EXECUTIVE SUMMARY

Virtual care—including telehealth, remote monitoring, and other digital forms of communication—has emerged as a critical tool for getting people access to health care, in part due to the COVID-19 pandemic. However, for many years, virtual care has been explored as a tool to reduce inequities in access to care, such as rural health care availability, provider shortages, and transportation needs. For this to be accomplished, a strategic and thoughtful approach to virtual care, that includes listening and responding to people's voices and perspectives, needs to be implemented. Without deliberate effort and careful attention, a rapid move to virtual care could worsen health inequities rather than reduce them. In fact, preliminary evidence from 2020 shows that virtual care has increased access for only some groups, threatening to widen existing gaps in access.

Every person experiences and accesses virtual care in a different way. Some barriers to accessing virtual care are shared across underserved communities, while others uniquely impact certain population groups. Based on our own research to date looking at experiences both prior to and during the COVID-19 pandemic, including academic research, national polls, claims data analyses, and listening work, we have identified the following categories of barriers that underserved populations experience at greater lengths when accessing virtual care. It’s important to note that many, if not all, are barriers people experience across society as a whole and not just within health care:

- Absence of Technology Devices
- Unreliable, Unavailable, & Unaffordable Broadband and/or Phone Data
- Limited Digital and Health Literacy
- Concerns about Quality and Personalization
- Lack of Physical Accommodations
- Language Proficiency Barriers
- Privacy Concerns

USofCare will be evaluating the extent to which existing policies and practices are meeting the needs of people—specifically, how they are addressing barriers or making them worse—as we continue our work. We plan to make recommendations on necessary changes to policies and practices that reflect people’s priorities and close gaps in access. You can join USofCare in our initiative to create a virtual care system that works for all of us by following the latest from us on Twitter @USofCare or reach out through our website at unitedstatesofcare.org/contact.
Introduction

For years prior, virtual care—including telehealth, remote monitoring, and other remote forms of digital communication—was seen by many to be a potential long-term fix to address access inequities in the health care system, such as rural health care access, provider shortages, and transportation needs. During the COVID-19 pandemic, virtual care has emerged as a critical tool for getting people access to the care they need while abiding by quarantine and stay-at-home orders which required emergency legislation and regulatory action to remove previous restrictions that limited virtual care access to certain circumstances. Prior to the pandemic, early adopters of technology including health systems with existing infrastructure for virtual care were the only consumers of virtual care. With the COVID-19 pandemic, the traditional later health system adopters started to use technology driven by the desire to avoid COVID-19 exposure risk in clinic settings and, in some cases, to support remote COVID-19 care and monitoring. Virtual care is now widely implemented as part of the pandemic response and will undoubtedly leave a lasting impact on our health care system as temporary policies are beginning to become permanent.

Moving forward, a well-designed approach to virtual care has the potential to break down long-standing barriers to health care access. Yet without deliberate effort and careful attention, a rapid move to virtual care could further exacerbate disparities, making care more convenient for those who already had ready access, while again leaving behind those for whom care was already inaccessible. Virtual care has already shown success in eliminating barriers to accessing care, such as transportation, stigma, and time-loss—for example, an FQHC in California found that telehealth reduced their no-show rate by 10-15%, and those types of lessons can be used to design equitable approaches moving forward.

It is also important to recognize that virtual care is being implemented within an existing health care system that has perpetuated inequities for several groups. In addition, a virtual care setting has the added complexity of technology—where the "digital divide" is well documented. This is illustrated by the current COVID-19 vaccinations distribution system and online scheduling which exemplifies the structural inequities that result in the disproportionate impact of the pandemic on traditionally under-resourced communities. For example, access to COVID-19 vaccines inequitably impact disadvantaged communities who are already at greater risk of exposure due to employment in essential jobs, multi-generational housing, and other societal factors. Although some states are working to address access barriers to vaccines, most vaccine distribution systems are inequitable due to their dependence on traditional communication channels, virtual scheduling, language barriers, distribution sites requiring vehicles, and more.

