NATIVE AMERICAN HEALTH DISPARITIES: WHAT CAN BE DONE?¹

By
Gary Arthur

ABSTRACT

This case explores the state of Native American health and the significant health disparities that exist between Native Americans and other populations. Health disparities have historic and inter-generational roots. Forced displacement from their ancestral environments followed by assimilation and legislative acts and laws that compromised the health of Native Nations has been a centuries old challenge for good health and well-being. New approaches to address the health needs of Native Americans are explored. Prevention and treatment strategies that connect with culture and traditions may be the pathway for current and future generations to achieve a state of wellness that can turn the tables on illness and disease.

The state of health for Native American (American Indian & Alaska Native – AI/AN) populations in the United States is currently in serious condition. National statistics put them well below the average for access to health care, and they rank highest in negative health statistics of any ethnic or racial group. (Indian Health Service, 2018) This case explores issues in Native American health, the factors that contribute to health disparities, how well health is promoted, and strategies being pursued by tribes to address these issues.

The Status of Health for the Native American and Alaska Native Populations

The American Indian and Alaska Native people have long experienced lower health status when compared with other Americans. Broad quality of life issues such as lower life expectancy and the disproportionate disease burden exist because of inadequate education, disproportionate poverty,
discrimination in the delivery of health services, and cultural differences. (Indian Health Service, 2018)

According to a U.S. Department of Health and Human Services study Healthy People 2020, disparities is often interpreted to mean ethnic or racial disparities. “If a health outcome is seen to a greater or lesser extent between populations, there is a disparity.” (Healthy People 2020, 2008)

According to 2007 – 2009 statistics, The Indian Health Service (IHS) reports that American Indians/Alaska Natives (AI/AN) rate highest in heart disease, unintentional injuries (mainly auto accidents), diabetes mellitus, cirrhosis, flu and pneumonia, nephritis, suicide, assault, and cancer.

(ihs.gov – disparity fact sheet)

Disparity for AI/AN Veterans - A distinct inequity exists for this group who serve in our armed forces at a higher rate than any other U.S. ethnic group. In spite of this impressive statistic, AI/AN veterans are three times more likely compared to other groups to not have health insurance and have a higher rate of mental health issues. They are also four times more likely

---

2 Obtaining the best and accurate data for AI/AN to understand the true state of health of AI/ANs is a challenge. Issues: No one data system for AI/AN or Tribes, US Census and Federal Office of Management and Budget racial/ethnicity standard definitions and uses of data is not broadly understood by those completing the census, no standard policy on AI/AN identity

- Racial misclassification of an individual’s race or ethnicity
- Low participation in statewide surveys (e.g. Washington State Healthy Youth Survey - only 1 of nine Tribal Schools participated in the survey)
- Small population size

than white counterparts to report unmet health care needs. (Develle & Mitchell, Health Services to American Indian and Alaska Native Veterans: Falling through the Cracks)

Mortality Disparity Rates

American Indians and Alaska Natives (AI/AN) in the IHS Service Area 2009-2011 and U.S. All Races 2010 (Age-adjusted mortality rates per 100,000 population)

<table>
<thead>
<tr>
<th>Cause</th>
<th>AI/AN Rate 2009-2011</th>
<th>U.S. All Races Rate - 2010</th>
<th>Ratio: AI/AN to U.S. All Races</th>
</tr>
</thead>
<tbody>
<tr>
<td>ALL CAUSES</td>
<td>999.1</td>
<td>747.0</td>
<td>1.3</td>
</tr>
<tr>
<td>Diseases of the heart (Heart Disease)</td>
<td>194.7</td>
<td>179.1</td>
<td>1.1</td>
</tr>
<tr>
<td>Malignant neoplasm (cancer)</td>
<td>178.4</td>
<td>172.8</td>
<td>1.0</td>
</tr>
<tr>
<td>Accidents (unintentional injuries)*</td>
<td>93.7</td>
<td>38.0</td>
<td>2.5</td>
</tr>
<tr>
<td>Diabetes mellitus (diabetes)</td>
<td>66.0</td>
<td>20.8</td>
<td>3.2</td>
</tr>
<tr>
<td>Alcohol-induced</td>
<td>50.0</td>
<td>7.6</td>
<td>6.6</td>
</tr>
<tr>
<td>Chronic lower respiratory diseases</td>
<td>46.6</td>
<td>42.2</td>
<td>1.1</td>
</tr>
<tr>
<td>Cause of Death</td>
<td>AI/AN Rate 2009-2011</td>
<td>U.S. All Races Rate - 2010</td>
<td>Ratio: AI/AN to U.S. All Races</td>
</tr>
<tr>
<td>----------------------------------------------------</td>
<td>-----------------------</td>
<td>-----------------------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>Cerebrovascular diseases (stroke)</td>
<td>43.6</td>
<td>39.1</td>
<td>1.1</td>
</tr>
<tr>
<td>Chronic liver disease and cirrhosis</td>
<td>42.9</td>
<td>9.4</td>
<td>4.6</td>
</tr>
<tr>
<td>Influenza and pneumonia</td>
<td>26.6</td>
<td>15.1</td>
<td>1.8</td>
</tr>
<tr>
<td>Drug-induced</td>
<td>23.4</td>
<td>15.3</td>
<td>1.5</td>
</tr>
<tr>
<td>Nephritis, nephrotic syndrome (kidney disease)</td>
<td>22.4</td>
<td>15.3</td>
<td>1.5</td>
</tr>
<tr>
<td>Intentional self-harm (suicide)</td>
<td>20.4</td>
<td>12.1</td>
<td>1.7</td>
</tr>
<tr>
<td>Alzheimer's disease</td>
<td>18.3</td>
<td>25.1</td>
<td>0.7</td>
</tr>
<tr>
<td>Septicemia</td>
<td>17.3</td>
<td>10.6</td>
<td>1.6</td>
</tr>
<tr>
<td>Assault (homicide)</td>
<td>11.4</td>
<td>5.4</td>
<td>2.1</td>
</tr>
<tr>
<td>Essential hypertension diseases</td>
<td>9.0</td>
<td>8.0</td>
<td>1.1</td>
</tr>
<tr>
<td></td>
<td>AI/AN Rate 2009-2011</td>
<td>U.S. All Races Rate - 2010</td>
<td>Ratio: AI/AN to U.S. All Races</td>
</tr>
<tr>
<td>--------------------------</td>
<td>-----------------------</td>
<td>-----------------------------</td>
<td>-------------------------------</td>
</tr>
</tbody>
</table>

* Unintentional injuries include motor vehicle crashes.

