

# Managing Networks in Unprecedented Times – Part 3

August 19, 2020

This is the third installment of CWTA’s series of reports looking at the traffic volumes on Canadian telecommunications networks during the COVID-19 pandemic (see [here](#) and [here](#) for parts one and two). Looking at traffic volumes for June and July of this year, this report shows that Canadians continue to utilize telecommunication services at higher rates than before COVID-19. The gradual relaxation of mobility restrictions across the country are reflected in the increase in mobile network traffic, with median wireless traffic exceeding pre-COVID-19 levels. Meanwhile, despite some businesses and public spaces reopening, wireline traffic volumes continue to show that many Canadians are still relying heavily on home internet services to stay connected to their workplaces, families, and friends.

Based on updated traffic patterns for June and July 2020, it is evident that our communications infrastructure has kept pace with ongoing changes in demand for telecom services. As relaxed COVID-19 restrictions and increased civilian mobility prompt further changes in demand for telecom services, Canadian networks remain impressively resilient, thanks largely to the proactive manner in which they are being operated, expanded and enhanced by Canada’s facilities-based carriers.

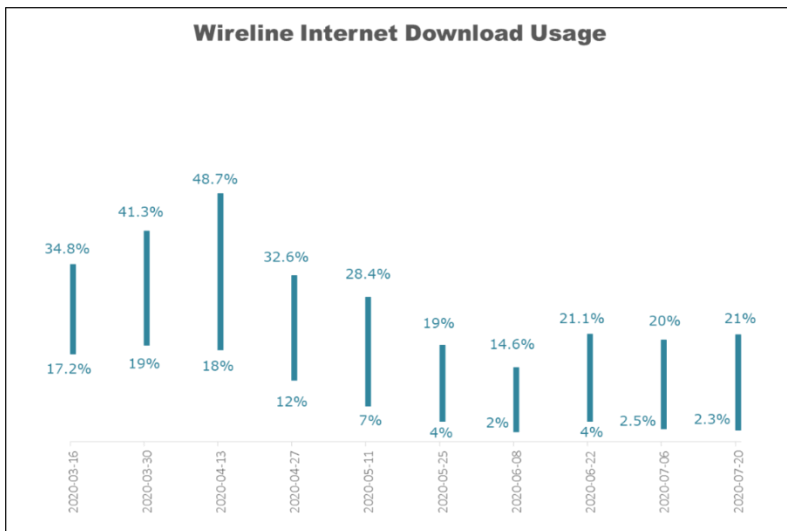
## **HIGHLIGHTS FOR JUNE AND JULY**

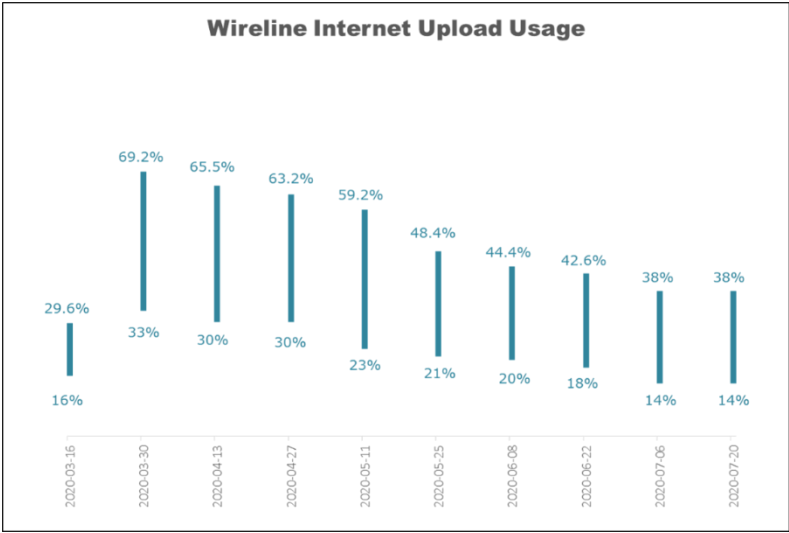
- Throughout June and July, wireline home internet traffic was as much as 21.1% higher for downloads and 44.4% higher for uploads compared to pre-COVID-19 baseline volumes. While this is a moderation of traffic volumes compared to the prior three months, it still represents higher traffic than before COVID-19.
- In late July, based on median changes in usage, mobile data download traffic surpassed pre-COVID levels by 14.6% while upload traffic was 27.7% higher than pre-COVID levels. This continues the trend of increasing usage of mobile wireless services since the early days of the COVID-19 pandemic.
- Voice call minutes on wireless networks also increased by as much as 40.1% in June, and 34.4% in July compared to pre-COVID-19 baseline volumes. While voice usage decreased by a small amount in July, this continued an overall trend of high usage that was evident throughout March, April and May 2020.

## **TRAFFIC VOLUMES IN JUNE AND JULY**

### Home Internet

The following chart shows that wireline traffic remains significantly higher than during pre-COVID levels.



