

# Indian mortality in northwestern New Spain, 1500-1678

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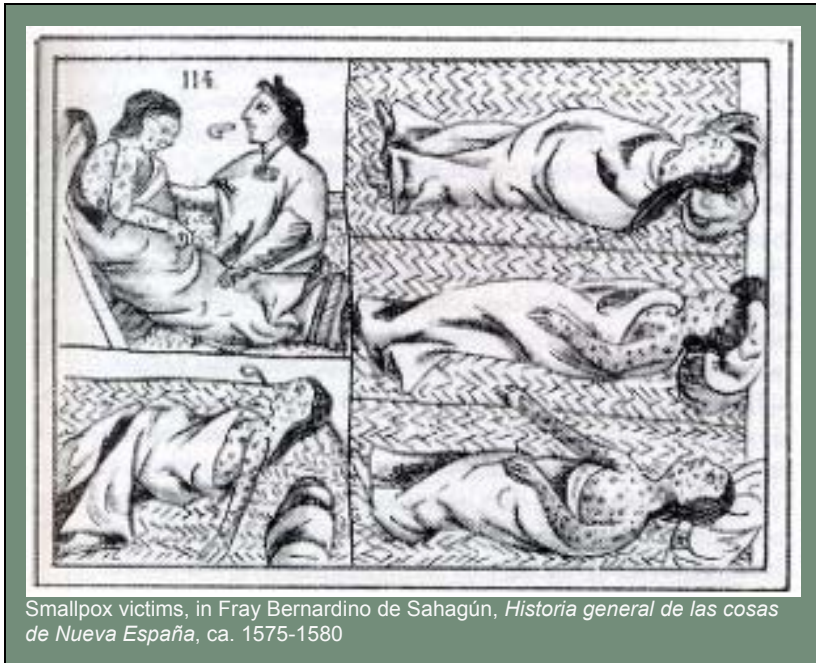
It is doubtful that there was a word or phrase that aroused as much fear among native people in Mexico during the sixteenth and seventeenth centuries as the term *cocoliztli*. This Nahuatl referent for disease took on a new meaning during the Conquest of Mexico, when smallpox, which previously was unknown in Mexico,

claimed untold lives, including thousands of defenders of the Mexica capital. During the months preceding and following Cortés's conquest of Tenochtitlan, smallpox spread to many areas of southern Mexico, Central America, and eventually Inca Peru. Although precise figures are lacking, at least several million Amerindians are believed to have perished during the pandemic. Ironically, because of the speed with which smallpox spread, many died without every having seen a Spaniard. (Cloudsley-Thompson 1976; Crosby 1967; Dobyns 1963).

## POPULATION TRENDS AMONG NATIVE AMERICAN GROUPS in NORTHWESTERN NEW SPAIN

	TOTAL	Serrano groups	Cáhita Proper	Cáhita of Río Fuerte	Guasave & Ahome	Yaqui	Mayo	Nébome	Utes and Mountain Pima	Sisibotari Opata of the Río Sahuaripa	Ayvino & Batuco Opata	Opata of "Señora"	Opata, Pueblos, & Pima Alto
1500	587,250	87,000	22,000	40,000	22,500	60,000	60,000	20,000	12,000	8,750	15,000	20,000	220,000
ca. 1625	234,203	<sup>1</sup> 10,014	<sup>1</sup> 2,880	<sup>2</sup> 12,938	<sup>1</sup> 4,261	<sup>2</sup> 20,450	<sup>2</sup> 16,000	<sup>2</sup> 11,750	<sup>2</sup> 10,000	<sup>3</sup> 4,410	<sup>5</sup> 7,500	<sup>5</sup> 15,500	<sup>5</sup> 118,500
1678	92,344	3,821	1,298	4,219	1,422	7,549	7,197	2,380	1,946	2,007	2,470	4,035	<sup>6</sup> 54,000

<sup>1</sup>1624 <sup>2</sup>1624 <sup>3</sup>1628 <sup>4</sup>1629 <sup>5</sup>1638 <sup>6</sup>1678: Totals from 1678 (Opata), 1680 (Pueblos) and 1700 (Pima Alto). 1500 estimates were derived from various sources (see Reff).



Smallpox victims, in Fray Bernardino de Sahagún, *Historia general de las cosas de Nueva España*, ca. 1575-1580

The smallpox pandemic of 1518-25 is one of the earliest and better known disease episodes that had a profound impact on native Americans. Wherever Europeans went, from New England to the Amazon and from Alaska to Tierra del Fuego, Old World diseases accompanied and, some believe, preceded the invaders. Because native Americans had not been exposed previously to maladies such as malaria, influenza, and smallpox, they lacked genetic traits that promoted resistance to these diseases. (Dunn 1965; McNeill 1976; Motulsky 1971). Genetics, however, cannot exclusively explain why native peoples perished in large numbers. The unprecedented and inexplicable suffering caused by Old World diseases often left the survivors of epidemics in a state of shock or overcome with panic and fear. These debilitating emotional states often contributed to suicide, starvation, dehydration, or various secondary infections that proved lethal in the absence of basic care. (e.g., Aschmann 1959-146; Cook 1955:321-22; Neel et al. 1970). . . .

Clearly, empirical evidence from a variety of New World contexts is needed before we can draw general conclusions about the introduction, spread, and consequences of Old World disease in the Americas. Toward this end, the present study documents the demographic and cultural consequences of Spanish-introduced disease among aboriginal populations in northwestern Mexico, particularly what is today northwestern Durango, Sinaloa, Sonora, and southwestern Chihuahua. Data are also discussed that pertain to the Pima and Pueblo populations of the American Southwest. . . .

