

Evaluation of NHS referral of postnatal women to a commercial, community-based lifestyle modification programme

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It is well established that the period following pregnancy and childbirth is a time when women are likely to gain weight. This has significant consequences for further pregnancies as obese women have a higher risk of impaired glucose tolerance and gestational diabetes, miscarriage, pre-eclampsia, thromboembolism and maternal death⁽¹⁾.

Suitable women ($n = 547$) who presented with a BMI above 30 at antenatal booking clinics in the NHS Tayside (Scotland) region were offered access to a commercial, community-based lifestyle weight management programme (Weight Watchers®) in the postnatal period. Participants received vouchers to attend 12 weekly community meetings, combined with access to online and mobile tools. Data was collected by group leaders and relayed to a central database (weight measured in meetings on calibrated scales). Analysis was based on 87 referrals that commenced between April and June 2012 and completion was defined as attendance at 9 or more meetings ($\geq 75\%$ engagement). Intention-to-Treat analysis, Baseline Observation Carried Forward (ITT BOCF) was carried out where those attending 8 or fewer sessions were assumed to have maintained their baseline weight (weight change = 0).

At baseline participants had a median age of 32 years (Inter Quartile Range 29.1–36.7) with a median BMI of 34.4 kg/m² (Inter Quartile Range 31.9–39.1). Participants lost an average of 4.84 (SD 4.49) kg, equating to 5.10 (SD 4.79) % of their initial body weight (ITT BOCF). Of the 87 women who were referred 55 (63.2%) completed 9 or more sessions. A higher proportion of older women (32 or above) completed the course (69.8% versus 56.8% respectively) and there was a strong association between the number of meetings attended and weight loss (Pearson correlation coefficient 0.748, $P < 0.01$) and this was reflected in the ITT analysis. Comparison of weight loss in completers showed that older women had a higher mean % body weight loss than younger participants.

Age group	n	Weight loss (kg)		% body weight loss		BMI change (kg/m ²)		$\geq 5\%$ body weight loss n (% of age group)
		Mean	SD	Mean	SD	Mean	SD	
ITT BOCF								
<32years	44	3.87	4.24	3.95	4.33	1.42	1.58	19 (43)
≥ 32 years	43	5.83*	4.57	6.27*	4.99	2.18*	1.70	29 (67)
Completers								
<32 years	25	6.82	3.36	6.95	3.45	2.51	1.28	19 (76)
≥ 32 years	30	8.35	2.92	8.99*	3.29	3.12	1.07	29 (97)

* $p < 0.05$ for difference from mean for <32 years using student *t*-test comparing age groups.

In conclusion, this community-based lifestyle modification programme may be an appropriate intervention for postnatal weight loss in overweight and obese women.

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1. National Institute for Health and Clinical Excellence (2010) Dietary interventions and physical activity interventions for weight management before, during and after pregnancy. <http://www.nice.org.uk/nicemedia/live/13056/49926/49926.pdf>.