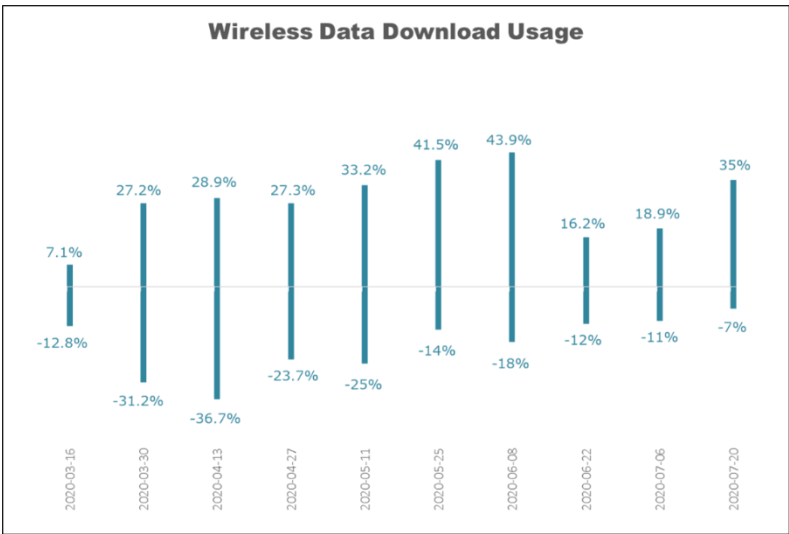


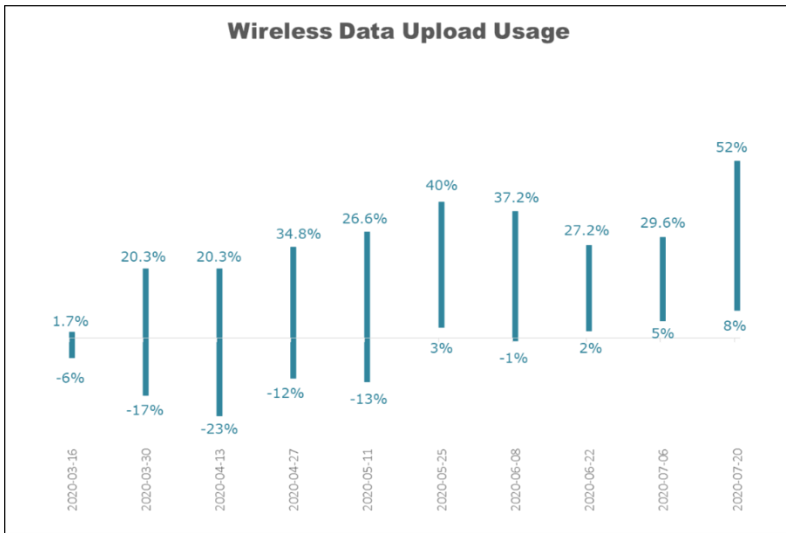
\*The above charts show the range of increase in data volume among participating carriers compared to their pre-COVID-19 baseline average. Each carrier’s baseline average was determined using their averages for February 24, March 2 and March 9.

**Mobile Wireless Data and Voice**

During June and July, wireless data volumes continued to vary between network operators, similar to the patterns that occurred in March, April and May. On the high end, mobile data traffic increased by as much as 43.9% for downloads and 37.2% for mobile data uploads.

At the same time, decreases in mobile download traffic were smaller on July 20<sup>th</sup> than they had been throughout any previous month, and all of the carriers we surveyed reported that mobile upload traffic had increased as of this same date.