Existing research, some of which is outlined in this brief, shows that inequitable access to virtual care during the COVID-19 pandemic exists across population groups; specifically for those that have been historically underserved by the health care system and already face greater disparities to accessing health care in general. These are illustrated in recent utilization data points that can help us chart a more equitable path forward. For example:

- **A JAMIA published study** conducted in New York City, utilizing data from March 20 through May 18, 2020, found disparities in telehealth usage connected to race, age, and language preference. Researchers also found that Black and Hispanic patients, older adults, and non-English speaking patients utilized telehealth technology platforms less often than to other groups.

- **Research published in the AHA Journal**, which followed patients with a scheduled outpatient cardiology visit between March 16 and April 17, 2020, found that those who had a telemedicine visit were more likely to be male, and more likely to speak English compared to female and non-English speaking patients. Additionally, researchers found that those patients conducting their virtual visits via video were more likely to be white males, and had a higher median household income than patients who completed telephone-only visits.
An AJMC cross-sectional study, which looked at 1,652 primary care and specialty care practices of adult patients at an integrated health system from April 23 to June 1, 2020, similarly found that patients who were older than 65 years, Black, Hispanic, Spanish-speaking, and from areas with low broadband access were less likely to use video visits than telephone virtual visits.

Similarly, a JAMA published study of 148,402 patients scheduled for primary care and medical specialty ambulatory telemedicine visits at a large academic health system from March 16 to May 11, 2020 found that older adults, women, Black and Latinx individuals and patients with lower household incomes were less likely to use video for telemedicine, and that older patients, people of Asian descent and non-English-speaking individuals had lower rates of completed telehealth visits overall.

At USofCare, we have a vision in which people, policymakers, providers, and entrepreneurs come together to build a virtual care system of the future, centered on people’s needs that closes gaps and removes barriers to access. To reach this vision, we have launched an initiative to look at the extent to which virtual care is addressing inequities and closing gaps in access to care for people. We are holding a national listening tour with people, providers, and other key stakeholders to learn about their diverse experiences with virtual care to better understand the barriers they are facing. We are then pairing what we learn from people from this listening tour with the research evidence and what experts in the field say so we can see: what we’re missing and what more we can do to ensure an equitable approach with virtual care.

Based on our preliminary research to date, looking at experiences both prior to - and during - the COVID-19 pandemic, including academic research, national polls, claims data analyses, and our listening work through focus groups and one-on-one conversations with our Voices of Real Life members and other communities, we have identified the seven categories, detailed below, of access barriers to virtual care that underserved populations experience at greater prevalence. It is important to note that the barriers and disparities explored in this brief are not necessarily siloed to the health care sector, but span across other forms of injustice within our society.

Absence of Technology Devices

For people to use and access virtual care, they need to have access to up-to-date technology that is compatible with virtual care platforms. This includes computers with audio and video capability, smartphones, and remote monitoring devices, among others. USofCare Voices of Real Life member and pediatric physical therapist, Summer Moss, explained that, at the start of the pandemic, about half of the families she worked with did not have access to her virtual platform. Since then, the district she works with has made significant efforts to increase access to technology for families who lacked it, but disparities, largely related to income and race, still remain. Access to adequate technology is critical for virtual care, however, people living with low-incomes, Black and Hispanic individuals, older adults, and people experiencing homelessness, tend to not have adequate technology in their everyday lives. A few related research findings show that:

★★ Children in low-income households are less likely to have access to a computer compared to their wealthy classmates. A USAFacts analysis of 2020 US Census Bureau survey data shows that 45% of students living in households earning under $10,000 annually had no access to a computer at home compared to 5% of those in households earning $100,000+ annually.

★★ A USAFacts analysis of 2020 US Census Bureau survey data also shows that about 35% of students who are American Indian/Native Alaskan do not have access to a computer at home compared to 10% of white students.