NOTE: Rates are adjusted to compensate for misreporting of American Indian and Alaska Native race on state death certificates. American Indian and Alaska Native age-adjusted death rate columns present data for the 3-year period specified. U.S. All Races columns present data for a one-year period. Rates are based on American Indian and Alaska Native alone; 2010 census with bridged-race categories.

Besides the statistical information shared in the chart above, the following areas also plague the AI/AN population:

**Chronic health conditions:** 1.) The prevalence of overweight and obesity in children and adults are higher than any other population group. 2.) Thirty-one percent of men and twenty-six percent of women eighteen years of age and older smoke tobacco products. 3.) American Indians and Alaska Natives are twice as likely as white adults to be diagnosed with diabetes. 4.) American Indian and Alaska Native adults are sixty percent more likely to have a stroke than white counterparts. (Russel, 2010)

**Leading causes of death:** 1.) Heart disease, cancer, and accidents are the leading causes of death for this population group. 2.) For this population group, suicide is the eighth leading cause of death. Native youth have more serious mental health problems such as depression, anxiety, and substance abuse. Students who are bullied and compromised because of sexual orientation or gender expression are 30% more likely to commit suicide. (Arviso, 2014). 3.) There are 8.28 infant deaths per 1000 births in this population group. American Indian and Alaska Natives are 3.7 times more likely to begin prenatal care in the third trimester or not at all. (Russel, 2010)
According to the CDC, “…infant mortality is an important marker of the overall health of a society.” The infant mortality rate for AI/NA mothers is at 9.4 for 2016, and the general rate is at 5.8. (https://www.cdc.gov/reproductivehealth/maternalinfanthealth/infantmortality.htm) Also the pregnancy-related mortality ratios (PRMR) reported by the CDC place AI/NA women at a 29.7 per 100,000 rate higher than that of their non-native counterparts in connection with pregnancy related deaths.

https://www.cdc.gov/mmwr/volumes/68/wr/mm6835a3.htm?s_cid=mm6835a3_w#T1_down

These statistics underscore not only the leading causes of death for this populations, but also reveals significant disparities that exist in comparison to other U.S. populations

Opioid Crisis – The Opioid crisis is a nationwide problem of epidemic proportions, but Native Americans and Alaska Natives experience opioid related death at three times the rate of Blacks and Hispanic Whites. According to the Center for Disease Control (CDC), an opioid overdose rate affects AI/AN at a rate of 8.4 per 100,000 which is second only to Whites. A national study reported from 1999 to 2009 the highest prescription opioid death rate for this population of any race. (National Indian Health Board, 2018)

Fetal Alcohol Syndrome – One of the most significant health problems facing Native Americans is alcoholism. They are five times more likely to die from alcohol related causes than whites. Fetal Alcohol Syndrome Disorder (FASD) describes the range of effects that can occur if one’s mother drank alcohol during pregnancy. Many lifelong effects on the health of those who suffer from FASD include physical, mental, behavioral, and learning disabilities. (US Dept. of Health and Human Services, 2018)

Missing and Murdered Indigenous Women and Girls (MMIWG) - The Urban Indian Institute (UIHI), which is a division of the Seattle Indian Health Board, released a report in 2018 about the challenges in collecting data involving missing and murdered American Indians and Alaska Natives residing off –reservation and outside rural villages.

“Seventy-one percent of American Indian and Alaska Natives live in urban areas, yet accurate data does not exist regarding the rates of violence among this population,” said Abigail Echo-
Hawk, Director of UIHI and citizen of the Pawnee Nation of Oklahoma. “This report is a step towards addressing this epidemic.”

Juana Majel-Dixon (Pauma Band of Mission Indians), Executive Board Member and Recording Secretary of the National Congress of American Indians (NCAI) said the UIHI report identified the state of Alaska as the fourth-leading state for number of cases of MMIWG. Also, in the top ten states are New Mexico, Washington, Arizona, Montana, California, Nebraska, Utah, Minnesota and Oklahoma. (Missing and Murdered Indigenous Women & Girls: A nationwide data crisis Brad Angerman Posted on: Nov 14, 2018, Posted in “Press Release”, Sexual violence retrieved at: https://www.uihi.org/new-report-identifies-506-urban-missing-and-murdered-indigenous-women-girls/ )

Oral Health Disparities - Despite the use of dental decay prevention programs by the Indian Health Service and tribes, the AI/AN population has the highest tooth decay rate of any population in the United States. Access to adequate oral health is a major factor. There are two major reasons that contribute to access. 1.) geographic isolation of tribal populations, especially Alaska and 2.) the inability to attract dentists to practice in IHS or tribal health facilities. Alaska alone has 85,000 Natives who live on isolated villages accessible only by boat or plane. (Confronting Oral Health Disparities Among American Indian/Alaska Native Children: The Pediatric Oral Health Therapist David A. Nash, DMD, MS, EdD and Ron J. Nagel, DDS, MPH) Retrieved at: https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1449361/

Categories of Personal Health

Common denominators for good physical health are linked to diet and moderate exercise, but research identifies separate dimensions of health that influence health and expands on the definition supplied by The World Health Organization: “Health is the state of complete physical, mental, and social well-being, not just the absence of disease or infirmity.” (WHO, 2018)

The following categories influence the overall state of personal well-being.

1.) Physical Health – This category refers to body shape and size, functioning, susceptibility to disease, sensory acuity, fitness, and recuperative abilities. The traumatic effects of relocation, isolation, and assimilation are sadly evident in the contemporary Native population. Obesity
and diabetes are evidential plagues as a result of forced changes in diet, exercise, and living conditions.

2.) Social Health – This category is explained by experiencing satisfying personal relationships and interactions, adaptability to social situations, and engaging in appropriate societal behavior. Again, the traumatic effects of relocation and assimilation have altered and interrupted the social existence of AI/AN populations. Forced to live in two worlds, relationships, interactions, and societal behavior are marginalized as Natives attempt to adapt to colonization while trying to hold on to the social fabric of their heritage.

3.) Intellectual Health – This category simply means to think clearly, reason objectively, and analyze critically. The traumatic effects of colonization where Natives were told how to think and reason, has immensely detrimental effects on intellectual health. The critical thought necessary to survive in one environment or culture becomes foggy when attempting to apply this approach intellectually to the colonizing effects of another culture.

4.) Emotional Health – This category engages in the appropriate expression of emotions and is also characterized by possessing self-esteem and self-efficacy, and experiencing trust, and love. The marginalizing effects of colonization has greatly affected the emotional health of AI/NA populations. When the dominant culture relegates these populations to second class status through policy and legislation, self-esteem and self-efficacy are considerably impacted.

