

The impact of COVID-19 on **access to the internet and digital devices**

Lack of access to the internet and digital devices like smart phones, tablets and laptops creates a digital divide felt most acutely by people living in poverty, in rural communities or on First Nations reserves.

COVID-19 affects every single one of us

The COVID-19 pandemic has wide-reaching effects on all aspects of our work, family, and social lives. We all experience and cope with the COVID-19 pandemic in our own way. The Vital Focus series examines the impacts of measures to control COVID-19 on health and wellbeing in our community.

Inequitable access to and use of digital information and communication technologies (ICTs) existed before COVID-19. However, the pandemic has intensified challenges for community members within and across communities.



There are gaps between people who can access and use information and communication technologies and people who cannot.

What is the digital divide?

The “digital divide” is a term that refers to the gaps between people who can access and use information and communication technologies (like smart phones and computers, reliable and affordable internet services) in their daily lives and people who cannot.^{6,1} A person impacted by the digital divide may experience low-quality and reliability of internet service, high device costs, inability to pay the cost of a device, high setup or increasing monthly costs, and/or limited types of connections depending on where they live or work.

Today, access to ICTs is more important than ever for people to fully participate in society, to:

- Communicate and stay connected with their loved ones;
- Find and keep employment, telecommute, or start and build a business;
- Participate in school and lifelong learning;
- Access cultural and civic events and entertainment, like films, online voting, and music; and
- Connect with essential services, including online banking, online shopping, and healthcare, emergency, government, and community support services.^{6,2,6.3,6.4, 6.5, 6.6, 6.40}

Local Spotlight: Guelph

SHELLDALE FAMILY GATEWAY  Outreach staff at Shelldale Family Gateway shared their observations

Lack of access to good, reliable internet is an issue for many of the families that access Shelldale’s services. Some families are struggling to pay for food, let alone internet or a tablet. The school boards provided a laptop for some of families but they still struggle if they have poor internet service. Many families rely on mobile data to access the internet so that limits their ability to participate in online activities or virtual sessions. People who speak English as a second language face additional challenges accessing virtual services.

Some community members are disproportionately affected by the digital divide

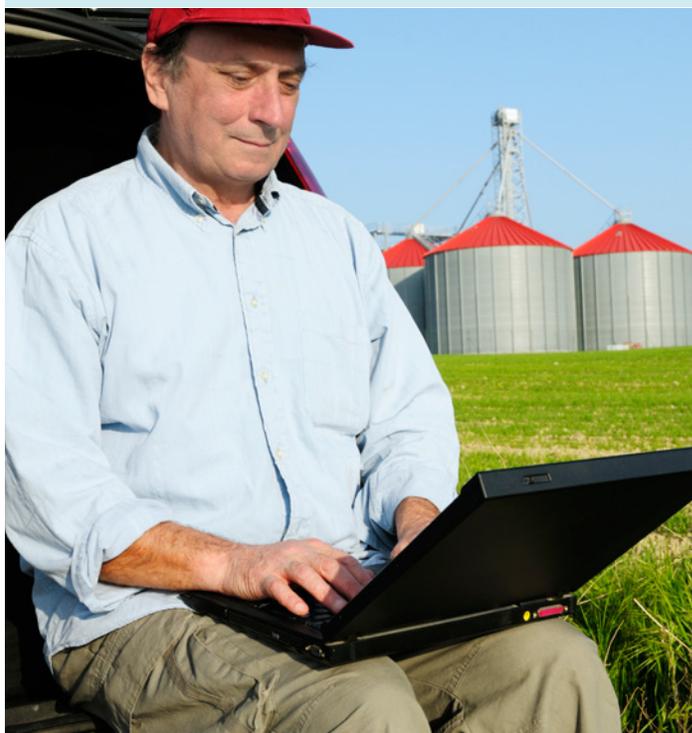
- People living in poverty face barriers to accessing digital devices, fast and reliable internet service plans, and ICTs education and support. ^{6.3 6.8 6.10 6.11 6.12}
 - In 2016, 11.1% of households in Guelph and 8.9% of households in Wellington County were low-income. ^{6.13}
- The costs of ICTs continue to rise leading to low-income residents spending more of their annual income on their ICTs. ^{6.11}
 - In 2017, Canadian households with an annual income of less than \$32,914 spent 9.1% of that income on phone, internet, and television services. ^{6.3 6.11 6.15}
- People who experience homelessness lack safe spaces to learn about, use, and store digital devices, leading them to rely on local community services to use ICTs and maintain ties with outreach services. ^{6.16}
- Across Canada there are many examples of projects and investments that have or will create access to broadband internet in rural areas and First Nations communities. ^{6.33, 6.68} At the same time, many people who live in rural areas and on First Nations reserves across Canada continue to experience a greater digital divide than those who live in urban areas, including:
 - Paying more for mobile data and internet plans due to less service provider competition. ^{6.11}
 - Less access to mobile data services. ^{6.11 6.18}
 - In 2017, 99% of Canadians had mobile LTE data coverage, decreasing to 95.9% for rural residents and 72.8% for residents on First Nations reserves. ^{6.11} Most current Canadian Radio-television and Telecommunications Commission (CRTC) data show a slight increase, with LTE data coverage for 99.5% of Canadians and 97.4% of rural communities. ^{6.71}
 - Significantly less access to fast, reliable, and unlimited internet. ^{6.10 6.11 6.18}
 - The Government of Canada has set a target for minimum internet speeds of 50 megabits per second (Mbps) for downloads and 10 Mbps for uploads. ^{6.48} In 2017, 50/10 Mbps unlimited broadband was available to 84.1% of all Canadian households, decreasing to 37.2% and 27.7% for rural and First Nation communities, respectively. ^{6.11} Most current CRTC data show 87.4% of Canadian households and 45.6% of households in rural communities have access to broadband at 50/10 Mbps, unlimited. ^{6.71}
 - In July 2020 Canada's download speeds were found to be 10 times faster in urban areas compared to rural areas. ^{6.19}

