



COVID-19:
Internet Access and the Impact on
Tribal Communities in New Mexico



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Introduction

It is impossible to overstate the impact that the coronavirus pandemic has had on the lives of Americans. Most of us have had to restructure our daily lives to combat the spread of the virus, and most of us are living in a jurisdiction that has asked us to change the ways we organize our daily lives. These changes include working from home, educating our children from home, discontinuing regular visits to medical providers, voting through the mail, and even shopping online for basic supplies.

Social distancing guidelines and stay-at-home orders intended to limit face-to-face contact have changed the ways we interact with our friends and loved ones. In-person contacts have become virtual visitations over the phone or through Web-based platforms. As many New Mexicans struggle to transition to life at home, it is easy to overlook the gaping inequality in access to high-speed internet. Without broadband access, Wi-Fi, or basic internet services, conforming to the digital lifeline is nearly impossible at this time.

New Mexico has received positive [national attention](#) for the important early steps the state took to reduce the spread of the deadly and highly contagious virus, such as closing schools sooner than other states and encouraging communities across the state to shelter in place in an effort to save lives. Social distancing standards and policies also were introduced statewide. Such policies were some of the important steps taken to stop or slow the spread of the virus. Given the severity of the virus, communities across the state were encouraged to take stay-at-home orders seriously, given the increased vulnerability of many of the state's populations, explicitly tribal communities.

The 23 tribes in the state of New Mexico represent approximately 11% of its population. Yet Native Americans represent 53.41% of the total positive cases COVID-19 (N.M. Department of Health 2020). The virus has impacted tribal communities at a greater level than any other racial and ethnic population in the state. Several tribal nations are being severely affected. The Navajo Nation has a total of 4,153 positive cases and 144 deaths, while Zuni Pueblo, Zia Pueblo, and San Felipe Pueblo are experiencing community outbreaks. This led Gov. Michelle Lujan Grisham to issue a rare executive order to close all vehicular access points into Gallup; a move supported by Jonathan Nez, the president of the Navajo Nation. The Pueblo of Zuni was also consulted and supportive of the measure.

While we support the efforts to flatten the curve, which undoubtedly have saved the lives of many New Mexicans, these changes have made the pre-existing inequality of access to high-speed internet much more important. The lack of internet access leaves communities without the necessary resources,

information, and educational tools to continue living successfully in the face of COVID-19. Access to the internet is an urgent matter that must be addressed in a timely and effective manner to buffer the impact of the virus on tribal communities. We focus our attention in this report on describing the digital divide between Native Americans and other New Mexicans, prior to identifying some of the most important consequences that the lack of high-speed internet will have for tribal communities while the state continues to adjust to social distancing policies. We will close this report with descriptions of the efforts being made to address this issue.

New Mexico Faces Broadband Challenges

Broadband internet service is the most used form of internet access because of its high speed and capacity to transmit large amounts of information, traits needed to be able to work from home and to conduct home schooling effectively. High-speed internet is offered in different forms, via DSL (digital subscriber line), fiber-optic, cable, and satellite. The dial-up connection remains an option as the only non-broadband internet service available, and even though it is cheaper, most internet users are moving toward the faster broadband internet connection.

While most Americans have the ability to adopt stay-at-home guidelines, unfortunately, far too many Native American families struggle to do so because they do not have access to the internet and online services. In fact, the Federal Communications Commission estimated that in 2018, 35% of Americans living on tribal lands across the country lacked access to broadband services, compared with 8% of Americans overall. According to the Government Accountability Office (GAO), in 2020, 1.5 million people on tribal lands are without essential services. This includes 68% of all tribal communities living on reservations that lack access to broadband services (FCC). Shortages in broadband services and technologies directly impact health services and education opportunities.

New Mexico has some of the lowest rates of broadband access in the nation. According to 2016 data from the U.S. Census Bureau, New Mexico ranked 48th nationally in the percentage of households with broadband internet subscriptions. That data suggests that approximately 26% of the state's population lacks broadband connections. More importantly, 9% of the state's population does not have the ability to purchase a high-speed internet connection due to a lack of broadband capacity where they live.

