

Understanding the mindset of dieters and how mindset relates to weight management

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Executive summary

Overview

Weight loss is challenging, and longer-term weight management takes time and persistence. Trying to improve activity behaviours provides low levels of natural motivation, but slightly more than improving eating habits or generally trying to manage weight. Initial motivation may theoretically be important but on its own is only a small piece of the puzzle to explain why people initiate, maintain, and succeed at weight management. Yet, despite being low in naturally rewarding properties, diet and activity behaviours remain a crucial part of weight management. The lack of natural reward creates higher demands on self-control, and therefore leverage activities people finding naturally rewarding to encourage them to change their behaviour or make these behaviours easier by providing better support and tools. In this research, as we have seen previously, engagement with the digital tools within the CSIRO Total Wellbeing Diet platform was the strongest predictor of weight loss success. The motivational variables captured in the mindset survey offered minimal predictive utility to the various stages of progress and success within the CSIRO Total Wellbeing Diet. These results further support the importance of promoting easy, rewarding behaviours such as self-monitoring.

The mindset survey

The mindset survey was developed by CSIRO behavioural scientists which aims to tap into the mindset of people contemplating a weight control program. It asks about motivation and what stage people are at with respect to healthy eating, being more active and managing their weight. The mindset survey was launched online in Australia in January 2020 on the CSIRO Total Wellbeing Diet platform.

The psychology of mindset

Psychological theories suggests that motivation is more than someone's intention to perform a behaviour. Motivation includes the quality of motivation that underlies this intent, some types of motivation are better for longer term success than others.

There are many reasons for doing things. Doing things for yourself creates the highest quality motivation types. Intrinsic motivation (eq., doing something for the fun of it) and internal motivation (eq., reinforces how you see yourself) are considered the highest quality motivation. Reasons that are external (eg, doing it for the money or praise from others) are considered to create lower quality motivation.

Value and identity have been identified as key drivers of sustained behaviour in the context of eating. Identity is another psychological construct. It is complex and multifaceted, but also likely to be motivating to initiate behaviour and achieve goals that are consistent with how one views themself.

Beyond motivation specifically relating to lifestyle and weight management, a person has broader drivers and aspirations that may be leveraged to cultivate higher levels of intrinsic motivation. These may be important to understand in terms of a person's context, particularly when behaviours themself may not provide intrinsic reward (for example, restricting junk food).

As well as motivation quality, people are trying to change their behaviour in the context of previous experiences. The stage that people are at with improving their diet, exercise and weight management related behaviours could also underpin their mindset and subsequent success.

Stages of Change is one of the most well-known theories about how people progress through different stages of behaviour change. Each stage of behavioural change may require different actions or motivations to progress to the next stage, and this progression tends not to be linear. Rather people may cycle through stages. An individual may cycle between acting, relapsing and trying again many times before entering a stage called maintenance.

In this analysis, we focused on 5 different stages of readiness to healthy eating, being more active and managing weight. These were:

- 1. Disengaged: Being undecided, seeing no need to start, or having tried but not trying again
- 2. Early stages: Decided to try but not yet started, or recently started
- 3. Planning to start again (relapse): Tried and planning to try again
- 4. Still Active: Tried and still trying, or trying and making progress
- 5. Successful (maintenance): Being successful

Mindset of Australians

- Over 128,000 Australians completed the mindset survey. Most were female (85%) with an average age of 51 years. Among this sample, 33% were classified as overweight and 53% as obese.
- Most people had actively tried to manage their weight many times before: 41% people had attempted to manage their weight 1-5 times in their lifetime, 22% had tried 6-10 times, and 16% had tried more than 25 times.

Readiness to manage weight, diet, and exercise behaviours

- The survey asked participants, of whom the majority were classified as overweight or obese, about their readiness for healthy eating, being more active and managing their weight. Across these three domains, very few survey respondents felt successful in doing this with only 12% feeling successful in being more active and 8% successful at healthy eating. Fewer felt successful in managing their weight. Changing what we eat and managing our weight is a longer-term challenge. It is a journey that is not always associated with feelings of success.
- In this sample, 59% of people were in the early stages of managing their weight or planning to start again, another 37% were actively trying to manage their weight. Compared to those people classified as normal weight based on their Body Mass Index, about twice as many people classified as obese were in the early stages of healthy eating (29% vs 16%) or planning to start healthy eating again (18% vs 10%), and likewise for planning to start again to manage their weight (23% vs 13%).

