

# Older Adults' Inclusion in and Exclusion from eHealth Services: Preliminary Results from a Systematic Review

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Due to the ageing of population in large parts of the world, a better understanding of older adults and their information behaviour is a key factor in the sustainable provision of health services for the public. There is a lot of research on the information behaviour and technology that covers older adults (55-70y) but in comparison to many other groups like children, young adults or the oldest old, there is less research that would focus on the specific issues related to this older but still active part of the population.

We present preliminary results of a systematic review on older adults' perceptions and experiences of eHealth services and discuss their relevance for a better understanding of why and how older adults' can become included in and excluded from eHealth services.

In this study, we review research on older adults' experiences of and perceptions on eHealth services to find evidence of factors that remedy and contribute to the inclusion and exclusion of older adults from being active participants in their healthcare. By experiences we mean lay people's user experiences, opinions, or thoughts about an eHealth service's impact on their life, perceived benefits of use, perceived usefulness, needs satisfaction, or perceived convenience. We are not interested in studies that report only user acceptance or usability of a service.

A systematic search of relevant original research articles was performed in eight databases in November 2015 with keywords such as eHealth, older adults, and information. Articles were also searched manually. Altogether 3,003 papers' titles and abstracts were inspected. Of these, 37 articles met our inclusion criteria and were included to the review.

Based on the reviewed research, eHealth services can facilitate the inclusion of older adults by providing support for decision-making, by increasing awareness, and providing a sense of control, for example. At the same time, the use

of a service may cause exclusion by inducing negative emotions and demanding excessive time and effort.

A major outcome of the review is that user experiences of the usefulness of eHealth services should be studied more to understand the reasons how different factors contribute to the use and non-use, and consequently inclusion and exclusion of patients from particular eHealth services. eHealth services may be easy to use but lack value for the user. Moreover, from the user's point of view, there may be also negative consequences of using an eHealth service. To understand the reasons of the inclusion and exclusion from the eHealth services, future studies should extend their focus to factors beyond narrow conceptions of usability, usefulness and value. The analysis also suggests that a better integration of the understanding what makes services easy (and difficult) to use, useful and valuable (i.e. often informative), and what decreases the likelihood of negative consequences and barriers of inclusion would be crucial for the successful promotion of the inclusiveness of eHealth services.

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