5.) Environmental Health – The effects of the physical environment we live in is critical to all elements of health; therefore, it is essential that we preserve, protect, improve and appreciate our physical environment. Of all cultures AI/NA populations have been renowned stewards of the physical environment. Removal from ancestral lands where Indigenous ways of knowing protected the environment, these populations became disconnected in a harmful way. When wild life, water, and air are threatened all suffer this area of health being compromised.

6.) Spiritual Health – This category is characterized by a feeling of unity with the existence of a greater force, and a guiding sense of meaning or value in all life. (Donatelle, 2009) This extremely meaningful dimension of health has been greatly compromised through government policy and colonization. Boarding school policies created a disconnect for Native cultures that is still evident today as tribes try to recover their spiritual traditions through the renewal of their ceremonies, language, and culture. (THE AMERICAN INDIAN HOLOCAUST: HEALING HISTORICAL UNRESOLVED GRIEF; Maria Yellow Horse Brave Heart, Ph.D. and Lemyra M. DeBruyn, Ph.D. retrieved at www.ucdenver.edu/caianh

Another dimension of health defined by NA/AN is “Cultural Wellbeing” which entails the ability to live in two worlds; possess a knowledge of history, culture, and language; adapt a positive Native Identity; and form a positive connection to one’s culture. (Pavel, et al, 2008)

The dimensions or categories of health are interactive and supportive of overall well-being. A combination of these dimensions that greatly affects and has affected NA populations is referred to as “psychosocial health.” Psychosocial health includes the mental, emotional, social, and spiritual dimensions of what it means to be healthy. “Psychosocial health is the result of a complex
interaction between a person’s history and his or her thoughts about and interpretations of the past and what the past means to the present.” (Donatelle, 2009)

Given the distressing history of NA in connection with genocide, relocation and assimilation, psychosocial health has been greatly compromised for this population and the result is often referred to as “historical trauma” which affects overall well-being for this population to this day. Historical trauma is a theory that is used to explain historical loss symptoms suffered by Native Americans. These symptoms are a transmission of cross-generational losses of population, land, and culture. (Brown-Rice, 2018)

The Indian Child Welfare Act (ICWA) of 1978 has attempted to correct the years of intervention in an Indian child’s life through harmful assimilation efforts by the government that removed Indian children from their homes to boarding schools as well as utilization of unfair adoption and foster care practices. ICWA restored jurisdiction of child welfare to the tribes. The National Indian Child Welfare Association (NICWA) has spearheaded this effort. Underfunding, poverty, single parent families, and substance abuse are key risk factors for child abuse and neglect that are well above the national average. (Simmons, 2014) The traditional manner in which tribal culture places children from troubled home environments is to put them with relatives or extended family. This approach maintains family ties and supports a closer tie to parents. The Government path to adoption of Native children requires the termination of parental rights (TPR) which is usually not accepted by most tribes. To evade the typically negative experiences with government adoptive care, some tribes have innovated their own ways of adoptions connected to their cultural traditions. (Cross, Kastelic, and Fox; “Dilemmas and Solutions in Tribal Child Welfare,” retrieved at http://nativecases.evergreen.edu/)

**History of Indian Health Care in the U.S.**

“The Federal Government and Indian Tribes have a unique legal relationship. The “trust relationship” between the US and federally-recognized tribes has long been recognized in the Constitution, statutes, regulations, case law, Presidential executive orders, and agency
policies. In its role of “guardian,” the US provides a variety of services, including health care, to Indian people.” (National Indian Health Board, 2009)

The Indian Health Care Improvement Act (IHCIA), along with the Snyder Act of 1921, form the basis for federally funded health care to NA. The establishment of the Indian Health Service which began on July 1 1955, was formed to institute the goal of delivering services to 1.9 million (1921 census count) AI/AN residing in tribal communities. (National Indian Health Board, 2009)

The federal government promised to take care of Native Americans’ health when it signed the treaties in which tribes gave up almost all of their land. Margaret Moss is a member of the Hidatsa tribe and has worked as a nurse for the Indian Health Service, as well as other systems, and now teaches nursing at the University of Buffalo. She points out that the US government has not kept their end of the bargain regarding health care. NA health needs are regularly unmet by underfunding. In 2016, the IHS health care budget was set at $4.8 billion. Spread across 3.7 million American Indians and Alaska Natives - coverage per person is $1297. That compares to $6,973 per inmate in the federal prison system. (Whitney, 2017)

Given the higher health status enjoyed by most Americans, the lingering health disparities of American Indians and Alaska Natives are troubling. In trying to account for the disparities, health care experts, policymakers, and tribal leaders are looking at many factors that impact upon the health of Indian people, including the adequacy of funding for the Indian health care delivery system. (Indian Health Service, 2018)

Government laws, broken treaties, assimilation, and displacement all took effect and still are factors that influence the overall health of Native Americans. The following legislations and laws have had dramatic effects on NA health.

The Indian Removal Act of 1830 was a government policy that ordered Indigenous populations from their existing land to be relocated to “unsettled” lands in the West. Oklahoma was the primary location and was observed as “Indian Territory.” (Zaferatos, 2015)

The Indian Appropriations Act of 1851 restricted Native peoples to small portions of land referred to as reservations. A motivating factor for this legislation was to free up Native land for
re-distribution to settlers and business operations outside the oversight or ownership of NA. (Native Voices Timeline)

The **Dawes Act of 1887** is also referred to as the General Allotment Act. It was another oppressive strategy that redefined boundaries within the reservations as allotments which created land referred to then as “surplus” which could be settled by the Euro-Americans looking for land. (Zaferatos, 2015)

The **Curtis Act of 1898** amended the Dawes Act by abolishing tribal governments, continued allotment of communal lands to registered tribal members, continued sale of “surplus” lands, and dissolved tribal courts. Tribal land titles were extinguished in the Oklahoma Territory designated as Indian Territory. (The Cherokee Nation, 2018)

The above legislations usurped an estimated 500 million acres of NA land that was originally assigned to them through treaty negotiations or were identified as territories of their ancestors.