Motivation for weight, diet, and exercise

- Most people in this sample reported the highest level of autonomous motivation for being more active (38%) followed by healthy eating (25%) and then weight management (17%).
- More women were most motivated by diet compared to men (26% of women vs 18% for men). Less people classified as obese were more motivated for exercise (36% vs 43%) relative to normal weight people. A slightly higher proportion of people classified as obese were most motivated by the areas of diet (26% vs 23%) and weight (18% vs 14%) compared to normal weight people.

Aspirations and identity

- Life aspirations were classified as being all or mostly external, or all or mostly internal/intrinsic. 77% of people who completed the mindset survey reported all internal/intrinsic aspirations and another 20% mostly internal/intrinsic aspirations.
- The most common internal/intrinsic aspiration selected was health (selected by 86% of people). Consistent with our other Mindset analysis, most Australians want the same thing: Health.
- Other commonly selected aspirations were happiness (78%), self-acceptance (47%), purpose (33%) and connection with others (30%).
- In terms of identity, almost six in ten were classified as desiring to be described as a Go-Getter (58%), followed by a Foodie (24%) or Attractive (11%). People classified as obese were more likely to value the Foodie identity (26% vs 18% for normal weight) and less likely to value an attractive identity (9% vs 15% for normal weight) than those in the normal weight category.
- Intrinsic motivators are things we do just for fun and could be described as hobbies. The most popular hobbies among Australians were those that involved connecting with others, nature, pets or oneself (meditation, relaxation) with 81% of people selecting one or more of these.
- Sedentary pursuits such as watching tv or using the internet were selected by 76% of people in the obese category and 66% of those in the normal weight category. Arty pursuits including crafts were selected by a greater percentage of those in the obese category (24% vs 17% of normal weight). Whereas active hobbies like walking and exercise were selected by lower percentage of people who were obese (53%) compared to other weight status groups (62-68%).

Mindset and weight loss

- About 11,000 overweight or obese people who completed the mindset survey went on to join the CSIRO Total Wellbeing Diet (n=10,892). The overall weight loss in this group of members who had completed the mindset survey and then joined the TWD program was 3.5kg or 3.8% of their starting body weight.
- These members were divided into TWD program starters and stayers, with stayers considered to have completed the program and had a weight entry in the system at the end of the 12-weeks.
- Among those who finished the 12-week program (the stayers), the average weight loss was 5.3kg at the end of the program, which equated to 5.8% of starting body weight.
- A weight loss of five percent or more is considered a clinically significant amount and has been associated with improved health outcomes. Over half of the sample (56%) who signed up for the TWD program after taking the mindset survey lost 5 percent or more of their starting body weight.
- In terms of readiness to change, it was people who reported being disengaged in healthy eating before they signed up to the TWD who lost most weight. This group of people who reported being disengaged with healthy eating before they signed up lost 6.5% of their starting body weight and those who felt disengaged in being more active lost 6.3% of their starting body weight. Another subgroup who did better than average were people planning to start managing their weight prior to joining TWD. This group of people lost 6.4% of body weight.
- Those who identified most strongly with being Attractive lost slightly less weight than those who identified as Foodies (5.4% vs 6.0%). However, the relationship between the strength of each of the identities and percentage weight loss was very small.

Predicting progress

- There were three stages of program progress captured in the current analysis: (i) Program sign up; (ii) Signed up for program and stayed the 12 weeks; and (iii) Stayed on the program became amongst most successful in losing weight (ie top 20% of percentage weight loss).
- Overall, the motivational variables captured in the mindset survey offered minimal predictive utility to the various stages of progress and success within the CSIRO TWD.
- A higher proportion of people who were only internally/intrinsically motivated signed up to the TWD (82% vs 77% for those that didn't sign up), and a slightly higher proportion of people who wanted to see themselves as Go-Getters as their top identity signed up (62% vs 57% for those who didn't sign up).
- Among those who finished the TWD program, 84% were entirely internally/intrinsically driven compared to 81% of starters who didn't finish the program. Stayers were more likely to feel successful (12% vs 9%) or in the still active phase of being more active (44% vs 39%) than starters. Starters were more likely to be planning to start being more active again (31% vs 26%).
- The strongest predictor of weight loss success was interaction with the TWD platform. Like previous research, TWD platform usage was again the key predictor of weight loss success, having a larger influence on weight loss success than all the motivational variables combined. Those with the highest food and weight tracking were more likely to be in amongst the most successful with their weight loss.

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