

# Free Meal Weight-Loss Program Beat Usual Care

BY DOUG BRUNK

FROM JAMA

Overweight or obese women who were assigned to a structured weight-loss program with free prepared meals lost a significantly greater amount of weight at 2 years than did those who received usual care.

In addition, a greater proportion of women enrolled in the program maintained a 5% weight loss at 2 years than did those who received usual care.

"For clinical practitioners, the evidence suggests that the structured program as applied in this study provides another route for their overweight or obese patients to achieve and maintain weight loss through behavioral changes for at least a 2-year period," researchers led by Cheryl L. Rock, Ph.D., of the University of California, San Diego, wrote (JAMA 2010 Oct. 9 [Epub doi:10.1001/jama.2010.1503]). For the study, 442 overweight or obese women at one of four study sites were randomly assigned to one of three groups: an in-person center-based intervention group, a telephone-based

intervention group, or a usual-care group.

Women in the intervention groups received free one-on-one weight-loss counseling for 2 years, and were educated on recommendations for a nutritionally sound, reduced-calorie diet with 20%-30% of calories from fat, and 30 minutes of physical exercise at least 5 days per week. They also received free access to prepackaged prepared foods from Jenny Craig Inc. to help them achieve their nutritional goals.

"Over time, participants were transitioned to a meal plan based mainly not on food provided from the commercial program, although participants could choose to include one prepackaged meal per day during weight-loss maintenance," Dr. Rock and her associates noted.

Women assigned to the usual-care group received a 1-hour consultation with a dietetics professional at baseline and at 6 months.

During these sessions, they received publicly available materials on dietary and physical activity recommendations to achieve and maintain weight loss, as well as sample meal plans and advice on reading food labels and estimating serving sizes. Women in this group were fol-

## VITALS

**Major Finding:** Women enrolled in an in-person center-based intervention for weight reduction lost a mean of 7.4 kg in 2 years, compared with 6.2 kg in a telephone-based intervention group, and 2.0 kg in a usual-care group.

**Data Source:** A randomized, controlled trial of 442 overweight and obese women enrolled at four study sites over a 2-year period.

**Disclosures:** The study was supported by Jenny Craig Inc. Dr. Rock disclosed that she served on the advisory board of the company from 2003 to 2004. None of her coauthors reported having any relevant financial conflicts.

lowed up monthly via e-mail or telephone contact.

All study participants received \$25 for each completed clinic visit, but no payment was provided for participating in the intervention or counseling sessions.

The mean age of study participants was 44 years, and 73% were non-Hispanic white. At 2 years, 407 participants remained in the trial, for a retention rate of 92%. The mean weight loss was 7.4 kg in the center-based group, 6.2 kg in the telephone-based group, and 2.0 kg in the usual-care group. In addition, 62% in the center-based group and 56% in the telephone-based group had maintained a weight loss of at least 5% by the end of the study period, compared with just 29% in the usual care group.

A reduction in C-reactive protein levels and improvement in leptin levels were greater in both intervention groups compared with the usual-care group, but there were no significant intervention effects on other measures, including cardiopulmonary fitness and cholesterol levels.

Dr. Rock and her associates acknowledged certain limitations of the study, including the fact that the prepackaged foods were provided free of charge. If women in the intervention groups were paying out of pocket, participant food costs would have averaged \$85 per week for a total of \$4,080 for the year, they wrote.

They also noted that weight-loss program counselors were unblinded, "which may have influenced their behavior and effectiveness, although they were instructed to provide the program and services as designed to be delivered to paying customers." ■

## Providing Programs for Free Might Be Worthwhile

The fact that participants received both the food and the counseling without incurring any cost, and received reimbursement for completed follow-up visits, may have increased their length of stay in the program and affected the results achieved.