The vast inequality Native Americans face nationally in access to high-speed internet plays out similarly in New Mexico. According the FCC, 50% of Indian Health Service facilities rely on outdated service connections. U.S. Sen. Martin [Heinrich's](#) office found that 80% of individuals residing on tribal lands in New Mexico do not have internet [services](#). Many rural tribal populations do not have Wi-Fi access due to the costs associated with providing Wi-Fi. Other rural tribes do not have access to high-speed internet due to the location of their homes within historical areas on reservations where digging is not allowed. Another impediment to access to Wi-Fi can be the physical structure of a home: Many pueblo homes are built of adobe, which does not allow for Wi-Fi.

Stay-at-home orders, tribal closures, and extended curfews on reservation lands are forcing families to shelter in place where there is no access to the internet. Tribes with curfews and closures are in immediate need of internet services, as many tribal communities do not have the infrastructure or funding to provide access for all residents. In many cases, access to the internet is limited to tribal administration offices and facilities such as schools, daycare centers, and libraries that are closed due to the pandemic.

The lack of Wi-Fi across tribal communities impacts both urban and rural populations, even in Bernalillo County where access to high-speed internet is greater than in the state overall but where Native Americans are much less likely than non-Native Americans to have reliable access ([The NM Political Report 2020](#)). The data summarized above is reinforced by the many stories, and we have heard from members of tribes across the state over the past few weeks while the state and tribal communities in particular struggle to adapt to a world increasingly reliant on access to the internet. This includes college students forced to vacate their dorms before the end of the semester who have faced major challenges attempting to complete their classwork at home where they lack access to reliable internet coverage. We have also heard from many parents who are struggling to keep their children engaged in their K-12 education without a computer at home or reliable Wi-Fi. Teachers across the country are reporting that only 25% of their students are able to join classroom activities via Zoom or other digital learning platforms ([Matzen 2020](#); [Doland 2020](#)). This has led many families to attempt to submit class assignments in restaurant parking lots many miles from their homes. More pressing is the inability of Native American communities to access telehealth services in remote areas of the state, including the Navajo Nation, where the virus has had the most devastating impact in the state.

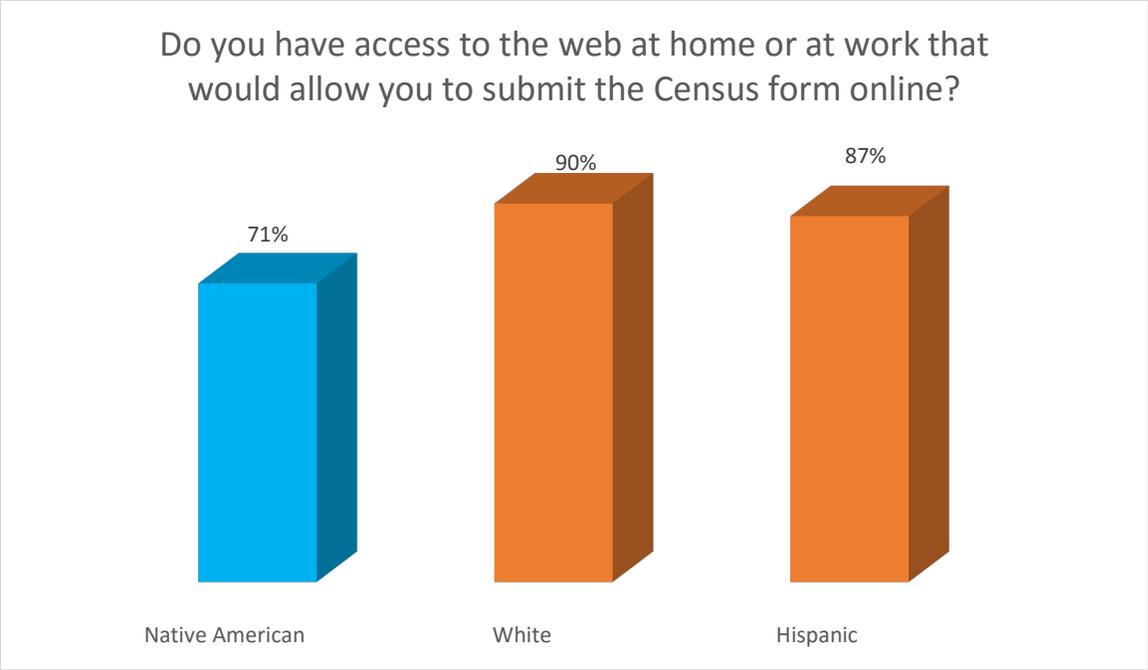
Direct Consequences of Limited Access to High-Speed Internet