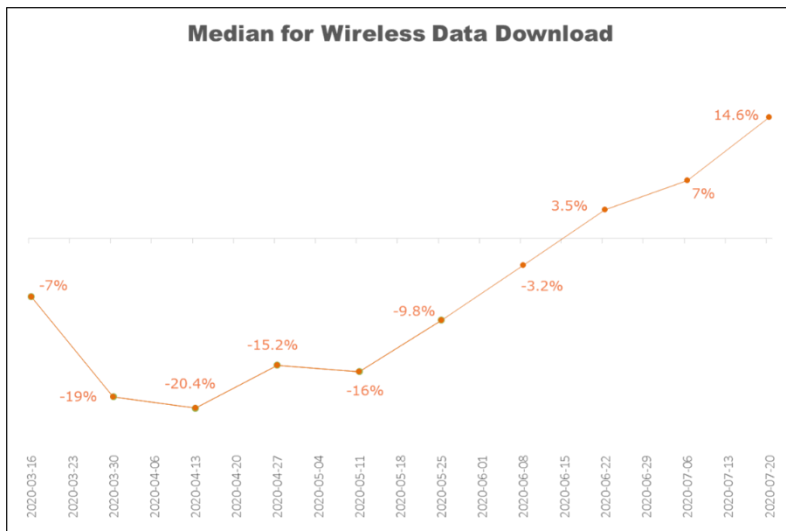
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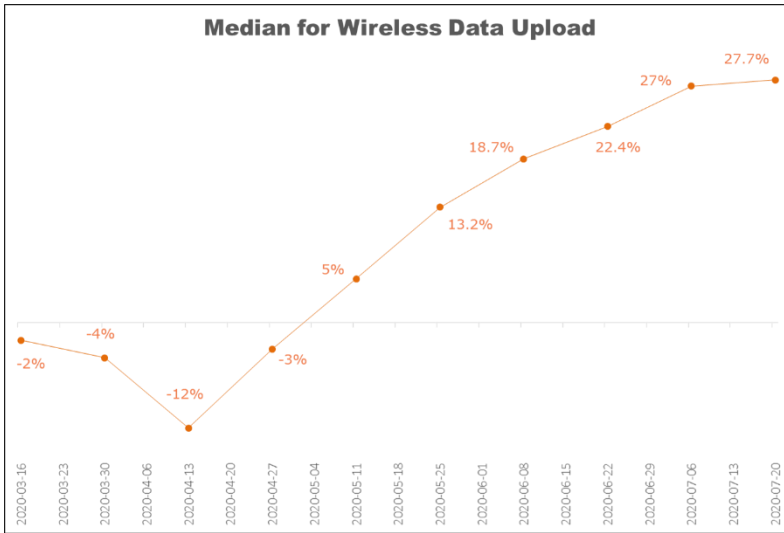
As in our previous network usage update, wireless traffic for June-July is analyzed more closely in this report by looking at median changes in traffic volume.

During March and April – when Canadians were asked to limit their travel away from home – median volume changes showed a decrease in mobile traffic being used across all networks we surveyed.

In May, as COVID-19 restrictions were scaled back in some parts of Canada, the median change in download traffic began to approach Canada's pre-COVID baseline, while the median change for mobile upload traffic was 13.2% higher than before the pandemic.

In late June, as more COVID-19 restrictions were lifted across the country, the mobile download median began to exceed Canada's pre-COVID baseline by 3.5%, while the median change for mobile upload traffic was 22.4% higher than before COVID. By the end of July, median increases for mobile download and upload traffic were +14.6% and +27.7%, respectively, compared to the pre-COVID baseline.

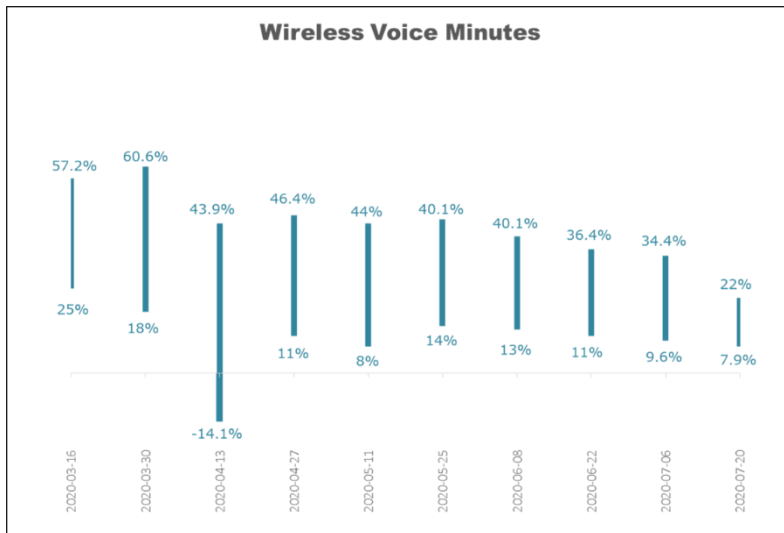




\*The above charts show the median change in wireless data volume among participating carriers compared to their pre-COVID-19 baseline average. Each carrier’s baseline average was determined using their averages for February 24, March 2 and March 9.

**Mobile Voice**

As during the previous three months, increases in voice minutes on wireless networks remained high in June 2020 – rising by as much as 40.1% on the dates that we surveyed. In July, voice minutes tapered slightly, but in the first half of the month they were still 34.4% higher than the pre-COVID-19 baseline.



\*The above chart shows the range of increase in calling minutes among participating carriers compared to their pre-COVID-19 baseline average. Each carrier’s baseline average was determined using their averages for February 24, March 2 and March 9.

**CONCLUSION**

The COVID-19 crisis has underscored the important role that telecommunications networks play in facilitating the commercial and public sector activities that Canada’s prosperity depends on.

The network traffic patterns analyzed in this report show that Canadians are continuing to rely heavily on their phone and internet connections, even as COVID-19 restrictions begin to be lifted and reopenings occur in different parts of the country.

At the same time, Canada's telecom infrastructure has proven remarkably resilient in the face of the heavy demands being placed on it. Such resiliency comes as a result of the resources that facilities-based carriers have consistently invested in Canadian networks for several decades now.

Note: Network operators surveyed were Bell, Rogers, TELUS, Shaw/Freedom, Videotron, SaskTel and Tbaytel.