

Mobile technologies can help improve communication between different healthcare providers, however more studies are needed to confirm their effectiveness

Gonçalves-Bradley DC, Maria ARJ, Ricci-Cabello I, Villanueva G, Fønhus MS, Glenton C, et al. [Mobile technologies to support healthcare provider to healthcare provider communication and management of care](#). Cochrane Database of Systematic Reviews. 2020;(8):Art. No.: CD012927. DOI: 10.1002/14651858.CD012927.

What is the context of this review?

- Effective communication between healthcare providers is essential in providing good quality care to patients, as they must be able to exchange clinical information and easily refer patients.
- In many rural and remote communities, there is a shortage of healthcare providers, and a lower number of specialists. Mobile technologies can help address this challenge by promoting communication between healthcare providers who are geographically separated, and improving the accessibility to specialized healthcare for residents of these rural and remote communities.
- This review aims to address whether mobile technologies can help increase communication between different healthcare providers, and whether this improves patient health outcomes.

Box 1: Coverage of OHT building blocks

This review addresses [building block #5](#):

- 1) defined patient population
- 2) in-scope services
- 3) patient partnership and community engagement
- 4) patient care and experience
- 5) digital health (domain 37 – e-consultations for patients and domain 38 – e-consultations among providers)**
- 6) leadership, accountability and governance
- 7) funding and incentive structure

What questions are being addressed?

- What are the effects of mobile technologies versus usual care for supporting communication and consultations between healthcare providers on healthcare providers' performance, acceptability and satisfaction, healthcare use, patient health outcomes, acceptability and satisfaction, costs, and technical difficulties?

How was the review done?

- Several online databases were searched to find studies that discussed healthcare providers using mobile technologies to get support and guidance from other healthcare providers.
- The authors were supported by funding from UNDP-UNFPA-UNICEF-WHO-World Bank Special Programme of Research, Development and Research Training in Human Reproduction.

How up to date is this review?

- The authors searched for relevant studies published up to 22 July 2019.

What are the main results of the review?

- The authors found a total of 20,949 studies, 19 of which were deemed relevant.
- Findings were grouped into 4 categories:
 - Mobile technologies used by primary-care providers to consult with hospital-based specialists
 - This form of communication makes little or no difference to healthcare worker or patient satisfaction, as well as the cost of healthcare delivery.
 - Most of the studies found that mobile technologies made little or no difference in changes to patient referral rates.
 - One study found that patients with diabetes were more likely to receive a screening examination when mobile technologies were used.
 - Mobile technologies for communication between specialists in the emergency department
 - This form of communication may increase the speed at which patients are managed.
 - No studies reported on whether this form of communication influenced healthcare providers' ability to follow guidelines, improved health outcomes, improved provider and patient satisfaction, or changed healthcare delivery costs.
 - Mobile technologies used by community health or home-care workers
 - Two studies experienced technical difficulties when using mobile technologies: Healthcare providers not charging mobile phones, mobile phones being stolen, and video imaging being unable to display images well.
 - Studies found that mobile technologies do not make a difference in the number of times patients have to visit a healthcare provider, or the health status of patients.
 - No studies reported on whether this form of communication influenced healthcare providers' ability to follow guidelines, helped manage health conditions at a faster rate, or improved provider and patient satisfaction.
 - Equity considerations
 - The authors found that studies conducted in areas with low accessibility to health care may face barriers when it comes to the high cost of mobile technologies
 - Many of the included studies that aimed to address low accessibility to health care did not include those who could not speak or read English, those who did not own a phone, and those who did not have the Internet, so it is difficult to determine if mobile technologies increase accessibility to health care.
- Overall, the authors concluded that more studies need to be performed to understand how mobile technologies improve health status, satisfaction of users, and cost of healthcare delivery.

How confident are we in the results?

- This is a high-quality systematic review with an AMSTAR score of 10/11.

RISE prepares both its own resources (like this plain-language summary) that can support rapid learning and improvement, as well as provides a structured 'way in' to resources prepared by other partners and by the ministry ([access all resources here](#)). The plain-language summaries produced by RISE are funded through a grant from the Ontario SPOR SUPPORT Unit (OSSU) to the McMaster Health Forum. RISE is also supported by a grant from the Ontario Ministry of Health to the McMaster Health Forum. The opinions, results, and conclusions are those of RISE and are independent of those from its sponsors. No endorsement by the sponsors is intended or should be inferred.