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Greater improvements in diet quality in participants randomised to a commercial weight loss programme compared with standard care delivered in GP practices

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An international randomised controlled trial showed that referral to a commercial weight loss programme led to significantly greater weight loss at 12 months than referral to standard care delivered in GP practices⁽¹⁾. This analysis considers the specific dietary changes that occurred during this intervention using data from the UK centre.

There were 236 participants who were overweight and obese adults (91% female; mean (sD) age 47 (14) years; BMI 31.2 (2.4) kg/m²). They were randomised at baseline to either Weight Watchers (WW; free access to weekly WW group meetings for 12 months) or standard care (SC; weight loss advice from a primary health care practitioner, with a suggested minimum of six visits over 12 months). Both interventions encouraged reductions in total energy intake and adherence to UK nutrient guidelines. All participants completed a 4-d food diary at baseline, 6 and 12 months. We hypothesised that WW participants would significantly reduce their intakes of total energy, total fat, saturated fat and total sugars and increase the fibre density (g/MJ) of their diets, relative to SC at 6 and 12 months after baseline. Longitudinal mixed effects models were applied to investigate changes in dietary intake between the two treatment groups at 6 and 12 months.

The table shows that in comparison with SC, WW participants reported significantly greater reductions in total energy (745 kJ/d, P = 0.028), total fat (9.6 g/d, P = 0.033) and saturated fat (4.0 g/d, P = 0.033) and a greater increase in dietary fibre density (0.3 g/MJ, P = 0.016) between baseline and 12 months. Similar statistically significant findings were observed for these nutrients in the WW group at 6 months. The greater reduction in energy intake is consistent with the greater weight loss observed between baseline and 12 months in the WW group (mean (SE) weight change of -6.7 (0.7) kg for WW v. -4.0 (0.7) kg for SC, P = 0.006).

	Months after baseline	Difference in mean change: WW compared with SC	SE	P-value*
Energy (kJ)	6	- 797	316	0.012
	12	- 745	339	0.028
Fat (g)	6	-9.9	4.2	0.019
	12	-9.6	4.5	0.033
Saturated fat (g)	6	-3.8	1.8	0.034
	12	-4.0	1.9	0.033
Protein (g)	6	-5.4	3.2	0.093
	12	-3.2	3.5	0.358
Carbohydrates (g)	6	- 16.8	8.9	0.060
	12	- 14.0	9.8	0.153
Sugars (g)	6	-6.4	6.1	0.293
	12	-5.2	6.8	0.445
Fibre density (g/MJ)	6	0.4	0.1	0.002
	12	0.3	0.1	0.016

^{*}z-test for significant difference between groups, mixed linear model.

In conclusion, UK participants randomised to a 12-month commercial weight loss programme (Weight Watchers) reported greater improvements in dietary intake compared with standard care delivered in GP practices, including reductions in total energy, total fat, saturated fat and increases in fibre density.

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1. Jebb SA, Ahern AL, Olson AD et al. (2010) Obes Rev Suppl. 1, 240.