★★ According to Health Affairs, over ⅓ of households headed by someone 65 or older do not have a desktop or laptop and over half have no smartphone. A similar 2020 KFF poll found that 32% of adults 65+ do not have
People experiencing homelessness also face significant barriers in accessing virtual care. Prior to the pandemic, a 2018 UCSF study found that only 36% of their unhoused study population had smartphones and 94% had no annual plan and used temporary phones requiring them to change their phone numbers monthly. Physician advocates for people who are experiencing homelessness and addiction say it is common for unhoused people to lose their phones or get their phones stolen due to the circumstances of their lives, affecting their ability to reliably access care virtually.

Unreliable, Unavailable, & Unaffordable Broadband and/or Phone Data

The nature of virtual care requires patients to have access to the internet and/or phone service, which, in part, includes being able to afford them. USofCare Voices of Real Life member Kris Garcia explained to us during a listening session that virtual healthcare calls can use up a lot of cell phone data. Kris adds that this can force patients to use wifi, which they may lack access to in general or specifically during the time period of their appointment—for example, during Kris’s lunch break. Various populations have particular difficulty accessing these types of services. Since virtual care relies on internet and/or phone coverage access, evidence shows us that, prior to the COVID-19 pandemic, as well as during, people living in rural areas, those with low-income, older adults, and those of Hispanic and Black communities, experience greater disparities in accessing virtual care:

- 2019 JAMA published research found that greater broadband access was associated with greater virtual care use in fully rural counties (those that are nonmetropolitan and without urban areas).
- A 2019 study by the Harvard School of Public Health showed that 21% of rural Americans reported that access to high-speed internet is a problem for them or their family.
- A 2019 Pew Research Center survey found rural Americans are 12% and 16% less likely to have broadband at home compared to urban and suburban Americans.
- KFF finds that low-income communities may also be much less likely to have reliable access to the internet, or have computers and smartphones.
- A USAFacts analysis of 2020 US Census Bureau survey data showed that about 28% of students living in households earning under $10,000 annually did not have access to the internet compared to about 10% of those in households earning $100,000+ annually.
- Additionally, 2019 Pew research finds that only about 60% of older adults are home broadband internet users.
- The 2019 Pew Research Center survey found only 61% of Hispanic individuals and 66% of Black individuals reported being home broadband users, compared to 79% of White individuals.
- In a 2019 JAMA study, it was found that counties with lower broadband had 34% fewer telemedicine visits per capita.
- Within some minority populations, even those who have smartphones may not have the internet connection or data plan to sustain a video call.

Limited Digital and Health Literacy
People may have technology devices and adequate internet coverage; however, if they have limited understanding of, and experience using, technology and the health system they will also face challenges in accessing virtual care. Virtual care access requires knowledge and/or experience in using compatible technologies, however evidence shows that older adults, people living with low-income, people with disabilities, people who have less than a highschool diploma, people who have limited health literacy, and people from Black and Hispanic communities face greater challenges with digital literacy.

- A 2020 UCSF study found 73% of older adults use the internet but only 60% are able to send an email, fill out an online form, or find a website.
- Prior to the COVID-19 pandemic, a 2018 JAMA article data estimate indicates that 38% of older adults were not ready for a video virtual care visit, predominantly because of inexperience with technology.
- Many low-income patients also lack digital and health literacy, which may result in harder times accessing and understanding virtual care.
- A KFF study found that 26% of non-elderly adult Medicaid beneficiaries reported never having used a computer, 35% did not use the internet, and 40% did not use email.
- People with developmental and intellectual disabilities may also have limited digital literacy and require assistance when utilizing virtual care.
- Digital literacy barriers are found to be more prevalent among individuals with less than a high school diploma, as well as within Black and Hispanic communities.
- Black patients are much less likely to use online patient portals compared to their peers who use them as the primary way to communicate with their physicians.
- Prior to the COVID-19 pandemic, a 2016 Journal of Medical Internet Research research study found that patients with lower health literacy were less likely to use different forms of digital health tools than those with high health literacy.
- A December 2020 West Health NORC poll found that of those who had a virtual care visit 39% of participants without a highschool diploma and 28% of those whose household income is less than $30K a year agreed with the statement, “I had trouble getting the technology or internet to work.”

