

EDITORIAL

Telemedicine in routine gastroenterology practice: A boost during the COVID-19 pandemic

Telehealth has been defined by the American Telemedicine Association as technology-enabled healthcare management and delivery systems that enable capacity and access.¹ Both “telemedicine” and “telehealth” are terms that have been used interchangeably in practice, but there are differences between them.^{2,3} Telehealth refers to a technology facilitated healthcare service, through the exchange of medical information from one information source to another. An example of this would be virtual check-in systems or remote monitoring of the health condition of individuals. In contrast, telemedicine utilizes audio and visual communication between healthcare professionals and patients in real time. An example of telemedicine would be tele/electronic virtual consultations, whereby healthcare professionals and patients communicate without a face-to-face meeting.

Prior to the COVID-19 pandemic, the utilization of telemedicine in gastroenterology had been poor. It was ranked the second lowest among Internal Medicine specialties, with only 7.9% of gastroenterologists utilizing telemedicine in their practice, according to a 2016 survey by the American Medical Association. Furthermore, regulatory restrictions by Medicare and Medicaid in the United States had limited the uptake of teleconsultation. However, a form of telemedicine, Project ECHO, had been initiated in the United States in as early as 2003, to provide tele-mentoring for clinicians treating chronic Hepatitis C remotely.⁴ Project ECHO soon expanded to other fields of Medicine and has been adapted in various parts of the world. In inflammatory bowel disease (IBD), tele-monitoring platforms have been used to generate risk scores based on patient-reported symptoms, to alert the healthcare providers when there was a potential flare or decompensation.



The COVID-19 pandemic resulted in a huge disruption of elective and routine services in all fields of Medicine, including gastroenterology.^{5,6} The pandemic impeded the conduct of face-to-face consultations and has fast-tracked the implementation of virtual patient consultation.^{7,8} Not only were normal clinical services disrupted, but fear of contracting COVID-19 at most hospitals by the public had impaired appropriate delivery of care in gastroenterology.⁹ A relaxation of rules and regulations by regulatory bodies in the United States during the pandemic additionally hastened the adaptation of telemedicine.⁹ Several publications from the United States have now demonstrated the increased acceptance of virtual consultation during the COVID-19 pandemic, even among less technologically inclined patients.⁷ In a study conducted at an academic gastroenterology medical center, two-thirds of patients who engaged in telemedicine rated the experience as good or even better than face-to-face consultation.^{4,10} Greater accessibility, convenience, and a reduced

travel burden are some factors that have led to an increased acceptability of virtual consultation.⁴

In the current issue of JGH Open, Ghoshal et al. have reported the feasibility and acceptability of telemedicine for IBD adult patients during the COVID-19 pandemic in India (REF). Among 50 patients recruited in the study, 80% underwent video consultation and 20% received telephone consultations due to unfamiliarity or insufficient network bandwidth. Over a 1.5 month follow-up duration, 98% of patients reported that they were satisfied/very satisfied with the teleconsultation. Forty six percent even rated remote consultation using digital technology to be superior to face-to-face consultation. Despite the COVID-19 pandemic, the IBD patients reported that their health-related quality of life and psychological issues were either comparable to or better than the pre-pandemic period, likely due to the improvement in their clinical disease. These findings are similar to a report from Italy, which compared the quality of life of IBD patients who had either face-to-face review in outpatients or telemedicine. Among 1083 IBD subjects, Mastronardi et al. showed a lower clinical relapse rate among those who had traditional consultation, but no differences in quality of life between the two types of consultation.¹¹

In another article in this issue, Zorron Cheng Tao Pu and colleagues from Australia report on patient and doctor satisfaction with telemedicine at a post-endoscopy clinic during the COVID-19 pandemic, using a validated scoring system (REF). The authors compared satisfaction scores between video and telephone consultation and observed a greater satisfaction by both patients and doctors with the former method. However, of the 306 patients who were scheduled for a video consultation, 170 (55.6%) could not connect through due to technical reasons and some had to revert to using a telephone. Furthermore, the median age of patients who successfully underwent video consultation was significantly lower (57 years) than those who received telephone consultation (65 years).

Although telemedicine has many benefits, it is not perfect. Some patients, especially the elderly, may not have access to telecommunication nor have adequate digital literacy.¹⁰ Infrastructure such as network/internet connectivity and patient preparedness may additionally affect the quality of the consultation.⁸ Importantly, if local licensing regulations are weak, there may be medicolegal and ethical issues around telemedicine.⁴ Telemedicine can never entirely replace the need of face-to-face consultation; however, it does have advantages as have been highlighted above. Nevertheless, the hybrid between these two methods of healthcare delivery could revolutionize the way we care for our patients.

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