The **Snyder Act of 1921**

Part of the reforms in the 1920s, the Snyder Act was supposed to “… treat and preserve the health of AI/NA citizens in federally recognized tribes.” In it

> Congress authorizes funds for “the relief of distress and conservation of health” among American Indians. The act defines the government’s responsibility for American Indian health care and is one of several legislative reforms in the works to improve the living conditions for American Indians on reservations and in government boarding schools. (Native Voices, 2018)

Unfortunately, Native peoples in the 1920’s had poorer health than that of the general population and higher rates of infectious disease and mortality. Native populations experienced diseases that did not affect the rest of the country. This Act failed to achieve its purpose. (Rainie et. al. 2015)

The **Miriam Report** conducted a survey in the late 1920’s of American Indian health services that provided a comprehensive summary of health issues affecting this population. The suggested changes outlined in this report had a positive influence on future health care policies affecting Native Americans. The report took the federal government to task in the following areas: 1.) insufficient appropriations, 2.) inadequate medical facilities, 3.) nonexistent preventive medicine programs, 4.) absence of adequately trained physicians and nurses, 5.) lack of understanding of
American Indian cultural knowledge and ideas about health, and the need for reliable data-gathering on American Indian health conditions. Positive changes to later policies and health services addressed many of these issues. (Rainie, et.al. 2015)

**1924 Indian Citizenship Act** – This all-inclusive Act assigned privileges of U.S. citizenship to all Native Americans born in the United States that were largely governed by state law. The right to vote was often denied to NA in the early 20th century. This Act resulted not from any kind of petition from NA, but was an assimilative action of acceptance into mainstream society. (http://www.nebraskastudies.org/0700/frameset_reset.html?http://www.nebraskastudies.org/0700/stories/0701_0146.html)

**The Indian Reorganization Act (IRA) of 1934** has been often referred to as the “Indian New Deal.” The goal was to reverse the policies of assimilation and encourage restoration of traditions and cultures of NA. Management of land and mineral rights were restored and economic strategies were supported and developed for reservations. (Zaferatos, 2015)

The constitutionality of the IRA has been continually questioned and addressed in the US Supreme Court. At issue is the transfer of non-Indian land to Indian land by taking it into “trust.” Trust land is free of state and property taxes, so state and local governments typically oppose it.

During the 1960’s activism efforts pushed for greater tribal autonomy than what was previously granted to them. Self-governance and the right to make their own decisions regarding issues and matters of the tribe were being pushed. Congressional support for the legal rights of NA and tribal sovereignty was strengthened, and legislation was put in place to help with tribal concerns, including passage of the 1975 Self Determination Act and Indian Education Act. (Rights of Native Americans, 2018) This Act supported participation in the government and education of Native People. The Act also provided full participation of Indian tribes in Federal Government programs and services. (Public Law 93-638)

**1945-61 Termination Act** – This Act was another assimilation policy that abolished and relocated tribes to urban areas. A resolution connected to this Act, not only moved Natives off their treaty allotted land, but also sold this land. Although most termination activities had ended by 1958, it was not until 1970 that President Nixon officially ended the policy. (https://www.nlm.nih.gov/nativevoices/timeline/488.html)
1976 Indian Health Care Improvement Act (IHCIA) (PL–94-437) – President Obama signed this legislation into effect in 2010 as part of the Patient Protection and Affordable Care Act. This signing made permanent the original law that was signed in 1976. This Act, by reimbursing Medicare and Medicaid services, better accommodated those residing in remote and rural locations where these services were not available. It also provided more comprehensive support for Medicaid services utilized through IHS or a Tribal facility. (Medicaid.gov, 2018)

1978 American Indian Religious Freedom Act (PL-95-341) – This law protects Indian religious practices (visiting sacred sites, use of religious sacraments, and performance of traditional services) from government interference. American Indians are the only Americans whose religious practice is covered by a law other than the First Amendment to the Constitution. (US Dept. of Health and Human Services-Native Voices retrieved at https://www.nlm.nih.gov/nativevoices/timeline/545.html; 2010)

**Determinants of Health**

By examining each of the determinants of health identified by the Dept. of Health and Human Services and how each has affected and is affecting NA, it may be possible to come up with strategies to improve the negative influences these determinants have on NA health. *Healthy People 2020* asserts that determinants of health such as 1.) quality education, 2.) nutritious food, 3.) decent and safe housing, 4.) affordable and reliable public transportation, 5.) culturally sensitive health care providers, 6.) health insurance, 7.) clean water, and 8.) non-polluted air are major influences on a population’s overall health. (Healthy People 2020, 2008) 7.) Adverse Childhood Exposure. (Koss, M, et. Al, 2003.)

**Adverse Childhood Exposure (ACE)** is a major determinant to AI/AN health. The nine categories of Adverse Childhood Exposures are listed below:

1. Physical Abuse
2. Sexual Abuse
3. Emotional Abuse
4. Physical Neglect
5. Emotional Neglect
6. Boarding School Placement
7. Foster Care Placement
8. Adoption
9. Having an alcoholic parent
Researchers at the University of Arizona and the National Institute of Alcohol Abuse and Alcoholism conducted face-to-face interviews across seven Native American Tribes between 1998 and 2001. 86% of those interviewed experienced one or more of categories 1 through 5, and 33% experienced four or more of categories 6 through 9. (Koss, M, et. Al. 2003)

ACE is an outcome of historical trauma, but a challenge when this is talked about is that this is a reference made regarding the past. The reality of this dynamic is that historical trauma is experienced in the present in the ways we relate to one another. It’s in our bodies, and it is in our daily thoughts. The researchers asked Indigenous youth about their thoughts of historical loss.

THOUGHTS DAILY OR SEVERAL TIMES A DAY

1. Losses from effects of alcoholism
2. Loss of our people through early death
3. Loss of language
4. Loss of culture
5. Loss of land
6. Loss of traditional spiritual ways
7. Loss of trust in whites/broken treaties
8. Loss of family ties/boarding schools
9. Loss of families/relocation
10. Loss of self-respect/poor treatment from government

The study found that one in four are thinking every day, several times a day, about loss of people they knew, language of their people, and losses associated with alcoholism. One in five are thinking every day or several times a day about loss of culture, land, and spiritual ways. One in six are thinking every day or several times a day about loss of trust, family, and respect. These are tremendous burdens for children to bear and has a monumental effect on their dimensions of health. (Koss, M, et. al., 2003)

Quality of Education – The types of education provided for AI/AN has been closely tied to practices of government assimilation of NA culture. Part of the assimilation process was to take Native children from their homes and send them to government boarding schools where they were exposed to a Euro-American curriculum and strict socialization to the ways of Westernized culture, including not being allowed to speak their language or engage in cultural practices.
“Sadly, the education system lies at the heart of maintaining the erasure of Native Americans. Native children have been mis-educated for generations under deliberately repressive federal policy, and all children in public schools are mis-educated in U.S. and Native history.” (Dunbar-Ortiz, Education Week, 2016)

This is especially painful for urban Native students unable to benefit from strong cultural ties to their extended family and culture. This can include not being tribally enrolled and/or wholly disconnected from their culture. (Ellwood, indiancountrymedianetwork.com, 2017)

Because of the boarding school approach, the parents and community were isolated from the colonized education of their children which created a disconnect and influenced family and community well-being, negatively affecting psycho-social health. The traumatic effects of this approach to NA education are still evidence of what is referred to as Historical Trauma that continues to afflict NA populations marginalizing psycho-social health. While many of these boarding schools no longer exist, the quality of education on and off the reservation is still often marginal at best. Although strides are being made, improvement is still needed.