. . . Population densities in the Greater Southwest [northwestern Mexico and the American Southwest] were comparable to other areas of the New World with largely sedentary, agricultural populations. Like the majority of New World inhabitants, the aboriginal population of northwestern Mexico and the American Southwest lived in village and towns ranging in size from several hundred to several thousand people. . . .

. . . [M]ost native communities [in the Greater Southwest] largely escaped exploitation by *encomenderos*, miners, or other Spaniards. In 1591, the Jesuits established their first permanent mission in northwestern Mexico, and were given what amounted to a virtual monopoly on the control of the native population, particularly in northern Sinaloa and Sonora. . . By 1678, the Jesuits had established missions throughout northwestern Mexico and had baptized close to 500,000 natives. During the closing decade of the seventeenth century the Jesuits advanced into Baja California and southern Arizona. Missionary efforts continued in both regions as well as in northwestern Mexico until 1767, when Charles II expelled the Jesuits from his overseas empire.

The Jesuit experience in northwestern Mexico produced a wealth of documents that is perhaps unparalleled outside of central Mexico, Paraguay, and Peru. The bulk of this material consists of correspondence from individual missionaries, mission superiors, and the head of the Jesuit Order in Mexico City (father provincial). . . Of particular importance here is the fact that the Jesuit materials contain countless references to and reports of disease and epidemics. It is possible, in fact, to construct a relatively complete disease

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San Jose de Tumacácori Mission, founded in 1691 by Jesuit missionary Eusebio Francisco Kino in the Santa Cruz River valley among the Sobaipuri Indians, who did not survive as a distinct cultural group. [Arizona, photograph, 1937]

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Pima Indian outside a ki, or roundhouse, Arizona, 1907, photograph by Edward S. Curtis. The surviving Sobaipuri people were absorbed into the Tohono O'odham (Papago) and the Akimel O'odham (Pima). [NPS]

chronology for northwestern Mexico, particularly for the period after 1591. . . .

A distillation of the evidence from northwestern Mexico results in a number of general observations regarding the introduction, spread,

and consequences of Old World disease that should have relevance for others areas of the Americas. First, it is clear that the rapid and pronounced reductions in population that have been inferred for central Mexico and Inca Peru were not unusual. In northwestern Mexico, as in the two civilizations to the south, Old World diseases destroyed upwards of 90 percent of the aboriginal population. It is further apparent that the precipitous decline and the failure of native populations to rebound was due largely to acute and chronic infectious diseases, rather than slavery, infanticide, or other evils coincident with Europe's invasion of the Americas. This finding should not obscure the fact, however, that heinous crimes were committed by Spaniards such as Nuño de Guzmán [*conquistador* and early Spanish official in Mexico]—crimes that resulted in the death of tens of thousands of natives and which helped destroy the fabric of Indian society. . . .

Paralleling the precipitous decline in native population were profound changes in aboriginal culture. Before Old World diseases took their toll, native peoples in many areas were integrated into chiefdoms or what Spanish explorers termed kingdoms and provinces (e.g., Señora, Topia, Oera, Batuc, Vacapa). Often these chiefdoms encompassed physiographically discrete river valley segments, and had hierarchical settlement systems with thousands of people divided among rancherías [temporary villages], villages, and towns. Through a variety of agricultural techniques, native peoples realized considerable surpluses that empowered elites and that were channeled into craft production, exchange, and large-scale warfare. All this changed with repeated exposure to smallpox and other maladies.

Infectious diseases with mortality rates in excess of 25 percent had their greatest impact on large, nucleated settlements, resulting in the abandonment of villages and towns and a proliferation of rancherías. Epidemics necessarily undermined productive strategies and long-established work, trade, and marriage alliances. Without surpluses, craft production and trade declined along with the power of native elites, who had been empowered by differential access to and control of surpluses and exchange. Similarly, the power and



influence of native priests and shamans were undermined by their inability to adequately explain and halt the unprecedented suffering caused by disease.

It was in the context of a disease environment that native peoples accepted missionization. Contrary to popular belief, Jesuit innovations, with the exception of cattle, which provided a ready source of protein during epidemics, were of little significance during the late sixteenth and seventeenth centuries. Native peoples were more interested in baptism and other rituals that might protect them from disease. Although the Black Robes and their ritual cleansing of the soul provided no such protection, the Jesuits did fill a void left by the failure of native priests, shamans, and other elites. . . .

Acknowledging the evidence of disease makes it further possible to account for Jesuit and Indian relations without reference to ethnocentric notions of cultural superiority. The fact that some native groups ceased to exist as distinct cultural entities, while others persisted, also becomes more intelligible in the light of the evidence of disease. It is apparent, for instance, that the majority of native groups that survived the dislocations of the early historic period, did so, at least in part, because their behaviors and beliefs were ideally suited to a disease environment. The Seri, Navajo, and Apache, for instance, all lived in small, mobile bands and had limited contact with Spaniards and more sedentary Indians, who were important disease vectors. Similarly, the Tarahumara and Varohío, while sedentary, withdrew to the virtually inaccessible canyon country of Chihuahua, residing in caves and small rancherías and avoiding contact with outsiders and even themselves.

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Pima women harvesting saguaro cactus fruit, Arizona, 1907; photograph by Edward S. Curtis