Our goal in this report is to identify some of the direct implications of this underlying racial inequality in access to broadband frequencies and to the internet more broadly, for New Mexico's Native American population. We have therefore highlighted several locales where a lack of access to high-speed internet is either already negatively impacting the lives of Native Americans or where this inequality will have important long-term consequences for tribes. We stress that COVID-19 did not cause these challenges for tribes but rather has magnified the importance of the digital divide for pueblos and tribes in a time where access to the internet is essential.

Impact of COVID-19 and Lack of Web Access on U.S. Census Participation

The potential long-term impact of COVID-19 on tribal communities is best exemplified in the 2020 U.S. Census effort to count every resident across the state of New Mexico. The lack of access to the internet was projected to pose challenges for accurately counting Native American communities across the state prior to COVID-19, given the federal government's goal of having most Americans fill out their census information online.

Our team identified the consequence of this challenge early in the process through [a statewide survey of New Mexicans](#) conducted in January 2019 that included questions about access to the internet. As reflected in the figure below, when respondents who said they were not planning to report their census information online were asked if they had access to the Web at home or at work, Native Americans were more likely than all other racial and ethnic groups in New Mexico to report a lack of access to the Web. Only 71% of Native Americans reported having access to the Web at home or at work that would allow them to submit the census information online, compared to 90% among non-Hispanic Whites and 87% among Hispanic New Mexicans.



Given the stay-at-home restrictions in place across the state and concerns about interacting with others, not being able to fill out the census form online will undoubtedly lead to undercounting the state’s Native Americans. This is an important inequality, because the Native American population in New Mexico has been defined as the state’s most difficult to count population. The tribal census has been undercounted for several decades (Forbes 1990; O’Hare 1999), despite the need for accurate numbers to support federal funding and community needs. The inability of tribal populations to fully participate in the 2020 census might for the next 10 years exacerbate existing health, housing, and educational inequalities. Given the huge [economic impact that COVID-19 is projected to have on tribal communities](#), the potential undercount could not happen at a worse time.

Fortunately, the U.S. Census Bureau has requested that the collection of field data for the 2020 Census be extended until Oct. 31, 2020, due to the impact of the COVID-19 pandemic. This is vital to tribes in New Mexico, because the health epidemic has already resulted in a suspension of all census field operations, which allow census forms to be hand-delivered to homes in even the most remote areas of the state. This suspension has had a devastating impact on New Mexico, which has more than three times as many residents as the national average who require a hand-delivered census form. At this stage of the census process, [37% of New Mexico households](#) had responded to the census, compared to a national average of 48%. Several national organizations that work on behalf of Native American communities have [expressed strong support for the extension](#).

The federal resources associated with census counts have been [well documented](#) by our team, including noting that just a 1% undercount could yield a loss in roughly \$2 million per year, which equates to more than \$20 million for tribal communities over 10 years. The U.S. census undercounted Native American populations by approximately 5 [percent](#), resulting in the loss of close to 10 million dollars in resources. Given the extensive needs that tribal communities across New Mexico will face due to the pandemic, we simply cannot afford to see losses due to undercounts due at least in part to a lack of access to the Web.

Lack of Access to High-Speed Internet Poses Health Challenges

Families without broadband access to telehealth, the internet, electronic information, and technology are at greater risk for not having their health needs met. The health-related impacts that tribal nations will face are unprecedented. Pre-existing health conditions among New Mexico's tribal populations make them one of the most vulnerable populations across the nation and within the state of New Mexico ([Roybal](#) 2020). Native Americans die at higher rates, have a lower life expectancy, and experience higher rates of life-threatening illnesses throughout their life course when compared to other populations in the state.

Native Americans have the highest premature mortality rates in the United States (Centers for Disease Control and Prevention 2016). These disparities in well-being outcomes are driven by extensive health inequalities in health conditions among Native Americans that include but are not limited to cancer, heart disease, cirrhosis of the liver, diabetes, suicide, unintentional accidents, and chronic respiratory disease (CDC 2016). Given the extent of pre-existing health conditions in the state's Native American communities, it is imperative that they have access to broadband services for treatment, education, interventions, monitoring, and direct communication with healthcare providers.

