



Healthcare  
Improvement  
Scotland

**SHTG**  
Advice on health  
technologies

# Plain Language Summary

SHTG Assessment

A review of the evidence for the effectiveness of digital delivery of cancer prehabilitation | April 2024

## What is digital prehabilitation?

Prehabilitation helps people to get ready for cancer treatment by focusing on both the body and mind. Prehabilitation involves personalised exercise routines, nutritional guidance, and mental health support. The goal is to make treatment more effective and increase the chances of surviving cancer. Prehabilitation is the preparation phase before starting the actual treatment, and part of the overall recovery process. Digital prehabilitation refers to prehabilitation services that use an element of digital technology in their delivery.

## Why is this important?

The use of digital prehabilitation is intended to maximise people's access to prehabilitation support regardless of their location or circumstances. By using digital tools like mobile apps or telehealth services, people could receive guidance on exercise, nutrition, and mental health support conveniently from their own homes. Digital methods of delivering prehabilitation could also enhance the effectiveness of in-person programs.

## What we did

We looked for studies measuring the clinical effectiveness of digital prehabilitation for patients with a cancer diagnosis and we also contacted clinicians in various health boards across NHS Scotland to see if there was any local data on the use and outcomes of digital cancer prehabilitation programmes.

## What we found

We found two studies that had reviewed how well digital cancer prehabilitation worked. We were unable to find any local data on prehabilitation use and outcomes.

A study in the UK followed 139 patients and found that their emotional wellbeing and anxiety improved significantly from before their surgery to 12 weeks afterwards. A small subgroup of patients (7 people) noted that a lack of digital skills was not a reason for stopping people being able to take part in the programme.

A study in Belgium involved 23 patients with oesophagogastric cancer and focused on a single prehabilitation program. It found that digital prehabilitation was feasible, with nearly all patients completing the programme (96% of people) and remaining satisfied. Emotional wellbeing improved notably in this group, but there were no other significant differences in other aspects of how patients felt.

We were unable to find any cost data to determine whether the benefit of prehabilitation programmes (including digital programmes) is worth the cost of the programme.

## What is our conclusion?

Digital prehabilitation helps to facilitate the provision of prehabilitation programs for cancer patients. More research is required to help determine the value of digital prehabilitation, in terms of its benefits and costs to people and the health service.

## What next?

Our assessment will be used by the Scottish Government Cancer Prehabilitation Oversight Group to inform the national delivery of prehabilitation within Scotland. The assessment will also inform an enquiry to the Accelerated National Innovation Adoption (ANIA) pathway by the Cancer and Rehabilitation Unit at Scottish Government. The assessment will be made available to clinicians and the public via the SHTG website.

This plain language summary has been produced based on SHTG Assessment: A review of the evidence for the effectiveness of digital delivery of cancer prehabilitation (April 2024)