Concerns about Quality and Personalization

People's success in accessing virtual care depends on their comfort and acceptance of virtual care as a viable form of getting quality and personalized care. Barriers to this include people being concerned that their unique needs may not be met, concerned that the provider will miss something, unaccepting or distrusting technology as an option for care, and distrusting the health system as a whole. This sentiment was captured in a community conversation that took place with a person with a disability where he states, “My primary care provider wants me to go to telehealth. I won’t do that. If a doctor cannot be bothered to have person to person interaction with his or her patients that indicates to me that all I am is a billable, impersonal, activity, and not a person who deserves to be heard.” These concerns can be seen across the board, but specifically for older adults, foreign-born individuals, people of color, and people with disabilities.

- A 2020 University of Michigan national poll found that 75% of surveyed older adults were concerned about a health care provider not being able to conduct a physical exam through telehealth and 67% were
concerned that the quality of the care is not as good as care provided in-person.

★ A 2020 Better Medicare Alliance survey found that 30% of Medicare Advantage beneficiaries noted being uncomfortable using virtual care to access medical care.

★ People born outside of the country may be reluctant to use any health service or medical institutions, including via virtual care, due to fear of deportation and/or receiving less quality care due to their cultural norms and practices.

★ Communities of color show higher rates of mistrust in the health system due to being historically underserved, mistreated, and exploited by health care in this country. This lack of trust can lead to avoided medical attention and lower quality of services through virtual care.

★ Some people with disabilities may have unique needs for in-person observations and examinations due to limited sensory awareness or cognitive ability to describe the symptoms they are experiencing.

★ The West Health NORC poll\(^1\) found that, of those who had a virtual care visit, 25% agreed with the statement, "I was concerned the provider would miss something because the assessment is being done remotely and not in person" and 20% agreed with the statement, "I did not trust that my provider could get an accurate assessment, diagnosis or treatment." Additionally, of those who had a virtual care visit, 23% of Black non-Hispanic individuals agreed with the statement, "I did not feel the [virtual care] visit was personalized" compared to 14% of White non-Hispanic individuals.

Lack of Physical Accommodations

People need to be able to physically use virtual care in order to access it. This includes people physically setting up the devices and successfully communicating with their provider and/or the technology platform. Without physical accommodations and interpreters available for virtual care, people with disabilities, older adults, and others face disparities in accessing virtual care.

★ People with physical disabilities may struggle with setting up virtual care devices, such as cameras and tablets without the assistance of others.

★ People with certain disabilities, such as people who are blind or low-vision, and people who are deaf or individuals with hearing loss may see additional barriers to accessing virtual care especially if the technology is not accommodating with screen readers, real-time captioning, and remote American Sign Language and speech-to-speech interpreters with medical translation knowledge.

★ Additionally, a 2020 JAMA published assessment found that an estimated 20% of older patients were not ready for telephone visits because of difficulty hearing, difficulty communicating, or dementia.

★ A 2020 University of Michigan national poll found that 25% of surveyed older adults were concerned about having difficulty hearing or seeing the health care provider through telehealth.

Language Proficiency Barriers

\(^1\) National survey conducted at NORC at University of Chicago AmeriSpeak Omnibus Wave 2 December 20, 2020 (funded by West Health) – Surveyed N=1028
People who have limited English proficiency or whose preferred language is not English may also face additional barriers to virtual care access. This is also a barrier to access in traditional health care settings, even with existing requirements for services to be provided in a patient’s preferred language. For communities like Zehra Hussain’s, where English is not the community’s first language, telehealth can be a barrier to patient provider communication. When USofCare spoke with Zehra in June 2020, she expressed concern that the physical cues important to communication for those in her community are not always conveyed effectively through virtual care, which can lead to a lower quality of care. People with limited English proficiency, including non-native English speakers and immigrants, face greater barriers in accessing virtual care.