Nearly half of Native American people are under the age of 24; more than one-third of Native children live in poverty; and Native youth have the lowest high school graduation rate of students across all schools. Nationally, the American Indian/Alaskan Native high school graduation rate is 69 percent, far below the national average of 81 percent -- but the situation for the eight percent of Native students attending Bureau of Indian Education (BIE) schools is much worse with an average graduation rate of 53 percent. (Bureau of Indian Education, 2018)

Even though the boarding school approach has fallen off, a westernized method to education still often supports the colonizing and marginalizing of NA students in many school systems. A recent study by Sarah Shear and her colleagues looked at representations of Native Americans in the K-12 curriculum in U.S. public schools. They found that the overwhelming majority gave the impression that “all Indians are dead” only presenting information on Indigenous people in the 1900 context (Shear 2015). Many reservation schools are run by the state and do not have faculty or programs that bond with the community. One negative effect of this is that the community is not supportive of the school system. Research has shown that including the history, challenges, and accomplishments of NA in public school curriculum is also important since the vast majority of NA students are in public schools. When a public school system addresses these issues, the psycho-social health of NA improves. (Banker; 2015)
Recently the State of Washington passed legislation creating the opportunity for tribal governments to enter a contract with the State to establish tribal compact schools. This contract allows tribal communities to have more direct control of their school systems and the curriculum and has been more successful (Winstead et. al., 2018). Now seven of the eight Bureau of Indian Education schools have become tribal compact schools in Washington.

Another success story involves the Neah Bay High School on the Makah Indian Reservation in Washington State. A common thread that hinders Native student success is tribal mistrust of school district leadership, approaches and policy. One of the first things a newly hired high school principal, Dr. Ann Renker, accomplished was connecting and garnering support of the Tribe. Transparency, collaboration, communication, and coordination were established to garner tribal support, and then establishing target areas with backing of the Tribe supported a new and positive approach to ensure student success. The target areas included achievement, budget, teacher retention, and Makah culture and language inclusion. The school moved from performing in the lowest five percent of Washington schools in 2005 to all 2013 graduates receiving letters of acceptance to college, universities, tech schools, and the military. (Menchaca, 2014)

Nutritious Food –Tribal relocation with usurpation of existing lands often eliminated access to traditional diets and water and had a profound effect on NA diet and overall health. As part of the “guardianship” agreement provided by treaty law, the government has historically supplied tribes with a diet of primarily white sugar, white flour, and canned protein. Canned meat loaded with bi-products, sodium, and cancer causing preservatives and nutritionally compromised flour replaced lean wild game and abundant availability of natural grains and fruit. NA are among the highest statistics in the areas of cancer, type II diabetes, and obesity – maladies with a direct connection to diet. Not only was the traditional diet of NA a healthy one, but hunting and gathering were healthful exercises in search of sustenance that for many NA is no longer part of their lives. (Nelson, 2008)

The Gila River Indian Community (GRIC) of Arizona is a prime example of this dynamic. After the Tribe’s water source was diverted this Tribe lost access to their traditional waters that were part of an agricultural existence. Starvation set in followed by reliance on processed foods. The result has been exceptionally high rates of diabetes and obesity. For years the Tribe has been
fighting for the return of their water source. The Arizona Water Rights Settlement Act of 2004 finally provided a solution restoring 653,500 acre-feet of water annually. (Brown, 2009) Now the GRIC is working on a return to a traditional diet complimented by physical activity in re-establishing the agricultural lifestyle of their ancestors. They have also become a national leader in the food sovereignty movement among Native Americans, recently hosting a Food Sovereignty Conference.

Tribal Food Sovereignty - Taking control of dietary intake is a major approach to Native Food Sovereignty. This strategy, applying sovereign methodology to the healthful dietary needs of Native Americans, is a major factor in reclaiming traditional lifestyles of wellness.

The overall goal of the Native American Food Sovereignty Alliance (NAFSA) is to develop a movement that gives voice to issues of Native sovereignty, food-system control and policy development, and serves as a strong network for collaboration among various organizations engaged in Native food-system control. (Native Foods Resource Center, an Initiative of First Nations Development Institute, https://www.nativefoodsystems.org/about/sovereignty)

Good food is essential to healthy, strong tribal nations. Having enough good food to eat – food security – is just one element of food sovereignty. That involves controlling and managing all of the factors that contribute to a sustainable food system: environmental assets, economic assets, cultural assets and more.

According to the Traditional Plants and Foods Program of Northwest Indian College, communities that exhibit tribal food sustainability and food sovereignty are those that:

- Have access to healthy food;
- Have foods that are culturally appropriate;
- Grow, gather, hunt and fish in ways that are maintainable over the long term;
- Distribute foods in ways so people get what they need to stay healthy;
- Adequately compensate the people who provide the food; and
- Utilize tribal treaty rights and uphold policies that ensure continued access to traditional foods.

“Many tribal communities are regaining control of their food supply. They’re growing traditional foods, plants and medicines and collaborating with the federal government to retain rights for hunting and gathering. Eager for resources such as those contained within this website, leaders of this movement are sharing stories and gaining inspiration from each other.” (Northwest Indian
The Nisqually People are another example of a Washington tribe addressing a critical area of health through a Food Sovereignty Assessment. The Nisqually tribe, located between Tacoma and Olympia, conducted an assessment which explored the unhealthy impacts of governmental forced food programs, the traditional approaches to food ways by the Nisqually People, and strategies to improve their health through their own food sovereignty programs. The plan stresses the connection of diet to overall good health and supports the use of traditional food and medicine programs. (Arndt, 2017)

