitability that ignored the impact of social inequity and political power.

Virgin-soil theory helped justify increasingly rigid theories of

race and race hierarchies in the late 19th century. An 1866 account described how “the red man of this continent and the autochthens of Asia have dwindled before the antagonism of the hardier blood and brains of the Anglo-saxon race.”<sup>38</sup> An 1883 article foretold the imminent demise of Native Hawaiians: “The very unequal struggle which the semi-civilized and naturally indolent Hawaiian has to maintain with the vigorous, fast-coming white man is gradually but inevitably exemplifying Darwin’s doctrine of the survival of the fittest.”<sup>39</sup>

### Resilience, Persistence, and Failed Policies

Amid the devastation wrought by dispossession, war, and genocide, the federal government occasionally intervened to help Indigenous Americans. Early efforts focused on vaccination. A passing mention in 1835 noted that the “government paid the last year four thousand six hundred and seventeen dollars for vaccinating Indians.”<sup>40</sup> But many beyond this campaign’s reach died of smallpox in 1838.<sup>41</sup> As the United States forced Indigenous communities onto reservations, it signed treaties providing health care, but medical services were hamstrung by inadequate staff, funds, and motivation. An 1880 editorial lamented the plight of the Northern Cheyenne, confined on lands “infested with malaria, a condition of things hitherto unknown to these Indians.” When hundreds fell sick in May, the doctor requisitioned supplies. None arrived until January: “What an encouragement for medical men who seek such places!”<sup>42</sup>

Countless judgments can be made against the reservation system. Its designers claimed reser-

vations would allow Indigenous communities to live in peace, outside the United States. Critics condemned these communities’ confinement to marginal lands that couldn’t support them. Fatalistic government officials saw reservations as palliative care for a dying race. Whatever its motives, the government defaulted on its obligations, failing to provide the necessary aid and care.

Doctors occasionally found bright spots in the suffering. Yes, the reservation system unleashed a tuberculosis epidemic, for which Indigenous peoples were “virgin soil.” But, as some doctors began to argue, this virgin susceptibility could be overcome. Races gained resistance to infections over time. The Sioux could hope that their tuberculosis mortality (2488 per 100,000) might one day fall to that seen “in the Polish Jews” (71 per 100,000).<sup>43</sup>

Observers soon recognized that Indigenous Americans were not going extinct: a 1910 analysis of vital statistics noted that their birth rate exceeded their death rate. Yet the author doubted the “ability on the part of the Indian to meet the conditions of modern life outside of the peculiar and special shelters of reservations. For better or for worse, the rise and fall of races, as of animal species in all times past, goes on under laws beyond human government or appreciable modification.”<sup>44</sup> By 1936, population recovery could not be denied. The *Journal* reprinted a *New York Times* article proclaiming “RED MEN THRIVE: The erstwhile vanishing Indian now has a birth rate that is probably the highest in the world... [T]he tribal existence has adjusted itself to the shock of reservation life.”<sup>45</sup>

Health services remained grossly inadequate. In 1926, the secretary of the interior attempted to reform the Indian Medical Service.<sup>46</sup> Investigations after World War II found “appalling conditions.” A *Journal* editorial fumed that “The Great White Father, despite bumper budgets of recent years, has turned out to be, in the case of his copper-colored children, an Indian giver. The original possessor of the country’s fields and forests, now one of the world’s most forgotten displaced persons, surrendered these possessions (after a struggle) for the opportunity of living in squalor as a permanent Guest of the Nation.”<sup>47</sup>

In response to a 1969 exposé, “Medicine in the Ghetto,” one doctor reminded readers that “Hidden from public view and thus from public conscience, the first American, the American Indian, represents the poorest of the poor in this rich land and an undeniable indictment of our failure as a society.”<sup>48</sup> Even as this doctor condemned the erasure of Indigenous Americans, Indigenous activists demanded attention, launching the American Indian Movement and asserting Red Power. Vine Deloria and other Indigenous scholars offered new histories focused on the experiences and abuses of Indigenous communities.<sup>49</sup> The 1975 Indian Self-Determination and Education Assistance Act gave those communities more authority to manage their own affairs, including health care. Thinking about disease shifted as well. Physicians increasingly directed their attention away from genetic causes of health disparities and toward social determinants of health.

Nevertheless, problems grounded in dispossession and structural

racism persisted. In 2005, Lakota physician Yvette Roubideaux described how her efforts to improve health care for the San Carlos Apache “were constantly thwarted by obstacles to good health that extended far beyond the hospital — problems whose roots lie in the high rates of poverty, unemployment, alcoholism, and other ongoing public health crises.”<sup>50</sup> Indigenous Americans (1.7% of the population) remain underrepresented in medicine, accounting for 0.4% of the physician workforce<sup>51</sup> and 1.0% of first authors and 0.7% of senior authors in *JAMA* and the *Journal*.<sup>52</sup>

Covid-19 accentuated disparities that had persisted for centuries. Indigenous Americans had the highest rates of Covid hospitalization.<sup>53</sup> The Indian Health Service and tribal hospitals were overwhelmed.<sup>54</sup> Concerns about racial injustice were amplified by the murders of unarmed Black Americans. A powerful essay in the *Journal* highlighted the long history of racism in America: “We got here because we live in a country established by indigenous dispossession and genocide.”<sup>55</sup>

Prompted by the historical trauma of past epidemics, Indigenous communities rallied against Covid. By December 2021, American Indians and Alaska Natives had achieved high vaccination rates.<sup>56</sup> Expanded funding and calls for reform generated guarded optimism: “As the United States reexamines its social contract and definitions of racial equity, it is a promising time to reflect on big solutions for fostering a transformative, rather than transactional, relationship between the federal government and tribal nations.” There was

hope for “renewed relationships based on respect, tribal sovereignty, and equitable resources.”<sup>57</sup> Medical care and research can deliberately target histories of racism, colonization, and erasure in pursuit of respect, inclusion, restoration, and revitalization.<sup>3</sup>

Hopes face entrenched obstacles. For centuries, European colonists and American settlers felt entitled to seize Indigenous lands and devastate Indigenous communities. These processes were cataclysmic. Indigenous communities contend with pronounced health inequities to this day. And yet writings in the *Journal*, from many influential health experts, routinely expressed Euro-American fantasies of superiority and conquest. What can American medicine offer in service of apology, reconciliation, and repair to re-surgent Indigenous communities?

The series editors are David S. Jones, M.D., Ph.D., and Scott H. Podolsky, M.D.

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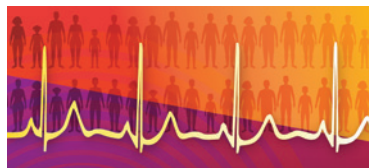
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