One way to provide remote services is via telehealth. Telehealth is the distribution of health-related services and information via computers and mobile telecommunication devices. It allows clinicians to reach patients and to provide health-related services such as care, education, interventions, monitoring, and in some cases remote admissions to healthcare facilities. According to the American Hospital Association (AHA) (2017), 76% of U.S. hospitals connect with patients through video or other technology. Unfortunately, the lack of computers and Wi-Fi services in rural and urban areas leaves communities at a deficit and makes even basic or fundamental activities, such as quickly sending patient information between health facilities, a challenge.

Other behavioral health interventions that now rely on telehealth are medically assisted treatment for patients with opioid use disorder and outpatient therapy, including group therapy. Many patients battling substance use in New Mexico are in danger of a relapse due to the lack of services and the inability to reach providers through telehealth. Other types of services provided via telehealth and the internet are suicide prevention services and support. Given the elevated rates of suicide among Native American in New Mexico ([NMDOH](#), IBIS 2020), it is imperative that isolated populations have access to lifesaving resources.

Direct Consequences for Native American Education Outcomes

The COVID-19 pandemic has posed a serious threat to educational outcomes for Native American students across the state. Prior to the pandemic, significant disparities in educational outcomes existed for Native American students. According to the U.S. Department of Education (2015), only 61% of New Mexico's Native American students graduated with a high school diploma within four years. Public school systems experienced a decline in reading scores among 11th grade Native American students prior to COVID-19 school closures. Compared to White students (73% proficient) and Hispanic students (48.3% proficient), only 37.8% of Native American students scored proficient on state standards based assessments (SBA). The impact of school closures and the lack of access to online educational resources have the potential to widen the gap between Native American students and their counterparts and to exacerbate educational disparities.

Distance learning, also referred to as distance education, requires technology to foster communication between students and parents and to provide services for disabled students. The lack of internet and broadband services and the technology to stream online classes or download suggested material leaves Native American students in a major deficit, exacerbating pre-existing disparities in educational attainment.

On March 27, 2020, all New Mexico schools closed for the remainder of the 2019-2020 school year, placing students and teachers in the uncharted venue of distance learning. The New Mexico Public Education Department identified 23,398 Native American students in the New Mexico public school system who were in need of broadband capabilities and devices ([PED 2020](#)). While this number is helpful to identify the scale of this challenge, it does not include students in the Albuquerque Public Schools, Rio Rancho Public Schools, Santa Fe Public Schools, Bureau of Indian Education, or tribally

operated schools. Therefore, the number of students who lack broadband access is much higher.

To our knowledge, no surveys have been conducted of Native American families, either nationally or specific to New Mexico to determine the extent of reliable internet access. However, relevant research has found that a large number of families from other communities of color are facing severe challenges in home schooling due to limited access to high-speed internet. For example, [18% of Latino families nationally](#) report that they do not have regular access to the internet at home, with another 20% reporting their only access to the internet at home is via their cellphone. Furthermore, a survey of high school students by the [ACT](#) Center for Equity in Learning found that approximately 26% of Native American and African American families had access to only one device at home, while only 8% of Caucasian and Asian families reported having access to only one device.

The absence of broadband services makes it difficult or impossible to access online resources. Parents sometimes lack the cognitive skills and knowledge to educate children and also must rely on the internet to assist their children with instruction. Further, students and recent graduates might not have access to assessment tools required by colleges and universities. Prior to COVID-19, the ACT and SAT assessment exams were taken in person at a local facility. The closure of schools and the movement toward online classes has posed a significant challenge for Native American students across the state. Due to time constraints and the lack of online resources, substantial disparities across families with younger students might very well exist.

We have heard from many educators that they are working harder now than ever, doing their best to help families find ways to navigate limitations they face with technology, including not having reliable internet access at home. School administrators and teachers are aware of the challenges that families are facing and are doing the best they can to address the huge needs of the communities they serve. For example, Albuquerque Public Schools (APS) was able to distribute Chromebooks to families that do not have access to computers at home. According to APS, they will loan thousands of computers to students without a device. Unfortunately, not all school districts in the state have the ability or means to be so generous and accommodating. Tribal school systems do not have the resources to provide for students, and most Native American students, do not have access to the internet in their family homes.