Decent and Safe Housing – On some reservations housing is in the form of cheap pre-fab structures. There is also a shortage of housing for those urban Indians who wish to return to the reservation. This type of housing is not free for most NA and its construction has generally not proven to be hardy enough to sustain longevity. While most NA housing is sub-par on some reservations, 78% of NA live off the reservation. (U.S. Census Bureau, 2011) Low-income sub-par housing for off reservation NA also has negative health effects. Mold, safety, rodent and insect infestations, lack of insulation and proper heating and air circulation are common features of low-income structures. Because of this, self-esteem and identity can also be compromised for
this population affecting psychosocial health. Low-income neighborhoods also have higher rates of crime and intentional injury. (Saegert S, Evans GW, 2003) When NA migrate back to their tribal communities, they often find that decent housing is hard to come by. Because financial institutions cannot offer home loans on federally deeded reservation property, there is a strong reliance on federal funding for housing. This funding rarely meets the housing needs of tribal communities. (Marchand, nd)

**Affordable and Reliable Public Transportation** – While some reservations provide transportation services for its members, a great percentage of NA live off the reservations and most are low income with inadequate support for transportation to health services. If living off the reservation, community members need to travel to the reservation to access health services or receive referral to specialized care which is most always off the reservation. There are Indian Health facilities in some urban areas though, and some urban tribes will let non-local Indians use their services. (Syed, Gerber, Sharp. 2013)

**Culturally Sensitive Health Care Providers** – Studies show that reputation, referrals, and recommendations from family and friends are contributing factors to choosing health care. (Abraham et al., 2011) Because provider choices for NA are limited, the luxury of choosing is not always an option. For NA, cultural sensitivity is important. This is an especially important determinant to good health since health care professionals who are not understanding of the background, challenges, and beliefs of their clients may end up polarizing the very people they are in the business to serve. Many NA experience racism and marginalization while attempting to access health care. (Whitney, 2017) Andonova’s article on the Stanford Medicine Website, stresses the importance of cultural competence and sensitivity at the bedside. This author states that awareness of socio-cultural diversity and social production of disease should be included in the expression of sensitivity. (Andonova, 2014)

Potential barriers in acceptability of services include culturally incongruent treatment regimens; cultural differences in concepts of modesty and propriety; lack of respect; long clinic waits; and, staff turnover. Many AI/AN elders will not apply for Medicaid benefits for which they are eligible as a matter of pride because it is perceived as a hand-out from the government, or because it is believed that medical care was assured by treaty, or because the system is too complicated. A “fatalistic attitude” toward health also sometimes makes care seem less acceptable. (Hendrix, 2018)
**Health Insurance** – Federally recognized tribes who have been promised health care by the government are also at the mercy of changing policies. It is not unusual for funding put in place to cover the health of NA to be inadequate to fully meet the needs of this population. Furthermore, a common dynamic is that funding will not last the entire year and usually runs out at the end of spring. The warning issued is “Don’t get sick after June.” (Global Health Now, 2016) For those NA who are not under the umbrella of federal recognition, health care access is much trickier. One out of three NA do not have health insurance because they are not enrolled in federally recognized tribes and therefore ineligible for health benefits. Most are low income, and therefore rely on other forms of government aid to access health care. Common practices such as regular checkups in the area of prevention cannot be arranged, and therefore their health care falls under the category of reactive care usually in hospital emergency rooms. (Whitney, 2017)

**Clean Water** – Seventy percent of the human body is made up of water, and around seventy percent of the earth’s surface is covered in water but only about 2% is fresh and fit for human consumption. (Tsiattalos, 2018) Clean water is a precious resource world-wide. The lands and waters of those designated by treaty law as reservations are continually under attack by government and business corporations looking to exploit resources. Most of these endeavors have to do with mining and/or oil excavation that threaten to compromise fresh water resources. As it is, access to uncontaminated water supplies are especially challenging on most reservations. (Nelson, 2008) A prime example of this is as reported by the Cree Nations in Alberta Canada. Government water withdrawals from their river and oil extraction processes have compromised the local fish habitat as well as depleted and contaminated the water supply. (Lambert, “Alberta’s Oil Sands and the Rights of First Nations Peoples to Environmental Health,” retrieved at [http://nativecases.evergreen.edu/](http://nativecases.evergreen.edu/)) Another example stems from extensive uranium mining and milling that has compromised and contaminated water supplies connected to the Navajo Nation causing radiation exposure, illness, and death during a thirty year time period from the 1950’s to the 1980’s. Although the Navajo Nation banned uranium mining in 2005, the threat continues to loom in adjacent communities. (Brown & Lambert, “Blowing in the Wind: The Navajo Nation and Uranium,” retrieved at [http://nativecases.evergreen.edu/](http://nativecases.evergreen.edu/))

A recent example of this concern is the Dakota access pipeline that affects the Standing Rock Sioux Tribe. The primary source of drinking water for this Tribe is the Missouri River that the
pipeline is designed to be placed underneath. The chance of hazardous leaks is a major concern for this Tribe since the Pipeline and Hazardous Materials Safety Administration has reported more than 3,300 leaks and ruptures since 2010 from oil and gas pipelines. (Worland, 2016)

**Non-polluted Air** – While air pollution is a concern for the entire nation, it is also a major determinant to NA health. Industrial contamination of the air is a constant threat, but the threat of lung disease because of the smoking of tobacco products is critically present in low income populations. This threat also promotes another threat to clean air and that is second hand smoke. Low income housing common to NA has also been proven to contain toxins and allergens that compromise breathable air. (Rauh, Landrigan, Claudio, 2008)

**The Challenge of Access** – An obvious factor to improve health is to have access to health care. Barriers range from cultural incompatibility to poor staffing to geographic location along with a list of many other issues. Overall though, AI/AN populations face access problems in three major areas: sociocultural, structural, and financial. (Raine, et al, 2015) As the following table indicates having health coverage is a major issue.

<table>
<thead>
<tr>
<th>Who has health coverage?</th>
<th>Percent of Americans with health coverage, by race</th>
</tr>
</thead>
<tbody>
<tr>
<td>Whites</td>
<td>88%</td>
</tr>
<tr>
<td>Asian Americans</td>
<td>82%</td>
</tr>
<tr>
<td>Native Hawaiian or other Pacific Islander</td>
<td>80%</td>
</tr>
<tr>
<td>African Americans or blacks</td>
<td>79%</td>
</tr>
<tr>
<td>Hispanics</td>
<td>68%</td>
</tr>
<tr>
<td>American Indians and Alaskan Natives</td>
<td>68%</td>
</tr>
</tbody>
</table>

*Note: Percentages for Native Hawaiian or other Pacific Islander and American Indians and Alaskan Natives is based on 2005-2007 data, all other percentages based on 2000 data.*

**Strategies for Enhancing Native American Health and Reducing Health Disparities**
According to the Disparity Reducing Advances Project sponsored by the Prevention Institute, there are five emerging approaches to reduce health disparities:

1.) Change the built environment. Physical structures and infrastructure greatly impact physical and mental health of community residents. Changes such as making community parks available to increase physical activity, restricting or changing industrial facilities that pollute the environment, designing streets with pedestrian zones to reduce crashes and injuries, and building high quality housing free of toxins, allergens, and pests.