- U.S. Census Bureau data from prior to the COVID-19 pandemic found that **22% percent** of the American population ages 5 and up **speak a language other than English at home**, however there are only **limited health providers** that share that identity, creating barriers to communication.

- *Health Affairs* published research found that, prior to the pandemic, only 4.8% of patients with limited English proficiency had used telehealth in the previous twelve months compared to 12.3% of English-proficient patients through secondary analysis of 2015–18 adult California Health Interview Survey data.

- It has been seen that there is a **strong need** for virtual care services that tailor to **non-English speakers**, including dissemination of instructions, follow-up information, technology platforms ability to integrate video remote interpreting capabilities, and bilingual and implicit bias training for patient facing technology tools.

- The communication gap disproportionately impacts **a large number of immigrants** who may have limited English proficiency.

**Privacy Concerns**

For virtual care, like any health care, it is important that the patient feels their privacy is being protected. This includes ensuring a private environment for both patient and provider, data sharing privacy, and the option of an independent health visit without additional personnel for assistance. However, with virtual care’s originating sites (where a patient receives care) being outside a doctor’s office or clinic, privacy can be difficult to come by for certain populations. For example, a 67-year-old white female with a disability, who is not a computer user, told us in a listening session that if she had to use a computer or any other way to use telehealth other than a telephone, she would not try virtual care, "because then I would need help from other people and I believe that health care appointments should be private." The opportunity for privacy within virtual care is not consistent across all populations, resulting in inequitable access to virtual care.

- A 2020 *University of Michigan* national poll found that **24%** of **older adults** had privacy concerns regarding a telehealth visit.

- **People experiencing homelessness** and/or people who live in small and overcrowded places may have a **more difficult time** finding a private space for a virtual care visit.

- People may have higher privacy concerns depending on their comfort level and unique care needs too. For example, individuals on the **LGBTQ+ spectrum**, people receiving **behavioral and mental health services**, and people experiencing a **substance use disorder** may have a greater need for privacy during a virtual care visit.
The West Health NORC poll\(^2\) found that 24% of Hispanic individuals said they were "concerned about my health data and personal health record privacy with the technology, applications, sharing of electronic health records, etc." compared to 15% of white non-hispanic individuals.

**Conclusion**

People from all walks of life have experienced and accessed virtual care to get the health care they need during the COVID-19 pandemic. However, data shows that there continues to be challenges with equitable access to virtual care for many underserved populations. USofCare is listening to people about their experiences and barriers with accessing virtual care. Our listening work thus far has supported the potential for virtual care to help maintain and even improve access. However, we continue to hear that Americans across the country are experiencing a variety of barriers accessing virtual care and that underserved populations are often disproportionately impacted by these barriers.

As we move forward to a post-pandemic world, we must harness the lessons of virtual care to construct policy that solves for access and addresses disparities in seeking care and health outcomes. As we continue to listen to diverse perspectives, we are incorporating their voices with the existing research data to help us determine what barriers we have not yet been unearthed.

In Fall 2020, we launched a listening tour focusing on underserved population groups that have experienced some of the greatest challenges accessing health care over time in the traditional setting. Our work is evaluating what access barriers are shared across demographics, as well as which ones are unique to specific groups. We are pairing our listening and research to understand how current policies and practices with virtual care are addressing these barriers, or in some instances increasing disparities to access. We use all of this information to develop and recommend principles and policies that will build a virtual care model of the future that works equitably for all of us.

**Additional US of Care Resources on Virtual Care:**
- Blog - Can Virtual Care Permanently Revolutionize Health Care? Only If We Look At It the Right Way
- Blog - Virtual Care During COVID-19: Three Americans across the country discuss the positives, negatives, and future of using technology to deliver health care
- Memo - Summary of Virtual Care Legislative Policy Areas Directly Impacting People’s Ability to Access Care
- Playbook - Older Adults’ Experience of Virtual Care: Action Steps to Increase Access and Equity

\(^2\) National survey conducted at NORC at University of Chicago AmeriSpeak Omnibus Wave 2 December 20, 2020 (funded by West Health) – Surveyed N=102