When a connection does not exist between students and their teachers and school staff, graduation rates are at risk of declining, the possibility of college

eligibility might diminish, and the completion of core subject areas of education (i.e., English arts, math, and science) for K-12 students are compromised, further marginalizing Native American students and widening the gap in educational attainment for tribal students across. Other areas of concern are students with special needs who rely on school systems to provide critical services, such as speech-language and audiology services, interpreting services, occupational and physical therapy, and early identification and evaluation of disabilities in children. Many of these services rely on consistent weekly visits by providers to limit student regression (Goldberg et al. 2003).

According to the state Department of Education, distance instruction for special education and disability services must transition to distance instruction and virtual conferencing to maintain support for students with individual education plans. Therefore, a lack of broadband services jeopardizes critical support for our most vulnerable students within education systems across the state. So that children do not fall further behind their classmates, it is imperative that our school systems provide timely and effective solutions to meet the needs of families that do not have access to the internet.

Lack of Access to the Internet Increases Negative Economic Impact of COVID-19 for Tribes

From March to April 2020, there was a 10.3 percent increase in the unemployment rate, taking the national unemployment level to 14.7 percent; reportedly the largest over-the-month increase since 1948. Nationally, the unemployment rates are still disproportionately higher for racial minorities, with unemployment rate for African Americans and Hispanic population at 16.7% and 18.9% respectively, compared to national average of 14.7%.¹ The current pandemic has also hit the New Mexicans hard, from February to April 2020, the state unemployment rate increased from 4.8% to 11.3%.² The lack of high-speed internet may further exacerbate unemployment across tribal populations who already experience the highest unemployment rates across many states. Here in New Mexico, the labor force participation rate for tribes of 47.6% is 10 percentage points lower than the state average (58.5%).

As businesses struggle to survive the need to close down or reduce operations, those that can have moved toward selling their products and taking orders over the Web. However, without access to the Web, many

¹ Information obtained from Bureau of Labor Statistics (<https://www.bls.gov/news.release/pdf/empsit.pdf>, accessed 5/27/2020)

² Information obtained from Bureau of Labor Statistics (<https://www.bls.gov/eag/eag.nm.htm>, accessed 5/27/2020)

Native American business owners have undoubtedly faced greater challenges staying open and paying their staff. This will lead to even higher unemployment across tribal communities, increasing the gap in labor force participation that already exists.

Existing studies have shown that access to the internet and broadband services can bolster employment opportunities and wage growth (Atasoy2013; Dettling 2017; Hjort and Poulsen 2019; Ivus Boland, 2015). Consequently, lower rates of access to the internet will make finding employment challenging for Native Americans in New Mexico and potentially increase the overall economic impact of COVID-19 for these communities across the state.

Further, the impact of a current pandemic could potentially extend beyond the labor force participation into unemployment insurance (UI) benefits. The effect of the current pandemic on unemployment has been unprecedented, as of May 2, 2020, a reported total of 27 million Americans were claiming UI benefits.³ A recent study has found that increasing access to safety net benefits, such as Social Security Disability Insurance (SSDI), through the internet has substantially improved access to individuals most in need of the programs (Foote et al., 2019).

Given lower access to the internet at home among Native Americans, unemployed individuals from these communities could also experience difficulties in filing claims for safety net programs, including UI benefits. The inability to access these programs promptly would hinder the welfare and livelihood of Native Americans at a time when the needs of these families are at their highest. When taken collectively, it is clear that unequal access to high-speed internet will lead to long-term economic stress for tribes, which could lead to increased poverty, unemployment, and debt for far too many Native American families. This calls greater attention to the need to identify resources available to address access to the internet, which is discussed in the next and final section of our report.

What Can be Done to Increase Access to High-Speed Internet for Tribal Communities?

