CLAHRC East Midlands November 2018



**CLAHRC**BITE

Brokering innovation through evidence

# Online patient education interventions in type 2 diabetes or cardiovascular disease



### Results

Online patient education technology can target biological, behavioural, cognitive and psychological measures.

Knowledge and social support benefit most consistently.

#### Who needs to know?

Patients with type 2 diabetes or cardiovascular disease and their doctors, who may be considering using such interventions.

#### What did we do:

A systematic review of systematic reviews was performed. Ovid Medline, EMBASE and Cochrane Database were searched between January 2005 and May 2018. Systematic reviews considering patient outcomes of online education interventions for adults with Type 2 DM and/or CVD were included. Quality assessment and data extraction was carried out in duplicate, and data combined using narrative synthesis.

## What we found and what does this mean:

Twenty-three systematic reviews were eligible, synthesizing evidence from 87 distinct primary studies. Biological, behavioural, psychological, knowledge and self-efficacy measures are all potential targets. The outcomes most consistently showing benefits were knowledge and social support. Conversely, self-care, healthcare use and medication adherence showed less improvement.

Online patient education has wide ranging potential benefits for people with Type 2 DM or CVD, however some patient outcomes are more suitable targets than others.

#### What next:

In addition to features of the intervention itself, the success of such interventions depends significantly on who is using the intervention, when and for what purpose. These factors require exploration with further work.

Other areas for further research include how to tailor online patient education interventions to underserved communities, exploration of the physician experience and how to integrate such technology into routine clinical practice.

#### What is NIHR CLAHRC EM?

NIHR Collaborations for Leadership in Applied Health Research and Care (CLAHRCs) are collaborations between the NHS, universities and local organisations. Our goals are to conduct applied health research across the East Midlands and translate our research findings into improved outcomes for the public.

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