- In Ontario, the analysis of 18 million internet speed tests indicate that 127 out of 740 communities (17%) routinely experience speeds below 5 Mbps (download) or 10 times below the national target; these are the "most needy" communities some of which are not as rural and remote as expected, such as Eden Mills. ^{6.66}
- Fibre optic and next generation wireless technologies are rarely found in areas where there is low population density. ^{6.54}

Local Spotlight: Wellington County

The Cost of Internet Service in Wellington County

- A local study found that in Wellington County, 57% of internet users exceeded their data cap in the past month. On average, it cost internet users \$75 when they went over their monthly data cap. ^{6.52}
- In Puslinch Township, data analysis indicates that the monthly cost of one residential service plan is on average \$85, plus the possible average one-time set up costs of \$236.00. ^{6.55}
- For those who can access the technologies they need and have a job that can be done remotely, working from home can lead to savings.
 - As of August 2020, the average Puslinch household with two telecommuters reported a savings of \$23,000 annually as a benefit of having internet access. ^{6.53}



In July 2020 Canada's download speeds were found to be 10 times faster in urban areas compared to rural areas.

The digital divide during COVID-19

- The pandemic has vastly increased the need and demand for higher quality internet services to:
 - work and learn from home,
 - connect with essential services,
 - contact loved ones, and
 - provide entertainment.^{6,21}
- Prior to the pandemic, we were downloading more than we uploaded. Now video conferencing for work or school requires increased upload speed. At the same time, in many households the number of people needing to connect at one time has increased, thus previously good internet service can fail to be adequate for the requirements of a household where multiple people are required to be online for work and/or school.^{6,58, 6,59, 6,60}
- With the digital divide exacerbated, people with barriers to accessing the internet or devices, may find it difficult to:
 - 1) **Connect with social support networks and services.**
 - Difficulty connecting with loved ones and accessing essential health, mental health and drop-in services make it harder to deal with feelings of isolation, depression, and anxiety.^{6,22 6,23 6,24}
 - Physical distancing reduces free access to digital devices and Wi-Fi in public spaces like libraries and limits time with family, friends and peer supports to provide help to use devices.^{6,9}
 - 2) **Work from home and find and keep employment.**^{6,21}
 - It can be difficult for many older people and people from low-income, rural, and First Nations reserves' households to look for work and retraining opportunities online or to work from home. These issues limit job opportunities, reinforce poverty, and force people to work in settings where they face an increased risk of COVID-19 exposure.^{6,9 6,26}
 - 3) **Participate in online learning.**
 - With some students learning from home, students from low-income, rural, and First Nations households have additional ICT challenges with competing needs for devices and connectivity.^{6,9,6,9 6,27}
 - 4) **Access online entertainment and events.**
 - Those impacted by the digital divide do not have equitable access to online content that may help reduce feelings of boredom, frustration, and isolation while physical distancing measures are in place.^{6,29}
 - 5) **Access health and wellbeing programs, and essential services.**
 - With barriers to viewing online COVID-19 related information and connecting with essential services, some people may be less likely to seek out and receive treatment for COVID-19 and other physical health issues.^{6,4 6,30 6,31}



Local Spotlight: Wellington County

Outreach staff from the Community Resource Centre (CRC) shared some their observations.