Unfortunately, increasing access to broadband services will require long-term efforts that will not address the immediate needs facing many Native American communities. However, there are some resources that could provide more immediate relief to those who lack access to the internet. Families living in the Albuquerque metro area can take advantage of the

³ Information obtained from Department of Labor (<https://www.dol.gov/ui/data.pdf>, accessed 5/24/2020)

[city's outdoor WiFi hot-spot program, which](#) allows members of the community to use wireless internet connections while practicing social distancing across the city. The Albuquerque/Bernalillo County Library System has a program that allows library cardholders to borrow a portable Wi-Fi hot-spot. Yet while these are great resources, they will not work for New Mexicans who do not live in the metro area and who cannot pick up a strong Wi-Fi signal.

CradlePoint technology can be utilized to deploy Wi-Fi on school buses that can be parked in rural areas that lack internet access. The state Department of Information Technology (DoIT) is attempting to work with Viasat, a company that currently manages Wi-Fi in state parks, to install free Wi-Fi hotspots for students in low income areas. Viasat is working with other states, such as Nevada, to put Wi-Fi in all school and library parking lots, using existing fiber optics, and is looking to convert school buses to become mobile Wi-Fi hotspots, using both satellite and LTE cradle points.

Tribal entities can also claim airwaves over their lands for free to acquire internet access. Tribal entities must apply for an FCC license by Aug. 3, 2020, to take advantage of this resource. Interested tribes can access information and technical assistance at Muralnet.org to help prepare and submit an application.

Most of the funding that has been provided to increase high-speed internet access to New Mexicans over the past several years has come from the federal government, and the state's congressional delegation continues to push for more federal investment. Most recently, U.S. Rep. Debra Haaland and other members of the Congressional Native American Caucus have formally requested that the FCC's Wireless Telecommunications Bureau grant an emergency special temporary authority to use a 2.5 GHz spectrum on tribal lands. This is one of the most promising short-term approaches to address the digital divide challenge for tribes, as most others require much more time to be launched.

Providing tribes with access to high-speed internet quickly is not an easy task, as most options require that there already be broadband in the area to tap into in order to increase access, and the costs associated with improving access can be very high. The Middle Rio Grande Pueblo Tribal Consortium provides an example of how tribes can combine efforts to aggregate the demand for internet access and negotiate lower prices. That project will connect tribal libraries across four pueblo communities--Cochiti, Santo Domingo, Santa Ana, and San Felipe--to provide Wi-Fi access at a more affordable price than if the communities sought the service independently.

This is a model that could be replicated across the state that utilizes public libraries, a [vital resource for tribes](#) across the country, given that they are a rare source of free, public Wi-Fi. However, the limitations of library-based Wi-Fi have become clear quickly during the COVID-19 outbreak, a time when the need for the internet among community members has skyrocketed. The strain on Wi-Fi in parking lots of libraries is challenging, as one family drawing on the feed to download school assignments can prevent anyone else in the area from having a strong enough signal to use the internet for their needs.

Expanding access to broadband services to tribes nationally and in New Mexico is not a new discussion, so there are a handful of ongoing efforts to address this challenge that could be transformative if implemented. New Mexico's U.S. Senators, Heinrich and Tom Udall, sponsored the Bridging the Tribal Digital Divide Act of 2020, with Reps. Haaland and Ben Ray Lujan co-sponsoring the measure in the House. The legislation would accelerate the deployment of broadband services to Native American communities. Earlier this year, Gov. Grisham lauded the inclusion in the Farm Bill of \$500 million for a Community Connects Program, a broadband grant program to support construction of broadband infrastructure in communities, such as tribal communities, that private companies might not deem economically viable because of their relatively small numbers. The bills would establish the Tribal Broadband Interagency Working Group to improve coordination across federal broadband programs and reduce deployment barriers. They would require that technical assistance be provided to interested, underserved Native American communities to develop a broadband deployment plan. The bills also would also streamline the application process for federal grants to support the deployment of broadband services on tribal lands.

We hope that the severe challenges tribes face due to a lack of access to high-speed internet during the COVID-19 pandemic provide the sense of urgency that will be necessary for leaders at the local, state, and national levels to recognize the importance of these federal initiatives.

In the meantime, our team at the Native American Budget and Policy Institute has identified additional funding streams tribes can access to address digital divide issues and has listed them on our webpage as part of our larger effort to work with the state's Indian Affairs Department to track funding streams for COVID-19 relief: <https://nabpi.unm.edu/covid-19-resources/index.html>.

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