2.) Encourage sustainable agriculture characterized by local fresh, unprocessed, and chemical-free food.

3.) Support economic development improvement which encourages self-sufficiency and dignity while reducing stresses associated with poverty and unemployment.

4.) Change harmful beliefs, assumptions, and standards referred to as ‘norms.’ This prevention technique connects with behavioral health approaches now being employed in a number of NA communities.

5.) Support community based efforts that encourage communal participation which is an effective way to unlock the energy and knowledge that exists in a community and build networks to address important issues. (Disparity Reducing Advances, 2007)

There are encouraging signs that many of these ideas are being enacted. Mark Trahant reports a finding from The Centers from Disease Control and Prevention that although AIAN populations have a life expectancy from birth that is 2.4 years less than that of all U. S. populations, efforts to close the gap in age at death have been steadily improving over the last four decades. Parity does not exist because of the chronic nature of disease affliction in Indian Country, but gains are being made in spite of this. (Trahant, 2018)

Indian Health Care Improvement Act – Originally introduced in 1976 this Act was permanently re-authorized into law by President Obama on 3/23/10 as part of the Patient Care and Affordable Care Act. This legislation is seen as critical to modernizing and improving health care for AI/AN. The following strategies for NA health care are being improved by this Act: 1.) Strengthening programs that retain health professionals for the IHS and tribal sites; 2.) Authorizing innovative ways to improve health care facilities; 3.) Creation of elder care
programs focusing on behavioral health; 4.) Expanding preventive services centering on cancer screenings; 5.) Screening and prevention activities for diabetes and management of diabetes through culturally appropriate programs; 5.) Strengthening approaches to collection of Medicare, Medicaid, and third party payers for reimbursement; 6.) Supporting a comprehensive approach to behavioral health assessment, treatment, and prevention; 7.) Authorizing health promotions and disease prevention programs; 8.) Promoting actions that eliminate and reduce environmental hazards and contaminants that create unhealthy household conditions. (Indian Health Services, 2018)

Tribal Management

By pursuing tribal plans to purchase insurance with available funding, creating community health care centers operated by the tribes, and tapping into Medicaid and Medicare, a more efficient model of health care provision is being utilized by a number of AI and AN communities. In Alaska some tribes have seized the opportunity to design and manage their own health care facilities. The Alaska Medical Center in Anchorage is the home of a large hospital, Southcentral, which also offers statewide services. “Southcentral (a non-profit affiliate of the Cook Inlet Region, Inc.), assumed some programs in 1987 and by 1999 ran the whole show…now serving some 55,000 people with 1,400 employees including 10,000 in 55 remote villages.” (Trahant, 2009)

According to a study by Jaime Arsenault and Stephanie Carroll Rainie initiated by the Native Nations Institute, tribal management can significantly improve tribal citizens’ access to health services. There are at least five challenges to tribal management. The first includes the funding challenge as tribes try to garner adequate funding with constantly changing costs and inconsistent government support. The second is an institutional challenge as tribes attempt to create governance approaches capable of support and sustainability of health care delivery. The third challenge is how to maintain the treaty/trust challenge upon which federal funding is based. The fourth area is a scarcity of information about management options and their effects on access. The fifth challenge is how to provide needed services and ensure that people use these services. (Raine et. al, 2015)

The benefit of tribal management is that it is an act of self-determination which supports tribal sovereignty. Other benefits include the following: 1.) community trust, 2.) improved retention of
physicians, 3.) shorter patient waiting times, and 4.) increased access to health services. This approach to tribal health care also supports priorities and values of the tribe. Including spiritual leaders, traditional healing practices, and cultural activities makes it more likely that Native citizens will take advantage of tribal health services. (Arsenault and Raimie, 2009) Interviewees from the Fond du Lac Band of Lake Superior Chippewa Tribe and the Citizen Potawatomi Nation both reported that access improved, partly as a result of cutting out bureaucracy and streamlining services allowing them to optimize revenue by managing their own third-party collections and revenues.

Another example of how tribes have improved health services is the Jamestown Family Health Clinic in Sequim Washington.³ The Jamestown S’Klallam Tribe is a small tribe with about 560 tribal members with about 50% living out of area. The Tribe’s reservation is located in a rural area on Washington’s Olympic Peninsula. The Tribe struggled with how to provide health services with such a small population. They began developing an insurance purchase program in 1995 as a solution.

³ Thanks to Cindy Lowe, Deputy Director of the Jamestown Health Department, for being interviewed and providing important information on the Jamestown health programs.

Jamestown Dental Clinic

In 2001 a major health care provider, Virginia Mason, decided to pull out of the area, leaving a substantial void in primary care for the tribal and non-tribal population. One of the physicians at
Virginia Mason’s nearby facility approached the Jamestown Tribe about providing services. The Tribe seized the opportunity and recruited several of the physicians from Virginia Mason. The physicians brought their clients with them and the Jamestown’s new family health clinic was overrun with patients when they opened. They quickly moved from 3 to 27 health care providers serving 17,000 patients annually including about 500 tribal members. In 2004 they expanded services by adding a dental clinic. They are now the largest clinic in Clallam County and the 2nd largest employer in the County.

Jamestown Tribal Clinic

The Jamestown S’Klallam Tribe maintained the insurance program approach and 100% of the tribal community now have insurance. This allows members to go anywhere to address their care needs though most prefer the local facility. The Tribe has also broadened health care options and resources though partnerships with other local providers such as the nearby Olympic Medical Center.