One of the growing barriers we are seeing our clients in Wellington County face is the cost of internet. It's no longer an optional service – it's how they connect with their community and supports and also how their children can participate in online learning. Not having access to internet can very quickly impact families in negative ways. Recently a client reached out because her internet was cut off due to arrears on the account. This immediately meant that her two children couldn't participate in online learning, therefore impacting their education. This very quickly put these children at a disadvantage compared to their peers. Fortunately, the CRC has a program that can assist with internet bill payments but it could still be multiple days before the internet is reconnected.



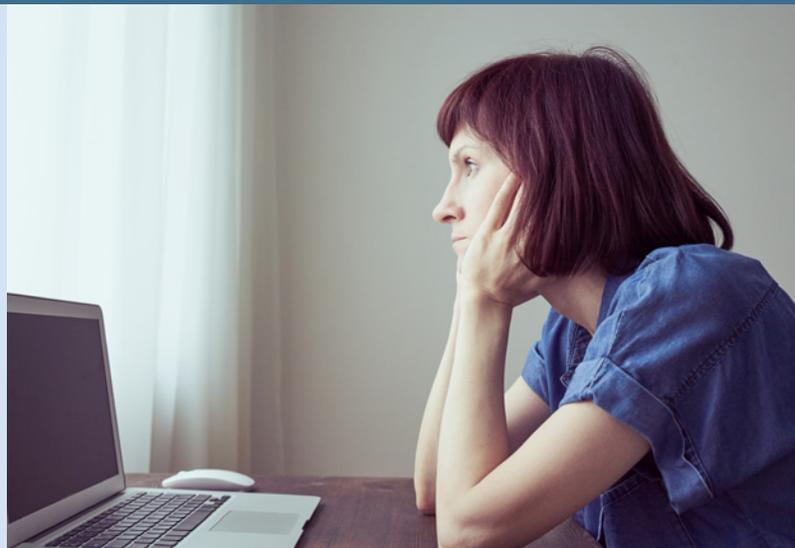
Not having access to reliable internet can impact families in negative ways and prevent children from participating in online education.

How to eliminate the digital divide

To eliminate the digital divide, community members need equitable opportunities to:

- Consistently and easily access well-maintained, modern, affordable digital devices;
- Connect to affordable, reliable, and higher speed internet services at home and work; and
- Receive accessible education and support about how to use ICTs safely and effectively.^{6.7 6.8 6.9 6.41}

While a digital divide continues to exist, free Wi-Fi hotspots are needed to provide internet access for people who do not have it elsewhere (such as their home and workplace). This is a stop-gap measure and should not be considered a long-term solution.



People living in rural communities face additional challenges regarding gaps and inequities in broadband access.

There are national, provincial and local initiatives trying to address the digital divide.

- Working with internet service providers, federal and provincial governments have made significant investments to improve internet and cellular access in communities, including the Ontario government's \$3.8 billion investment, the \$1.75 billion Federal Universal Broadband fund, and the \$750 million CRTC Broadband Fund.^{6.69, 6.70, 6.71}
- Currently, the SWIFT (Southwestern Integrated Fibre Technology) program is leveraging \$12.9 million in public and private funding to support four broadband infrastructure projects within Wellington County to create faster and better-quality internet services.^{6.33 6.45}
 - 36% or 12,683 of the approximately 35,000 premises (household or business) in Wellington County are underserved by broadband internet.
 - The current SWIFT projects will serve almost 2,900 underserved premises in Wellington County.^{6.5, 6.67}
- The Upper Grand District School Board (UGDSB) and the Wellington Catholic District School Board provided more than 4,000 digital devices in March, 2020 to help students learn from home during the initial months of the pandemic.^{6.34}
- Local task forces like the Puslinch High-Speed Internet Group have been formed to support data collection and attract Internet Service Providers to seek out federal and provincial funding to improve services in their rural areas.
- Guelph and Wellington County libraries offer programs to improve digital literacy, including one-week hotspot loans, as well as access to various technologies and digital instructions. They have also supported the distribution of Chromebooks provided to students by the UGDSB.^{6.63}
 - Wellington County Libraries have about 130 Chromebooks and 70 Wi-Fi hotspots available for patrons. Since the beginning of the pandemic these have always been checked out, with waitlists for hotspots running about 3 months.^{6.64}
 - Guelph Public Library has 52 Wi-Fi hotspots available for patrons to borrow. Wi-Fi can also be accessed in the library parking lot.^{6.65}
- Private companies donated and provincial governments provided digital devices with mobile data to people who experience poverty and homelessness (e.g., TELUS' All Connected for Good program and the B.C. government).^{6.24 6.22}
- The Government of Canada is examining gaps and inequities in broadband access. Two Parliament of Canada House of Commons Standing Committees are studying these issues, with one looking at accessibility and affordability of telecommunications^{6.67} and the other looking at challenges faced by women living in rural communities.^{6.68}