The findings of this trial raise the possibility that if structured commercial weight-loss programs could be provided free of charge to participants, both retention and average weight-loss outcomes might be far better than when participants must pay for these

programs. Currently, insurance companies will cover the cost of bariatric surgery for obesity (estimated at \$19,000-\$29,000 per patient from insurance data), but they do not cover the cost of commercial weight-loss programs (such as that evaluated in this study, with estimated costs of approximately \$1,600 for 12 weeks of the program and for food).

Providing commercial weight-loss programs free of charge to participants might be a worth-

while health care investment. Future studies should examine whether providing commercial programs free of charge to participants would be a cost-effective approach.

RENA R. WING, PH.D., is director of the Weight Control and Diabetes Research Center at Miriam Hospital, Providence, R.I. Her comments were made in an editorial published online (JAMA 2010 Oct. 9 [Epub doi:10.1001/jama.2010.1529]). She disclosed that preparation of the editorial was supported by the National Institute of Diabetes and Digestive and Kidney Diseases.



# Internet-Based Weight Maintenance Yields Mixed Results

BY DOUG BRUNK

FROM THE ANNUAL MEETING OF THE OBESITY SOCIETY

SAN DIEGO – There were no significant differences in the amount of weight lost at 18-month follow-up among adults randomized to a weight management program delivered online, compared with those randomized to the same program delivered in person.

However, a significantly greater proportion of self-monitoring records were submitted by adults assigned to the online group, compared with those assigned to the in-person group.

"We didn't know whether or not the delivery channel impacts weight-loss maintenance, but there are reasons to think it might be different online," Delia Smith West, Ph.D., said at the meeting.

"We know that the maintenance phase is characterized by a decrease in session attendance. It can be a fairly marked decrease between the initial weekly ses-

sions of weight-loss reduction and weight maintenance. We also know that self-monitoring falls off," she noted. "The ability to attend your session online might be associated with a decreased burden and therefore greater adherence."

For the study, Dr. West and her associates evaluated weight maintenance and treatment adherence among 481 adults who received the identical group weight-loss program.

The treatment goals were to help participants modify eating and exercise habits, with modest calorie restriction, 25% or fewer calories from fat, exercise up to 200 minutes per week, and daily self-monitoring of dietary intake and physical activity.

For this component, the participants who were randomized to the in-person group tracked their progress in a paper-based journal while the online group tracked their progress in a computer-based journal.

Of the 481 patients, 161 were random-

ized to online delivery of the program during weekly sessions for 6 months, 159 were randomized to in-person group delivery of the program during weekly in-person sessions for 6 months, and 161 were randomized to receive a mix of both weekly online and in-person delivery sessions for 6 months. Maintenance continued for 12 months, said Dr. West of the Fay W. Boozman College of Public Health at the University of Arkansas for Medical Sciences, Little Rock.

The mean age of subjects was 47 years, 28% were black, and 93% were female. Their mean weight was 97 kg, and mean body mass index was 36 kg/m<sup>2</sup>; 65% reported being a college graduate.

Dr. West reported that at 6 months, the amount of weight loss significantly favored the in-person group (a mean of 18 lbs, compared with a mean of 14 lbs for the hybrid group and a mean of 12 lbs for the online group). However, there were no statistically significant differences in total weight loss between the

groups at 18 months (a mean of 12 lbs for the in-person group, a mean of 9 lbs for the hybrid group, and a mean of 6 lbs for the online group).

The overall rate of weight regain at 18 months was similar between the groups (a mean of 6 lbs for the in-person group, a mean of 4 lbs for the hybrid group, and a mean of 5 lbs for the online group).

The proportion of study participants who were able to attend all scheduled sessions over the 12 months of the maintenance program did not differ between the groups (37% for the in-person group, 33% for the hybrid group, and 41% for the online group), but a significantly greater proportion of self-monitoring records were submitted by the Internet group (28%, compared with 14% by the in-person group and 20% by the hybrid group).

The study was funded by the National Institute of Diabetes and Digestive and Kidney Diseases. Dr. West said that she had no relevant financial disclosures. ■