Work to Increase the Indian Health Service (IHS) Budget – An obvious strategy to better serve this population would be to increase funding for better service. IHS funding is at 40% of need. While funding is gradually increasing, the health care agency is still dramatically short in available resources. Providing health care with a limited budget results in denials and deferments of services. The IHS system is starved, not broken, so making more funds available to better care for those in this system is important. (Trahant, 2009)
Although the Indian Health Service is critically underfunded, according to Don Berwick who ran the Centers for Medicaid and Medicare, the Indian Health Service is a model of efficiency: “The Indian Health Service can and will be one of the leading prototypes for health care in America. The Indian Health Service is trying to deliver the same or better care with half the funding of other systems in the United States.” Berwick added, “the very nature of the agency’s underfunding has resulted in a discipline that’s an example for us all.” (Trahant, 2018)

**Improving Health Care Delivery through State Legislation** – Legislative action can also help improve health care. In Washington State a government-to-government agreement called the Centennial Accord is intended to improve services “… delivered by both parties.” Under this agreement, The American Indian Health Commission (AIHC) is a tribally driven organization created in 1994 and serving the federally recognized tribes in the State of Washington. Urban health centers are part of the program and important since most Natives live off the reservation and in urban areas. Twenty-nine tribes send delegates to this commission, so Native voices are heard in the area of health and well-being under this agreement. (Smith, 2019)

The AIHC is unique and is considered a best practice model within the State of Washington and across the nation. The AIHC is frequently contacted by tribes and agencies outside the state to garner ideas to improve collaboration and coordination within their state tribal health policies. As federally recognized sovereign nations, tribes engage in government-to-government relations between themselves and the state agencies where they are located. (American Indian Health Commission, 2018) As one tribal leader notes,

> “Tribes need to be identified separately, we have a unique relationship with the state and their agencies, and we have to make sure we are identified as Tribes. We are sovereign governments, we are communities, and we are partners. We have our own health care delivery system that doesn’t link us to outside agencies, we want full faith and credit for our services provided to our people. Some tribes may not have the capacity to provide needed services, which makes linkages to the statewide systems vital to our people if they so choose.”

> “I am echoing the words of my elders.”
Cheryl Sanders, Lummi Councilwoman.

Since many Natives live off the reservation, support for health care is difficult and sometimes prohibitive. The Urban Indian Health Program (UIHP) organization works with the AIHC who
collaborates with the Governor’s office, state health leaders, the legislature and other organizations to address health priorities. The AIHC and UIHP help ensure that Native principles, values, and needs are considered when implementing health care systems that address disparities. (AIHC, 2018) It is important to note that UIHP are not sovereign therefore do not have the same unique status as federally recognized tribes. However, in the Indian Health Improvement Act (PL 94-437), there is a requirement to confer with UIHP’s, a standard set forth by this Act.

**Medicine Wheel Healing** – This approach to healing calls for culture-congenial and holistic therapeutic approaches to treatment of the indigenous. The approach to Western medicine that Native Americans have been forced to accept is foreign to the culture and approach of the more holistic health practices that indigenous peoples have relied on for centuries. Western medicine treats the symptoms of disease or health maladies that already afflict an individual. Indigenous societies were more pro-active with their health and so the reliance on treatment was different than that of western medicine. The “Medicine Wheel” refers mainly to a healing strategy connected to addressing Native alcohol problems, but is also representative of a cultural method as a healing modality which includes prevention as well as treatment. (Coyhis, 2018)

**Behavioral Health Aide Program** – This program is designed to promote behavioral health and wellness in Alaska Native individuals, families, and communities through culturally relevant training and education for village-based counselors. (Behavioral Health Aide Program, 2018)

**Innovative Housing Programs** – The Quileute Tribe located on the somewhat isolated Olympic Peninsula in the State of Washington, purchased and installed solar panels for more reliable energy sources for their homes. The Red Feather Development Corporation instituted the construction of straw built homes with better insulation for the Northern Plains tribes who face freezing winters. Facing an enormous housing shortage, the White Mountain Apache Tribe in Arizona partnered with the federal government and private lenders to build over 300 new homes. A tribally designated housing entity, The Northern Circle Indian Housing Authority, came together to advocate housing for several tribes in California. (Marchand, nd)

**Conclusion**
Historically Native Americans have relied on a government system of health care that does not effectively support the needs of their population. It seems that even when favorable legislation is put in place, constant attacks on laws and acts supporting NA health place the health of NA in a constant state of jeopardy. Recently legislators are questioning the implementation of Obama’s Indian Health Care Improvement Act. When access to resources that supports care is an ongoing issue, achieving wellness is more difficult.

At the same time, there are a number of promising approaches. Engaging in assessment, treatment, and prevention strategies are key factors in the quest for well-being. Pursuing increased funding promised by the government, addressing the most effective ways to access health care, continued efficient management of underfunded health care, and adopting strategies that connect with tribal traditions and culture are effective possible pathways to better health and well-being for AI and AN. Questions for future consideration include: Does tribal management of health care address the problems of access and funding? Can it be expanded to many different tribes and communities? What are the barriers to this approach? Are cultural strategies for prevention and treatment effective? How are they best implemented? Has the Indian Health Care Improvement Act been allowed to implement its policies, and are they effective? What are some other avenues that tribes have used to improve health and well-being? How can effective practices be scaled up and shared?
References:


Arviso, (2014) Honoring Our Children: Acceptance Within The Indian Community. Available at: http://nativecases.evergreen.edu/collection/cases


Dunbar-Ortiz, Roxanne “The Miseducation of Native American Students” Education Week (November 28, 2016)


Koss, Yuan, Dightman, Prince, Adverse childhood exposures and alcohol dependence among seven Native American tribes, 2003, American Journal of Preventive Medicine
Lambert, “Alberta’s Oil Sands and the Rights of First Nations Peoples to Environmental Health,” retrieved at http://nativecases.evergreen.edu/

Marchand-Cecil, C. (nd) Housing in Indian Country Available at: http://nativecases.evergreen.edu/collection/cases

Medicaid.gov, 2018 - 1976 Indian Health Care Improvement Act (PL–94-437)


Missing and Murdered Indigenous Women & Girls: A nationwide data crisis Brad Angerman
Posted on: Nov 14, 2018, Posted in Press Release, Sexual violence retrieved at:

https://www.nihib.org/docs/09182017/Opioids%20One%20pager.PDF

https://www.nihib.org/docs/10302009/NIHB%20IHCIA%20FACT%20SHEET.pdf

Native Foods Resource Center, an Initiative of First Nations Development Institute. Retrieved at
https://www.nativefoodsystems.org/about/sovereignty


Northwest Indian College Traditional Plants and Foods; Accessed at: https://www.nwic.edu/community/traditional-plants-and-foods/


Smith, Barbara Leigh (2019) The Centennial Accord: What has been its impact on government to government relations between tribes and the State of Washington. Available at: http://nativecases.evergreen.edu/colleccion/cases


The American Indian Holocaust: Healing Historical Unresolved Grief; Maria Yellow Horse Brave Heart, Ph.D. and Lemyra M. DeBruyn, Ph.D. Accessed at www.ucdenver.edu/caianh


Trahant (2009) The Indian Health Paradox: Honoring a treaty or raising real dollars? Available at: http://nativecases.evergreen.edu/colleccion/cases


Winstead, Hopkins, Vendiola, 2018. Are Tribal Compact Schools the Answer to Improving Native Student Success in Washington? Available at: http://nativecases.evergreen.edu/collection/cases
