

Study finds 5:2 diet is useful weapon in fight against diabetes

June 9 2016, by Katrina Mclachlan, The Lead



A popular diet is proving to be effective for improving the health of people with type 2 diabetes.

In a pilot trial conducted by the University of South Australia, use of the 5:2 diet resulted in a significant reduction of [blood glucose](#) level and

[weight loss.](#)

In the three-month trial involving 35 people, participants reduced their haemoglobin A1C (HbA1c) by an average of 0.6 per cent and also reduced their bodyweight by 6-7kg.

The results have prompted a larger year-long study to begin in the coming months, which aims to involve 100 participants.

University of South Australia PhD candidate Sharayah Carter said there had been a lot of research to support the new diet, but none that looked into its potential benefit for people with type 2 diabetes mellitus (T2DM).

"One of the major struggles with weight loss is people's ability to stick to a daily-restricted calorie diet," she said.

"On top of that, people with T2DM have medication to consider. A person with diabetes is not going to be able to take the same amount of medication on those two days because they're not eating enough food to support that medication.

"What we found was that two days of severe energy restriction basically achieves similar results to a daily restriction diet."

The UniSA trial was the first of its kind and tested the effects of a two-day intermittent energy restriction (IER) diet with 5-days of habitual eating for people with T2DM. This was compared to a daily restricted diet.

The results showed that while the IER diet has less of an impact on lifestyle and medication, both diets achieved similar reductions on weight and in haemoglobin A1C levels.

The standard calorie restriction diet consisted of 1200 calories a day for women and 1500 calories for men. All participants were asked to walk an extra 2000 steps per day to increase their level of exercise.

People who are obese are up to 80 times more likely to develop type 2 diabetes than those with a Body Mass Index (BMI) of 22. Weight loss can help control and possibly halt the disease.

According to the World Health Organisation, the number of people with diabetes in 2014 was 422 million, up from 108 million in 1980. In 2012, an estimated 1.5 million deaths were directly caused by diabetes and another 2.2 million deaths were attributable to high blood glucose.

Type 2 diabetes, which accounts for the majority of diabetes cases, is a progressive condition in which the body becomes resistant to the normal effects of insulin and/or gradually loses the capacity to produce enough insulin in the pancreas. The cause of type 2 [diabetes](#) is unknown.

"IER uses short periods of severe energy restriction – 500 calories for women and 600 calories for men - followed by periods of habitual eating to achieve similar health improvements as daily dieting but unlike some IER diets, does not require non-fasting days to involve restricted dieting," Carter said.

"We achieved a 0.6 per cent drop in HbA1c in both groups which was a significant drop in that time frame and importantly all our participants who were on medication reduced their dosages which is important for both the individual and the health budget.

"Essentially you are achieving the same total energy restriction after seven days by following the two-day restriction and getting the same results."

The study was conducted in collaboration with the Sansom Institute for Health Research. It is a consortium of leading researchers with the aim of intervening early to prevent illness, improve health systems and services, creating more effective therapies and advancing health equality.

Provided by The Lead

Citation: Study finds 5:2 diet is useful weapon in fight against diabetes (2016, June 9) retrieved 20 November 2023 from <https://medicalxpress.com/news/2016-06-diet-weapon-diabetes.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.