

Y. ARAKI, H. BASRAEL, S.A. LEAR. Consultation for the development of Internet-based technology platforms for managing multiple chronic diseases. *Gerontechnology* 2010;9(2):188; doi:10.4017/gt.2010.09.02.288.00

Purpose Chronic diseases pose a significant burden to patients and health care resources. Effective management of patients with chronic disease requires a patient-focused, multidisciplinary, team approach which includes the patient, primary and specialist care providers, and allied health professionals. However, chronic disease management programs are limited to urban centres, limiting access to those in small centres and rural/remote communities. The use of telehealth has the potential to create geographical equity with respect to these services. Building on our existing experience in the successful development and testing of the Virtual Cardiac Rehabilitation Program (vCRP) and the Virtual Heart Function Clinic (vHFC), the British Columbia Alliance on Telehealth Policy and Research is in the process of developing an Internet-based platform for managing multiple chronic diseases. The CDM Platform Project aims to identify which chronic diseases may be appropriate for patient-focused telehealth services and explores what specific intervention strategies (e.g. health professional involvement, symptom monitoring, medication management, behaviour/lifestyle change, patient education, peer support) could support sustainable self-management for each chronic disease condition.

Method The CDM Platform Project comprises a literature review, an on-line survey and semi-structured interviews with health authority decision-makers, front-line physicians and health care professionals involved with chronic disease management in British Columbia, Canada. The data collection took place from January 2009 to June 2009. The literature review was conducted to summarize the need for and the accessibility of technologies for chronic disease management. Survey respondents were asked to identify: (i) diseases in which optimal care can be provided through Internet-based disease management programs; (ii) specific intervention strategies that could support sustainable self-management for chronic diseases; (iii) strategic advice for implementation of Internet-based CDM programs and to self-identify as a key informant for follow-up interviews. Interview participants were asked to provide further insights with respect to chronic conditions that they have worked closely with.

Results & Discussion 111 participants completed the survey. The results suggest that: (i) Internet-based CDM programs were seen as potential tools for patient education (99%), symptom monitoring (92%), medication management (88%), and communication with allied health professionals (86%) for a variety of chronic conditions; (ii) participants were less certain if Internet-based CDM programs would benefit patients with cognitive/neurological disorders and mental health conditions. Thirty participants participated in the interviews. Interview participants were generally in favour of a single platform for patients to monitor their multiple chronic conditions at once. However, participants identified possible challenges of incorporating diverse, disease specific, and intervention strategies into a single platform. The findings from the interviews suggest that the specific needs of elderly populations with multiple chronic conditions, those in transition from acute to chronic conditions, those with low socioeconomic status and those in geographically isolated areas be taken into consideration. A need for including a component to provide online self-management for depression, one of the most common co-morbidities for patients with chronic diseases, was also addressed.

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