If you or someone you know is struggling to access internet or digital devices, please visit [Toward Common Ground](#) for internet access and technology support options.

Recommendations to help close the digital divide

- Policy stakeholders must create policy and funding opportunities to create equitable access to 1) digital devices; 2) reliable, consistent, and affordable broadband and cellular services; and 3) ICT education and support.^{6.8} To accomplish these goals policy stakeholders should consider the following interventions:
 - Look to [Canada's Digital Charter](#) to inform local action and/or the development of a local digital charter.
 - Treat higher speed, reliable broadband services, Wi-Fi hotspots, and mobile LTE data access as essential services similar to public utilities like water or electricity.^{6.12}
 - Whenever possible, municipalities should work with Internet Service Providers to create access to low-cost internet options.^{6.43}
 - Create policy to help increase reliable and affordable rural internet access, including competitive internet and mobile data prices.^{6.35 6.43}
 - Follow [best practices](#) for program funding.^{6.42} For instance, increase government funding, expand the eligibility of programs, and/or encourage Internet Service Providers to sign up for and promote programs like the [Connecting Families](#) initiative.^{6.8 6.10 6.44}
 - Municipalities can adopt requirements such as “dig once” (the requirement of “construction of fibre-optic conduit as part of any public works project”)^{6.50} and rights-of-way policies (“The legal right, established by usage or grant, to pass along a specific route through grounds or property belonging to another”)^{6.57} to support internet infrastructure build out and scaling.
 - Municipalities should also consider streamlining permitting fees and processes to remove barriers in the way of Internet Service Providers trying to implement new networks.
 - Participate in internet use [surveys](#) to inform public investment strategies in better broadband
 - Fund community research about the digital divide to guide policy goals, measures of success and accountability reports.^{6.43 6.44}
- Internet or mobile data service providers should consider the following actions to ease the burden of additional ICT costs:
 - Permanently increase mobile data caps at no additional cost and eliminate mobile data overage charges.^{6.36}
 - Evaluate corporate social responsibility programs, such as TELUS' [Mobility for Good](#),^{6.37} [Internet for Good](#),^{6.38} and [Tech for Good](#),^{6.39} and investigate whether similar programs can be made available for Guelph-Wellington community members.
 - Create partnerships with governments, non-profits, and rental housing companies to increase access to high-quality free or low-cost internet for people with barriers to access.^{6.41 6.43}
- Increase marginalized community members' access to upcycled, upgraded, and publicly available digital devices:
 - Governments, non-profits, and the private sector should continue to work together to provide low- or no-cost digital devices to people who are marginalized.
 - The public and private sector and community members should run campaigns that encourage people to donate used digital devices for redistribution.^{6.9 6.43 6.44}
 - Community spaces (e.g., libraries) with public internet and digital device access should be kept open when it is safe to do so, in addition to other public spaces creating digital access (e.g., recreation centres) with modern ICTs. For example, downtown Elora, Fergus and Guelph offer free Wi-Fi.^{6.9 6.43, 6.61, 6.63}
- Increase social support for digital learning:
 - Governments, non-profits, and private companies should partner to provide long-term, tailored, low- or no-cost, relevant digital learning and training opportunities for populations disproportionately impacted by the digital divide, in convenient locations or by innovative means (e.g., peer-to-peer assistance, information videos).^{6.8 6.9 6.10 6.44}
 - Education stakeholders should create further opportunities to learn digital skills through school curriculums.^{6.9}
- Offer flexible and varied community programs and services to ensure that community members most impacted by the digital divide are able to access essential supports and services, including in-person supports where safe and possible.

Footnotes and references are available at [Toward Common Ground](#).

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Note: There are limitations associated with the data and research sources included in this Vital Focus. For more information about sources and citations, please go to [Toward Common Ground](#). If you know of research or data about diverse communities not represented in this Vital Focus, please contact us at sarahh@towardcommonground.ca

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